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Digital Comics Ecosystems:

Investigating creation, publishing, consumption, and communication practices

Linda Berube

A dissertation submitted in partial fulfilment

of the requirements for the degree of

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at

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Department of Science and Technology

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Declaration

‘I, Linda Berube, confirm that the work presented in this thesis is my own. Where information has been derived from other sources, I confirm that this has been indicated in the thesis.'



Abstract

The digital technology that has ‘disrupted’ creation, production, and consumption processes as well as communication models in publishing has had no less of an impact on the comics industry. Those who participate in the making of digital comics, including creators, publishers, and readers, have adapted to these changes by developing new models and processes, as well as new understandings and uses of the comics themselves.

But there is a noticeable empirical and qualitative gap in the kind of research that would address this disruption from the perspective of those who participate in the making of digital comics. To address this gap, the context for this research has expanded beyond comics studies and comics publishing to the broader publishing environment. By doing so, other influences that intersect with digital comics and their makers have been considered to provide a theoretical framework through which to conduct empirical research. These include communication from a sociological and digital perspective; publishing, including book history studies; the production of culture and comic works; and the influence of platforms on how digital comics are made and used.

The research findings have been identified through the lens of empirical data gathered from UK-based makers, including creators, publishers, platform providers, and consumers-readers. This user-centred data has been analysed and understood through the theoretical framework, contributing to a digital sociology of comics. Three major research themes evolved from the findings: the new makers, roles, and ways of working in the production of digital comics culture; the influence of materiality and embodiment in the experience of digital comics; and the different kinds of communication that build relationships and support through the vehicles of process, platform, and content.

Therefore, this research is not just about digital comics but how their making and makers contribute to the building of a digital comics ecosystem that is at once part of a wider digital ecosystem and user-generated personalized ecosystems. Digital comics, along with memes, video shorts, and similar visual media, are part of the currency and language of the web. They are used to communicate on comics- and non-comics platforms where UK digital comics makers create, discuss, live.

The significance of this research is represented by its contribution towards a sociological approach to digital comics through an empirical, theoretical, and thematic framework of study. This framework is based on the experiences of participants in the digital comics ecosystem: this approach provides for a holistic and human-centred investigation of the processes, use of technology, and communication that contribute to the making of digital comics. Its objectives are not only to understand the processes themselves through user experience but also to contextualize them within a wider digital comics ecosystem, indeed digital ecosystem, that can be comics-based but often is not.

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The British Library (BL), in the persons of Ian Cooke and Stella Wisdom, in their 'wisdom' (see what I did there, I'm sure you've heard them all, Stella) saw the potential for digital comics as not only a subject for study, but also as important content for collection development. In turn, Ernesto Priego and Stephann Makri from The Centre for Human-Computer Interaction Design (HCID) at City St. George's, University of London, had the foresight to respond to the British Library's call for a CDP partner, seeing something more in the study of digital comics than circumscribed by comics studies. Had I not been placed in an environment that on the surface seemed alien to the study of comics, I would not have been intellectually stretched to see digital comics on a larger, more user-centred stage.

To all my supervisors, I offer my heartfelt thanks for the support, patience, and sharing of knowledge and experience.

The staff at the BL and City St. George's are owed a debt of gratitude for accepting this cuckoo in the nest, but also for offering material help in tracking down participants for study, assisting with recruitment, the list is rather exhaustive. HCID people, past and present, are also to be commended for their support of a virtually visible, but frequently invisible, PhD student. I appreciated the writing retreats and research group, even if mostly in spirit. My fellow doctoral students have also been a constant source of advice. Apologies for not naming names, but people are too numerous, and I am in fear of forgetting someone.

The people “voluntarily cornered” who participated in this research, the creators, publishers, distributors, and readers, were my teachers. Before them, I hadn’t realized one could have an emotional response to a webcomic. Sad to say, but true. Now I know. Thank you.

There are people who must be named, there is no help for it. They have been so darned helpful. You, the reader, would not have been able to read this document if I were left to my own devices with formatting. How many versions, Jo, in the end? And that after a thumb operation! The figures in this dissertation would have been laughable, were it not for my brother, David, even amid his own difficulties, taking over and forcing me to confront actual graphic software. I also thank my mother, my earliest supporter.

I am saving the most important for last, as is the way of these acknowledgment things: don’t think anyone would be seeing a dissertation at all were it not for Frank’s support and encouragement. I guess I did something right in my life, and I am not referring to this dissertation.

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Chapter One
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> "Stories are a special genre. They are not lists of codes or categories. They are not frequencies. They are not decontextualized intellectual objects. Stories cohere. They have threads that get woven together-however unevenly and episodically. Their patterns end up linking codes, categories, themes, and other elements into stories that can become an analysis. Stories are fabrics of life. As such, they are situated in the practical details of everyday life" (Clarke and Star, 1998, p.342).

This dissertation has a story to tell about how people in their daily lives interact and communicate through their own personalized ecosystems with the assistance of their digital 'companions'—smartphones, tablets, laptops, and PCs—to create, publish, read, and discuss digital comics. These stories are not often told from the perspective of the people, the makers—in this instance, UK creators, publishers, and readers[1]. While "most of the research efforts have focused on analysing texts" (Cedeira Serantes, 2014, p.1), this research highlights the makers as they communicate and interact through technology to create, publish, distribute, consume, and read digital comics. It does so by employing research methods in a new way for the study of comics, namely a Human-Computer Interaction (HCI) approach (see Chapter Three for the use and influence of HCI methods in the research, and Chapter Four for a participatory design example from research participants). This approach enables a user-centred interpretation of the digital processes of comics, a 'digital sociology of comics', producing a new approach and reusable methodology for analysing digital comics combined with a multi-disciplinary theoretical framework.

The purpose of the research is not only to understand the processes themselves but also to address the larger research problem of how to contextualize

[1] Reader and consumers are not usually included as 'makers' in comics publishing. In this research they are. This inclusion is explained in the terminology section (1.2.1) as well as in the findings chapters. It should also be noted that there is a distinction between 'consuming' and 'reading' in the findings, with consumption considered within the theme of processes and reading within the theme of communication (see 1.2.1. 4.4, and 6.4)

them not only within a digital comics ecosystem but also the wider digital ecosystem that can be comics-based but often is not. Hernández and Bautista (2023) describe this context, suggesting that

> The most successful platforms are ‘centripetal’ (Scolari, 2022, p. 90) and seek to attract and retain users at all costs**…** It is not surprising, therefore, that many companies and brands or individual content creators are increasingly inquiring about what type of content and formats are the most sought after in these new digital markets that social media seem to have become (Hollebeeck & Macky, 2022; Stephen, 2016) (Hernández and Bautista, 2023, p.1).

In this wider context, digital comics, and especially webcomics, are among the “types of content and formats…sought after in these new digital markets”, not only illustrated by Hernández and Bautista’s study but also this research. It is not the content being examined in this research, but the processes. These processes, identified by the empirical, user-centred evidence supporting the production of culture framework for the research, are constructed by UK-based makers, including creators, publishers, platform providers, and consumers-readers. A production of culture framework provides a focus for understanding how the makers interact, and what they create, not just the comics themselves but the communities within digital ecosystems. Publishing (including book history), platform, and communication studies work with and within the production of culture framework to provide a theoretical lens through which to analyse the user-centred data.

While the research focuses on digital comics, it is more specifically about how UK makers, through the digital comics ecosystem, use comics and non-comics platforms to make and live in their own personalized digital ecosystems.

It provides qualitative, empirical support for what is anecdotally and theoretically known—for instance, that creation of comics, whether digital or print, is almost entirely digital as is their production. Moreover, it provides empirical evidence to suggest what might not be so well-known: for example, there is much variation in the creation and production of digital comics, revealing processes, practices, and device use that are adaptive, experimental but always focused on how to bring that comic idea, comic world into being and through communicating with others in the

wider world of the digital environment. It addresses the dearth of qualitative, empirical research in comics studies, which has generally been text-based, by focusing attention on the people and their relationship to the text through their digital companions. In doing so, it challenges assumptions about what a 'comics community' is, a frequently used phrase[2], and who comics readers are. In this sense, the research moves the discourse of digital comics beyond the theoretical and descriptive; indeed, it has opened it "to a range of analytical possibilities" (Murray, 2012a).

UK research participants demonstrated that there is not just one comics community, not even just one digital comics community. It is a combination of comics and non-comics spaces, communities, and personalized ecosystems woven into a larger digital ecosystem. Both offline and print activities and texts are included in these considerations of a personalized ecosystem, because the findings demonstrate that the digital does not exclude the analogue and vice versa. For some participants, print remains a primary focus, but even for these cases, 'digital' has an equal if not a stronger hold as it is seamlessly enfolded into their lives. Digital and print comics may be analysed separately in the scholarship, but they cannot be separated in the workflow, processes, and routines through which people live their daily lives, on and offline. Are these digital lives predictable and easily generalized? Of course not. There are occasional contradictions in the data presented, sometimes from just one participant. These examples not only illustrate the nature of ethnography (see Chapter Three) but also illustrate that digital ecosystems, driven by the platforms and systems upon which they are based, are constantly evolving as the participants in them do. In this sense, we are living in a post-digital age where the human response is the most important factor in this evolution (Cramer and Jandric, 2021).

1.1 Research Questions and Objectives

In this dissertation, I follow the story of the making of digital comics as told by UK comics creators, publishers, and readers. Along the way, I review the scholarship

[2]For example, it is used frequently in *The UK Comics Creators Research Report,* produced by former UK poet laureate, Hannah Berry, and the Audience Agency (2020). This is by no means the only research to do so: numerous articles cited in this dissertation include the phrase without reference to its meaning or scope.

to date on digital comics with an eye towards empirical qualitative research, as well as theoretical methodologies that contribute to research methods and analysis.

The motivation for research is to expand the study and understanding of digital comics by undertaking a holistic and human-centred investigation of the processes, use of technology, and communication that contribute to their making. This approach allows for the inclusion of lesser-researched subjects from an empirical perspective, for example, reader experience. The theoretical framework and qualitative empirical research methods seek to respond to the following research questions:

RQ1-Are digital comics a distinct form of comics with unique affordances shaped by creators, publishers, and readers?

RQ2-How do UK creators, publishers, and readers make digital comics? What are the specific processes for creation, publishing, consumption, and reading?

RQ3-What kind of communication takes place, what kind of relationships or communities are developed among those who create, produce, distribute, consume, and read digital comics?

RQ4-Does technology, for example social media, platforms, apps, etc., facilitate and influence this communication and these relationships?

The questions are phrased in such a way as to emphasize the makers of digital comics, how they use technology in the making process, and how they interact with each other and the text in the process of making. Capturing this experience was the main objective of the research. The choice of qualitative and specifically Human-Computer Interaction (HCI) methods ensured that the experience of the makers took priority, and that the data highlighted the complex relationships with the comics and with each other. It also served to illustrate the complicated and intimate, often embodied, relationships with the devices that enabled their access to digital comics and the multiple platforms that provided them. Access to these platforms facilitated the drawing together of multiple platforms by makers in the space of a day, constituting a personalized ecosystem in which digital comics formed a key part.

1.2 Terminology, Scope, and Limitations

1.2.1 Terminology

Because of the multi-disciplinary nature of the study of comics (reviewed in Chapter Two), any consideration of them will include unfamiliar terms to one or more categories of readers. For example, comics and comics studies have their own set of vocabulary with which comics studies scholars are conversant.

Even within comics studies scholarship, terminology and its definition form a core part of any discussion on comics, primarily because there continues to be significant disagreement about what a comic is (see Chapter Two), not to mention what a digital comic is. This research has proceeded from broad definitions of digital comics, including webcomics, ebooks, and graphic novels for one main reason: the nature of comics, digital comics, their definitions and usage, must derive from the makers, creators, producers, and readers as indicated by Research Questions 1 and 2. As explained in Chapter Three, the purpose of this research and Research Question 1 is not to produce a definitive definition for comics or digital comics. This dissertation presents not only what scholars have proposed, but, for most of the dissertation, primarily what research participants have experienced and how they perceive digital comics. In other words, the research is practitioner (or maker)-led.

In keeping with this approach, this research has adopted specific terms that are used throughout this dissertation. In some instances, they contradict the accepted versions of the terms but are derived from and make sense within the findings. Ultimately, an understanding of their use provides a context for the overall objectives and findings identified in this study.

Publisher or Comics Gatekeeper-Mediator (CGM)

The disruption to publishing processes caused by digital technology has resulted in changes to roles and responsibilities. For example, while ‘publisher’ was frequently used in early discussions of this research, its limitations soon became apparent. Traditionally, a publisher (including a comics publisher) is a company or organization that commissions or contracts with creators, then edits, approves, produces, publishes, and distributes books and other printed matter (Clark and Phillips, 2020). Publishers are the gatekeepers, the sentinels of what eventually

makes its way to the reading public. The approval or commissioning process, the criteria for acceptance depending on cultural and economic factors, is a major determinant of what becomes part of literary culture and a barrier to those looking to participate (Coser, 1975; Janssen and Verboord, 2015). In this way, publishers have an impact on and control over those cultural objects they choose to produce.

The impact of digital technology on the text has affected publishers and publishing companies, what they do and who they are. The rise of self-publishing has expanded the definition of publisher to the extent that it is no longer just associated with commercial publishing houses. Webcomics, for example, created digitally and delivered online via a website to be read online, are often produced, financed, and published by individuals. Not only have the publishers changed, but the business models as well, according to Dowthwaite (2017):

> "The recent phenomenon of internet-based crowdfunding has enabled the creators of new products and media to share and finance their work via networks of fans and similarly minded people instead of having to rely on established corporate intermediaries and traditional business models" (p. iv).

As a result of this uniquely digital environment, a more descriptive term for publishers was required to represent the changing relationships between comics producers and distributors and digital comics. Lewis Coser (1975) coined the phrase "gatekeepers of ideas" for publishers in the 1970s. They "provide institutional channels for the flow of ideas… as they are empowered to make decisions as to what is let 'in' and what is kept 'out' (p.15). J. B. Thompson (2010) maintained that 'gatekeeper' "greatly oversimplifies the complex forms of interaction and negotiation between authors, agents and publishers that shape the creative process" (p.17).

While various delivery platforms and apps that facilitate self-publishing do not, at least in an obvious way, control what is produced, they, as well as traditional publishers, still act as gatekeepers in the digital environment. Some do so by explicitly prohibiting certain types of content, for example those deemed offensive or Not Safe For Work (NSFW) (see Chapter 3). Some may be inadvertently restricting publication to certain groups through technology tools that are not necessarily easy to use, especially from an accessibility perspective.

For these reasons, instead of using ‘publisher’, Coser’s “gatekeeper” in combination with ‘mediator’-- comics gatekeepers-mediators or CGMs--will be used in this report and throughout the research to include:

- traditional book publishers and publishing companies
- delivery/distribution/retailer platforms
- self-publishers on dedicated personal websites as well as platforms, for example social media, crowdfunding, and creation/distribution sites
- collectives and other groups who facilitate delivery, promotion, and creative endeavours
- grant-funded projects, academic departments, and others whose objective is to create, promote, and support the creation of comics in applied settings.

Makers: creators, producers, publishers, distributors, readers, consumers

Perhaps because of the disintermediation of certain activities in the book and comics publishing processes, these roles need some explanation.

For example, the term ‘producer’ is used in this dissertation to distinguish from ‘publisher’, where often the former is subsumed by the latter as part of the overall traditional publishing process. However, with the rise of self-publishing, production (and editing) roles, including formatting, colouring, typesetting, design, anything having to do with producing the final file, are performed by the creator or third-party services. The concept of the traditional publisher has all but disappeared.

Publishing or ‘making available’ to the public and ‘distribution’ or sending to multiple retailers, online platforms, and stores happens as a distinct workflow within the overall process. In self-publishing, all three can be performed by separate parties or by only one. For example, a webcomics creator can create, produce, and then publish on their dedicated website as well as distribute across social media platforms. Another may contract all of these workflows out to one or more companies.

While in book publishing, ‘author’ is straightforward, in comics, ‘creator’ can include comic writers, illustrators, and anyone involved in the creation of a comic. In

this dissertation, those who create graphic novels are included in ‘comics creators’, although they are often referred to as ‘authors’ or ‘graphic novelists’.

The term ‘maker’ is used frequently in this dissertation. Generally, ‘makers’ are considered to be creators. In digital publishing, this can include publishers as well as creators which is often one role. The inclusion of publisher as a maker is especially pertinent to traditional comics publishing where publishers retained the rights and determined the content. According to the *Cornell Law School Legal Encyclopedia*, “A ‘maker’ is a person who makes, frames, executes, or ordains” (‘Maker’, 2021), a broad enough definition that allows, together with reader-response theory, for the inclusion of the reader and consumer. According to Wolfgang Iser (1972), a proponent of reader-response, every literary work has gaps: “thus whenever the flow is interrupted and we are led off in unexpected directions, the opportunity is given to us to bring into play our own faculty for establishing connections—for filling in the gaps left by the text itself" (p. 285). In this sense, the reader is involved in the creation of the text and, because multiple readers can have multiple interpretations and connections, the work is realized as many different texts. This perception of the mutability of the text is especially pertinent to comics, not only with its gaps or gutters between panels (McCloud, 1993) but also with the implicit sense of time and distance, all requiring the reader’s input.

Because of these considerations, as well as digital comic reader findings (see Chapters Four-Six), the term ‘maker’ will be equally applied to creators, publishers, distributors, and readers throughout the dissertation.

Reading and consuming, readers and users

The primary objective for creators and publishers is to get their comics to readers. What readers do with the comics upon receipt, their reading and response to that reading (in other words, communication with the text, sharing, discussing, co-creating) is differentiated in this research from the act or process of consumption. In Chapter Four, which explores the findings on processes of digital comics creation, production, publishing, and consuming, two aspects of the readers’ consumption is explored: firstly, consumption (the various decisions leading up to and after purchasing) as it happens intentionally and incidentally, and what place it has in the daily lives of committed and casual comics readers. For both, findings were focused

on the degree of decision-making or agency in consumption and the manner of consumption: in other words, how and where do consumers-readers encounter comics. The distinction between consuming and reading is reviewed in Chapter Two (see especially 2.5.3), while the activities of consuming and reading in this research are treated in more detail in Chapters Four and Six. I use the term ‘consumer-reader’ where relevant throughout to ensure not just that the two activities are perceived as distinct but also that they are understood as roles assumed by one individual within the makers’ creation-production-consumption chain.

I have opted for ‘readers’ over ‘users’ as much as possible and where applicable. ‘User’ is too amorphous a term for this research which seeks to be specific not only about interactions with digital comics but also about the individuals themselves. It is part of the findings of this research that individuals do not merely ‘use’, but interact, transact, and immerse, all activities pertinent to a ‘reader’.

Processes, workflows, and routines

At a fundamental level, these terms and what they mean are the foundation of this research, so it is important to differentiate between them.

Workflows usually happen within processes: they are a series of steps to complete a specific task. Multiple tasks make up a process that achieves an output, objective, or goal. The publishing process can be broken down into a series of workflows: creation, production, distribution, and consumption, with the goal being the published (made available to the public) comic or book.

While workflows and processes are considered a part of work, routine (not in the sense of coding) is a personal way of doing things, often at a particular time. It does resemble a workflow in that there are set steps, but it is considered more a part of daily life, sometimes a way of getting through the day. For examples within this research, see Chapter Four.

Platforms and ecosystems

Platforms differ from websites that provide information or content (through sales or for free) in that, aside from consumption, they provide other communication and creation opportunities within a setting that resembles a kind of “walled garden” (Murray and Squires, 2013). Essentially, readers are encouraged to spend time (and

money) on the platform providing selection, purchasing, and reviewing information gathered by platform owners. A network of platforms, instigated by platform owners through branding (Amazon and Goodreads, for example), commercial cooperation (WEBTOON and Patreon, for example), or through underlying systems and technology, constitutes an ecosystem, a subset driven by commerce and content within the larger web environment. Platforms and ecosystems are discussed in more detail in Chapter Two and throughout the findings chapters, Four-Six, as well as Chapter Seven.

Of specific note and illustrating the mutability of the platform economy, Twitter did not become X until after the collection of data had been completed. So, for continuity, Twitter is used throughout.

1.2.2 Scope and Limitations

The research topic and questions have been shaped by certain limitations and scoping issues, including the consideration of print, types of comics in scope, UK focus, and pandemic restrictions.

Print comics

Early in the research it became clear that the production, communication, and business processes for print comics would have to be considered and referenced. The inclusion of print comics is necessary not only because digital comics were and are still viewed as the next stage in comic evolution (McCloud, 2000), but also because print comics are still very much a feature in the comics market, with digital and print versions of comics often published simultaneously. Moreover, print comics are still prized by collectors. It is not uncommon for readers to possess the same title in print and digital formats (Priego, 2011; Stough and Graham, 2023). Findings related to print comics are included in Chapter Five.

Effects of pandemic (2020-2022) on research and research progress

This doctoral research began in Autumn 2019. By March 2022, the first of successive phases of pandemic lockdown in the UK (closing universities, cultural institutions, etc.) had commenced. These lockdowns affected this research in the following areas:

- Processing of ethics applications and approvals (Appendices I-III)
- Access to library publications (including print) for literature review, writing articles, etc. Physical closures at both City St. George's Library and the British Library meant that print publications were difficult to access.
- Working across institutions, The British Library and City St. George's, University of London, as prescribed by the AHRC Collaborative Doctoral Programme, working across two institutions. While dividing time between two institutions is part of the requirements of the grant, it has essentially doubled some of the challenges described in the previous bullet point regarding access. Both institutions endeavored to provide remote working services quickly, which meant multiple downloads, multiple systems, and all the problems that go with new software and systems, as well as new modes of working.
- Publishing environment during lockdown periods, affecting participants' availability to schedule interviews.

CGM interviews were conducted during the summer and autumn of 2021. Although pandemic conditions, for example lockdowns, had commenced in spring 2020, the most extreme effects on print-first publishing (encompassing the CGMT and CGMI book publishers, as well as the CGMM publisher of legacy comics) had yet to be felt at the time (however, this does not mean that there were no effects, see Brinton, 2021)

Focus on UK participants

The world of comics is composed of multiple making practices, often dictated by cultural, social, and economic systems. While there may be creative and publication practices that are common across countries, there are multiple differences in comics culture, business, and social status to indicate that a focus on one country's comic environment or one comic tradition, such as Anglo-American, would provide enough data for one research project. The focus on the UK digital comics scene provides a readily accessible and manageable research cohort. Moreover, "comics from the UK…[are] still [considered] a backwater in comics

studies" (Sabin, 2023, p.7). In this sense, the research contributes towards filling that gap.

While this research focuses on UK digital comics, US comics are a constant reference and comparison point, as they have been for comics internationally. Their influence is felt not only through direct distribution to the UK but also through trends, digital innovation, and, critically, through their attraction for British comics creators and readers (Sabin, 1993; Chapman, 2011).

Analysing British comics practice, sometimes through the lens of American comics and book publishing, has been a considerable challenge for this research. To add other comics spheres of influence, from Europe and Asia for example, would be detrimental because adequate representation would be challenging while not necessarily adding to the research. This is not a comparative study: mention of other comics influences, such as manga or bandes dessinées, occurs only to support research on subjects that also concern UK digital comics from the perspective of other scholars.

UK traditional comics publishers

Included in the publisher (CGM) cohort interviewed are those who have taken on the Intellectual Property (IP) rights for legacy UK comics, i.e., those that have a history of publication, mostly for print comic books, in the UK. However, the cohort does not include current traditional UK comics publishers, such as DC Thomson and Titan Comics, for example, largely because interviews could not be obtained, and because these are still mostly print-first with occasional digital versions (there are exceptions, see Beano Studios below). The UK comics market continues to be volatile (Sabin, 1993, 2000; Chapman, 2011), with publishers such as Glasgow-based BHP Comics (during this research) announcing they are winding down and comics publications taken over by, or converted to, multimedia platforms, for example DC Thomson and *The Beano* with Beano Studios ("a rebellious multi-media business powered by data and insight" according to its website). While smaller indie publishers were more receptive to interview requests, the larger media companies proved more difficult to contact. This is not unusual: Martin Barker (1989, 1990) observed the difficulties of gathering data from comics publishers, and these challenges still appear to be the experience for scholars even in the present day (an

academic speaker at the International Graphic Novels and Comics Conference (IGNCC) 2024 spoke of this challenge). Despite this lack, there is a good representation of publications and publishers that include various creation and production processes.

In addition, there is no specific focus on Welsh or Scottish or Irish comics simply because the research is focused on the makers themselves, and not necessarily on the comics. Accordingly, those interviewed have come from all over the UK, and in some cases, from outside the UK, for example UK students from other countries.

1.3 Dissertation Overview

This research has benefitted greatly from being situated within the Human-Computer Interaction (HCI) discipline and specifically the Centre for Human-Computer Interaction Design at City St. George's, University of London UK[3] (see Chapter 3.3.3). For the discipline and the Centre, the focus is on people and how they interact with and are challenged by not only hardware (devices including PCs, smartphones, and tablets) but also software and web-based platforms and content. HCI is not just about design application and usability: it is also focused on the more qualitative elements that describe the experience of that interaction. In a sense, the major focus of the research, the experience of creating, publishing, consuming, and reading digital comics, fits into a type of 'post digital paradigm' where 'digital' does not matter so much as the humans using it and what they make of it: there is no 'attachment' to or 'investment' in "one particular medium—no matter whether that medium is a white cube or the Internet" (Cramer and Jandric, 2021, p.987). Rather, the emphasis is on communities and how they "bring back joy and purpose to the arts" (Ibid).

An HCI approach to understanding the experience of digital comics means that the focus of this research is more of a qualitative understanding rather than a theoretical one, and human-based rather than content-based. In keeping with this approach, there are not many of those elements to be found in a more formal (ist) analysis of comics included in humanities research, for instance

[3] For more information, please consult the web page: https://www.hcid.city/?utm_source=city-web

• references to comics titles, characters, art, and storylines to be found in research that is solely focused on the textual and visual analysis of comics content

• images reproducing covers and comics panels (as combined with the above)

• the creation of a comic and writing about it to embrace fully the experience: this is a form of learning that predates comics studies (Tilley, 2017)

• writing the dissertation as a comic to embrace more completely the experience (Comics-based research, as illustrated by McCloud, 2000; also see Kuttner, Sousanis and Weaver-Hightower, 2017; Kuttner, Weaver-Hightower and Sousanis, 2021).

For the most part, these approaches are suited to formal (alist) comics analysis situated in literary, historical, or art disciplines and theories. However, none of them adequately support this research. Essentially, the focus of the research from early on has not been on comics content, but on the processes of making them as recounted by the makers themselves, contextualizing them within a wider digital comics content ecosystem that can be comics-based but often is not. This ecosystem, which overlaps with others (such as news ecosystems, for example), in turn is part of personalized user-generated ecosystems through which digital comics are created, produced, distributed, and consumed. Digital comics are not 'niche' cultural objects but part of the language or viral content of the web, contributing to multi-layered communication that binds relationships and community.

These themes evolve throughout the chapters of the dissertation, starting with the Literature Review. **The Literature Review (Chapter Two)** contains a survey of not only comics studies literature but also other related disciplines on the topics suggested by the research questions—the nature of digital comics; processes of creation, production, consumption, and reading; access to digital comics provided by technology, including devices, platforms, ecosystems; digital comics communities and production of culture. Although there is a strong theoretical framework underpinning the literature, from production of culture, platform, communication, publishing (including book history), and reader response studies, emphasis where possible has been placed on related qualitative, empirical research in comics studies (where a notable gap has been identified) and other disciplines.

Chapter Three, including methodology, methods, and analysis, emphasizes the 'human approach' taken in this research. This focus begins with the research questions, through to the ontological and epistemological influences, and is again evidenced in the qualitative, rapid ethnography approach, using specifically HCI data collection methods. Reflexive thematic analysis allows not only for user-led themes but also for a flexibility that identifies and tests research assumptions.

Chapters Four-Six present the findings, largely organized according to a framework composed of themes identified by the analysis and responding to the research questions: essentially, the processes (Theme 1) and technology (devices and platforms) that constitute the digital comics content ecosystem (Theme 2) through which communication, community and the creation of personalized digital ecosystems takes place (Theme 3). These three main themes provide a thematic framework linked to theoretical and empirical scholarship that supports a new approach to digital comics analysis.

The discussion chapter **(Chapter Seven)** expands especially on the notion of user-generated and -distributed ecosystems as they apply to a user-centred understanding of digital comics. These ecosystems place creators and readers in new roles of 'making', while introducing new types of publishers or CGMs. The thematic framework, derived from qualitative, empirical data and supported by a theoretical framework, constitutes a new research approach—a digital sociology of comics.

Finally, **Chapter Eight** highlights the significance of the research for diverse disciplines, including digital sociology, comics studies, digital publishing studies, HCI studies, communication studies, platform and ecosystem studies, reader-response, and digital archives development.

Taken together, the findings around the themes of processes and practices (Chapter Four) enacted through multi-layered technology (Chapter Five) and the kinds of communication facilitated by the digital environment, specifically platforms and ecosystems (Chapter Six), add up, not to a defined, enclosed digital comics community, but to a more elastic digital comics ecosystem composed of many communities. This ecosystem embraces comics and non-comics platforms as well as new types of creators, publishers, consumers, and readers. Comics creators interact

with other creators in person and online, and with their readers on dedicated websites and digital platforms. Digital comics readers, and specifically webcomic readers, have taken comics into noncomic communities using them to reinforce views and bonds within these communities. For these readers, digital comics have specific affordances that allow them to overcome economic, health, and social challenges.

In this sense, there is no one comics community (including print and digital creators, publishers, and readers) but a collection of interactive personalized ecosystems of user-generated and user-distributed content. These ecosystems encompass a digital comics content ecosystem, which can constitute comics culture, wherever commonalities of digital creation and production, content, and communication channels are present.

Chapter Two
Taking the Broader View: A Digital Comics Literature Review

2.1 Introduction

This research is composed of the stories of UK makers of digital comics, framed by four research questions that have also guided the literature review. In this chapter, I have gathered and assessed scholarship on digital comics, their processes and technology, and most importantly the people, alone or in community, who contribute to their making.

This research, empirical in approach, takes as its starting point the publication and production processes for digital comics, including creation, production, distribution, consumption, and reading. These processes are viewed through the lens of theory, specifically production of culture, publishing (including book history) and platform studies, and communication theories and models, in order not only to understand the processes themselves but to contextualize them within a broader digital ecosystem that can be comics-based but often is not. Therefore, while this review includes theoretical and empirical literature from comics studies on the topic of this research, of necessity as well as by design, it ranges across other academic disciplines.

Reviewing scholarship in other disciplines to understand digital comics publishing is the result of finding little in the way of sociological, specifically user-centred, empirically-based, research in comics studies, thereby revealing a gap in the scholarship.

Most comics scholars come from arts and humanities departments (McNicol, 2013) which produce scholarship that is largely theoretical in nature and textual and visual in analysis. Moreover, according to Woo (2019), comics studies has been dominated by the “self-theorizing discourse” of creators, fuelled by discussions to be found in “fanzines, amateur press associations, fan conventions, and eventually email listservs and discussion boards” (p.4, Woo borrows the quote on discourse from media scholar, John Thornton Caldwell, 2008). Woo’s essay reveals some of

the conflict around the theoretical (textual and visual analysis or descriptive and historical discourse, for example) versus the empirical in comics studies, especially concerning readers (see also Cedeira Serantes, 2014). Observation on the lack of empirical study (especially for readers) within comics studies begins with Barker (1989, 1990); Gabilliet (2010); Cedeira Serantes (2014; 2019) and proceeds onto Woo (2020); Hills (2020, 2023); and Hatfield (2022). While Woo's and Caldwell's assessment may appear to be challenging in tone, it is evident from this literature review that there is relatively little empirical, qualitative[4] discourse in comics studies as a whole, and even less for digital comics production and creation as well as digital comics creators and readers.

This gap in reader-centred empirical scholarship has been observed in book history and production studies as well as digital humanities and library and information studies, including such scholars as Murray (2012a, 2013); Cedeira Serantes (2014, 2019); Benatti (2019, 2024); Antonini and Brooker (2020); and Antonini et al. (2020). In Section 2.4, I will follow Darnton's (1982) Communication Circuit (and book supply) through the work of these scholars, focusing not only on communication and production but also on the readers' participation in these processes.

For this literature review, my recourse to other disciplines, both empirically and theoretically, has included publishing and book history (Thompson, 2010, 2021; Murray, 2019; Squires, 2019), platform (Helmond, 2015; Nieborg, Poell et al. 2018-2024), communication (Narula, 2006), and production of culture studies (Peterson and Anand, 2004; Brienza, 2010; Brienza and Johnston, 2016). Some of these also touch on a sociological, user-centred approach. In addition to these areas of research is the relatively new discipline of digital sociology (Marres, 2017; Fussey and Roth, 2020), "concerned with the shaping of social structures and social relations by digital technology and how the development and application of digital technology is affected by the social environment" (Zhao and Wang, 2023, citing Orton-Johnson and Prior 2013; Lupton, 2015; Marres,2017; Selwyn, 2019; Fussey and Roth 2020).

[4] There are more examples of quantitative research, including Arai and Mardiyanto (2011); Cohn and Maher (2015); Ha and Kim (2016); Cohn (2019); Hernández and Bautista (2023); and Benatti (2024).

The predominant focus of comics studies has created some of the challenges entailed in a literature review of research topics and questions that fall outside the major emphasis of the scholarship, requiring the multi- and interdisciplinary approach described above. However, the gap does provide an opportunity to build on the little empirical research there is for comics and specifically digital comics, allowing the makers' experience to take precedence and applying new approaches within the context of the broader digital ecosystem.

2.1.1 Chapter Overview

This research (and research questions) is based on the process of making comics in various digital environments and what the participant makers have to say about the processes and each other, essentially using HCI and related qualitative sociological methods for data gathering and analysis. The organization of the literature review proceeds from the research questions: beginning with the digital comics themselves and how scholars discuss and analyse them and then moving on to scholarship regarding their making or production and distribution. This last led to scholarship on the digital environments of creation, production, distribution, and reading, including the influence of platforms and access across platforms, in other words, ecosystems. Literature reviews rarely follow as straight a line as the above described: as previously noted, comics studies is largely theoretical and until most recently (2023-2024) treated digital comics within narrow analytical approaches (in a sense, it persists in being largely theoretical, focusing on definition, history, and text and visual analysis, for example). This necessitated branching out into other disciplines: media, publishing (including book history), cultural, and communication studies, for instance. Moreover, the literature review was conducted with a view to empirical research: essentially, had there been any consideration given to the makers themselves?

The chapter is composed of the following sections:

- The "Definitional Project" of digital comics, from the perspective of scholarship on materiality, mediality, and intermediality (2.2)
- The "Insistent Materiality" of digital comics, focusing not just on the content but also on the containers as constituent parts and their relation to the content (2.3)

- How Digital Comics Are Made speaks to the processes of production and distribution through the lens of publishing and platform studies (2.4)
- Communication and the Production of Comics Culture considers the community, communication, and culture associated with producing digital comics. It refers to production of culture and communication studies scholarship, using them as a framework for considering digital comics makers, especially readers (2.5).

The multi-disciplined approach to the literature review reveals that digital comics have a place outside of comics studies and comics-based platforms. It suggests research methods that emphasize what makers contribute to the understanding of digital comics. Their making processes are multi-faceted and can be analysed in any combination of ways, illustrating how they contribute to the building of culture and specifically the digitality of culture. They are based on communication that is multi-layered, multi-directional, and multi-purposed, including not just others but also the self and the text.

2.2 Digital Comics: What Are They Made Of?

> "The prevalent academic approach to the study of comics and graphic novels might be understood as one that defines itself by negation; scholars have focused on those formal qualities that differentiate sequential art from poetry or prose in order to create a theoretical vocabulary that might serve the discipline. However, for a scholar such as myself coming to comics studies from a different disciplinary background – that of book history and publishing studies – such a valorisation seems intriguing in the face of the form's insistent materiality, especially in the commitment of this approach to structuralist readings of image and text" (Murray, 2012a, from a *Comics Forum* post).

2.2.1 Introduction

At the beginning of the creation, production, distribution, consumption, and reading processes is the conception of the cultural artefact, the digital comic, upon which this publishing ecosystem is based. The first question of this research—are digital comics a distinct form of comics with unique affordances shaped by creators, publishers, and readers?—is not necessarily framed as a quest after what digital

comics are, but rather what differentiates them according to their makers—creators, publishers, and readers. As comics scholars, by their own admission, tend to be at least one of these, if not all, the literature review begins with them.

According to scholars, digital comics would appear to be shape shifters (Priego; 2011, Wershler, 2011; Antonini et al., 2020; Busi Rizzi, 2023), as they are not just dependent on the "insistent materiality" as observed by Padmini Ray Murray's 2012 blog post in *Comics Forum* (see also Murray, 2013; and discussion below on influence of platforms on cultural production, Nieborg and Poell, 2018). For digital comics, this insistent materiality is indeed an important component, but there are other approaches to understanding them. Instead of studying comics from the perspective of the "slippery relationship to literary and cultural legitimacy", Murray advocates, in keeping with book history studies, "a cultural materialist viewpoint" that proposes "a range of analytical possibilities". These possibilities include not only viewing comics as "material artifact", but from "the processes that [govern] their dissemination, circulation and reception" (as with Chartier, 1992 and Darnton, 1982, 1999 for books, see below). Interestingly, she feels the need to assure her reading audience that she is not trying to "diminish the role of author as auteur but was alert to the roles played by other agents in the production of a text" (her list of other comics' agents does not mention readers).

While this research is devoted to the makers' voices, including readers in that term, and how they speak of digital comics, it has been influenced by scholarly discussion seeking to define them from within traditional comics studies scholarship as well as without. That there is a difference of opinion, largely based on theoretical discourse attempting to parse digital comics, has been part of the motivation for trying to understand digital comics from the makers' perspective. This is not to suggest that makers can offer a definitive definition. What is definitive is their reactions and responses specifically to digital comics of whatever type, taking the discourse of digital comics beyond theory, history, description, and the ubiquitous comparison to print comics (illustrated by the "Digital Comics" chapters in comics studies anthologies). Although scholars mention a socio-cultural approach to digital comics (or perhaps the lack of it, see Priego, 2011; Murray, 2013; Wershler, Thon and Wilde, 2016, Lamerichs, 2020), discourse rarely encompasses the 'socio' in any experiential form, for example, usually referring to readers in a general, frequently

unsubstantiated way. However, in grappling with the format, the technology, and vocabulary, scholars have provided useful perspectives on what makes digital comics different that can contribute to a view of their unique offering as well as frame a sociological, empirical study.

The next section begins with a warning from Priego (2011) about the term “digital comics”. In much the same vein, I would like to admit to a particular challenge in conducting a literature review on ‘digital comics’. The challenge has been trying to determine whether, when a scholar refers to ‘comics’, they are including digital comics. In some cases, it is clear when they are and are not. But in other cases, it is not so evident, especially when their observations could pertain, however unintentionally, to digital comics. It could be argued that intentionality in this case does not make a difference, and to a certain extent, this is true. However, intentionality is a topic of discourse (see Kleefeld, 2020, for example) that matters in comics scholarship—for example, if a creator intends to publish a comic in print, what of the usually accompanying digital version? Has that been intentionally created as well? There is a vice versa for webcomic creators: if they are creating webcomics but with the intention of eventually publishing a print version, which is it ultimately? Some scholars (Kleefeld, 2020) have argued for this creator intentionality as the rule. In the findings for this research, there are participant creators who maintained that they did not create digital comics, for example comics creator CCT2 in Chapter Five, while digital versions of their comics had been published. These considerations are especially pertinent in discussions of materiality.

This digression is indicative of scholarly intentionality as well: sometimes scholars will mention digital comics as an aside, which will then beg the question, have they been speaking only of print comics all along? In my selection of literature, I have, for the most part, specifically chosen literature in which the subject is explicitly digital. However, with more theoretical scholarship (for example, the production of culture and comics studies), I have referred to those theories and observations that could also refer to digital comics, whether the relationship is explicit or not.

2.2.2 A Definitional Project

> “Digital Comics: This term requires a special warning. It is problematic and controversial, especially as digital tools are not a novelty anymore but the standard in comic book creation and publishing” (Priego, 2011, p. 227).

Two full-length considerations of digital comics, over ten years apart, are Scott McCloud’s (2000) *Reinventing Comics: The Evolution of an Art Form*, often referred to as a manifesto for the potential of comics in the digital age, and Ernesto Priego’s (2011) *The Comic in the Age of Digital Reproduction*, arguably the first full length analysis of materiality and comics with a specific focus on digital and digitized comics. Both regard digital comics “as a distinct form with unique affordances” (from Research Question 1) but for different reasons. One was written at a time when there was a sense of optimism for the new digital age; the other, ten years into this new age, harbouring some reservations but still looking forward to new developments. Both, in their separate approaches, attempt to move digital comics beyond the “definitional project” described by Meskin, (2007, p. 369).

Priego’s work in its consideration of the materiality of digital comics through formats, processes, publishing history, technology, and content, also offers a wide-ranging analysis that includes structural, formal, and socio-cultural factors, in the service of “provid[ing] an original –though tentative– definition of comics in consideration of their existence as different types of publications” (p. 45). Priego observes that a definition of comics, in general and specific, is usually a first requirement of the scholarship:

> Any definition of what digital comics and webcomics are or can be will depend on an agreed understanding of what the phenomenon of comics is. The definition of comics as a medium is in itself a complex debate with a rich history. In fact, the majority of the published histories of comic strips and comic books are also histories of the comics ‘definitional project’ itself. Most studies on comics participate in this debate, sometimes in painstaking microscopic detail (p.52).

Priego goes on to cite scholars who “question[s] the need to keep debating different definitions of comics”, for instance Meskin (2007, pp. 369-379). Priego agrees with this perspective but calls for more rigour in the scholarship that has until that time

meant that comics as primary sources were not adequately referenced if at all and lacked an agreed taxonomy (p53). While this view may have described the state of scholarship at the time of writing, comics studies has evolved and grown since then as an academic discipline. Moreover, as this “rich history” of “debate” over comics definition is still ongoing, it has, in a sense, prevented an understanding of digital comics beyond that debate. In fact, digital comics themselves are amassing a “rich history” of definition: as observed above, a consideration of digital comics is often represented by one chapter in comics studies anthologies, usually definitional, historical, or descriptive, or all three (see Busi Rizzi, 2023 for the most recent example). In 2011, Priego maintained that

> …the hybrid medium of ‘graphic storytelling’ is still a blind spot in mainstream culture, at least so in comparison to other art forms caught in the midst of the transition from the analogue to the digital such as literary prose, film or music, to only give three examples (p.61).

Judging from the number of comics studies’ articles and chapters still wrestling with what digital comics are, there would appear to be, if not a blind spot, then an obstacle to moving forward with a varied approach to analysis of digital comics as recommended by Murray(2012a), and especially one independent of print comics (examples of those that reference print as a whole or in part include Bell 2006; Campbell, 2006; Dittmar, 2012; Wershler, 2011; Goodbrey, 2013, 2017, 2023; Wilde, 2015; Wershler et al., 2020; Maity, 2022; and Busi Rizzi, 2023, some of these focusing on materiality which will be considered below).

Indeed, this research does not entirely avoid engagement with the topic of print. However, the works cited above differ from this study in that they largely operate within theoretical, definitional, or historical frameworks and rarely take an empirical approach. For example, scholars such as Priego (2011) and Kashtan (2018) examine digital comics and print comics as distinct instantiations within a broader comics context, although largely from a theoretical perspective. The special 2023 issue of *Studies in Comics*, titled *“Comics Strike Back! Digital Forms, Digital Practices, Digital Audiences,”* features articles that investigate digital comics both in isolation and in relation to print. Much of this work remains theoretical, including articles on mediality (Wilde) and remediation (Busi Rizzi and Di Paola; Goodbrey),

which maintain connections to print. Nicolle Lamerichs and Vanessa Ossa do explore themes of fandom and digital platforms. Gaëlle Kovaliv's contribution, *"Internet, the Paradise Lost of Comics? Observations on the Constraints behind Publishing Webcomics, Based on Interviews with Francophone Authors,"* provides the only empirical and process of culture-based research, analysing the purported freedoms and actual constraints of creating comics in a platform environment. Several findings from her interviews resonate with those presented in this dissertation concerning UK creators—especially regarding aspirations toward print publication ("Aiming for the book") and collaboration with funding partners ("Satisfying Partners").

This set of papers grew out of a 2022 conference of the same name hosted by the Ghent University (organized by Giorgio Busi Rizzi, post-doctoral research for the 'Digital Comics. Form and Function' project). Other recent initiatives for the study of digital comics as indication of increased interest in employing different analytic (if not necessarily empirical) approaches include "Comics in the Digital Era" initiative (2023) funded through the Ecole Polytechnique Federale de Lausanne (EPFL) in Switzerland and "Reconfiguring Comics in our Digital Era", a Swiss National Science Foundation funded project (2019-2024) for which Gaëlle Kovaliv at the University of Lausanne conducted doctoral research. In the UK, initiatives include my doctoral research as well as another at the University of the Arts in partnership with the British Library and funded by the AHRC. The European digital comic project, EUDICOM, aims to enhance the reading of comics through various electronic devices, including smartphones and tablets (Missiou and Tapsis, 2023).

The interest in what digital comics are, for this research, proceeds from creation-production into a consumption-reading 'lived experience'. Moreover, this lived experience through comics and non-comics platforms, according to the findings in this research, does not necessarily discriminate in which form comics are produced. All comics are born (created, produced) digitally: the output can be digital or print, often with similar physical elements (such as frames and panels). Priego (2011) offers a related working definition of comics at the beginning of his study:

> A medium that conveys narratives or other types of information through a layout of still images often in combination with written words, in various

> techniques and on different analogue, hybrid and/or digital platforms, arranged in one or more sequences on a delimited physical space, and separated from one another by the outlined or implied frames of panels, also commonly distinguished from each other by the 'gutter', which is a blank space between them (p. 56).

This definition includes everything a comic can be, including the "analogue" of print. At the same time, it is specific about the trappings or appearance of the comic: panels, gutters, and even blank spaces. However, there is a risk of being too specific, as there is a possibility of ruling out innovation, as discussed in the next section.

Multimedia, within limits

Priego (2011) was not necessarily satisfied with this definition and admits to omissions (mention of speech bubbles, caption boxes, for example) but feels that it is "simplistic to define a phenomenon by simply pointing at one or several of its specific manifestations" (pp 61-62). To enumerate, though, allows for a distinction often important to definition: inclusion or exclusion of elements. For his part, McCloud (2000) wanted all possibilities included for digital comics: "as wide as Europe or as tall as a mountain" (p. 222), essentially an "infinite canvas" (p.222), both practically, in terms of screen size, for instance, and conceptually, in terms of possibilities. In a previous publication, *Understanding Comics* (1993), McCloud describes comics as a sequence of images, but for all that not necessarily linear because of the part the reader plays in filling in between panels. In *Reinventing Comics* (2000), digital comics are listed as the twelfth "revolution" viewed in combination with the revolutions of "digital production" and "digital delivery", necessary for comics to survive. Graeme McMillan (2021), revisiting the work in *The Gutter Review* online, felt that for the most part it had been misunderstood (see controversies below). True, it had been "the butt of jokes", arguably for its enthusiasm for a digital exclusive world, but "when it comes to the big topics…McCloud was almost unerringly right, at least in broad strokes". These broad strokes included devices, third-party verification, digital distribution, and even that infinite canvas which, while rejected in favour of the traditional print panel page by several webcomics creators, is the basis of WEBTOON smartphone delivery. This

infinite canvas can be filled with all manner of things: hypercomics as well as motion and animation, among other media.

Kashtan's (2013) definition of medium or media (derived from Bolter and Grusin, 2003, p.65), is "a historically and culturally situated assemblage of technologies and physical parameters, which is employed for the delivery of some sort of content" (p.93), a definition that can include all the media mentioned above. Intermediation is when one medium crosses over to another, for example, animation into comics: Wolf expresses this intermediality as "any transgression of boundaries between conventionally distinct media" (Wolf, 2002, p.17, as quoted by Brown, 2018).

However, this particular example of intermediality is discounted by Priego (2011): "This study asserts that so-called 'motion comics,' video games, and animation are not and cannot be comics" (p.238). Moreover,

> the absence of real sound and real-time animation reveal(sic) that comics may do things on the screen that cannot be done on paper and vice versa, but that synchronous animation with sound belongs to a different realm in which comics stop being comics (pp.276-277).

That animation is included in definitions of webcomics by other scholars (for example, Goodbrey, 2013) gives some indication of an academic debate to which comics studies is not immune (for another one, see Materiality below). The draw of animation was regarded with some apprehension by creators to the extent that it sparked a fairly public disagreement (that spawned additional commentary) between Scott McCloud and Gary Groth, co-founder of *The Comics Journal* and Fantagraphic Books. Groth's "scathing" review of McCloud's (2000) *Reinventing Comics* is framed by Cave (2001) quoting a comics creator: "'the fighting is so fierce because the stakes are so small. No other industry could have this kind of debate because no other industry is so small and close-knit'". Those who have been vehemently critical of McCloud and especially his use of the word "revolution" might want to consider Donatella Padua's (2021) statement:

> A revolution is not a linear process. As in a volcanic eruption, a chaotic process develops, with change bursting from different points, after energy has

> built up over time. It's a sudden uncontrollable massive event. Again, no linearity, no predictability, and no control (p. 98).

Animation as a gauntlet as well as a line not to be crossed is picked up as a focus on mediality by Wilde (2015) in 'Distinguishing Mediality: The Problem of Identifying Forms and Features of Digital Comics' and again with Thon (2016) in 'Mediality and Materiality of Contemporary Comics'. Wild revisits "the theory of mediation" discussed in his article with Jan-Noel Thon (2016) in the above-mentioned 2023 *Study in Comics* issue, this time applying it to the webcomic *Erzählmirnix* (or *Emoticomix*) and including "semiotic-communicative", "material-technological", and "cultural-institutional" perspectives. Although there is a

> constitutive vagueness inherent in the fundamental question of how comics can be conceptualised as a medium, the fact remains that they are generally treated 'as conventionally distinct means of communicating cultural content' (Wolf 2005,253) and, hence, can be considered to be media that are 'conventionally perceived as distinct' (Rajewsky 2010, 61, original emphasis), even though – or, rather, precisely because – their mediality is 'not entirely predictable from semiotic type and technological support' (Ryan 2006, 23) (Thon and Wilde, 2016, p.234).

Here, Thon and Wilde indicate the "shape shifting" referred to earlier, if not for all comics, then at least for digital comics. As observed by Priego (2011), how technology in particular functions as a component of comics "is not entirely predictable", as with Thon and Wilde (2016), and this is because the progress of technology is not predictable. Wilde (2015, and with Thon, 2016) would disagree with the statement from Cave (2001) above: the "industry may be small", but the stakes are not: "Confronted with experimental webcomics and motion comics this ["to define a difference from animation"] is a pressing task for theorists and practitioners alike" (p.5).

Pertinent to this research, Wilde raises the subject of reader control in his review of literature on the subject of animation: "Daniel Merlin Goodbrey pursues this question with references to practitioners…who all seem to agree that 'Comics are Control' (2013a, 194)" (2015, p. 6). Quoting John Barber (2002), Wilde presents the view that control of "'the rate at which information is absorbed… is inherent in

comics; this is what separates comics from film'" (2015, p.6; see also Berube et al., 2024, in an exploratory empirical adjunct to this research on reader control). However, Wilde goes on to differentiate between "movement per se" and "the control over movement": if digital comics (specifically webcomics) are distinguished by the latter, then some, though not all, animated comics could certainly be included. Wilde cites Stevan Živadinović's *Hobo Lobo of Hamelin* (2011) as an example of the reader's control over scrolling "'according to individual pacing and interests'" (2015, p.6, quoting Dittmar, 2012).

It is most likely owing to these contradictions regarding multimedia and digital comics that Busi Rizzi (2023) in his chapter on 'Digital Comics: An Old/New Form' from the *Cambridge Companion for Comics* maintains that "the umbrella term of 'digital comics' as all kinds of comics that are read and consumed on digital supports still calls for clarification" (p.110). This clarification comes in a categorization of digital comics that is file-based and proceeds from the most prominent structural, multimodal component of comics, and includes

> …skeuomorphic ones (i.e., those that remediate the layout and static nature of paper comics); comics modulating their inter-panel succession (use digital affordances to do things that paper comics cannot do as effectively or evidently); comics featuring intra-panel expansions (different perception of the storyworld in comparison to traditional comics)…comics featuring enhanced panels (motion comics and AR comics) and those featuring explorable panels (hypercomics and VR comics) (pp. 110-112).

In describing these categories that identify the "(changing) shape of digital comics", Busi Rizzi does bring animation along in forming a hybrid version of digital comics but also observes that digital comics are "possibly complexified by the presence of sounds and animations (multimediality)" (p. 106). This complexity is most specifically in evidence when material agency or reader control is set against immersion, which is often defined as the reader's loss of control or 'abandonment' to the narrative or the device:

> In this case the relation between material agency and immersion seems to be inversely proportional: when the duration of animations cannot be interrupted, the text dictates and delimits its time of consumption, minimizing the users'

> material agency while (in theory) maximizing their immersion (Busi Rizzi, 2023, p115; see pp114+ for a discussion on immersion; again see Berube et al., 2024 for empirical evidence of this loss of agency).

Part of Busi Rizzi's discussion of immersion and agency is reminiscent of Kashtan's (2018) consideration of the "crystal goblet" and "golden goblet" designs, which will be explored in the next section.

Although this research included all types of comics—webcomics, app-based comics, graphic novels, branching narratives, and other interactive comics, for example—it did not include animation for the reasons cited above specifically to do with reader control and a distinct form of media. Moreover, one aim (RQ1) of the research was to seek out the unique affordances of digital comics in and of themselves, separate from other media.

Sociocultural considerations

Also raising the reader as a component of the definition of comics, Priego stresses the importance of the third layer of analysis in his research, the socio-cultural (the other two being formal and structural). He begins this third consideration with a call to memory:

> Nevertheless, at least for those readers born between 1946 and 1977, pointing to these examples of comics publications will evoke a series of remembrances, bringing back to life the memory of reading experiences of childhood (p. 61).

Part of these remembrances is that "comics can be identified on first sight" and that "the experience of what is meant by comics remains relevant" (p.61) and accessible at a popular level. This position is arguable currently where, for example, Nick Cohn's (2020) research makes a point of asking participants about their level of "fluency" in reading comics and not presupposing among other things exposure to the medium: "fluency [is] a proficiency acquired through exposure to and practice with a system of visual narrative" (p. 266). However, during the period Priego identifies as well as the time of writing, this fluency may have been an acceptable presumption.

Towards the end of his work, Priego provides another iteration of his definition of comics as a whole, incorporating his three phases:

> An important definitional trait of comics as a medium is rooted in the inseparability between 'form', (the vehicle by which the stories are told) 'content' (the system comics, what makes them recognisable in different physical formats) and 'context' (the ways in which human(sic) interact with comics as publications) (p.338).

He goes on to observe that "in this sense… the printed comic book is the paradigmatic cultural interface through which comics are experienced and by which they are identified" (p.338). This view is arguably valid given the date range he provides above and perhaps in correlation with the dominance of Anglo-American comics during that time. In 2011, "digitised comic books, webcomics and mobile comics offer unique case studies with which to interrogate the relationships between physicality and textuality" but cannot, according to his research, be considered a "paradigmatic cultural interface" (p. 338). However, in 2024, at the time of this writing, "paradigmatic cultural interfaces" have changed with the dominance of those mobile devices which over a decade ago would prove only a "unique" case study. People are living and reading daily in a different context or space where comics are viewed more frequently and solely through digital devices. Moreover, according to Hernández and Bautista's (2023) empirical study of "the interaction rates of posts tagged as webcomics", "spaces not defined exclusively for the consumption of comics [allow for] a broader exploration of the impact of the webcomic" (p.2). These research findings support this "broader exploration" especially with the concomitant expansion of another definition, that of the digital comics reader, as well as that of the creator/self-publisher (Hernández and Bautista, 2023, who also refer to Hajro et al., 2021; Hootsuite, 2023; Gustines and Stevens, 2022; Kaplan, 2022 "for reports on the consumption of social networks and digital platforms" p.2).

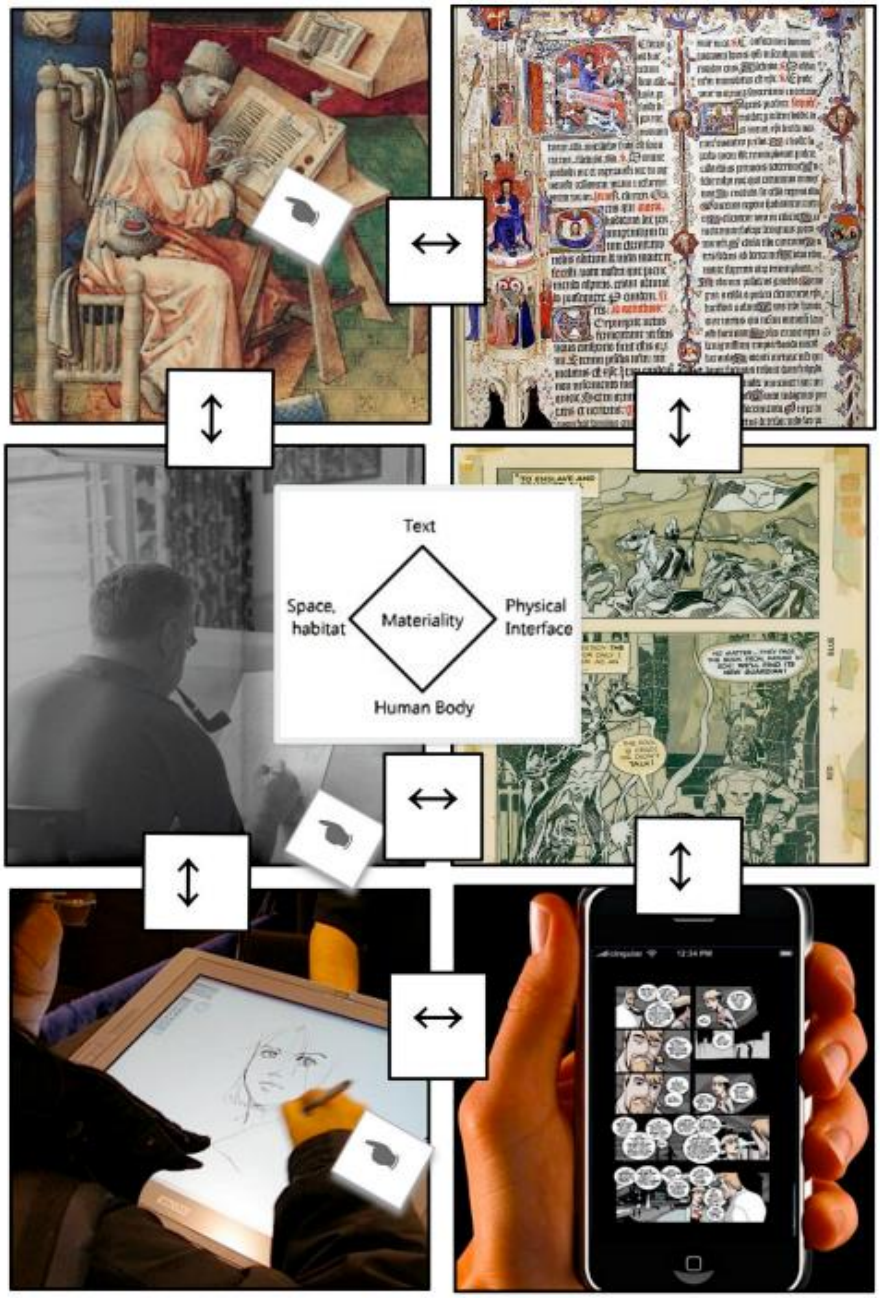


Figure 5.1.17 .The Digital Scriptoria: Textuality and Materiality.' Left to Right, up down: The scribe Jean Mielot (from 'Scribes and Illuminators', C. de Hamel, British Museum Press); A medieval illuminated manuscript; Jack Kirby in his studio (from 'Kirby: King of Comics', M. Evanier, Abrams, 2008); Mechanical Original page from "The Man from the World of D" Captain 3-D; pencil art by Jack Kirby; ink art by Mort Meskin, story by Joe Simon and Jarck Kirby, letterer unknown; 1953, Original Art Digital Archive Project, Jack Kirby Museum and Research Center; Comic book artist The Comic Book in the Age of Digital Reproduction 341 working on Wacom tablet; photographer unknown; the Comixology Comics app for the iPhone and iPod Touch, 2009. (Priego 2010c).

Figure 1: "The Digital Scriptoria: Textuality and Materiality"(Priego, 2011, p340 Figure 5.1.17)

In searching to draw a line from the "textuality and materiality…of the artwork and the creative space" to that textuality and materiality as represented on a Wacom tablet (interactive device for writing and drawing) also containing digital artwork and

providing creative space, Priego predicts in a sense this future in figure form (Figure 1) in the “Digital Scriptoria: Textuality and Materiality” (Priego, 2011, pp. 339-340). The evolution in the figure is crucially not a straight line: “technological ‘progress’ (with materiality at its core) is not sequential: it includes, in its present form, previous practices” (p.339; see also McLuhan,1964 and Resha, 2020). Moreover,

> …the diagram visualises that digital textuality is not ‘immaterial’ (Lippard, 1997): tools, desks and interfaces that are required to interact with the devices (computers, PDAs, mobile phones, etc.) are and create certain types of materiality (p. 339),

This new type of materiality introduces another “paradigmatic cultural interface” for comics. Priego acknowledges the cultural and social ubiquity of devices and their potential consequences:

> Surprisingly, N. Katharine Hayles, wrote in 1993 about ‘the implicit erasure of materiality in word processing.’ She compared the physical, pain-inducing typing on her ‘old Smith-Corona’ with the ‘lighter touch’ of word processing, that reduces ‘friction’ to ‘zero’(1993:65). As made literal by the ergonomics of human-computer interaction, using the devices themselves is in itself a physical reality in which past, present, human body, physical space, machine and (digital or non-digital) text are not disconnected (pp. 339-340).

In Chapter Six of this study, digital comics readers will indeed speak of these problems and will demonstrate that the current access and ownership of multiple devices mean that these physical challenges can be overcome to a certain extent, and the digital comic enjoyed. And Hayles, formerly a chemist, currently a scholar in the field of literature, science, and technology, goes onto a deeper consideration of the interaction between humans and technology in *Unthought: The Power of Cognitive Nonconscious* (2017) where she speaks of “cognitive assemblages” leading to “planetary cognitive ecology”. Using language not dissimilar to that of cultural artefacts or ideas as they make their way through processes where makers act upon them, Hayles describes “cognitive assemblages” as

> …the flow of information through a system and the choices and decisions that create, modify, and interpret the flow. While a cognitive assemblage may include material agents and forces (and almost always does so), it is the cognizers within the assemblage that enlist these affordances and direct their powers to act in complex situations (p.116).

Hayles, also described as a post humanist scholar, moves beyond the links to digital ecosystems as expressed in this study (see below, and Chapters Six and Seven): cognition goes beyond the human body to encompass other "cognizers", namely systems and technology, as well as the natural environment, in essence "planetary cognitive ecology" (pp.26, 46, 140). Although Hayles' theorizing is beyond the scope of this study, comics studies scholars, such as Karin Kukkonen (2015) in "Space, Time, and Causality in Graphic Narratives: An Embodied Approach", speak specifically to the reading of comics and an "embodied" storyworld in which readers act and interact. This storyworld within comics is enfolded in the world of digital "cognitive assemblages", where readers, if not creators, bring cognition beyond the human body. It is useful to consider embodiment alongside the concept of digital ecosystems as a continuous re-evaluation of human experience within a larger context (see Chapters Five and Seven, for example, on humans and their digital companions). Digital comics in this study can be seen and act as a vehicle for cognizers to interact within larger systems, thereby becoming another type of "paradigmatic cultural interface".

Priego's (2011) working definition and subsequent iterations reflect that of other scholars trying to encompass comics and specifically digital comics. For example, Darren Wershler, writing about them in 2011 and again with Kalervo Sinervo, and Shannon Tien in 2020, ranges widely in scope, presenting an illustration of the "shape-shifting" or changing shape of digital comics. In 'Digital Comics, Circulation, and the Importance of Being Eric Sluis' (2011), Wershler suggests thinking of them as "assemblages":

> Rather than thinking about digital comics as bridges between a source and a destination, the point is to consider them as an aggregate in flux. As new types of digital comics continue to appear, there will be a constant realignment of their various forms in relationship to each other. 'Digital comics,' then, is an

> evolving assemblage whose cultural significance shifts as new hardware, software, genres, modes of distribution, publishers, policies, authors, and audiences enter the mix (Wershler, 2011, p. 128).

In this article, Wershler views digital comics through the perspective of “screens”, specifically film studies, and “their decades-old process of migrating off the page and onto the screen” (2011, p. 127). It is that part of cinema theory that deals with circulation that he feels is pertinent to the consideration of digital comics. He quotes from the work of Will Straw in ‘The Circulatory Turn’:

> ’The key question is no longer that of how personal or collective life registers itself within communicative expression, but of how the movement of cultural forms presumes and creates the matrices of interconnection which produce social texture’ (Straw, 2010, p.23).

Some reflection of this “movement of cultural forms” can be found in the discussion on production of culture and digital ecosystems below, and indeed throughout the research findings: readers, creators, and publishers, individually and collectively, are building their own “matrices of interconnection” or ecosystems through devices, platforms, and apps.

Systems, series, environments

A foundational definition of comics, from Groensteen (2007), considers them as a “system”: "a combination of a (or two, with writing) subject(s) of expression, and of a collection of codes" (p. 6). This definition appears simple enough in theory, but from what has been presented above, complex in application. Some scholars as demonstrated resist the urge to itemize identifiable parts of a comic, although a certain amount of it is de rigueur; in its contradictions, it is illustrative of digital comics as more than just another format or offshoot of print. Almost ten years on from Wershler (2011), in Wershler’s chapter with Sinervo and Tien on ‘Digital Comics’ for *The Comics Studies Guide*, they still appear to be in a state of flux:

> It’s far from clear what ‘digital comics’ actually references, because comics are at once a medium, a set of genres, and a series of different ‘formations’ that combine a system of production and circulation, a cultural and ideological component, and physical format. Digitization involves shifts in all these levels,

affecting how comics are produced, circulated, and consumed (Wershler, Sinervo, and Tien, 2020, p.256).

Following on from Wershler et al.'s (2020) "system of production and circulation", Antonini, Brooker, and Benatti (2020), in 'Circuits, Cycles and Configurations: An Interaction Model of Web Comics', posit that the digital comic (specifically webcomic) is "not…a discrete entity…or a transmedial component in a greater distributed story…[it is] a formation of discrete interactions which take place in a variety of spaces" (p.2). They seek to understand multimedia technologies firstly by considering the psychological term, "gestalt": one famous example shows what appears to be an abstract field of black marks; upon recognising it as a dog, the entire image resolves itself in the mind of the viewer. This coming-together of individual components to form a gestalt is exemplified in psychologist Kurt Koffka's (1935) well-known (and often misquoted) phrase "'the whole is other than the sum of its parts'" (p.1). In web technologies, these parts are constantly recombining, generative, creating new concepts of what is considered a "whole". So, the systems as Wershler et al. (2020) describe them above, and reminiscent of Priego (2011), are not static, are not simply multimedia converging in one fixed point, in a film, for instance (a "coming together" as Antonini et al., 2020 put it). But in digital space, the components, the media, are not so easily fixed. Webcomics are purely the product of digital space, a "temporary formation of interacting components [facilitating] a unique structure which is other than the sum of its component parts" (Antonini et al., 2020, p.7). Even their "infrastructures of both feedback and distribution" (for more on this see section 2.4 below) are examples of "calibration" and re-calibration (Antonini et al. 2020; Antonini and Brooker, 2020), depending upon the input of the various makers (or cognizers, as Hayles, 2017, would have it). The recombinings and recalibrations in fixed space, or what Helmond and van der Vlist (2021) call when applied to apps and platforms, "overwriting their own biographies", is, for example, one of the challenges to archiving webcomics on dedicated websites as well as apps and platforms (see Chapter Eight).

The connection between digital comics and systems and discrete acts, especially as they apply to platform creation, publication, and distribution of comics, will be explored in the next two sections on materiality and production.

2.2.3 Section Conclusion

A complete review of the literature considering what digital comics are (or are not) could be an entire dissertation in itself. The purpose of this section of the literature review is twofold. Firstly, I have sought to give a flavour of the scholarly discourse grappling with the concept of digital comics to provide a basis for responding to Research Question 1. Collectively, scholars seem to get so far—for example, animation compromises the uniqueness of comics, especially in the areas of time and reader control—only to backtrack by maintaining some animation in comics allows these very things. I have tried to give a date range of scholarship here to demonstrate that, at least theoretically, 'what digital comics are' has been taken only so far and is still in need of those additional analytical approaches suggested by Murray (2012a).

Secondly, Priego refers to the discourse on comics definition as a "complex debate with a rich history" which, given the above, can certainly describe the discourse on digital comics definition as well. And following this discourse has been useful to this research in providing an understanding of how scholars perceive them. However, there is a certain level of frustration with this "complex debate" when it comes to empirical research, especially when faced with interview participants expecting the researcher to provide the parameters of the subject. As stated above, defining digital comics was not an objective of the research (this literature review discourages that), but how the makers themselves perceive them and experience them as something whole unto themselves. In this respect, the definition of digital comics that underpins this study can be seen as encompassing both socio-cultural contexts as well as technology systems and environment. Moreover, in the interest of proceeding "less…[from] an essentialist approach, but rather for clarity of definition" (Wilde, 2015 on Dittmar, 2012, p.5), the definition adopted in this research, that of Priego's (2011) where much can be ruled in but with animation ruled out, has enabled discussion with a wider scope of stakeholders producing rich data. Ruling animation out has less to do with agency and immersion here, and more with avoiding a sense of redundancy: digital comics (as are print comics) are already animated, already convey a sense of motion, time elapsing. True, this sense is more from the perspective of the creator's control, but is animation of a different form than animated media? Priego (2011) indicates that "for a distinction between comics in

print and comics on the screen to be meaningful, a set of recognisable traits needs to survive in spite of the migration from one environment to another" (p.238). Motion and time in comics occur according to different creative techniques that do not need to include animation. This factor is enough of a "recognisable trait" to distinguish between digital comics and animation.

As Busi Rizzi (2023) concludes, after observing that certain comics scholars wish to discount some of the very innovations within the digital comics purview (his second and third categories essentially, see above): "There is no space to thoroughly examine the issue of their comicness… but I argue that, as Ian Hague sums up, ultimately 'a comic is what is produced or consumed as a comic'" (p. 104, quoting from Hague, 2014).

Busi Rizzi, through Hague, refers to production (creators, publishers) and consumption (readers) as the final arbiters of what digital comics are, essentially the starting place for this research. In the next section, one aspect of "comicness", materiality, is examined through the makers' activities, highlighting how it functions in the digital space.

2.3 "Insistent Materiality": Is There Anything There?

> "A media-specific analysis of a text asks how it engages with its material and technological conditions of production and distribution – meaning both how its content is shaped by its material parameters and how it uses those same material parameters as a signifying resource. The term 'media' in this sense therefore overlaps with 'materiality'…materiality describes both the physical, technological parameters of texts – for example, typography and publication design – and the ways in which these parameters are interpreted and constructed by readers" (Kashtan, 2013, p.93).

2.3.1 Introduction

While production and production of culture in comics studies, even for print comics, have received little consideration, the focus on digital comics in these areas has been even less. Where digital comics receive the most attention is in materiality scholarship, often in comparison to print. Kashtan's (2013) parameters as described above—physical, technological, and interpretive—consist of "the visual and material

substrate of texts and the cultural connotations attached to such visual and material substrates" (p.93). Kashtan, in his article (2013) 'My Mother Was a Typewriter: Fun Home and the Importance of Materiality in Comics Studies' and in his book (2018), *Between Pen and Pixel: Comics, Materiality, and the Book of the Future*, speaks of the "insistent materiality" (using Murray's phrase, 2012a) of comics, whether they be print or digital, creating different reading experiences.

However, comics materiality apparently has not been explored extensively, and the relative lack of scholarship has not gone without notice from comics studies scholars themselves. In 2013, Kashtan observed: "My sense is that materiality, despite the work of people like Ernesto Priego, has been given short shrift in comics studies". Whereas Wilde (2015) maintained that print comics materiality at least has been well-served:

> In fact, despite Ian Hague's observation that 'materiality as a whole remains a relatively neglected area of comics scholarship' (Hague 2014, 23), a great many studies in recent years have focused on the very 'material richness' (Kashtan 2013; cf. Priego Ramirez 2011; Jenkins 2013) of print comics, precisely as a defining feature (p.2).

The study of the materiality of digital comics forms an important part of this research in that their materiality is often denied: for example, no pages, nothing to experience through the sense of touch. Files and devices necessary to read and create them intrude on the experience of them. But these files and devices are understudied (and arguably undervalued) as components of digital comics. A new consideration of these parts is one of the main themes of this research.

2.3.2 Digital Comics: What They Are Made Of

Kashtan himself would go some way to address the oversight he observed in his book, *Between Pen and Pixel: Comics, Materiality, and the Book of the Future* (2018). However, in that publication, he further specifies where the gap in materiality scholarship lies: "We are therefore currently without an account of materiality in comics that takes full account of the evolution of comics in the digital era" (p.14). Kashtan advocates for a more complementary view of the relationship between digital and print, believing that one does not necessarily supersede the other. In fact, what should precede the material or medial "boundaries" of comics is "an a priori,

Platonic concept which exists prior to the way it gets instantiated in particular media and technologies" (p.24). In other words, there is the concept of comics, and then there are the "technological parameters[that] help to shape what comics are" (p.24). In this way, Kashtan addresses definition from a different perspective when writing about digital comics. Digital comics are not considered separate from the main topic of comics, as they often appear to be in anthologies.

In this sense, although Kashtan appears to follow other scholars in considering digital comics only in relation to print comics, he does it in such a way that they are both considered as different instantiations of comics: "when we consider materiality from the perspective of comics rather than that of print, we avoid being distracted by the crystal goblet phenomenon, because we can literally see how alterations in materiality lead to alterations in content and affective response" (pp. 16-17). While Murray (2012a, 2013) speaks of the "insistent materiality" of comics, the processes that turn art and text into comic books and the importance of the actual object for readers and more importantly collectors (Steirer, 2014; Resha, 2020; Stough and Graham, 2023) do not appear to be part of the general discourse on materiality. For Kashtan (2018), this insistent materiality is unique to comics:

> …largely *due* to the *standard* crystal *goblet* model of *typography*, *we as* readers are *unlikely* to pay attention *to* the physical *attributes* of the text we read – unless the *author or* typographer intentionally calls our attention to those attributes, as in the present sentence (p11, referring to Beatrice Warde, *The Crystal Goblet: 16 Essays on Typography*).

In comics, there is no need to draw attention intentionally to "physical attributes" because the "effect of materiality is much harder to ignore" (p. 11).

The comics creator is always calling attention to the page, as an example of the golden goblet design (Kashtan,2018, p.11, opposite to that of the crystal goblet model above): if a reader is to be abandoned to a story (narrative immersion), then the depiction of that story is not in their imagination but on the page with the creator and the artwork as guides or temptation to immersion. However, despite the best efforts of literary studies, according to Chartier talking about books, "a text does not exist without the medium on which its reading (or hearing) is based, and that no document can be understood without considering the form in which it reaches its

readers" (Bremer, 2020, p.350, quoting Chartier, 1990, p.12). In the case of digital comics, what this can signify is that the comics text or context and the digital medium or media (for example, the file types by which the content is displayed or delivered) should not be considered separately. The media, the digital goblet or container, is worthy of consideration for how it works and relates to the content and the creator as well as to the reader, without having recourse to print as a comparison.

Containers: files, devices, platforms, apps

The previous section includes many references to devices, mostly as a means of access to digital comics. But when considered from the perspective of materiality, the insistent materiality lies not just with the container of content—page, panel, etc., but with the additional container that encompasses these, in other words, devices. In her book, *The Crystal Goblet*, cited by Kashtan, Beatrice Warde (1955) advocates that typography should emulate the experience of drinking wine out of a crystal goblet, the golden goblet competing too much with the content. However, digital comics call attention to their containers even more so than do print comics (essentially the subject of Chapter Five).

Book and comics scholarship often divides the book not only from the digital container but also the digital file as container: Priego writing in 2011 refers to "a transitional age still rooted in a paradigm where print, textuality and materiality (the 'objectness' of the book) were three inseparable elements" (p. 42). But for some scholars (Priego refers to Gardiner and Musto, 2010), the "electronic book" is not an object in any material sense, which begs the question:

> Where does this leave the 'computers and other digital devices' necessary to read these 'books'? Are these devices not 'objects' too? And are the digital files not, strictly speaking, 'digital objects' that are themselves a 'commercial object' itself the result of cultural practices, i.e., the demand for electronic books? (p. 42).

Priego is one of the first comics scholars, even though in question form, to connect the content to the "digital objects" including files and devices. Moreover, he suggests "a new metaphysics…where a book can still be a book even if according to this vision it lacks physical substance or matter" (p.43). In the same way, a digital comic

is still a comic with different “physical substance or matter”: the file, the device, and the application.

That digital files cannot be considered objects is opposed by Kashtan (2018) as well, at least in his descriptions of making a file behave in the manner of a print comic on a digital device: “in digital comics, the size and shape of a page does not necessarily match the size and shape of the screen” (p.114), exacerbated by the customary production of them as image files. What went some way to resolving this inflexibility was another object, the tablet device. Kashtan goes on to explain that even more than the tablet, the former comics platform ComiXology (now part of Amazon, see Alimagno, 2023; Simons, 2023) went even further in “making a comic digitally readable” (p.115) with its Guided View Technology providing panel by panel reading, reproduced by other companies (for example, Marvel, by ComiXology offshoot, Iconology) and also in vertical comics (scrolled panel by panel) for smartphones, for example WEBTOON.

The Naver Corporation designed and invested in smartphone comics reading through its WEBTOON platform, thus demonstrating the importance of the synergy between devices and digital comics. In the same spirit as ComiXology, a file format was matched to a device to create different ways of not just reading comics but also of enjoying the experience of reading them. ComiXology, WEBTOON, and other platform apps based on their technology are designed according to “the concept of 'immersion', in which the application or system in question takes over the entire screen of the device” (Fensterseifer et al., 2016, p.27). This is what accounts for the enjoyment, according to Fensterseifer et al. (2016) writing on comic books and mobile device usability. Referring to studies in smartphone design (Feijóa et al., 2013), they describe that such applications allow readers to immerse themselves “without having to divert [his] attention to other information, facilities or available distractions” (p.27). They also associate use of the app’s immersive function with having “free time to devote to content” and that “such motivation for use seems to fit well in the context of reading a comic book in digital media” (p.27). In this total immersion, the device and app fall away so that the reader can focus on the content.

However, comics scholars, as well as scholars from other disciplines (for example, see Zhu, 2023, on e-books in the field of information science and

technology), regard this combination of file plus device on “app comics” (Wershler, 2011) with a degree of concern:

> App comics, after all, are more of a leased service than a purchased product. This is the lesson of the circulation of digital comics through culture to date: their transfiguration marks the process by which we have traded the rights of ownership and first sale for ostensible conveniences, the duration of which remains uncertain (Wershler, 2011, p134).

So, despite the “objectness” of digital comics, there is still a sense of their not ‘being there’ because of this lack of ownership, bestowing a sense of impermanence. Wershler portrays the transaction as a questionable one: while some very real rights have been lost, the conveniences gained are only “ostensible”, so perhaps not really there or present. Reading scholars around this same time, for example Mangen and Kuiken (2014), report that the conveniences are only “ostensible”: using iPads, readers experienced “a dislocation within the text and awkwardness in handling their medium” (p.150).

Comics studies scholarship, in general, regards devices and apps mostly in the sense of remediation, where one medium crosses over to another. Benatti (2024) maintains, for instance, that “webtoons [smartphone comics] provide the first true remediation of the comics medium in a digital context” (p.8). There is little in the scholarship that considers the technology and content together as a form of embodiment: “the representation or expression of something in a tangible or visible form[5]”. Comics scholarship, for the most part, considers embodiment through engagement with the content. For example, Kukkonen (2015) describes it as

> time, space, and causality of the storyworlds of graphic narratives not as objective, external parameters but as emergent properties, related to the immediate physical resonances of drawn bodies, the texture of the emotional and social interaction of characters, and the gestalts of their composition on the page (p. 49).

[5] Widely quoted definition from *Google’s English Dictionary* as provided by *Oxford Languages*, see https://languages.oup.com/google-dictionary-en/.

Chute and Jogoda (2014) speak of “producing and consuming media as an embodied activity, about time, space, play, print culture” (p.1). Cedeira Serantes (2019) picks up on the components of time and space as part of embodied activity in digital and print reading, citing HCI design scholars Rouncefield and Tolmie (2011) and Hupfeld et al. (2013) in their observations that digital does not have to oppose print or supplant it; rather, the context for each is important:

> …similarly to Rouncefield and Tomie’s study, the researchers (Hupfeld et al.) detected that people’s practices and orientations surrounding e-books shifted in emphasis from the book as artifact to a set of activities or experiences associated with reading (p. 17) (Cedeira Serantes, 2019, p.72).

Situated in time and space within these experiences, device containers should not be studied “in isolation but as part of a larger ecosystem that more often than not includes print books” (Cedeira Serantes, 2019, p.72, citing Hupfeld et al., 2013, p.5). Cedeira Serantes speaks of the “forced dichotomy” of reading—print or digital—as opposed to the view of Hupfeld et al. (2013) that proposes seeing print and digital device containers on a spectrum of experience, activity, space, and time. Cedeira Serantes suggests that the dichotomy has been created by “corporate interests that understand attention as economic profit” (p.72). She goes on to observe that most of those interviewed for her research (mostly print readers) had “internalized the discourse about using print and digital devices as a dichotomy instead of a spectrum” (p.72). She, interestingly, does not see the device container in terms of embodiment, and observes the dichotomy through her research participants:

> When Shade is reading a print comic, container and content are one. This is something very different than reading on a tablet or e-reader, where the container stays the same for different narratives, even different activities (p.81).

Chute and Jagoda (2014) describe taking “comics as a central point of inquiry and… situating the form within various media ecologies” (p.2), so not the emphasis on print culture that is still evident in the scholarship, and not even multimedia, but transmedia: the relationships and intersection across media.

Despite some of these early treatments of digital containers and their place in everyday lives, a considerable amount of comics scholarship remains theoretical or

based in text and visual criticism, and, when focusing on materiality, more so on file and content. The examinations of digital comics rarely treat with their constituent parts, devices, files, and apps, in an empirical way and how these inform the experience of the comic, both considerations central to this research. This is a significant gap in comics studies which this research goes some way to addressing. Scholarship evaluating emotion and interaction through devices comes mostly from sociology, as well as design and usability research (see Fensterseifer et al., 2016 above), specifically human-computer interaction (HCI). For example, Matsubara et al. (2016) studied "estimating emotions" with users reading digital comics on mobile devices. From a sociological perspective, Du Gay et al. (2013) focused specifically on devices as "social actors" (see section 2.5).

2.3.3 What and Who Makes Them

Priego (2011) offers a full-length analysis of the materiality of comics, with a focus on digital technology, intersecting with Kashtan (2018) in some areas but also expanding the study of materiality into others. His view of materiality is all-encompassing from theory to production to container or device, in other words, "the relationship between process and product" (p.9). Priego (2011) precedes Kashtan's (2018) view of digital comics in relationship to an overall concept of comics:

> Comics [are] an artistic form that developed in connection with technologies belonging to print culture and the age of mechanical reproduction. This fact is both reflected and challenged by the digitization of printed comics, digital comics (comics created with computers that can be read on different electronic platforms, either networked or not) and webcomics (comics made mainly to be read on computers online) (p.3).

In other words, both digital and print comics encompass the history of technological change and development from which they arise. Digital comics "reflect" all of the technologies that "[belong] to print culture" as well as describing technologies that are wholly unto themselves.

Quoting Chartier (1995) on the materiality of the book, Priego agrees that "the meaning of a book is 'inseparable from the material conditions and physical forms that make the text available to readers' (1995:22)" (pp. 15), and that "what is important to capture is 'the transitions' any 'textual object [undergoes] between their

initial conception and their final publication'" (pp15-16, referencing Kirschenbaum and Farr et al., 2009). Viewed in this way, the materiality of comics, and for this purpose the digital comic, is not just a set of "physical qualities… but… a complex process involving cultural practices" (p.16).

This observation proceeds from one of the themes of Priego's work, "the socio-cultural", as mentioned in the previous section. The "cultural practices" to which he refers are the steps taken to achieve the cultural object. As noted in section 2.2, dealing with different ways of defining digital comics, Wershler, Sinervo, and Tien (2020) as well as Antonini, Brooker, and Benatti (2020) have all arrived at a similar perspective, and, because of the 'digital' aspect of the comic, it pertains even more so: the digital comic is not just what can be perceived on whatever device in use, but because of its changing nature is all the activities leading up to that perception. But as suggested by Kirschenbaum et al. (2009) as referenced by Priego (2011), this "complex process [publishing, dissemination, creation, etc.]…[involves] cultural practices as ways of interacting with them throughout time" (p. 15-16). In this sense, the "practices" do not stop at "final publication" (if, indeed, there is a final publication in the digital environment) as suggested by Priego, referencing Kirschenbaum et al. (p. 16). In Chapter Four, section 4.4, the activities often enacted by the consumer-reader after publication will also be considered as part of those cultural practices.

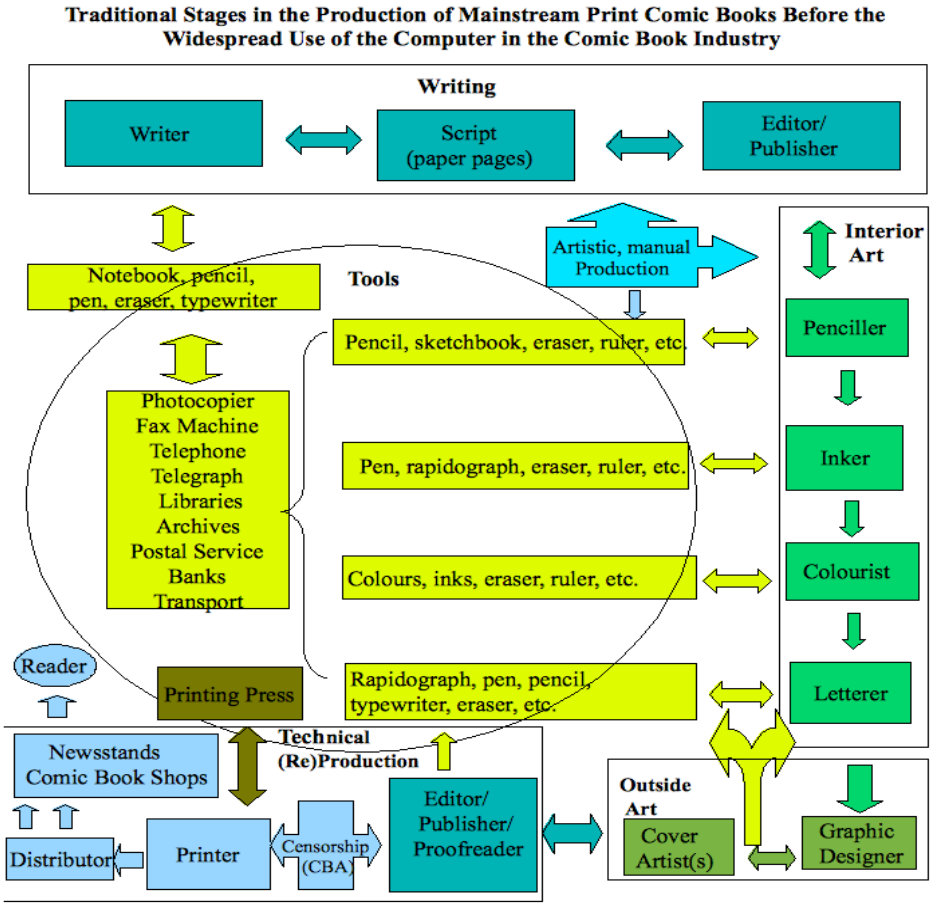


Figure 2: "Traditional Stages in the Production of Mainstream Print Comic Books Before the Widespread Use of the Computer in the Comic Book Industry" (Priego, 2011, p. 199, Figure 3.6.7)

Priego begins with an examination of print comics publishing. The situation of comics within publishing and specifically the processes of publishing are what distinguishes Priego from Kashtan's consideration of digital comics: "comics as a communicative and artistic system has expressed itself as a type of materiality" (Priego, 2011, p.3) or "the strictly artistic with the mechanical" (p.185). Kashtan (2018) refers to Scott McCloud to set out his focus: "Scott McCloud draws a distinction between digital production and digital delivery of comics, meaning respectively the creation of comics with digital tools and the distribution of comics in digital form (2000, 22)" (p.19). Kashtan focuses on delivery, not production. Priego (2011) delves deeply into the production processes of print. He describes Figure 2 as

> [a] diagram [that] describes the convoluted process of multi-authored mainstream American comic books. It imposed constraints of all types, and forced those involved in the creation of comic books to work within those limits (p.199).

Murray (2012a) calls those involved "a supporting cast of artists, pencillers, colourists and letterers who contribute to the finished product" (p. 336). For the most part, the constraints under which they worked were enforced under the 'work for hire' contract. Although Priego describes the above as "an assembly line process" (for references to this type of sequential process, see also Sabin,1993; Gabilliet 2010; Murray, 2012b, 2013; Cadrette, 2016), it was an iterative process up until the time the editor passed it on for production, much the same as it is for current large and small book publishers producing graphic novels, as well as current commercial comics publishing (Rebellion, for example) (see Chapter Four).

In another publication, Priego (2010) described his work in the following manner:

> …by studying the still-transitional stage in which comics co-exist in different platforms and how new ways of creating, publishing and therefore reading are being put to test, my research seeks to challenge a series of assumptions about books and digital technology.

The phrase, "the still-transitional stage in which comics co-exist in different platforms", could describe the present; in other words, this environment in flux is permanent in its perpetual state of change. Priego and Kashtan might maintain that this flux is permanent because the co-existence of different instantiations or formats are simply the manifestation of comics in their various forms. Digital comics which themselves manifest in different forms, such as webcomics or as ebooks read and experienced through different platforms, are their own distinct type of comics and not simply a by-product of print comics. All are products of an electronic and now digital process of production and distribution. According to Priego (2010), "comics as a communicative language has expressed itself as a kind of materiality that is specific to itself and only itself".

This "assembly line process", which Priego describes as "convoluted", is at its most basic linear, a production workflow upon which traditional book publishing was

built. The next section illustrates how this process was disrupted to create platforms and then ecosystems, environments that loom large in this research and for its participants.

2.3.4 Conclusion

Featuring materiality as an important aspect of digital comics is a reflection of the search through the literature for a response to RQ4 (technology): the role of the material form or containers in the understanding of them and how those devices and platforms play a part in the communication and community of RQ3. The latter will be further explored in the next section. The important conclusion from this section is how digital comics have not had a "'de-materializing' impact" (Priego, 2011, p.342, citing Hayles, 1993 and Lippard, 1997): the materiality of digital comics is just as insistent as that of print comics. Although Priego feels that digital comics "have not really modified the paradigm of the printed page" (p.342), they have a materiality that is uniquely their own, contributing to creating and reading and "new ways of understanding the old paradigms" (the page, for example) (p. 340). Although within a file format, the digital comic may adhere to the paradigm of the page (the way panels are laid out etc), because it does not replicate the physicality of that page, it is not constrained by its print "technology". According to Palmer (2016),

> …as an example of Peterson's (1985) constraint of technology, digital comic books are freed from the limitations of the printed page, and this freedom opens up the possibility for further experimentation with the form (p.246, citing Guigar et al., 2011 and McCloud, 2000).

This experimentation is not necessarily page-bound but device-bound, which becomes a new paradigm for the delivery and access to comics.

2.4 How Digital Comics Are Made: The Evolution of Digital Publishing

> “The materiality of literature can be understood as a contact zone between editorial science, book history and cultural studies. Basic for this understanding is Roger Chartier’s dictum that authors do not write books. They write texts that others use to make books from in a multifaceted, highly complex technical process” (« Les auteurs n’écrivent pas des livres: non, ils écrivent des textes qui deviennent des objects écrits, manuscrits, gravés, imprimés (et aujourd’hui informatisés) », Chartier, 1992, p. 21) (quoted in Bremer, 2020, p.350).

2.4.1 Introduction

In a sense, Chartier reflects McLuhan (1964) on the impact of media: “the ‘content’ of any medium is always another medium. The content of writing is speech, just as the written word is the content of print, and print is the content of the telegraph” (p.13). Resha (2020) would maintain that the content of a digital comic is a print comic (p.70). Chartier perhaps would not go so far as to say that content is secondary to media, as ascribed to McLuhan, 1964—"the medium is the message”—who would maintain that the content distracts from what is changing in the material environment: “meat carried by the burglar to distract the watchdog of the mind”. However, he does highlight the production of the media or the material conditions of making. The subject of comics production, especially digital comics, has often played handmaiden to content in its significance to culture (see section 2.5 for Brienza-Locke interaction below).

The previous section touches on some of the issues in comics materiality discourse, and it also highlights a lack of scholarship on the material conditions, especially all the constituent parts or the processes and activities that create the digital comic and contribute to it as a cultural object. Brienza (2009, 2010, 2013a, 2013b, 2016a, 2016b), Priego (2011, 2010), Murray (2012a, 2012b), and Woo (2013, 2015, 2016) speak of and to this lack for the most part in the first half of the last decade, and this most recent literature review confirms that there is still a gap (even wider if the focus is on digital comics combined with empirical research). In this literature review, I focused firstly on searching for research on the material production processes themselves in the comics industry (RQ2), and how these

processes, in developing and distributing comics, play a role in communication and community, in other words connecting them to a wider, social context (RQ3). I approached both intending to learn about the digital comics environment or ecosystem but found even less in this area. Consequently, the scope of the search had to be widened to include print comics (see Chapter One and section 2.2.2), as well as specific types of comics such as manga (Brienza, 2009, 2013a, 2016a, 2016b, especially has produced research in this area). According to Brienza and Revers (2016) in their article on 'The Field of American Media Sociology',

> what distinguishes media sociology from media and communication studies is that it is not satisfied with studying media in its own terms. It relates media production, communication/discourse, and consumption to other important key sociological areas, like social inequality, stratification, social problems, collective action, and identity (p. 540, referencing Waisbord 2014, p.15; see also Brown,1997, 2001).

This research is focused on digital comics and their makers as they interact in digital ecosystems and not necessarily on broader social issues and problems, or "social realities" (Brienza and Revers, 2016). Any examination of daily digital lives will uncover such issues and problems and how individuals arrive at digital solutions, as the findings in Chapters Four-Six demonstrate.

This section presents the literature on digital comics production processes (in response to RQ2), and because there is still a gap in scholarship, with frequent reference to book publishing and platform studies (and where appropriate the convergence of publishing and platform studies, see Parnell, 2020) where these disciplines align.

2.4.2 Disruption and Evolution of Publishing

The history of comics publishing does not often trace the evolution of the digital disruption to comics production in any universal sense, nor where specific types of comics production, for graphic novels or comic books for example, have been disrupted. There are broad and descriptive accounts of the industry, including publishing and distribution processes, and of specific publishers, such as Marvel (see Perren and Felschow, 2017, for example). Busi Rizzi (2023) goes some way to provide broad stages that map digital disruption, while Kleefeld (2020) tracks the

evolution of the webcomic formats alongside that of the web, citing as does Kashtan (2018) the impact of tablet devices to creators (as self-publishers) as well as the development of specific webcomics as case studies. This research addresses that gap, but for a literature review, scholars in comics studies and publishing studies can provide some general context. It is illustrative to widen the lens to encompass book history and publishing, where, while there are notable differences (mostly rooted in traditional business models), there are also some significant similarities, for example in ebook publishing (as traditional publishers produce graphic novels). Book publishing, at the process level, has experienced similar digital impact to that of comics publishing: changing roles, digital processes, self-publishing, and platformization.

John B. Thompson, one of the foremost scholars on Anglo-American book publishing, examined the influence of this industry and the impact of digital technology in two books: *Merchants of Culture: The Publishing Business in the Twenty-First Century* (2010) and *Book Wars: The Digital Revolution in Publishing* (2021). These two books, as well as a book on academic publishing, *Books in the Digital Age* (Polity, 2005), all based on empirical research, follow on from a publishing history largely focused on media theory. These books of empirical research do have a theoretical framework, based on Bourdieu's 'theory of fields': "how social actors fashion and maintain order in a given field" (Fligstein and McAdam, 2011). Thompson's approach reflects those of this research: he found that he had to move beyond this theoretical framework in order to "put the question of technology into field theory and look in detail at what technological innovation amounts to in practice" (Thompson, 2021, pp. 495-496). Moreover, he also wanted to ensure that people, how they act in organizations and as organizations, were a primary focus:

> I needed to put people back in, or, rather, ensure that people and their ideas were there at the outset and an essential part of the story… Fields, technologies, organizations, individuals: I have tried to weave all together, giving each their due and privileging none, in my account of what happens when an old established media industry collides with the great technical revolution of our time (p.496-497).

It is critical, according to Thompson, for an understanding of processes and how they figure in culture, that people and the communication that drives them are not forgotten in the course of the research.

Value chains and publishing

Business processes, including publishing, have been traditionally organized linearly according to the value chain: for example, a version from Valdez-De-Leon (2019) offers steps including Inputs>Production>Fulfilment>Sales and Marketing>Distribution (see Figure 10 and Thompson's version in Figure 3). The impact not just of digital technology but specifically communication technology and platforms has disrupted this linear process (Valdez-De-Leon, 2019; Thompson, 2010, 2020, 2021, see the linear chain from *Merchant of Culture*, 2010, below in Figure 3 and Figure 4, representing the somewhat fractured linearity from *Book Wars,* 2021).

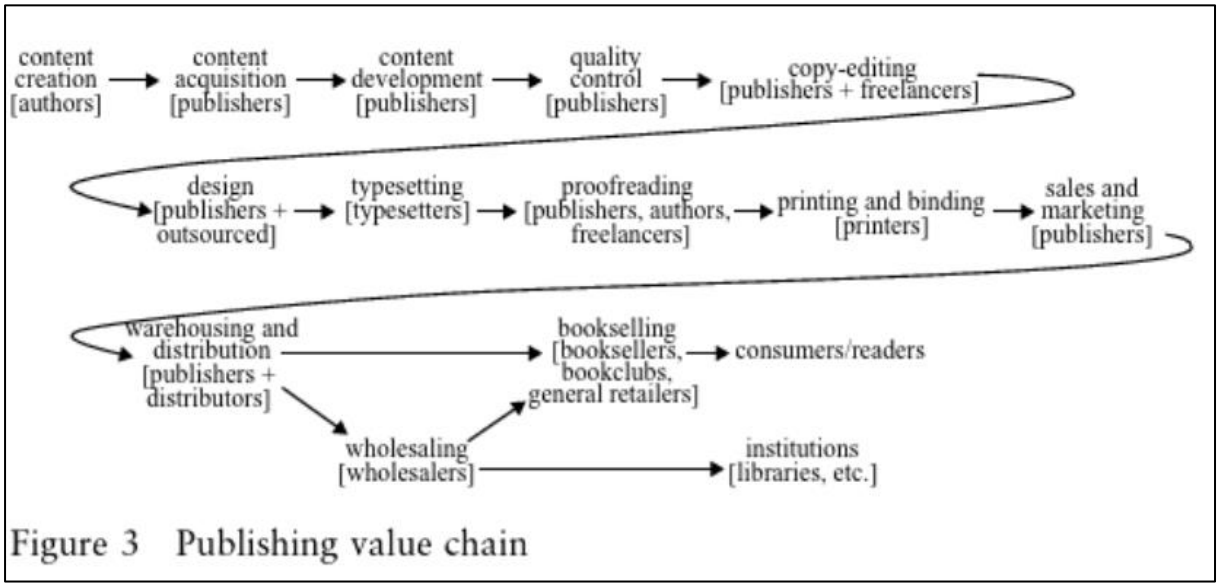


Figure 3: "The Publishing Value Chain" (Thompson, 2010, p. 16, Figure 3), including extended publisher responsibilities in the print book supply chain

In Thompson's Publishing Value Chain above (specifically here applying to academic publishing), the similarities to Priego's (2011) Commercial Comics Publishing Chain (see Figure 2) are evident. The differences, of course, are down to the publisher's acquisition of content (for traditional mainstream comics, this was and still is often 'work for hire'). Regardless of the configuration of the diagrams, activities move for the most part linearly, with each actor contributing to the finished product or adding value.

In the business sense, ‘value’ relates to costs and profits, and it was in this sense that value chains in book and by extension most publishing were applied: “the traditional value chain is a linear rendering of the core book production functions, from concept to consumer, with each agent in the process adding significant value” (Shep, 2015, p.8; see Padua, 2021, p.93-94 on how “the producer–seller–customer traditional value chains have been replaced by ecosystems of actors”). Thompson (2010) maintained that

> …the publishing chain is both a supply chain and a value chain. It is a supply chain in the sense that it provides a series of organizational links by means of which a specific product—the book—is gradually produced and transmitted via distributors and retailers to an end user who purchases it (pp.14-15).

As a value chain, each publishing function must add something of value, “something substantial to the overall task of producing the book and delivering it to the end user” (pp.15-16). If that function ceases to add value, then it is “disintermediated” (or eliminated in its traditional sense) (Thompson, 2010; see also Murray and Squires, 2013). Thompson acknowledges the influence of technology on this change, that it can, indeed, be the cause of disintermediation (Thompson, 2010).

The potential disruption in comics production and publishing is similar to that of ebooks where

> …the traditional value chain, which traces the trajectory of intellectual property from author to reader, and where publishing activities such as editorial, marketing and design are all performed by the single entity of the publisher is being disrupted and disintermediated at every stage (Murray and Squires, 2013, p3; see also Phegley, 2010).

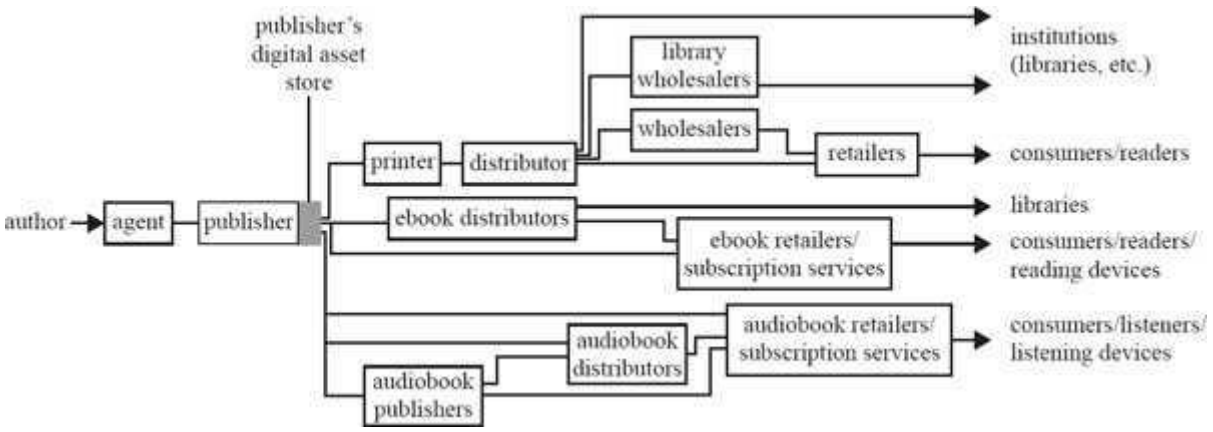


Figure 4: "Digital Book Supply Chain" (Thompson, 2021, p.457, Figure 12.5)

However, as the above figure suggests, although some fragmentation or branching (as opposed to the straight line offered in value chains or communication models) appears, there is still a linear quality to the supply chain as Thompson portrays it in digitally-based book publishing (see Figure 27 for digital comic publishing process which demonstrates the same type of fragmenting or branching). Although digital processes have disintermediated some of the roles seen in the previous figure, traditional commercial book publishing has adapted technology to fit a traditional value chain.

From chains to circuits

There have been attempts to bend the linear progression of publishing activities into something more circular, for example Robert Darnton's (1982) Communication Circuit. While Darnton's model evolved to follow print publications in 18th-century France, it has been adapted for more modern book publishing processes, and, as discussed later in this section, for digital publications. It is a tool through which one can examine "the way books come into being and spread through society" (Darnton, 1982, p.67). In his explanation of each stage in the circuit, tasks and activities are identified to be sure, but the emphasis is on the participants and how their communication creates the finished product, the idea encapsulated in book form.

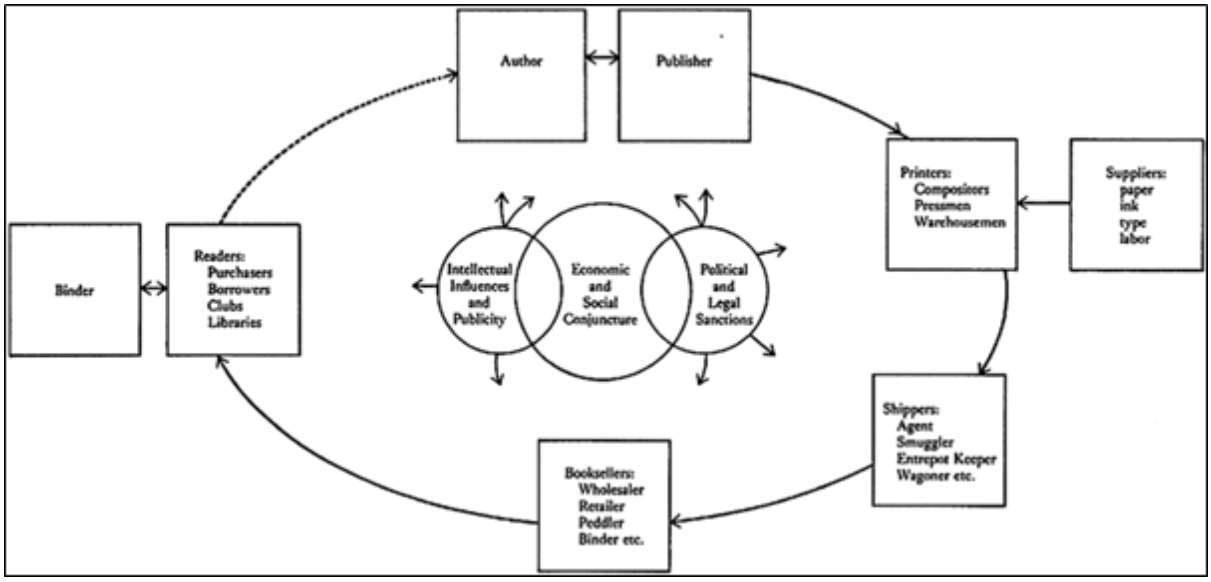


Figure 5: Darnton's Communication Circuit (Darnton, 1982, p.68, Figure 1)

In essence, these publishing value chains or circuits were designed in such a way as to demonstrate that one business had control over all roles and activities (even to an extent third parties).

The publishing process model, as a supply chain, value chain, and as a communication circuit, has been largely devoted to print books. However, scholars have brought Darnton's (1982) Circuit specifically into the digital environment. In "The Communications Circuit Revisited", Adriaan van der Weel (2000) analyses the model to test whether or not it is "equipped to deal with a period that its maker had not intended it to serve" (p.13). Van der Weel analyses each segment of the model for its application to the production of electronic texts. He makes an important distinction between those texts produced by publishers and self-published texts. The latter represents the access afforded by the web (van der Weel was writing at the beginning of the 21st century). Van der Weel goes on to observe that not only is the publisher and bookseller "disintermediated" in the revisited Darnton model, but also the printer and the distributor (although distribution as a platform activity is key to self-publishing, platforms, and ecosystems, see below), and in doing so "democratising" the process (p.18). The disintermediation and democratization not only change the model but also circumvent it: the book is not the model text but only one of many types of texts. The 'digital' communication model becomes not just the process of the book but of texts in whatever material format: "book history should be

interdisciplinary"; it should "be subsumed by the history of textual transmission" (p.25).

A more recent 'revisit' of the Communications Circuit, The eBook Communication Circuit (see Figure 6) by Padmini Ray Murray and Claire Squires (2013), does not necessarily suggest a radical change to Darnton's (1982) Circuit. The perspective focuses on the disruption in the publishing industry: the description below is reflective of what is happening in the comics industry:

> Although patterns remain that recall the history of the printed book, the place, role and passage of the book in the digital age is undergoing very real change. It is a landscape dominated by large conglomerate publishers and, increasingly, by even larger technology companies, but it also offers space to start-ups, to independents with strong brand presence and innovative business approaches (Murray and Squires, 2013, p.19).

This view of the publishing industry as dominated by "conglomerate publishers" and "larger technology companies" describes both book and comics publishing (see Perren and Felschow, 2017, for example) to the extent that this research uses book publishing categories as a framework for considering the UK digital comics industry (see the UK comics publishing map developed for this research in Chapter Three and Appendix V). In addition, findings from the mapping of that industry highlight the role these types of organizations play in the sector.

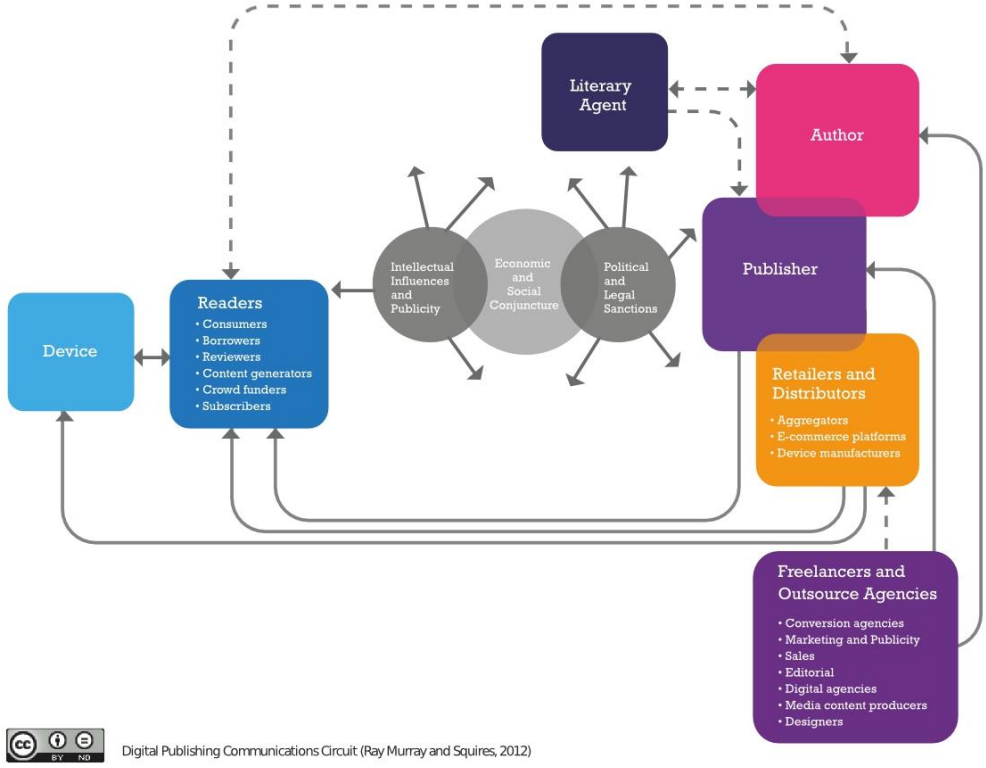


Figure 6: "Digital Publishing Communication Circuit", (Murray and Squires, 2013, p.8, Figure 4)

An important difference between Darnton's (1982) Communication Circuit and the eBook Communication Circuit, above, is that self-publishing has made a significant impact to the extent that it cannot be contained within one iteration. The activities and the participants' roles have changed too much. A separate process model is required (as in Figure 7) to demonstrate the differences and who controls most of the production. However, the relationship between author and reader is still problematic and vague, as demonstrated by the broken line in each figure.

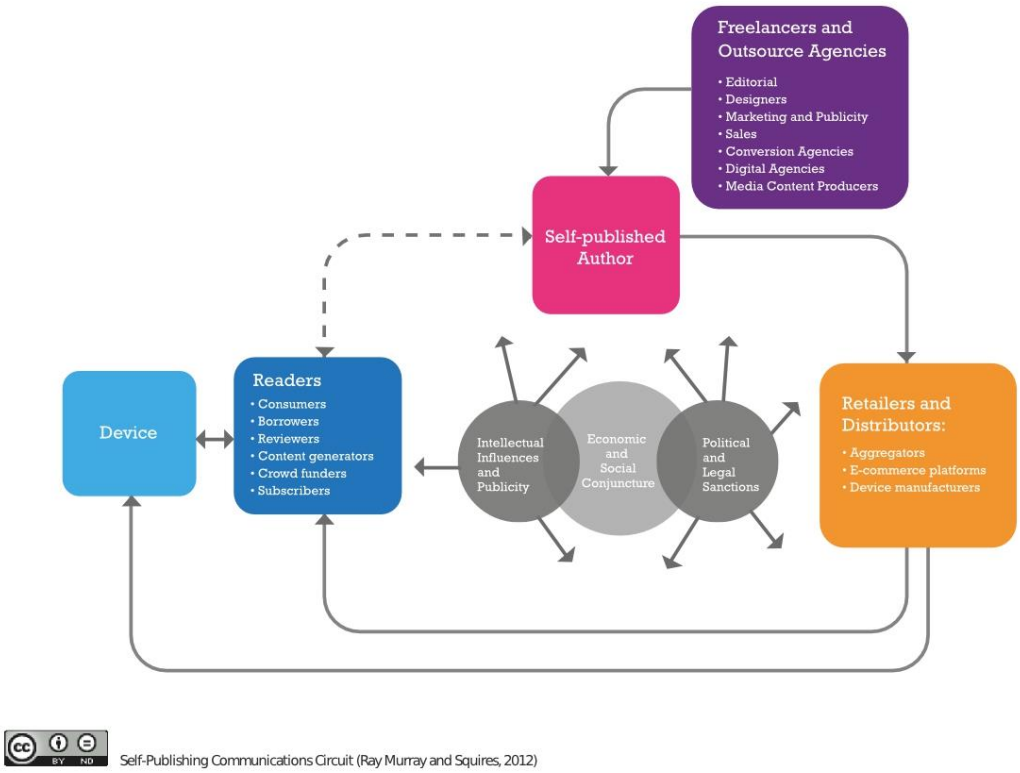


Figure 7: "Self-Publishing Communication Circuit" (Murray and Squires, 2013, p.6, Figure 3)

Thompson (2010, 2021) also reflects on Darnton's (1982) original Circuit but addresses an inherent problem that also applies to these more recent iterations: they are not truly circuits because of the broken line between readers (the linear end point) and authors (the linear start point). With the claims to the direct line of communication between self-published authors and readers (also true of webcomic creators and readers), Murray and Squires (2013) are still not able to draw a solid line (indeed, other research contests whether or not there is a direct line, see Butler, 2021). Thompson (2021) explains:

> In Darnton's original model of the traditional book supply chain, there is a loose feedback loop between readers and authors, indicated by a dotted line in his original figure (p.182 of The Case for Books), on the grounds that the reader 'influences the author both before and after the act of composition', and 'Authors are readers themselves'. (p. 180). But this is a very weak and diffuse feedback loop…some authors may have some concept of the audience for which they are writing, though even when they do, this is usually

> a very diffuse and quite general concept and it may bear little relation to the preferences and practices of actual readers (p.462, note 32).

Murray and Squires (2013) note the dotted line as well but emphasize the solid line between readers and devices (substituting for Darnton's binders, as readers would obtain binding services directly from them) as well as retailers, distributors, and publishers with whom readers form especially strong ties. These relationships are established and maintained through platforms which Murray and Squires (2013) term "the walled garden":

> This relationship [with retailers, distributors] is strongest with the 'walled garden' generated by Amazon's Kindle, which ties in the digital reader, rendering him or her a dedicated device user and loyal consumer (p. 14, referencing Digital Book World, 2012; Pogue, 2012).

They also include Kobo and Goodreads in this category, specifically focusing on social reading and reviewing. However, they do not go back to that 'problematic' dotted line representing the connection between author and reader.

Padmini Ray Murray (2013), in addition to her work with Squires as cited above, is one of the few scholars to apply Darnton's (1982) Circuit to comics. As with Casey Brienza (2010, and see in next section; also see Francesca Benatti, below), this is in conjunction with approaching comics from a sociological perspective and specifically through production of culture (see next section). In 'Behind the Panel: Examining Invisible Labour in the Comics Publishing Industry', where she advocates for a "cultural materialist view" noting comics' "insistent materiality", she quotes Brienza (2010) on what are the perceived difficulties of a production approach to manga:

> …as Brienza herself admits, such approaches can appear limited as they render the 'art object itself […] invisible; sociologists look straight at it and see only a collective mode of production and the various constraints upon it' (p.338).

Murray finds confirmation in this perspective from Darnton (1982): "'Book history concerns each phase of [the publishing] process and the process as a whole, in all

its variations over space and time and in all its relations with other systems, economic, social, political, and cultural'" (p.338).

Moreover, learning about the mechanics of comics, especially from a creator perspective, can "ruin their mystique" and their magic (quoting Buddy Scalera's guide on creating comics, 2011). Despite these reservations, Murray maintains that a focus on production from a publisher and editor perspective foregrounds the "art object', the comic, because of the considerable influence these actors exert on the final product.

In another article, 'Scott Pilgrim v. The Future of Comics Publishing', Murray (2012b) considers a print-to-digital publication, using empirical evidence from publishers, app creators, and readers. Again, from a "cultural materialist" perspective, Murray not only examines the additional value a digital version of a print comic, essentially transmedia, can provide, but, as with the previous article, how actors make a difference to the final version. Although she observes that the Scott Pilgrim app ultimately "does not really stand on its own as artefact" (p. 138), she does not take this as a final assessment of digital versions, more as a challenge to the state of creation and production in flux. Moreover, she addresses the broken line in Darnton's (1982) Communication Circuit, in a way that she was not able to do in her work on digital book communication circuits. She gives voice to the readers themselves who maintain their own active role in reading digital comics: "another respondent said, 'There is a forward momentum with Comixology's 'Guided View' system which made me much more of an active reader than I generally am when I read comics on paper' (2011)" (p. 137). This view highlights the digital device and app platform working together with the content to provide a different reader experience from reading print (see also Berube et al., 2024 for additional empirical evidence of this experience).

Murray's (2013) work with cultural materialism through comics production focuses more on the actors, and especially readers, than on the actual roles themselves. Francesca Benatti (2019) picks up on "the pervasive influence of readers" but also notes the tenuous link for readers within Darnton's (1982) Communication Circuit in 'Superhero Comics and the Digital Communications Circuit: A Case Study of *Strong Female Protagonist'* (and more recently, 2024, in

Innovations in Digital Comics: A Popular Revolution). While even Darnton had to admit that "of all the steps in the communications circuit, reading is the most likely to elude the scholar (Darnton 1982, 79)" (p. 307), he contends that his 18th-century French book supply/communication chain "is applicable with small adjustments to printed books" (p. 307). From a comics perspective, Benatti agrees with this view:

> The traditional production process of US superhero comics can indeed be plotted against Darnton's circuit, though certain agents have greater weight in the so-called 'direct sales' or 'direct market' system that has dominated comics publishing for the last 40 years or more (Sabin 1993, 66) (p. 307).

Benatti perceives the author as being the prime agent and the one who holds the copyright in Darnton's (1982) model, while in the superhero model, the publisher is that "all seeing eye" (Priego, 2011) and owner of rights. Benatti presents a detailed examination of the mapping of Darnton's (1982) model with commercial print comics, for example noting that the Shippers of Darnton are comparable to the distributors, especially the long-time Diamond Distributors of comics. Indeed, Diamond had a monopoly as a distributor (this ended in 2020 with major commercial publishers going elsewhere; see also Perren and Steirer, 2021, on digital comics distribution), whereas shipping was competitive in 18th-century publishing. While digital publishing, as demonstrated by Thompson as well as Murray and Squires, has disintermediated and disrupted other roles in the supply/communication circuit, its product, what Benatti refers to as the "digital social text", brings readers more firmly into the circuit,

> [permitting] readers to address authors…with greatly reduced editorial intermediation and filtering, and, crucially, in close physical juxtaposition to the authorial text. While this may not amount to the same level of co-authorship available on a wiki page, where readers can directly alter authorial texts, the comment section of a webcomic such as SFP should be considered an integral part of the reading experience (Priego 2011, 229). Crucially, comments also facilitate reader-to-reader communication, allowing for the enactment of practices of 'community reading' (Bérubé et al. 2010, 422) (2019, p. 311).

Because comics “are still stigmatised as a ‘fandom’ rather than an acceptable form of reading (Orme 2016, 407)” (2019, p. 311; see also Locke, 2012b; Barker, 1993, and Brown, 2001), the “digital social text” and its affordance of community reading connects “fellow readers” online and in more tangible ways, for example the Carol Corps, an organization of readers of Captain Marvel (p.311). While it is demonstrative of the affordance of digital comics, this type of community does not always extend between authors and readers, as Benatti has to admit for her main example, the webcomic *Strong Female Protagonist*: “The authors seem to have chosen to keep a marginal profile on this platform, limiting themselves to moderating objectionable comments rather than directly intervening in discussions” (p. 311; see also Butler, 2021). Benatti maintains this as an example of allowing readers to interact with each other, instead of acting as “a passive assembly”. However, this behaviour on the part of authors seems to perpetuate the broken line as depicted in Darnton’s (1982) Communication Circuit.

Benatti (2019, 2024), together with Antonini and Brooker (2020) in ‘Circuits, Cycles, Configurations: An Interaction Model of Web Comics’, partially grounds interactive models in Darnton’s (1982) Book Supply/Communication Circuit. They observe that

> …the work requires significant production time and a material outlet (bookshops) for distribution, after which the reader’s role in the feedback mechanism is historically confined primarily to indirect sources (such as sales). Print comics have a shorter life cycle, which is dominated by their serial publication, usually through monthly issues (p.4).

Using the term “lifecycles”, Antonini et al. consider “the result of the industrialisation of content creation, which rationalised phases and roles so that they achieve predictable outcomes” (p. 4) and provide models that update Darnton’s Circuit, including “a book-like life cycle”, a “serialization-like life cycle” and a “webcomics-like life cycle”. The differences between the first two life cycles and the webcomics-like lifecycle are the “short time” it takes for single issues to be “created, translated, distributed, monetised, read, commented and discussed” (p.5). However, the creation process itself, spread across several webcomic issues, may be comparable to that of the book-like life cycle. Antonini et al. also accord readers a more

enhanced role in the lifecycle than that of an “indirect source” in the “feedback mechanism”. In their webcomics-like life cycle,

> …readers can play multiple roles: contributing to translations for the benefit of other communities, funding the author, providing feedback, publicising the contents through social media, recommending and rating contents, commenting on the issue or commissioning new issues. While reading, users contribute both indirectly (through generation of ad revenue, for example) and directly (through micro-payments, rating, comments, commissions and suggestions) (p.5).

From a theoretical standpoint, there is much potential for the readers’ role in general, although how much participation and communication are actually achieved is another matter. Moreover, while Antonini et al. observe that a “parasocial relationship…deepens the engagement” between creators offering up biographical information and “interested” readers, they also mention “the emotional labour of addressing fans”. However, there might be an emotional response by readers who would like more engagement than that of the parasocial kind.

This consideration of supply and communication models, and especially the problem of representing the author-reader relationship in circuits, has been important to this research, because ‘comics fans’ have often been depicted as the most engaged of readers (Woo, 2020). This research has sought to identify more specifically the processes involved and the kind of engagement to better understand comics community and culture.

Platforms, adding value or further disruption?

Thompson (2021) also addressed Darnton’s (1982) dotted or broken line between readers and authors through identifying activities for specific platforms where readers are engaged purposefully in a participatory way, namely crowdfunding (see Figure 8) and Wattpad (a publishing and reading platform now owned by Naver which also owns WEBTOON, see Figure 9), both of which are used by comics self-publishers.

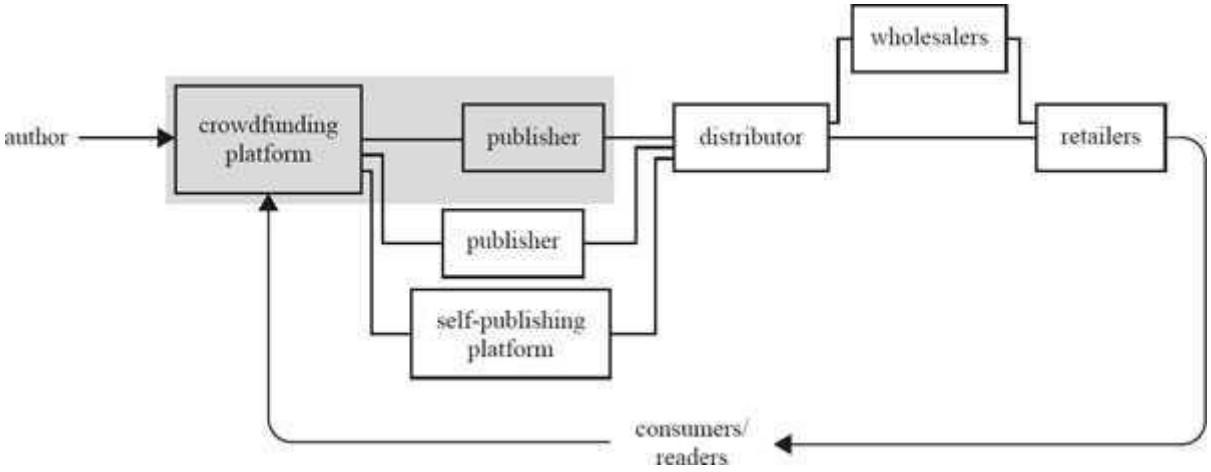


Figure 8: "Book Supply Chain for Crowdfunded Publishing" (Thompson, 2021, p.459, Figure 12.7)

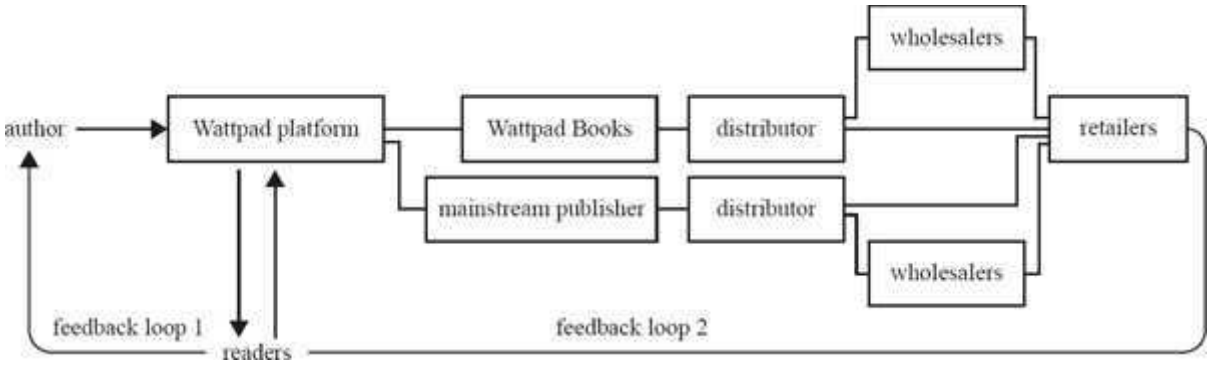


Figure 9: "Book Supply for Wattpad Books" (Thompson, 2021, p.461, Figure 12.8)

The strong feedback loop built into these platforms between readers and authors is a defining feature of both diagrams. Although the crowdfunding feedback loop goes back to the platform and not directly to the author, it is the conduit through which both groups interact and often do. Antonini et al. (2020) refer to a similar type of feedback loop that also functions within the distribution process (and the calibration and recalibration required in these loops).

Thompson (2021) expands on the concept "to publish": "making available to the public" and "making known to the public" (p.456). "Making available" is when a book is uploaded online in some fashion:

> But to publish in the sense of making a book known to the public, visible to them and attracting a sufficient quantum of their attention to encourage them to buy the book and perhaps even to read it, is an altogether different matter – it is extremely difficult to do, and never more so than today, when the sheer volume of content available to consumers and readers is enough to drown out

> the most determined and well-resourced marketing campaign. Good publishers are market-makers in a world where attention, not content, is scarce (p.456).

The three figures (4, 8, 9) above from Thompson, representing the traditional book supply and the crowdfunding and creator/reader book supply chains, illustrate the evolution from websites that just sell and platforms which aside from consumption provide other communication and creation opportunities, indeed resembling the kind of “walled garden” described by Murray and Squires (2013). In a sense, publishers have been challenged not only by more competition for content but also by an increase in communication (and creation) tools. Valdez-De-Leon (2019) explains the “symbiotic” relationship between platform owners, software developers, and third-party businesses, and how this relationship, through the online platform interface, draws in the end-user:

> Value is mutually created both to the end consumer, the platform owner and ecosystem participants. Every participant in the ecosystem benefits from interacting within the ecosystem and thus is incentivized to keep participating. This implies a move away from creating value through only one firm’s integrated value chain, towards creating value by many firms enabled and orchestrated by a platform (p. 44).

Valdez-De-Leon introduces the concept of ecosystems here in terms of the “symbiotic” products and activities created by many businesses to be offered by one platform (see Figure 10). But ecosystems are not only multiple businesses linked together on one platform, but also multiple platforms interlinked through architecture, content, and users themselves. The different types of platforms, from those that focus on digitized publications to platform ecosystems offering various activities as well as integration with other platforms, all add up to what Anne Helmond (2015) refers to as “platformization, or the rise of the platform as the dominant infrastructural and economic model of the social web” (p.1). Nieborg and Poell (2018) define

> platformization…as the penetration of economic, governmental, and infrastructural extensions of digital platforms into the web and app ecosystems, fundamentally affecting the operations of the cultural industries (p. 4276).

While Helmond's article deals specifically with Facebook, she has also investigated social media platforms in general and their "extension…into the rest of the web and their drive to make external web data 'platform ready'" (p.1).

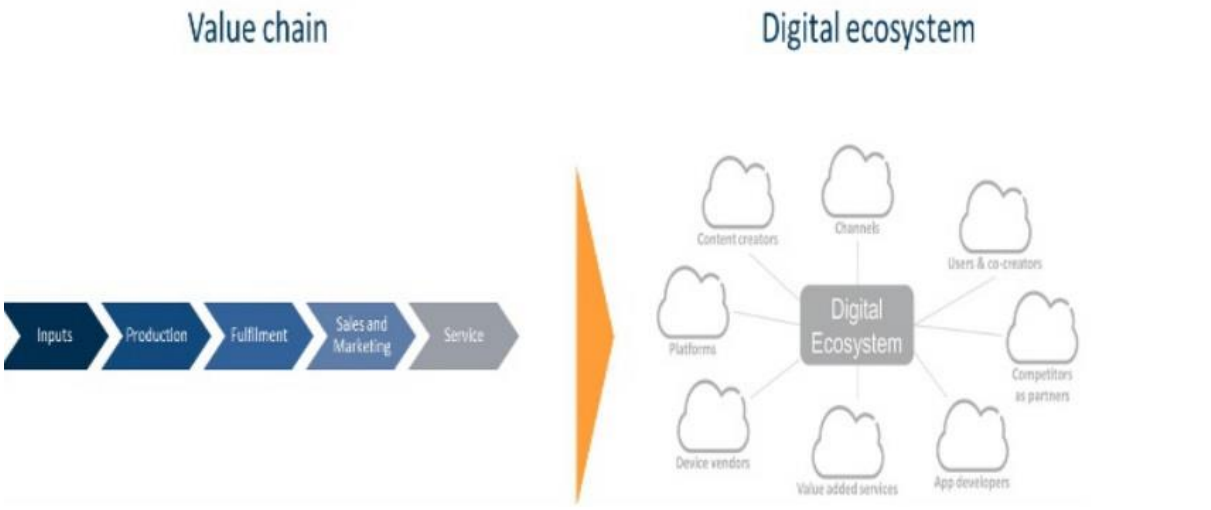


Figure 10: "The Transition from Value Chains to Value Ecosystems" (Valdez-De-Leon, 2019, p.45, Figure 1)

Nicole Lamerichs (2020) has also investigated platforms and adds additional context to their definition:

> Platforms are best understood as socio-technical assemblages that facilitate different communities, and act as mediators and gatekeepers of content (Gillespie 2018). They have also been described as commodities that are 'malleable, modular in design, and informed by datafied user feedback, open to constant revision and recirculation' (Nieborg, Poell, and Deuze 2019, 85) (p. 213).

In her article including a case study of WEBTOON, Lamerichs cites Helmond's (2015) work and observes that

> …these technologies are not neutral, and creative producers are increasingly dependent on them. Platforms may be designed with certain criteria in mind, but they are socially constructed and their affordances, including their algorithmic design, give yield to complex user cultures (van Dijck 2013) (p.213).

Indeed, Helmond (2015), with such scholars as Gillespie (2013), Nieborg and Poell (2018); Nieborg, Poell, and Deuze (2019); Poell et al. (2022); and Neiborg et al.

(2024), speaks in terms of the powers of platforms, algorithms, curation, data, and metrics as varied attempts “to unpack platform power by theorizing forms of corporate control” (Nieborg, Poell, Caplan and van Dijck, 2024, p.6, referring to Beer, 2016; Bucher, 2018; Cheney-Lippold, 2017; and Prey, 2020). These “powers” work both for and against creators, readers, and publishers, and even when they are useful, continue to gather data and channel platform activities. Lamerichs (2020) notes that platforms and the “global infrastructure” supporting them are “more than service models” (p. 211).

Not all scholars perceive platforms in this light. According to Shadbolt et al. (2016) in ‘The Rise of Social Machines: The Development of a Human/Digital Ecosystem’, software platforms are the “engines” for the “social machine”. They cite Berners-Lee and Fischetti (1999) in explaining the nature of this support:

> Real life is and must be full of all kinds of social constraint—the very processes from which society arises. Computers can help if we use them to create abstract social machines on the Web: processes in which the people do the creative work and the machine does the administration (quote on p. 107).

While Shadbolt et al. in 2016 looked forward to “an emerging and genuine partnership between humans and machines, between data, human cognition, and machine algorithms blended in myriad ways” (p. 107), Helmond (2015), Lamerichs (2020), and other scholars cited above would challenge this benign view of the machine.

2.4.3 Comic Platforms, Digital Ecosystems

> “Content platforms and social networks become necessary collaborators in the dissemination of webcomic narratives, which makes them coexist with other similar visual formats in an ecosystem rich in images but complex in the consumption habits of those who inhabit them. Although the analysis of narrative images in social media and their consumption by digital natives is of general interest to researchers—mainly focused on the study of memes (Bauckhage, 2021), there is still room for expansion in the study of the comic inserted in this type of user-shared content platforms” (Hernández and Bautista, 2023, p.2).

Indeed, as an ‘early adopter’ of platforms, digital comics as a presence in this economy is relatively absent from the research in platform studies. This absence could be attributed to the focus on the complexity of the technological evolution of platforms, as well as an emphasis on the business aspects, rather than content in the research.

However, in the literature on digital ecosystems, there is the increasing awareness of the multidisciplinary approach required to analyse them, and Helmond (2015) (social media), Lamerichs (2020) (comics), Valdez de Leon (ecosystem frameworks), and Padua (digital sociology) in their various disciplines exemplify a form of digital sociology (see Nortje Marres in *Digital Sociology: The Reinvention of Social Research* from 2017). Earlier publications focused on the business aspect of ecosystems and still do to some extent, especially the large institutions like Google, Amazon, and Apple (mentioned in Dulsrud and Bygstad, 2022). For example, Dulsrud and Bygstad (2022) in their analysis of research on digital ecosystems, including identifying the four streams of “the political, the economic, the technological, and the social and the cultural”, speak of them as “social institutions”. In particular, they identify consumers as important:

> We associated the consumer as the critical actor of digital ecosystems, because the impact of digital ecosystem development hinges on the way in which consumers perform, accept and integrate the technology (p99).

They go on to demonstrate the “the relationship between consumption and digital technology” and that the act of consumption is more than a simple or single transaction: it “is multifaceted and non-deterministic” (p.99).

Whereas digital ecosystems were and are often associated with the technology infrastructures of business, Dulsrud and Bygstad (2022) believe that the focus should be on consumers, because they are “the critical actors” on “digital platforms”: “the consumption side refers to the ways in which ordinary users use these technologies and the ways in which their use is transforming everyday life (Torpey, 2020)” (p.100). The emphasis on “the consumer as the critical actor of digitalisation” (p.100) brings us back to Priego (2011) and his summarizing of Gardiner and Musto (2010) on e-books: “reading as cultural practice [as enacted by the reader, the consumer] is becoming more important than the book as an object”

(p. 43). Indeed, platforms have been conducive to the consumption and reading of comics online. Commercial comics publishers have had to heed the same warnings as book publishers:

> Even though the legacy publishers have survived eBook disruption, publishing veterans attribute this to luck instead of a solid strategy (Ross, 2016). To them, it is not 'the time to sit back and hope the status quo will last' as the publishing industry might not weather the next wave of digital disruption with 'such good fortune' (Missingham, 2017) (Ren, 2022, p.280).

Comics have most notably aligned with cross-platform culture and economy, not just as a quick and succinct "visual format" substitute for communication but also because they "[do] not and cannot exist in isolation from the different material platforms in which [they have] traditionally reached [their] readers or might do in the future" (Priego, 2011, p. 19-20).

Priego's study viewed comics in their various material forms—systems, print books, and digital publications. All are comics, but in different instantiations, none taking precedence over another. This study shares that view, and findings, especially from readers, generally display a container equanimity, often in spite of stated preferences for one or the other. For digital comics, there is the shared, almost ubiquitous experience of the platform or, in a wider sense, 'the platform economy', whether that be comics- or non-comics-based. Digital comics platforms, whether they are commercial publisher or self-publishing platforms (and even individual webcomic sites), combined with non-comics platforms including social media sites, have acted as a nexus of communication, facilitating a sense of community, even an ecosystem of creating, producing, and reading.

One researcher has claimed that the use of the term "ecosystem" as part of "digitalization" (as opposed to its origin in the natural environment) "has become commonplace to the point of ubiquity… along with the adjacent 'business ecosystem' and 'entrepreneurial ecosystem,' in computer science, economy, environmental policy and related fields" (Krivý, 2023, p.1). While this may be arguably true, it is a term illustrative of how digital comics have evolved. The comics industry was quick to adapt to the platform economy, or "platformization" (Helmond, 2015). Indeed, this research affirms the influential role platform comics, often accompanied by apps,

have played in the reading of comics, although the relationship has not always been a frictionless one (ComiXology, for example, see Alimagno, 2023; Simons, 2023).

Comics on personal computer or digital platforms came about almost simultaneously with the platforms themselves: the first ‘computer app’ was the VisiCalc spreadsheet application in 1979 exclusively for Apple II. In this instance, the reference is to software platforms tied to specific hardware platforms, such as Apple or Commodore: “A platform is a group of technologies that are used as a base upon which other applications, processes or technologies are developed” (Rouse, 2024).

Digital comics platforms usually call to mind the likes of ComiXology, Marvel Unlimited, or WEBTOON, but there were comics platforms long before these incarnations. Wershler et al. (2020) provide a detailed timeline of comics platforms, starting “in 1988 and 1989…Infocom’s *Infocomics*…four titles for the Apple II, Commodore 64, and PC” (p.257). Wershler et al. observe that these digital comics were among the first examples of experimentation with hypermedia and comics. Marvel was not far behind, however, in exploring distribution and access to comics in the digital environment: Wershler et al. describe *Cybercomics* for America Online as “a hybrid, ‘slightly interactive’ form that fell somewhere between comic and animation” and “were marginal and clunky”, “the first entirely digital Marvel product” (p. 258). These were the first attempts at not only creating comics electronically, but in such a way that would raise their profile among a wider, not necessarily predisposed, comics audience. Busi Rizzi (2023), among others (Garrity, 2011; Priego, 2011; Kleefeld, 2020; and Wershler et al., 2020), tracks these attempts:

> A fuller understanding of the heterogeneity of digital comics comes from retracing their historical trajectory. We can identify four phases of digital culture, determined by different paradigms: personal computing; network computing; digital renaissance; platform economy. These phases have shaped the dominant forms in the history of digital comics (p. 106).

However, Julien Baudry (2018), in “Paradoxes of Innovation in French Digital Comics’, cautions against a linear approach to digital development in comics:

> The very first digital comics created during the 1990s (*John Lecrocheur*, *Opération Teddy Bear*, *Supershoes* to name a few…) are in many ways more innovative with form than most of the digital comics of the late 2010s. The context of French digital comics reveals a paradox between the widespread idea of a linear transition towards novelty in digital form and the empirical observation that comics simply do not follow that direction (p. 3).

Wershler, Sinervo, and Tien (2020) make a similar observation about Anglo-American comics. Comics have always been intermedial ("and interactive") while "digitization itself might be relatively new" (p. 254). Wershler et al. believe it more productive to look beyond "formal concerns", such as the application of innovative digital "techniques" (p.254). Quoting Bart Beaty, they advocate "[thinking] of comics as 'the products of a particular social world, rather than as a set of formal strategies'" (p.255, quoting Beaty, 2012, p.43). Of particular pertinence to this research, they maintain that "what should matter to scholars and historians is not some elusive and chimeric formal essence but what particular communities say about and do with the things that count as comics to them" (p.25). Wershler et al. go on to consider platform-based comics, especially given their fragility but also as continually evolving: "It is unlikely that any one digital expression of comics will soon become dominant, and maybe that's for the best" (p. 265). The dependence on what readers and creators "say about and do with" brings us back to Priego (2011, and Gardiner and Musto, 2010, and Hernández and Bautista): the platforms of communities, of consumers, of readers are at the heart of comics and specifically in their digital formats.

The second (crowdfunding and support platforms) and third (social media, the first being comics-exclusive platforms) cases mentioned by Busi Rizzi (2023) in the "platform economy" phase of digital comics are important to note in that they bring not only comics but also their creators and readers outside of the self-contained comics platform and into the greater, non-comics, web ecosystem. As previously noted, Busi Rizzi describes the "platform phase" as comprised of three types: platforms that host; platforms that support; and social media platforms. All three combined illustrate a comics ecosystem, where creators, users (or readers), and producers create and interact across platforms. This development of platform to ecosystem has been assisted by the relative ease with which the comics industry

has “accommodated” platformization. According to Busi Rizzi (2023) “comics are no strangers to the centralization and concentration that has invested other fields of digital culture” (p. 117). This propensity to centralization has meant that while “smaller businesses had to shut down” the large commercial comics publishers (“multinationals”) spent a period of time “[resisting]…a market where users are often unwilling to pay for the consumption of intangible, uncollectable objects” (p.117), i.e. digital comics. Busi Rizzi recounts the changes to business models that “comics conglomerates” undertook, in their pursuit not only of providing access to comics digitally but also of taming the consumption of digital comics. For example, they provided “flat subscriptions” while “[curbing] most of the exchange practices that have long characterized comics culture, channeling them towards a more orderly consumption” (p. 118). Busi Rizzi does not explain what “orderly consumption” looks like and how it differs from previous (print?) consumption. Dulsrud and Bygstad (2022) would maintain that consumption on “conglomerates’” platforms only represents part of a more “multifaceted” consumer culture.

With their emphasis on providing a framework for analysing content technologies, Antonini et al. (2020) provide a view of “webcomics as an integrated ecosystem of authorial, editorial, funding and reading tools, mediating a complex network of interrelation between the key actors of the webcomics life cycle” (p.2). In this way, their analysis ranges beyond the confines of “large organizations” outward to the wider web in its identification of content, production, distribution, and feedback practices within “the webcomics technology ecosystem”. This ecosystem is not so much orderly or disorderly as “[supporting] a frenetic life cycle”. Perceived thus, “webcomics [are] not…images on a website, but a complex ecosystem of interaction modalities held in matrix” (p. 9).

While Antonini et al. (2020) provide a focus on how creators perform within the webcomic life cycle ecosystem, Heekyoung Cho (2021) demonstrates how the platforms within the webtoon ecosystem promote a form of “orderly [or maybe disorderly] creation”. In ‘The Platformization of Culture: Webtoon Platforms and Media Ecology in Korea and Beyond’, Cho contends that there is a “continuing and intensifying dependency of art on platforms” which has “reinforced [an] ‘artists incubating system’” (p. 73). Cho contrasts the promotion of webtoon artists on platforms like Naver and Daum and “common fan art sites”. This platform-supported

promotion has had an impact on webtoon creation culture in Korea: “it is one of the webtoon platforms’ fundamental interventions into webtoon culture and that the process of the platformization of culture is effectively sustained and reinforced by this incubating system” (p.83). The coordination between multiple platforms in “the webtoon ecosystem” “is orchestrated and reinforced by various participating parties in economic, political, and sociocultural sectors…which, in turn, further accelerate the dependency of cultural production on platforms”. This leads to creative works that are “hypercommodified in the platform-led media ecosystem” (p. 91).

The literature for this research includes a significant category of articles on the subject of Korean culture and “the webtoon ecosystem”, consisting of the different webtoon platforms, dedicated webtoon personal sites, and fan art sites. It is illustrative here to consider this well-documented impact of comics platforms and ecosystems. The commodification of comics through platformization has had a similar impact on Western comics. According to Yecies and Shim (2021) in *South Korea’s Webtooniverse and Digital Comic Revolution*, not only have webtoons had a significant impact on Korean culture, but especially “branded webtoons”, combining content and product promotion, such as can be found throughout Korean media as well on the platforms Naver WEBTOON, Daum WEBTOON, and Lezhin Comics. Webtoons have been considered “spreadable media” from their initial uptake to “[attract] Internet and mobile traffic to Korea’s two major search engines, Daum and Naver, as well as to other webtoon and related digital media platforms” (p. 153). It seemed a logical next step to harness webtoons into “walled gardens”:

> …most companies had few digital or electronic options outside their own websites, blogs, and Facebook accounts for hosting and publicizing branded content. Now producing a branded webtoon and adding a webtoon platform to a company’s overall promotional branding strategy makes it look in-step with the times and popular culture (p.155).

These webtoon platforms have wielded significant influence in the Korean creative industry, not the least because of their global popularity attracting foreign currency earnings. Moreover, they created their own ecosystems, as noted above, through blogs and social media. Their promotional reach is attractive to comics creators, especially those specifically cultivated or “incubated” by the platforms (indeed, one

creator research participant launched their comics career on the then new English-language WEBTOON).

Lamerichs (2020) illustrates how incubation can work in the form of income for creators in her case study of WEBTOON and the “attention economy”. While WEBTOON creators can develop their comics outside of the WEBTOON platform and then upload, there is also the option for creating within the platform with the Canvas tool. Creators choosing this option earn credits:

> Credits are paid directly to an artist’s Patreon, thereby creating an intimate relationship between the popular crowdfunding platform and the comics platform. Together, these services form a new comics ecosystem for artists and readers (Lamerichs, 2020, pp. 220-221).

As Lamerichs observes, this link between the two platforms creates a comics ecosystem within the broader web ecosystem. The link between WEBTOON and Patreon is different from the platforms having an account on social media: there is a permeability of the walls around these platforms that allows not only for a system connection but also a financial one.

What this example of “platform to ecosystem”, especially the human relationships it facilitates, illustrates is a kind of digital sociology (Fussey and Roth, 2020). This type of sociology consists of “ecological principles” (Marton, 2022) where “the primary use of these platforms ...solidify and maintain existing relationships” (Fussey and Roth, 2020, p. 670), between creators and platforms and between the platforms themselves, especially in terms of financial and artistic support.

Cho (2021), Lamerichs (2020), and Yecies and Shim (2021) use Naver WEBTOON as a way of illustrating how comics-based platforms interact to form ecosystems, although sometimes at the expense of non-platform-based creators (as well as their own creators, for Lezhin Comics’ conflicts with creators, see Yecies and Shim, 2021). The example of webtoon platforms and their influence in South Korea and globally illustrates just how readily adaptable comics are to this type of creation>production>distribution>reading paradigm. These platforms, independently as well as connected seamlessly with others, are attractive to creators looking for a steady income and enhanced profile in the face of much competition.

In ‘The Renewal of the Webcomic in the Era of Platformization: The Case of 9Gag on Instagram’, María Abellán Hernández and Pavel Sidorenko Bautista (2023) examine “the appropriation by [comics] authors of other social media and platforms where they have found not only a window to exhibit their works but also an opportunity to capitalize their creative efforts” (p. 4, referencing Perez, 2016). Not only does “the Instagram wall…function as an infinite canvas…the structure of the posts can [also] mimic the panels of a traditional comic page (p.4). This “appropriation” of Instagram space, a kind of “literary salon” (from Trehondart, 2020, writing on a French comic strip series, *Été*, on Instagram) demonstrates the intersection between 9Gag’s own social content platform, which includes webcomics as well as memes, and its social media presence. Given this kind of permeability between platforms (as also demonstrated by Lamerichs, 2020, with WEBTOON and Patreon, and Cho,2021, on multiple webtoon platforms and art sites), Hernández and Bautista (2023) maintain that comics and their supply/communication chain is a long way from the impenetrable silos of the “walled gardens” of the previous decade:

> The current scenario is sensibly different as digital content platforms cannot be understood as mere containers as the media were previously understood, but must be imagined more as connectors and catalysts of small nodes that are the users belonging to the community (pp. 9-10).

Discussion of platforms and ecosystems repeatedly returns to users, consumers, be they readers or creators. This focus highlights the importance of empirical research that is user-centred and, as such, is a primary focus of this research.

2.4.4 Section Conclusion

In tracing the evolution of the production (and distribution) of digital comics, this section demonstrates not only their relation to book production and distribution, but also the “platform economy” that connects them to other comics and non-comics sites. Comics, in their digital form, lend themselves to the commodification that comes from creation and distribution on platforms. The spider-like production process ecosystem in contrast to the linearity of traditional publishing, as exemplified by Valdez de Lyon’s diagram above (Figure 10), is not only reflective of the impact platforms have had on all publishing, but also of the impact of self-publishing as an engine that drives platforms such as Naver WEBTOON. In this sense, creators as

users and consumers on these sites, as well as readers, become the central force exerting change on technology, business models, and access. This role has been predicted by some scholars from early in the last decade, essentially a byproduct of digitalization. In their analysis of "reading, writing and sharing trends emerging across Asian-born webtoon [South Korean] and webnovel [Chinese] platforms", Shim, Yecies, Ren, and Wang (2020) maintain that the participatory and interconnected cultures spawned by these platforms are "shifting various models of production" (p. 833) as well as distribution. Integral to these cultures are "active fans, otherwise known as 'cultural intermediaries'" who "have moved to the forefront of creative industry transformations" (p. 833). In their article, 'Cultural Intermediation and the Basis of Trust among Webtoon and Webnovel Communities', Shim et al. (2020) go to the sources of these participatory cultures, using "non-participatory observation" on community-based websites (as well as data mining) in order to conduct ethnographic research (p. 841). By observing these "cultures" in situ, Shim et al. highlight the importance not only of digital publications but, more importantly, of the communities that evolve around them and the crucial role of communication in this evolution.

2.5 Producing Comics, Communicating Comics Culture

> "We approach the analysis of mass-mediated symbolic forms by distinguishing three aspects or object domains – what I shall describe as the 'tripartite approach'. The first aspect is the production and transmission or diffusion of symbolic forms, that is, the process of producing … and of transmitting or distributing them via channels of selective diffusion…The second aspect is the construction of the media message…The third aspect of mass communication is the reception and appropriation of the media messages" (Thompson, 1990, p. 303).

2.5.1 Introduction

This research has highlighted J.B. Thompson's empirical work on publishing, particularly in the context of comics publishing. However, before publishing, his research focused on the role of mass communication and media in society, including *Ideology and Modern Culture: Critical Social Theory in the Era of Mass Communication,* in which he expounds his tripartite approach as described above

(see also his influence on Brienza's work below). In this approach, Thompson interweaves, in essence, the production, creation, and consumption of the symbolic form (including cultural artefacts), all as aspects of communication. He uses this approach while focusing on publishers in his empirically based work on publishing, thus providing a case study for his own theoretical analysis. While writing from a business or organizational level analysis, Thompson was also interested in analysing these through "a combination of social-historical analysis and ethnographic research" (p. 303). In doing so, he sought to capture not just organizational processes, but also "the routine procedures followed by individuals in carrying out their everyday tasks" (p. 304). He was concerned with the "assumptions about the audience and its needs, interests and abilities" (p.304). In this chapter, I review the production of culture literature with a particular emphasis on the role of communication, addressed by comics studies and other scholars.

2.5.2 Production of Culture and the Study of Comics

The activity around creating, producing, distributing, consuming, and reading, whether through traditional publishing avenues or platforms, tends toward the development of a cultural artefact, the digital comic. The study of the production and distribution of comics not only reveals the makings of a cultural object but also the values of the culture itself. Casey Brienza summarizes Thompson's tripartite approach, observing its application to one type of symbolic form, "the cultural object", and indicating its influence on her work (2010, pp106-107). As with Brienza, the focus of this research reflects all three of these approaches: indeed, both Thompson (1990) and Brienza (2010) observed that the three approaches naturally overlap, it being difficult to isolate one from the other. For this research, an analysis of digital disruption across "broader social contexts" (Brienza, 2010, p.109) demonstrates the impact on comics as an example of a cultural object.

In addition to Thompson (1990) and Brienza (2010), other scholars advocated for a social science approach to the analysis of the production of cultural objects. The "six-facet model of the production nexus" refers to specific factors that influence the making and production of cultural objects: technology, law and regulation, industry structure, organization structure, occupational career, and market (Peterson and Anand, 2004). Indeed, various such studies have "illustrated elements of culture

being shaped in the mundane processes of their production" (Peterson and Anand, 2004, p. 312, referring to collected essays entitled *The Production of Culture*, 1976 edited by Peterson and 1978 edited by Coser; see also Lee and LiPuma, 2002, on the dichotomy of economy and culture).

The undertaking to understand digital comics makers through empirical, indeed experiential, research is part of an effort to move away from the organizational, business, and technology-related focus that often dominates production, platform, and ecosystems studies, and to contribute to a digital sociology approach. In previous sections, indeed right from the introduction, I have noted the lack of a sociological approach to comics, especially digital comics, the preponderance of humanities- and literary-based scholarship, and the work to make comics studies a discipline largely within that context. However, with production studies, and especially production of culture studies, I almost immediately located a seam of comics scholarship from the earlier part of the last decade, led for the most part by Brienza (2010, with Johnston, 2016) along with Priego (2011), Murray (2012a, 2012b, 2013), and Woo (2011, 2013, 2015, and latterly 2021).

However, attempts to move analysis beyond theory, history, and visual and textual analysis to production were not always without pockets of resistance which equated 'production' with 'organization'. When writing on the production of comics culture as a focus for a sociological methodology, Brienza (2010) met with some resistance from Simon Locke (2012a), author of *Comics, Superheroes and their Fans: A Sociological Analysis* (2015) and scholarship on science in comics who, while supporting a sociological approach, objected to the "retrograde step" of a production focus, in a blog post on *Comics Forum:*

> It comes as something of a surprise to find that the first explicitly stated effort to define a sociology of comics (Brienza 2010) chooses to place emphasis on only one aspect – and it is that same old hoary figure, the production of culture, looming up again like a hydra sprouting yet another bug-eyed head.

Brienza (2012) was given a right to reply and spoke to her experience as "the humanist desperately trying to see beyond text and national territory", in other words a broader context than what Brienza and Johnston (2016) in a later publication define as " a tendency to canonize the writer and to advance a narrow, auteurist

vision of production when analysing and studying comics" (p.1; see Woo's, 2019, "self-theorizing discourse" of creators above). Brienza and Johnston's (2016) publication, *Cultures of Comics Work,* was arguably a direct result of a "Comics & Cultural Work" Special Theme Month (December 2013) of *The Comics Forum* (see Brienza, 2013b*).*

What this exchange demonstrates is that, firstly, at that time the division between humanities and sociological (specifically production of culture and material realities) views, at least from representation in the literature, was indeed wide (and perhaps still is from the relatively little scholarship for the latter in comics studies). Also, there remains scope for more nuanced scholarship where an analysis of human 'argument' through production does not signal a divide from content. However, the opposite must also obtain—or can the two be combined in a way that serves humanities and sociology? This research may be classified as advocating for production and 'material culture' studies, theory even, but for one aspect: the empirical approach that examines the whole experience of comics using process as the context.

The production of digital comics culture

As demonstrated by Brienza and other scholars, comics do benefit from Thompson's approach, as well as others focused on the production of culture (see Peterson, Anand, and Coser above). However, Brienza and the scholars referenced were not necessarily focused on digital comics, per se. For example, *Cultures of Comics Work,* published in 2016, contains no real consideration of digital comics production, not even when speaking of self-publishing. In the 'The Tail that Wags the Dog: The Impact of Distribution' chapter, there is a 'Recent Developments' section on Manga and 'Digital' which is not exhaustive. Benjamin Woo, who contributed articles to both *The Comics Forum* series (2013) and the *Cultures of Comics Work* anthology (2016), conducted empirical research for an article, 'Erasing the Lines between Leisure and Labor: Creative Work in the Comics World' (2015), focusing on creators and, while not considering the spectrum of cultural production, does delve into the many ways it costs a creator to make comics. In a note, Woo describes the survey of 570 comics creators conducted between 2013 and 2014,

> …recruited from a number of channels (including creators credited in comics listed for sale in randomly selected issues of the Previews catalog, creators exhibiting at one of five 2013 comic conventions or festivals, and through social media referrals) (p.63).

Although not stated specifically, the description of the recruitment venues sounds like creators of print comics very much dominated the sample. Indeed, there are not many references to digital comics throughout the article. The lack of routine mention of digital comics in the scholarship is in some way indicative of the state of comics publishing: Murray (2013) who examined the various participants in making comics observes that the "experimenting with various strategies to succeed in the digital comics market", among other influences, is a sign of the state of "flux" (p. 339). She may have been writing over a decade ago, but publishing, comics and otherwise, is still unsettled by current and continuing digital developments.

Essentially, there appears to be no relatively recent full-length treatments of a production of culture approach to advance this work and certainly not for digital comics. Most references to production in the scholarship are to mass production of Anglo-American print comics (publishing studies in general reflects this concentration on big publishers and mass production and communication, see Thompson 2010, 2021, supported by field theory, as well as Ho et al., 2011; Hall, 2019; Parnell, 2020; Ren, 2022 among others, some of these combining publishing and platform studies). In fact, Brienza does more to advance production studies, but as it applies to manga, although not beyond 2016 (see Brienza, 2009, 2013a, 2016a, 2016b).

It is where platform studies intersects with comics studies (Lamerichs, 2020, for example) that digital comics figure more prominently. This intersection also places them within the context of the production of culture. Lamerichs (2020) refers to "cultural systems":

> …comics are popular online…with the emergence of platforms such as DeviantArt, Smackjeeves and Webtoon. Through comments and follow features, readers can directly engage with their favorite artists. Crowdfunding platforms, from Kickstarter to Patreon, also allow audiences to become investors and support their favorite comics financially. These cross-overs of

fandom and comics are indicative of a changing landscape, one where texts, audiences and media are not experienced in silos, but in complex cultural systems (p. 212)

Interestingly, a device was the basis for another methodological approach to culture presented in the form of a circuit. The device, a Sony Walkman, was a precursor to the smartphone. While the circuit of culture theory was originally formulated in 1997 in connection with the use of the Walkman cassette player (du Gay, 1997), it reflects the production of culture approach in that it advocates for studying cultural artefacts according to five similar aspects: representation, identity, production, consumption, and regulation (Figure 11).

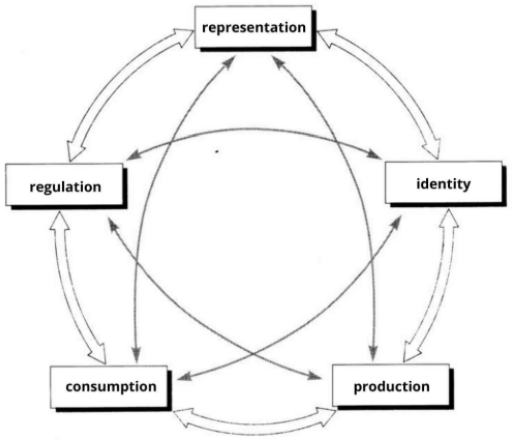


Fig. 2. The circuit of culture (Du Gay *et Al.*, 1997 and 2013).

Figure 11: "The Circuit of Culture" (Du Gay et al., 1997 and 2013, Figure 2)

The circuit of culture theory is not only interesting within the context of this research for its approach to materiality but also its connection to the production of culture. It emphasizes "the centrality of the relationship between practitioners and artefacts" (Mora, Noia, and Turrini, 2019, p. 66) or "between human and non-human actants…assembled in so-called 'actor-networks'" (Du Gay et al., 2013, p. xiii). Mora et al. (2019) compare the differences between the 1997 and 2013 editions of the book by Du Gay et al., *Doing Cultural Studies: The Story of the Sony Walkman,* the most noticeable being the evolution of devices. What made the Sony Walkman attractive as a subject of cultural study also pertained to the mobile devices of that time, according to Du Gay et al. (2013):

> Comparing the cultural practices associated with the Walkman with the practices related to modern Web-based mobile devices reveals both continuities and changes in the ways such technologies have been represented, identified with, produced, consumed and regulated (Du Gay et al., 2013, p. XII as quoted by Mora et al., 2019, pp.65-66).

The Sony Walkman was an instructive case study "through which to demonstrate how material objects that enable particular social practices can be at the centre of interaction networks and particularly of complex meanings" (Mora, et al. 2019, p.66). They are not just "at the centre" but are the conduits through which interaction happens, transforming it. The "material turn", represented by the evolution in devices from the Walkman, signals a change in "socio-cultural relations" (More et al., 2019, using Du Gay et al., 2013 terminology).

These devices have featured in the supply/communication circuits (forms of "actor-networks") envisaged above by Thompson (2010, 2021) and Murray and Squires (2013). It is not just that they are "material objects that enable particular social practices" but that they enable the primary social practice—communication—the engine that drives networks, circuits, ecosystems, and culture.

2.5.3 Communicating Digitally about Culture

Platforms that rely heavily on the actions of creation, consumption, reading, and distribution are driven by continuous communication and are the basis for ecosystems that contain and make up complex cultural systems. Lamerichs (2020) is cited above as referring to "complex user cultures" because "platforms are relational…embedded in social and economic contexts" (p213). These "complex user cultures" are often considered to be more engaged in this digital environment than in print environments by virtue, at the very least, of the speed and ease of communication tools (Guigar et al., 2011; Manzerolle, 2014; Dowthwaite, 2017). But that is to beg the question: what kind of communication is it? Communication and publishing studies offer a way to evaluate communication that is pertinent to digital comics studies. Moreover, they relate to the identification of multi-layered communication in the digital environment represented by the findings in this research.

Scholars, such as Darnton, have envisioned the communication process in a cyclical fashion where actors contribute value in the supply chain sequentially. Communication, especially within the digital production process, is complex and often involves several participants, messages, and types of messages: more of a give-and-take, a one-to-many, or a many-to-many, rather than a straight line (Narula, 2006; Corey, 2009; Jones, 2013) or even a complete circuit. In this respect, it is useful to consider communication models.

According to Narula (2006) in her *Handbook of Communication Models, Perspectives, Strategies* (alternatively entitled *Communication Models)*, "communication is interaction with ourselves, with others and our external and internal environments" (p.2). Digital technology has brought an immediacy to communication as well as content, but does it also bring a concurrent substantiveness to the communication? Immediacy is often cited as the hallmark of communication in the digital environment. Manzerolle (2014), in 'Technologies of Immediacy/Economies of Attention', defines it as being "relatively unencumbered by spatial and temporal constraints" and "tied to the specific location of the individual" (p. 210) as opposed to being dependent upon the time and location of another. For example, readers receive comics on their laptops or phones as opposed to making their way, often costing time and money, to the comic book shop to get the next issue. According to Guigar et al. (2011, as quoted by Dowthwaite, 2017, p.20), "[o]ne of the greatest things about Webcomics is the immediacy, frequency and intensity of your interactions with readers. You can talk to them, and they can talk back" (p. 104). In the digital environment, book and comics publishers receive comics immediately, and the give and take of editing happens more quickly.

Guiger et al. (2011) mention "immediacy, frequency and intensity" as indicative of interaction through webcomics. However, applying communication models provides a firmer basis for analysing the types of communication that occur, especially in the face of such claims for the digital environment. There is immediacy and frequency, but how to define intensity? Communication scholars have identified different types or levels of communication, for example, linear, interactional, and transactional models (Narula 2006). The linear model is focused on the speaker (in the case of comics, the creator, or the creator and publisher, depending on which type of comic is under consideration). The Berlo model (1960), as well as the

Shannon-Weaver model (see Wrench et al. 2015), is an example of this linearity. In a sense, the Darnton (1982) Communication Circuit and the reiterations from Murray and Squires (2013) can be viewed as linear: the starting point is the creator, and the end point is the reader. The problematic broken line and the vague description of the reader's action and feedback prevent them from being true circuits.

In addition to the linear model of communication, Narula also discusses the interactional and transactional models which can arguably apply more to digital communication, especially on platforms (they are the kinds most encouraged by platform owners). The interactional model covers feedback from the reader to the creator or publishers, mostly in the form of likes, follows, and affirmative (and not so) posts on social media. They are an acknowledgement of value (see Chapter Six for more of this kind of communication). In the case of the transactional model, which can involve the consumption of a product, “communication is a cooperative action in which communicators co-create the process, outcome and effectiveness of the interaction” (Corey, 2009). According to Narula (2006), “both parties are engaged in the process of creating meaning in a relationship” (p. 18).

Crucially, the ‘field of experience’ or, in the case of the transactional model, the ‘environment’ must be shared or at least have some overlap among the participants. Moreover, the circularity inherent in the models emphasizes “patterns of recurring communication” (Narula, 2006; see also Corey, 2009). Where communication is transactional, there is a joint process to produce something of cultural significance, and not just interactional feedback between participants (Corey, 2009; Jones, 2013). Transactional communication describes a context where “we don’t just communicate to exchange messages; we communicate to create relationships, form intercultural alliances, shape our self-concepts, and engage with others in dialogue to create communities” (Jones, 2013, in Chapter 1.2).

It is through these two models that a more circular or cyclical approach to representing communication is described (see Thompson’s supply chains for Wattpad and crowdsourcing above as examples). In addition, “shared environments” or “fields of experience” dominate these models. For example, “the *field of experience* refers to how environment, experiences, culture, and even heredity can influence how a sender constructs a message” (Corey, 2009). In these models, the

focus is increasingly on both the creator, the reader, and the feedback loop they produce, as well as the activities in the process that are driven by this communication. Moreover, by including “field of experience”, the model moves beyond the individual organisation to include a larger context or framework within which these processes occur. In this sense, the processes reflect general patterns of communication occurring in a wider context of communities, cultures, and ecosystems.

Narula (2006) goes onto explain that “in transactional models, the concern is with the *patterns of communication behavior* within the relationship formed between the senders and receivers; and not with *patterns of information and redundancy”* (pp18-19; italics are Narula’s). In a sense this view links to Antonini et al. (2020) and the description of webcomics as “a formation of discrete interactions” (interaction here not used in the strict sense of Narula’s definition). These interactions and behaviours can be observed in the communication between comics editors and publishers, for example (see Chapter Four).

But do we need others to create meaning through communication? According to Barnlund (1970), “flags, crowns, crosses and traffic signals do not contain meanings; they have meanings thrust upon them. Our physical and social environment [include] the messages to which we attend” (p.47). In other words, people communicate nonverbally regularly throughout the day: “meanings may be generated while a man stands alone on a mountain trail or sits in the privacy of his study speculating about some internal doubt” (Barnlund, 1970, p.47). This type of communication with self and objects introduces the concept of reader-response, and how comics readers are also comics makers.

Readers making, consuming, and communicating

Readers often reserve their most substantive, most meaningful communication with the digital comic itself, reflecting Narula’s (2006) definition that describes “interaction between ourselves…and with our…internal environments” (p.2). This “interaction with ourselves” and “our internal environments” is expressed through literature as reader-response (in the response to a text, the reader contributes meaning) and by extension transactional reader-response (the convergence between the text’s implied meaning and the reader’s individual

interpretation and response, see more on this below). Both theories focus on the reader as an active participant in creating meaning and adding value to the work itself.

An example of how different types of feedback loops can occur in comics publishing, specifically webcomics, is demonstrated by Antonini et al. (2020). As noted above, they maintain that the webcomic lifecycle is an example where the influence is diffuse, not just across publishers and creators but readers as well (see also Priego, 2011, and others above). The diffuse interaction and influence are demonstrated in two phases of the lifecycle:

1. Distribution infrastructure, in which content is delivered to users. This accommodates shops, websites, e-reader software, collected volumes etc.

2.Feedback infrastructure, which delivers resources necessary for the creative process: comments, ideas, criticism and (crucially) payment (p.6, and as illustrated in Figure 12).

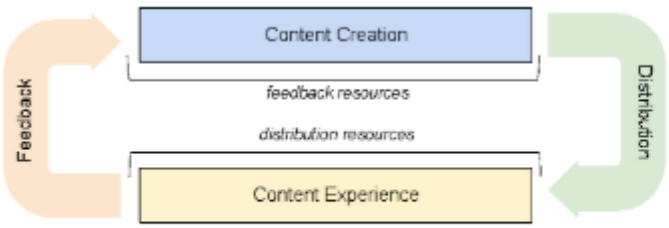


Figure 4. Distribution and feedback infrastructures.

Figure 12: "Distribution and Feedback Infrastructures" (Antonini et al., 2020, p.6, Figure 4)

Distribution itself becomes a form of communication. This is especially true for the distribution of webcomics on social media, where creators can be seen not only to be publishing their comics but also at the same time reaching out and communicating with readers.

Antonini et al. go on to define specifically categories of "interaction" (note that they combine both the interactional and transactional models as described above), including "narrative", "content experience", and "content creation" (p.7). These categories can be specific to different actors: for example, "editors [and creators] are more likely to be involved in content creation". They "identify at least five main types

of actors: author, reader, publisher, editor patron" with a permutation of "25 points of potential interaction" (p.7). These interactions can be illustrated as in Figure 13, "the result of numerous interactions between different subset[sic] of actors".

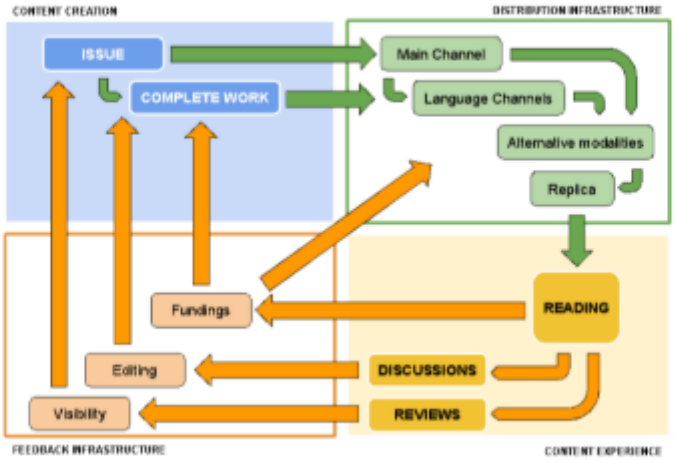


Figure 13 "Lifecycle Activities in Web Comics" (Antonini et al., 2020, p.10, Figure 7)

Antonini et al. (2020) maintain that "the overall functioning of this technology-enhanced life cycle is the result of the quality of the interactions" (p. 10). Of interest here to book supply and communication models is that, in the webcomics ecosystem, there appears to be a tangible start point in the Content Creation quadrant, but no real tangible end point in the Content Experience quadrant. However, as expansive as their interpretation of the actions of readers is, it is confined to communication in that external sense, and not as Barnlund (1970) and Narula (2006) describe internal communication with the self and with objects.

Antonini et al.'s (2020) webcomics lifecycle somewhat resembles Thompson's (2020) 'Mediated Interaction in the Digital Age' with communication flowing in different directions (although the life cycle flow Antonini et al. depict is largely circuitous, almost like a whirlpool, and mostly one way). Thompson refers to "computer-mediated communication", and although he states that the device for communication does not matter, he observes that

> …the smartphone is a computer too, and in some ways even more important for understanding the new forms of interactions that are brought into being by computer-mediated communication and their increasingly pervasive presence in everyday life (p.6, see also Chapter Five in this document for smartphones as “social companions” and “social actors”).

He emphasizes that this type of communication “is oriented towards a multiplicity of other recipients—it is many-to-many rather than one-to-one” (p.6; see also Lamerichs and Ossa, 2024, on many-to-many).

In this ‘Like Economy’ (Gerlitz and Helmond, 2013; see also Chapter Seven), social relationships “are shaped both by the properties of the platforms they are using…and to the extent to which these interactions are tied to this medium” (Thompson, 2020, pp.6-7). These properties include the communication currency of “comments, photos, newsfeeds”, and, although Thompson does not mention them, comics.

This “like economy” is a form of communication that is also tied up with consumption behaviour, in that it is part of the feedback and distribution infrastructure identified by Antonini et al. (2020) above. Scholars often note the difficulty of tracing consumption, including reading and other activities after purchase, especially in the print world. This difficulty has led to scholarship that equates consumption with purchasing alone (see Squires, 2019; Lee et al., 2021). However, as Squires (2019) points out, referencing her work with Murray (2013):

> Behaviours enabled by social reading sites are in a continuum with historical practices such as epistolary communities, reading unions and reading groups […] their digital nature makes them specific, and ripe for commercialization’ (Ray Murray and Squires 2013: 14–15) (p.611).

Indeed, scholars such as Lee et al. (2021) have taken up the challenge of tracking consumer-reader behaviour after purchase, with a particular focus on online book reviews. A motivation for them was to “[understand] the distinction between buying and consumption… [and how] such differences influence the evaluative behaviors of consumers”:

> Given that data on consumers' actual consumption are difficult to collect, online-review studies have largely overlooked this behavior with respect to the evaluation of products. Researchers have thus far construed the act of purchase to be identical to consumption, but the reality is that many of the goods bought by customers are often only partially consumed, or not at all (p.1385).

As Squires, Lee et al. as well as Gerlitz and Helmond (speaking from different disciplines—book history; online review studies, and platform studies) demonstrate, the digital environment, and especially platform ecosystems, has made identifying these behaviours, these communications easier in that they can be digitally tracked (whether an ebook is completed, abandoned at the beginning or middle, for example). The availability of data has assisted scholars such as Lee et al. to identify a consumption continuum that takes place entirely after purchase (see Figure 1 on p.1369 of their article, where the rate of reading as consumer behaviour is distinct from reading behaviour, including reading response).

However, types of communication (and consumption)—liking, following, sharing, reviewing—can be exhilarating or fraught with complexity and conflict or both at the same time (and still difficult to track quantitatively and qualitatively), indeed, the nature of communication itself. But where in this computer-mediated environment does the kind of communication to which Narula (2006) and Barnlund (1970) refer, that with self or external objects, namely the digital comic, take place? Speaking of the connection between book history and reader-response, Squires (2021) asks: "How do consumers make their purchasing decisions, and how do readers read? What appropriations are made by readers?" (p. 606). While reader-response scholarship inclines toward the theoretical, some scholars have examined it from an empirical perspective, some even in comics studies.

Louise Rosenblatt (1978) speaks to this communication with self and cultural object when referring to the evolution of her book, *The Reader, the Text, the Poem: The Transactional Theory of the Literary Work*: "The premise of this book is that a text, once it leaves its author's hands, is simply paper and ink until a reader evokes from it a literary work-sometimes, even, a literary work of art" (p. i). For her interpretation of reader-response theory, which includes textual, experiential,

psychological, social, and cultural approaches, reading is an event to which readers bring their past and present to complete the text. In this way, through the response and the transaction the reader undertakes, they are also makers of the text.

While there has been some empirical study on comics reading (Cedeira Serantes 2014, 2019 and Priego and Farthing, 2020 as examples of qualitative research; Hernández and Bautista, 2023, on social media readers; and Benatti, 2024 for quantitative research on WEBTOON), readers have been more often discussed by comics scholars in a theoretical and generalized way (in talking about McCloud,1993, Hatfield, 2022, refers to “a fuzzy set of readerships” to which McCloud “appeals”, p. 269). For example, McCloud’s *Understanding Comics* (1993) is considered one of the most influential works (see Davies, 2017; Flowers, 2020; Miller and Worden, 2022; Hatfield, 2022, among others) especially in its focus on the comics reader as co-creator or “equal partner” (p.68) with the creator. Reader creation happens in between the panels (panels as visual representation can preclude the reader’s imagination), in the spaces, the gutters, where the reader imagination has free play (McCloud, 1993: “This phenomenon of observing the parts but perceiving the whole [is] called closure” p.63). McCloud is not exactly calling for the “death of the author” (see Barthes, 1967) so that “the interpretative work of the reader” can happen (Davies, 2017, p. 27). He is more in accord with Davies (2019), in that

> …we enter into communion with one another, when we read a comic created by another: we share in the space the creator has constructed for us, and collaborate in a mutual act of meaning-making (p.2).

In this sense, this is the best description of the type of communication that goes on between the reader and creator, instead of the insistence on the direct, immediate messaging between the two in the ‘like economy’.

The sense of anticipation in the comic narrative and impatience, but at the same time empathy with the creator (see Digital Comics Reader 4, DCR4, in Chapter Six), illustrates that the relationships here—reader and comic, reader and creator—can be complicated. Indeed, Hatfield (2022) refers to a perceived conflict in McCloud’s (1993) *Understanding of Comics:*

> McCloud's sense of the reader as creatively engaged, a stance hospitable to critical populism and visions of comics as participatory culture, rejects stereotypes of comics-reading as passive or intellectually undemanding… On the other hand, McCloud imagines an uncritical, implicitly disempowered reader whose 'identity and awareness' are 'pulled' into comics via the power of cartooning, the schematized simplicity of which, he argues, enables or even demands the reader's powerful identification with comics characters (p.267).

Hatfield (2022) expresses this conflict in terms of the "empowered" or "disempowered" reader, in essence, McCloud's "equal partner" or "an uncritical, implicitly disempowered reader who responds to simplified cartoon art in an automatic, almost helpless way" (p.272). Hatfield equates McCloud's description of the latter type of reader as "identification" which, according to Hatfield, as well as Barker (1989) and Frome (1999, as referenced by Hatfield), has the negative connotation of luring young, unsuspecting readers into a "low" form of reading material (Hatfield refers to Frederic Wertham,1954, who wrote *Seduction of the Innocent* which introduced this view of comics).

Hatfield (2022) identifies McCloud's work as a "reader response-oriented text" (p.269) in its desire to identify the reader as "equal partner" in creation. Reader-response theory, which describes the reader as active in creating meaning, has been variously interpreted. For example, Rosenblatt's (1978) transactional reader response describes almost a dialogue that constitutes the creator's meaning and the reader's interpretation based on emotional response, while the social reader-response of Fish (1970) speaks to a community interpretation of a text. The theories can be divided up among those who think the reader is in control and those who think the text is, as is reflected in Hatfield's consideration of McCloud. Reader-response theory relates to reception theory (Iser, 1972) in the sense that readers are situated within their own contexts and bring expectations derived from these to bear on their interaction with a text. Where most reader-response approaches focus on the individual reader, reception theory mostly addresses the reader in aggregate (as audience, for example).

2.5.4 Section Conclusion

Production process studies and platform studies have long been associated with the businesses and organizations in which they originated. However, what production of culture studies demonstrates is that these same processes and entities are multi-faceted and can be analysed in any combination of ways to demonstrate their contribution to the building of culture. What these facets include and upon which they rely heavily is communication, multi-layered, directional, and purposed, as evidenced in Thompson's tripartite approach to studying cultural objects and as reflected in such lifecycle research as Antonini et al. (2020). Antonini et al. represent the relatively little attention paid to this area in comics studies, despite some of the activity from the last decade. There is communication research that is focused on the creator and text (see Davies, 2017; 2019), but very little addresses what happens between all the participants in the making of comics, not just through the text, a gap that this research addresses.

2.6 Chapter Conclusion

The study of digital comics within comics studies has largely focused on their definition, description, history, and relationship to print comics. There is an indication of a more human-centred approach from recent scholarship (for example, Cedeira Serantes, 2014, 2019) that is comics-based but also looking to other disciplines (reader response and hermeneutics; platform and media studies) to consider the place of comics in the lives of all the makers: creators, publishers, readers. This literature review identifies the relatively few empirical, and especially qualitative, studies to which this research contributes. In addition, it identifies and builds a theoretical framework that can enrich analysis of empirical data, including the consideration of materiality (what they are and what makes them); production of culture, publishing (including book history) and platform studies (how they are made and made available); and communication and reader-response studies (the personal, social, and professional interactions and ecosystems). Taken together as a framework for the empirical research, these disciplines facilitate a new understanding according to Scolari (2022), as summarised by Hernández and Bautista (2023):

> The importance in this new era of platforms is not so much in the factors that influence the creation of content such as its creative originality (or at least not only on it), but the focus is placed on the interaction that such content can generate with a community or user (p. 1).

The interaction that is at once personal, social, and cultural, and that facilitates and is facilitated by digital comics, is the focus of this research. The research methods and methodology as described in the next chapter have been chosen to support and sharpen that focus.

Chapter Three
“The Human Organism” in Research: Digital Comics Research Methodology, Methods, and Analysis

> “The human organism… is ultimately the mediator in any perception of the world or any sense of ‘reality’” (Rosenblatt, 2018, p.452).

3.1. Introduction and Methodology

This research is firmly focused on “the mediator”, the “human organism” involved in the making, producing, and consuming of digital comics within the wider digital ecosystem. Essentially, the research provides an understanding not only of the processes entailed in creation to consumption, the ‘what’ and ‘how’, but more importantly also of the type of communication and relationships that drive the processes and, in addition to the comics cultural artefact, what cultures and communities are created through these relationships. These twin foci describe the philosophical paradigm of the research: “culture [as it] expresses itself in materiality” (Priego, 2010, p.1).

The focus on the participants in the making of digital comics, and not on the digital comics themselves, presumes a qualitative, empirical approach for the most part to the gathering of data. The story of the UK digital comics landscape is told by those who shape it. This approach is driven by an interpretivist ontology and epistemology that seeks multiple truths rather than a single one. However, the research began with an ontology and epistemology that blend in positivism through the first two research questions:

> RQ1-Are digital comics a distinct form of comics with unique affordances shaped by creators, publishers, and readers?
>
> RQ2-How do UK creators, publishers, and readers make and consume digital comics? What are the specific processes for creation, publishing, consumption, and reading?

Research Question One may at first appear to be misleading: this research will not come up with a definitive definition of comics, to add to those posited by

several scholars. What exactly constitutes a digital comic, indeed a comic, has been and continues to be the subject of much debate (see Chapter Two). Of most interest was what the research participants perceived as digital comics. To that end, I began the research with the widest definition possible: digital comics are any comic produced and distributed electronically (PDF versions of graphic novels, comic books, app versions, webcomics, etc). I conducted sampling and recruitment to represent this range to learn what those most invested in digital comics thought. Trying to understand the unique affordances, if there were any, of digital comics would be limiting if digital comics were to be defined as just webcomics (see Chapters One and Two). This definition would not only limit the participants involved, but also the experiences of multiple digital formats, how they are produced, created, and the response to them.

And I have been, for the most part, confirmed in this view of digital comics for one reason: a comic is defined or perceived according to the perspective of the reader (Hague, 2014, for example, but other scholars suggest the creator's intention as the determining factor, see Kleefeld. 2020). For example, one digital comics reader, DCR5, has only read Neil Gaiman's *The Sandman* on their phone, and so for them the graphic novel is a digital comic. However, it can also be a print comic at the same time (as Gaiman's work is), a kind of Schrödinger's comic[6] : both print and digital, but if only one is read, then the other does not exist.

The important part of the question is whether digital comics offer unique affordances, making them distinct from their print versions. Or are they merely a mirror image in digital form, something that might be a halfway house between print and other media, for instance animation? In this dissertation, the research subjects provide the answers, albeit with support from comics scholars (see Chapter Two for the latter and Chapters Four to Six for the former).

The data associated with these two 'what' and 'how' questions provide a snapshot, for it can only ever be a snapshot in the changing digital landscape, of the range of digital comics and the processes by which they are made, produced,

[6] A take on Schrödinger's cat which is a type of thought experiment (from Austrian physicist, Erwin Schrödinger in 1935: A cat is placed in a box with something that could potentially cause its death. But the outcome is unknown until the box is opened, in which case the cat can be both dead and alive.

distributed, consumed, and read. Therefore, the basis of the research is process-oriented, providing examples of those processes and perhaps common process models.

The search in the literature for prior empirical research that would elucidate on these two questions revealed that not only was there a gap in comics studies on the subject of RQ2 for the UK, but for comics in general and especially digital comics (Benatti, 2019; Murray, 2013, among others previously mentioned). As explained in Chapter Two, I needed to go beyond the comics context to the broader (e)book publishing environment to establish a baseline of digital publishing practice. The empirical research among UK comics mediators and gatekeepers (CGMs) would confirm or deny the parallels to book publishing to be found in digital comics publishing.

The gap in empirical process research can, to some extent, be ascribed to the paucity of empirical research regarding RQ 1. A deceptively straightforward question—"What are digital comics?"—has produced various answers (see Chapter Two), often separating downloadable PDFs from "netcomics" (Sabin, 2000) which then go on to become known as webcomics. It would appear that there are multiple truths about what a digital comic is in the literature. For this research, I decided to include all comics produced digitally or electronically, published and read as such.

Beyond the data underpinning the answers to these two questions, the rest of the research is exploratory. Comics is a subject area that often produces an emotional response, not just while reading but also when discussing them (Matsubara et al., 2016). This background led to a more interpretivist approach to the next set of research questions:

> RQ3-What kind of communication takes place, what kind of relationships or communities are developed among those who create, produce, distribute, consume, and read comics?
>
> RQ4 Does technology, for example social media, platforms, apps etc, facilitate and influence this communication and these relationships?

Through these questions I sought to understand digital comics from the perspective of the participants not just the processes, and the participants in

relationship to the comics and others involved in shaping the comics. Do these interlocking relationships produce communities, shared understandings, and commonalities? And what function does the technology play in all this? These considerations guided the choices of research methods and the development of the research tools.

3.2 Research Plan and Methods

This research entailed "the researcher [entering] the informants' world and through ongoing interaction, [seeking] the informants' perspectives and meanings" (Creswell and Creswell, 2017, p.180). Mostly qualitative methods were employed, with some quantitative work done in mapping the UK digital comics landscape and requesting readers to complete a brief survey on devices and platforms. My role was very much the "entering of the informants' world". My experience with reading comics, although lifelong, was and is very much different from the 'comics experts' I met in the early days of my research. They could be described mostly as 'committed' comics readers or 'fans' with an encyclopaedic knowledge, for example, of comic book characters, stories, and artists (see Barker, 1993; Locke, 2012b). The UK "comics community" (Berry, 2020, p.3; also see Chapter One and Note 2 on the use of this phrase), or "family" ("I feel like it's family. A sometimes wildly dysfunctional family but one I don't want to leave" Berry, 2020, p.10). did feel like that in those early meetings, a community or family where everyone knew each other, welcoming but still in some ways insular. It was difficult to put across that the comics themselves did not matter so much in my research: they, the creators, the publishers, the bloggers, and the readers, were what mattered. Because comics research is more theoretical than empirical, my approach was as foreign to them as I felt when among them. How could someone conduct comics research without reference to the comics themselves?

But as a researcher, I had to overcome what initially felt like barriers "to enter their world" to discover their comics experiences, what comics meant to them. Taking field notes or making qualitative observations (Creswell, 2009, p.168; Braun and Clarke, 2013, pp. 71, 93) during interviews and later in the research during interactive Think Aloud observation sessions allowed me to reflect not only on initial impressions of the research participants, but also on my own reactions and assumptions.

These field notes became critical when I had to reflect on my role not just as a researcher but as a woman who might encounter comics which, according to my perspective, were offensive (see section 3.5).

3.2.1 The Research Plan: Built on Relationships

The literature review uncovered little in the way of empirical research into digital comics in general and their creation, production, and reading in specific, but much on the disagreement about a definition of digital comics. Therefore, theoretical as well as practical approaches have influenced this research and especially the research design.

The project plan was broken down into specific actions grouped around three main, interlinked phases as dictated by the research questions, aims, and objectives. The level of detail allowed for a more accurate assessment of time requirements necessary for completion of research in the period proscribed.

The data collection was structured and scheduled to begin in the centre, with CGMs, of the creation-production-consumption workflow and communication process. Beginning in the middle made sense because CGMs still, in many ways, are the lynch pin between creators and consumers in the publishing process. Additionally, another data collection method, building a map of the UK digital comics publishing landscape or ecosystem would also take place during Phase One and provide the sampling upon which a CGM interview cohort could be built.

The phases for data collection were scheduled as follows:

Phase One (2020-2021): focused on the producers and production of digital comics, the research methods proceeded from practice (or process) as the unit of analysis approach, specifically identifying workflows and processes within and across UK digital comics publishers or CGMs. Data about communication with creators and readers as part of these processes were also collected.

The research questions build upon this foundational approach of process analysis, illustrating that “the symbolic elements of culture [in this case, digital comic] are shaped by the systems within which they are created, distributed, evaluated, taught, and preserved” (Peterson and Anand, 2004, p.311). However, the research is also qualitative, based on semi-structured interviews collected from participants in

those processes. So, the research builds upon process analysis to include a form of affect and flow analysis (part of relational analysis), to understand response, both physical and emotional, in creation, production, and reading.

Phase Two (2021-2022): focused on the creation of digital comics and through semi-structured interview with UK digital comics creators, identifying the evolution of the comic from idea to tools and workflows. As with CGMs, creators were asked about their process, specifically their creative process. Creators were also asked about their relationships with CGMs, creative team members, and readers.

Phase Three (2023): through semi-structured interviews and Interactive Think Aloud (ITA) and observation sessions, the focus was on the reading of digital comics by UK-based readers, including not only devices, apps, and other media used but also on the experience (or response) of reading itself and the discovery of digital comics. Readers were also asked about their relationships with creators and publishers.

CGMs, whether traditional book publishers, self-publishers, or platform owners, predominantly provide the digital environments in which most or all other participants in a production process interact. Moreover, they can identify potential steps that may align with cohesive and general patterns resembling a creation-to-consumption cycle. They were well-positioned during the early phases of the research to identify activities and participants within a production process, establishing the link between creators and readers. These elements enhance the understanding of the path of an idea and the digital culture that evolves through the expression of that idea, the digital comic object.

Phases Two and Three, focusing on creators and readers, contribute to the analysis of the production process and introduce the workings of a communication process at an organizational level and at a universal level where appropriate. This wider perspective demonstrates the potential benefit of digital comics and the study of them to readers, students, educators, and researchers.

3.2.2 Sampling and Recruitment: Rich Data from a Combination of Sampling Methods

Qualitative research is based on research participants willing to give their time and feedback. Recruiting these participants is often the most difficult part of the research process. But before recruitment can begin, the researcher must think of the types of participants who can contribute most to the study. This thinking and planning process involves considering the sampling methods that would best achieve that aim.

It became clear early in the research that some attempt at mapping the UK digital comics ecosystem, thereby achieving a purposive sample from which to select research participants, would be necessary. The aim here was not to be exhaustive but to be representative as much as possible over a rather substantial population. Platforms, such as Comic Rocket, provide a baseline estimate of webcomics in the tens of thousands, and that is just from webcomics registered on the site, excluding other types of comics publication on the web (Berube et al., 2023). From this map, I put together a representative group of CGMs (see categories below and Appendix V).

Sampling and recruitment for digital comics creators and digital comics readers would also be based on the map but using different techniques: purposive sampling combined with a type of convenience sampling known as snowball sampling.

Purposive sampling and the UK Digital Comics Landscape Map: data filtering and analysis

The aim of this doctoral research reflects the work of comics studies scholars who have approached comics through analysis of their production (Brienza, 2010; Brienza and Johnston, 2016; Perren and Felschow, 2017; Benatti, 2019) without bestowing priority on any one participant or activity in the process. However, because it was necessary to build a map sufficient to identify UK digital comics publishing categories and potential interview participants, the first research phase was focused on CGMs and the production of digital comics. This approach also made sense because CGMs were the link between comics creators and readers: they communicated with both at the beginning and end of the production workflow.

Therefore, they had an overview of the entire process not necessarily open to the other participants.

Phase One of the research plan, as noted above, included learning about CGMs, who they are and what their role is in digital comics publishing. This Phase required two methods of data gathering activities: data sampling, filtering, and analysis; and semi-structured interviews. The first, a mapping of the UK digital CGM ecosystem, of necessity, preceded the interviews as the map provided the means by which sampling could be effected.

One of the first challenges of this doctoral research was assembling a UK CGM map of sufficient range and currency from which a representative interview sample could be selected. Both datasets, the larger map (macro) and the smaller sample (micro), worked together to provide sufficient and appropriate data on publishing and production workflows and practices (in response to RQ2).

Digital disruption, bringing widespread access to the web and digital tools to facilitate creation and distribution (McCloud, 2000), has spurred a rise in self-publishing. Self-publishing has been as much of a force in the comics market as in the book market (Priego, 2011; Dowthwaite and Greenman, 2014; Clark and Phillips, 2020). While the more well-established, traditional book publishing houses (sometimes known as 'the Big 5'[7]), for example those major book publishers producing graphic novels, were relatively easy to identify and count using web searches, the numbers grew exponentially once self-publishers and the third-party platforms through which they distribute their publications were added to the list. This list, and the many attempts made to achieve it, expanded and contracted, according to dead web links, one-hit wonders (single publications with no follow-up), and those no longer publishing. The pandemic also affected the currency of the list as it made an impact, for example, on whether businesses survived, and if self-publishers could continue in the face of personal and financial hardship.

[7] The Big 5 publishers are generally acknowledged to include Penguin/Random House, Hachette Book Group, Harper Collins, Simon and Schuster, and Macmillan. The US and UK list are similar, with the UK sometimes including such publishers as Bloomsbury (see Jane Friedman's Key Book Publishing Paths https://janefriedman.com/key-book-publishing-path/).

Despite the challenges cited above, some attempt to map the UK digital comics ecosystem, even in snapshot form, was necessary to this research: there was no other way to learn directly about the approximate scope of the industry, its diversity, and in some sense its longevity. Because of the potential 'elasticity' inherent in such a dataset, rigorous criteria sampling and filtering were applied. The criteria were defined by their relevance to the research and the eventual cohort to be interviewed.

The criterion sampling filtering and analysis process began with the application of the following broad filters:

- Selection of Relevant, Freely-Available Comics Datasets: To provide a basis from which to build a UK Digital Comics Map, several comics datasets were identified and consulted, through web searches, literature review, and recommendations
- Restriction to Country of Origin: Because the research is focused on the UK digital comics ecosystem, an initial filtering of the datasets involved selection based on those listing UK CGMs and publications.

These filters resulted in an initial UK CGM dataset that was 'unwieldy': with no other criteria applied, there were simply too many to assess in any meaningful way.

Therefore, further criteria sampling, considering, for example, currency and consistency of publication and well-established CGMs, was necessary to produce a more focused map from which a representative CGM interview sample or cohort could be selected. This kind of purposive sampling, as opposed to exhaustive sampling without reference to more specific criteria (as demonstrated in the first two filters), identified CGMs that were representative across a range of comics production and publishing types, had been publishing for some length of time, and were stable financially. Sampling conducted in this way resulted in a rich source of appropriate data.

Selection and filtering were conducted manually using Excel filtering and advanced filtering features. Digital methods and tools such as screen scraping (automatic collection of many URLs) were not considered suitable because of the structure of the data sets and the vocabulary used as presented on screen.

The only factor in predetermining the eventual numbers of CGMs, creators, and readers was adequate representation across the categories of digital comics publication. In this way, the data collected represented the range of experience inherent in digital comics publishing. Other than category of publication, there was no attempt to determine or limit the number of research participants. Rather, the concept of “information power” was applied: “Information power indicates that the more information the sample holds, relevant for the actual study, the lower amount of participants is needed” (Malterud et al., 2016, p.1759; see Rapid Ethnography and HCI below). Consequently, the sample size was based on the representation of digital comics publishing categories, with numbers within each determined by recruitment success.

Gatekeepers and mediators: UK digital comics publishing paths

Data collection began with CGMs as they were identified by the initial mapping of the UK digital comics ecosystem, an exercise in searching out the diverse avenues where some form of digital comic was produced. Moreover, the CGMs were frequently the link in the production and communication process between creators and readers, often with a perspective and knowledge of both that provided a foundation for the succeeding phases of data collection.

The various avenues or paths for UK comics publishing, described below and in Appendix V and derived from the mapping exercise, are illustrative of the impact of digital technology. These paths closely parallel those of book publishing and not just because digital comics are produced by book publishers. The mapping and interviewing of gatekeepers, mediators, and self-publishers (CGMS) reveal additional factors influencing the comics publishing-production landscape, for example, the rise of the graphic novel and the influence of tech and gaming industries. But the greatest impact on both comics and book publishing has been digital self-publishing, with emphasis on ‘digital’ as both types of publishing have long histories of self-publishing. The ‘digital’ has made self-publishing not just another publishing path but has influenced all of publishing from back office to creator control and rights.

Jane Friedman (2019-2020; 2023-2024) charts the different “paths” of book publishing yearly, essentially the industry structure including information about business models. These paths or categories include:

- Traditional [Book] Publishing (Advance-Based), including the Big Five Houses (for example, in the UK Penguin Random House) and Other Traditional Houses (such as Wiley and university presses);
- Traditional [Book] Publishing (Not Advance-Based), consisting of small presses and independent publishers;
- Indie or Self-Publishing, including Assisted & Hybrid, Indie/DIY, and Social Media (including, according to Friedman, 2023-2024, “special cases”, such as Amazon and other digital-only or digital-first online publishers).

These three categories do not appear much different from the Book Publishing Paths Friedman has produced over the last seven years. However, in 2019, she described the Indie/Self-Publishing category as composed of “evolving models and diverse contracts”. Indeed, the very emergence of this category has split publishing into two distinct streams: ‘traditional’ publishing (predominantly print-first) and ‘self’-publishing (predominantly digital-first).

UK (digital) comics publishing, according to the mapping exercise conducted to launch this research, supports the contention that the impact has been the same for comics. Using Friedman’s Book Publishing Paths (from 2020-2024) as a guide, I have identified the following paths for comics publishing (see Appendix V for a more detailed description and corresponding participant codes):

- Traditional (Advance-Based) Large-Scale or Multi-National [Book] Publishers (CGMT)
- Independent and Small Press (Not Advance-Based or Minimal Advance) [Book] Publishers (CGMI)
- Traditional Comics Publishers (CGMCom)
- Multi-Platform or Entertainment (CGMM)
- Indie/Self-Publishing (CGMI/S) further subdivided as follows:
    - Indie/Self-Publishing: Hybrid (CGMH)
    - Indie/Self-Publishing: DIY (CGMD) and including platforms
    - Indie/Self-Publishing: Collaboratives/Collectives (CGMC)
    - Indie/Self-Publishing: Social: serial self-published, otherwise known as Webcomics (CGMW)

- Indie/Self-Publishing: Others (CGMO) including projects undertaken by university and cultural institutions.

Although these categories roughly correlate to Friedman's Publishing Paths (2020-2024), two more closely associated with the production of comics have been added: CGMMs (combined with traditional UK comics publishing houses) and CGMOs. During the mapping, filtering, and selection process, multimedia studios or multiple platform technology companies evolved into a significant CGM subset. This not only reflects the current state of comics production and its ties to other media, but also the rise of "market-oriented, conglomerate publishers" (Murray and Squires, 2013, p.5). In addition, applied comics, those comics created for social, health, education, and instructional purposes, were strongly represented through disparate CGM channels, such as academic departments, cultural institutions, and health organizations, among others (here represented in the CGMO category).

It should also be noted that the first two comics publishing paths, basically book publishers, are relatively new to comics. Their involvement has come about as part of the rising profile of 'literary' graphic novels. Interest from traditional publishers with a mass market began in the 1970s (Priego,2011; Sabin,1993). Still, despite traditional mass-market publishers taking on the graphic novel, there was frustration expressed in this research that comics continue to be regarded as 'for kids' and that graphic novels, clearly for adults, were not comics:

> I had one tutor on my literature course degree who did a module using comics to talk about narrative devices and narrative structure. I just think it would be brilliant if comics could be incorporated into that sort of educational framework more often because it's one of the things that would potentially introduce a broader readership to them. People don't realize that there are comics for adults out there (Comics Creator Independent 2 or CCI2).

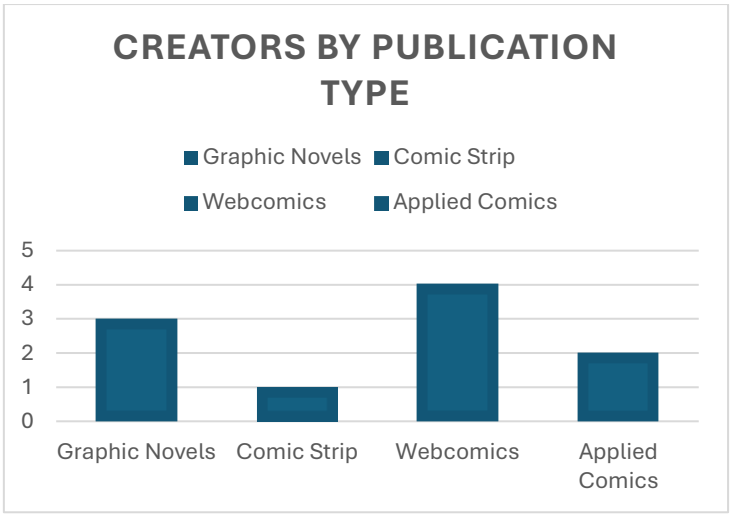
The mapping exercise as part of data collection in this research was not only useful in identifying these various paths to UK digital comics publishing but also in creating a snapshot of the wider context in which CGMs, digital comics creators, and digital comics readers communicated and played their part. CGMs and their various mechanisms of publishing and distributing, especially platforms and web-based storefronts, represent an environment in which relationships evolve. These

relationships, as evidenced by the contributions of the individual research participants, are not only influenced by the publishing landscape but, in turn, influence it. The impact of digital self-publishers, their sheer numbers, especially webcomics creators, has resulted in the development of platform-based companies such as WEBTOON, comics for smartphones, a response to the popularity of free at the point of access webcomics as well as self-publishing and discussion (see Chapter Two).

Snowball sampling and digital comics creators

UK comics creators were recruited primarily through recommendations from CGMs interviewed in the first phase, either for creators they had published or worked with, or through publicizing the recruitment drive through their Twitter feeds and blogs. In this way, the purposive sampling of CGM participants was combined with snowball sampling to directly select participants, comics creators, for Phase Two of the research. There are certain risks with snowball sampling, a type of convenience sampling, which includes “selection bias as well as a lack of external validity, generalisability, and representativeness” (Parker, Scott, and Geddes, 2019, p.4). However, this research does not require random or probability-based sampling. In addition, most CGMs provided more than one creator name. In the case of self-publishers of digital comics, I referred for the most part to the map which, as explained above, was based on purposive sampling.

UK Digital Comics Creator Participants: At my first Thought Bubble (UK comics) convention (2019), in the exhibition hall I was struck by the number of people sitting behind the tables with a pad and pencil or pen to hand, drawing while chatting with those who were perusing the publications and merchandise (this, while I was desperately searching out the digital comics creators and publishers. I finally came upon one of which provided two interview subjects). The second notion of comics creators came from the creation of comic images in an entirely different setting: a documentary on the making of *South Park*, where the animated series was initially developed from static comic images drawn digitally using digital pens and large screens. What I learned from interviews with creators was that creation was strikingly divergent. However, the product of creation, at least in the production phase, was essentially digital (see Chapter Four).



CGMT, CGMI CGMI CGMW, CGMCC CGMO

Table 1: Digital Comics Creators by Publication Type

Another assumption made at the beginning of the research was that most of the comic creators would come from ‘Comic Strips’ or ‘Webcomics’. However, through the comics mapping and through recruitment, I learned of those who created other types of comics, and that what comics creators were creating was as diverse as how they were creating. This diversity, in the first instance, can be ascribed to the many forms of self-publishing; but the wide definition of digital comics adopted for this research has also had an impact on sampling.

Based on the sampling and recruitment described above, ten creators made up the final interview cohort (two of whom were cross-overs from the CGM interview list as self-publishers/creators). Of the comics publications corresponding to publishing paths (see Table 1), no creator interviewed came from the CGMM (multimedia companies) or traditional comics publishers, although requests for possible participants were addressed to the CGMs. It may not be coincidental that CGMs of these types generally contracted for comic creation on a work-for-hire or fixed-term basis, and where the affiliation for the readers is often with the characters or the series rather than with the comics creators. CGMM1 suggested a comics creator who happened to work for the company but did not create for it (they published webcomics).

The representation by publication type reflects those in the CGM chart (see Table 1), which in turn illustrates the dominance of digital self-publishing. For comics

creators, digital self-publishing did not necessarily mean that creating comics was a career. Creators, for the most part, had college degrees in literature, art, English and philosophy, and Creative Writing. One had an engineering degree, another a comics degree. One had no formal training or higher education. In terms of formal training, none had gone to art school, but one had an art GCSE. Only one had followed an art-related education track, including a university degree in graphic design and illustration at The Royal College of Art. One comics creator, an illustrator, applied for art school and when they produced their portfolio at interview was told “we are not interested in that” meaning their particular kind of artwork (which influenced their switching to comics illustration).

A significant majority did not make their living from comics and worked at other jobs:

- Worked at other jobs/professions (7), including children’s book illustrator, academic publisher, engineer, full-time mother, graphic designer, editor, academic
- Of these, 1 worked for the publisher who published their work (small press), and one other worked for a comics publisher
- Made a living solely from creating and publishing comics (3)
- Made no money from comics at all (4)
- Made money from merchandise or earned something from ad revenue (2).

Interview subjects got into creating comics through various avenues, including the university experience; frequenting bookstores and eventually comic bookstores; libraries; and encountering comics on Instagram or Twitter. A few were pulled in by reading superhero comics, but at least two of the female creators cited female-oriented or UK ‘girl’ comics. Most identified a particularly visual or graphic orientation, love even. They perceived digital comics as ‘easy to do’, ‘easy to share’, and ‘low cost’.

While most of the creators published through book publishers or self-published, at least four had been involved with work-for-hire contracts, two as solo creators, one as part of a writer/illustrator team, and one as part of academic, cultural projects.

Graphic novel creators were more likely to be print first, while webcomics were digital first. However, for most, works were eventually published in both formats, or the creator had a mixed output of print-first or print-exclusive works as well as digital-first works (for more background information on creator participants, see Appendix VI).

Snowball sampling and digital comics readers

Digital comic reader recruitment differed from that of CGMs and comics creators in that the recruitment strategies for the latter two consisted of application to individuals—individual publishers, individual creators (most of these responded to direct requests from CGMs interviewed combined with direct requests from the researcher). For digital comics readers, the strategies were applied to address a wider (entirely unknown) population, some of whom might not even identify themselves as being comics readers. While, as a university student, I assumed that a certain amount of recruitment would be directed at the student population using different channels, I did not and could not confine myself to this environment, wanting to learn from digital comics readers from all types of backgrounds.

This approach, however, meant that more diverse strategies would have to be employed for the third phase of recruitment than had been in the first two phases. The time frame allotted, three months, included the possibility for a rolling recruitment. However, the recruitment strategies would have to be the kind that could encourage maximum variation sampling, recruitment activities to be seen by the greatest number and variety of people: “ A maximum variation sample is constructed by identifying key dimensions of variations and then finding cases that vary from each other as much as possible”(Suri, 2011, p.66, referring to “Patton’s purposeful sampling strategies” from Patton, 2002). The key dimensions here pertained to new categories of digital comics readers to be represented in the research. The recruitment required a different approach, therefore, from Phases I (purposive sampling) and II (snowball sampling) where a personal or professional connection to participants could be applied.

However, a maximum variation sampling approach only produced five to six potential candidates for interview, at which point by the end of April 2023, snowball sampling was employed along much the same lines as the recruitment for Phases I

and II. In the end, this type of sampling produced the best results and for a reason that was specific to the recruitment of digital comics readers: potential candidates self-selected out because they did not consider themselves ‘comics fans’, something that they thought equivalent to ‘comics readers’. In fact, it was not until I spoke individually with potential candidates and explained the qualities of the different types of comics readers I was looking for (with support from Barker, 1989; Cedeira Serantes, 2014, 2019), that they came around to thinking that they might indeed be a digital comics reader. For example, Digital Comics Reader (DCR) 7, who initially did not volunteer, subsequently sent me the following email:

> I went through the information you had shared last week about your study, and I want to volunteer to participate in the study, as a casual reader of digital comics on social media and news apps. I mostly follow editorial/political comics. Is that ok? Incidentally, I also mentioned your research [to DCR9], my partner, and turns out [they are] a (somewhat) regular comic reader. I’ve passed on the details you shared with us earlier for [them] to go over. I wanted to share my (and [their]) interest with you and check if we should just go ahead and fill out the survey linked in the previous mail?

Even after I had supplied specific details about different types of readers, DCR7 was still hesitant about whether or not they or their partner should participate and needed explicit confirmation. DCR5, who expressed an interest but did not think they ‘qualified’, had this to say after I had supplied specific information about digital comics readers:

> I am very definitely a casual reader, mostly when they come up on my social media. I thought this might be a bit difficult to see for the observation as it’s quite unreliable, but there’s also a couple of series on the Guardian website I read.

These exchanges demonstrate, even before data collection, the necessity for addressing the gap in comics readership studies, especially through empirical research (see Chapter Two). The subsequent Interactive Think Aloud (ITA) sessions confirmed this view: participants who originally expressed doubt over their eligibility spoke enthusiastically about digital comics they read and even changed their status

from Casual to Regular readers (or at least in between or a combination) based essentially on what they learned about their own reading through interview.

Digital Comics Readers Participants: This research has involved not only identifying who creates and produces UK digital comics but also who reads them, how they read them, what they read, and, most importantly, the response to what they read, or the reading experience.

While readers were required to be UK-based, they were not restricted to reading only UK comics. However, I asked them what UK comics they read or were reading in a filtering survey (see Appendix VII for reader background data).

3.2.3 Recruitment Techniques

As observed above, the recruitment techniques for CGMs and comics creators were relatively straightforward: by using the Map initially, both sets of participants were identified and approached.

CGM interview participants were selected from the UK Digital Comics Map (as described above) and through supervisor recommendation, based on publishing and business model type and type of publication (see Appendix V). An interview invitation list was drawn up, consisting of 20 CGMs representing a cross-section of CGM categories. Participants were recruited predominantly through direct email invitation (see Appendix I) along with some supervisor introductions. Initial invitations to participate in an hour-long, remote, recorded interview were sent out in June/July 2020, once ethical approval had been received.

During the transcription process, the identities of the CGMs were anonymized in the following way: CGM + publishing path + numerical designation of participant. This approach resulted in the following identification for participants: CGMT+number for large book publishers (for example, CGMT1); CGMI+number for small and independent press book publishers; CGMM+number for multimedia companies and comics publishers; CGMI/S refers to self-publishing as a whole, but this category has been divided into types of self-publishing: Hybrid (CGMH), DIY (CGMD); Collaboratives/Collectives (CGMC); Social: serial self-published, otherwise known as Webcomics (CGMW); Other (CGMO). The resulting interview cohort consisted of twelve CGMs.

Digital comics creators were recruited through CGMs or by consulting the map in the instance of self-publishers. As with CGMs, creators were recruited according to publishing path or category. Once the CGM had supplied a name or names, an email invitation was issued after ethical approval (see Appendix II). The resulting interview cohort consisted of 10 comics creators across all digital publishing categories. The anonymized designation for creators began with CC + publishing path designation followed by a number (for example, CCI2).

Selection and engagement with digital comics readers were conducted using various recruiting channels following on from the different types of sampling used (see Appendix III):

- through consultation and facilitation with City St. George's HCID and BL contacts (including other national libraries), as well as other experts in the field
- through social media, institutional blogs, etc. (see Berube, 2023; this blog was also used to supply further information to prospective participants)
- relevant online communities (such as LDC community, UK Comics Scholars, Comics Forum discussion lists, City and City HCID mailing lists and social media, BL internal forums and discussion groups).

Once participants responded positively to the invitation via email, they were asked to fill in a brief Qualtrics filtering survey, requesting some demographic information, questions about what they read (including what UK digital comics they read), frequency, and whether they create comics or not. The screening survey had two purposes: firstly, to ensure that there was a spread across types of comics read (comic books or strips, graphic novels, manga, webcomics etc); secondly, to collect background data outside of the interview before the reading sessions to save time and to allow for more in-depth interaction during the interviews.

Also, readers were supplied with a consent form and research information sheet (see Appendix III). They were also asked about scheduling and location preferences. Twelve readers were recruited who also filled out the survey. Readers were anonymized with the acronym, DCR (Digital Comics Reader) + number (for example, DCR8).

3.3 Research Data Collection Methods

A primary aim of this research was to capture the current state of the UK digital comics ecosystem, not just its components but also how those parts work together to produce a cultural artefact. To do so, it was necessary to search out all the stakeholders in the making of a digital comic: creators, publishers and producers, distributors, and readers. Considering any of these would be dissertation enough (see, for example, Cedeira Serantes' dissertation on young comics readers, 2014). To range across stakeholders satisfactorily enough to learn about the UK digital comics ecosystem, I had to employ a mixture of data collection methods, in some cases designed to illustrate the experience of a specific stakeholder.

Moreover, these methods had to reflect a research approach that in the first instance proceeds from a cultural materialist approach through a digital practice and process methodology, and in the second instance embraces theoretical considerations, for example reader-response and production of culture (see Chapter Two, section 2.5).

These methods are examined in more detail in the next sections.

3.3.1 Mapping through survey (CGMs, readers)

The first step in data collection for this research was to search out publishers, producers, and platform distributors of UK digital comics. By creating a list of these, I would build a large enough dataset from which to conduct sampling and get a sense of the depth (number) and width (different types of publications). In addition, because I included self-publishers (primarily but not exclusively coming from webcomics), I would at the same time create a sub-dataset of creators. These datasets were largely created by searching through freely available comics databases online, the UK Web Archive (and Web Comic Archive), and through recommendations from supervisors.

Collection of data via a short Qualtrics filtering survey was used only with readers to determine device and platforms. This information helped facilitate the use of screensharing for Think Aloud and observation purposes.

3.3.2 Semi-Structured Recorded Interviews (CGMs, Creators, Readers)

According to Braun and Clarke (2013), the qualitative interview was a response to “the ‘depersonalisation’ of (then) standard social scientific methods of data collection” (p. 79, referencing Oakley, 1981). The differences between “standardised interviews” and “qualitative interviews” included the role of the researcher/interviewer and the nature of and adherence to questions. Magaldi and Berler (2020) maintain that “qualitative interviews exist on a continuum”, encompassing at one end the “free-ranging, exploratory discussions” of individualistic, participant-led unstructured interviews to structured or standardized interviews, researcher-led where questions are preset and uniformly delivered. In the middle of this continuum is the semi-structured interview: best described as a discussion between researcher and participant under the guidance of topics and open questions that the researcher has developed. Similar to the structured interview, there is a list of questions (or categories of questions). But it also resembles an unstructured interview in that the participant’s response may suggest other relevant topics that can be explored by both.

Another distinction identified by Braun and Clarke (2013) is between face-to-face (f2f) and virtual interviews. Given the date of publication, there is an inclusion here of email interviews as well as online interviews (typing rather than speaking). Even so, they still maintain: “email and online interviews [as opposed to f2f and telephone] are no longer regarded as (poor) substitutes for face-to-face interviews but as different types” (p. 97). During the period when CGM and creator interviews were conducted, the UK was still in various periods and types of pandemic lockdown which dictated that either the research was delayed or that all interviews would be conducted virtually. By the time of the reader research, there were no lockdown restrictions, so face-to-face interviews were again an option. In addition, because I am part of the Human-Computer Interaction Design Centre at City St. George’s, University of London, I also had access to the Interaction Lab with cameras and software conducive to usability testing.

I offered participants the options of either remote sessions or Interaction Lab sessions. Only two were available to be interviewed on-site, while the rest preferred to be interviewed remotely. This preference reflected the ongoing practice of people

working from home and was the more economic option, as I was unable to offer expenses. However, even these two sessions had to be substituted with remote sessions as ongoing economic disruptions, such as train strikes and education/university strikes, meant cancelling and trying to reschedule.

Ultimately, the remote approach allowed for a more natural setting than that of a lab: readers engaged in the sessions from their own homes or offices, using their own devices. In this sense, I attempted to capture “the context of use” or the actual conditions where creating and reading would take place (Voit et al., 2019). Although more distraction can indeed occur in the home or in situ environment, I ensured that attention was always focused. Indeed, while there was no attempt at emotion elicitation in the study, readers were comfortable enough in their own environment to reproduce their reading experiences, in some cases almost exactly (Larradet et al., 2020).

In this research, the emphasis was on how the participants experienced digital comics: through creating, producing, and reading. More importantly, I was interested in how they described their experiences. So, while I developed lists of open questions, to respond to the research questions and to guide the sessions I wanted to explore “understandings, perceptions and constructions of” digital comics with people who have a “personal stake” in them (Braun and Clarke, 2013, p.81) (see Appendix IV for Interview Specifications).

CGMs

The semi-structured interviews, conducted with CGMs, creators, and readers, were based on a core set of questions, the basis of which was to respond to the research questions in the first instance. The questions for CGMs were grouped around the following broad themes: business/production models, production process; responsibilities in the workflows, including creation processes and motivation; publication type and formatting; submission methods (engaging creators); distribution and platforms; interaction with readers; and technology tools (Appendix IV for interview specifications). These topics evolved from the research questions, literature review, the map creation and analysis, as well as initial assumptions and prior knowledge regarding book and ebook publishing and comics in general. Interviews also included, where relevant, online interactive demonstrations (given by

the interview participant) of processes and process tools: for example, apps for formatting and uploading digital files, online design tools, and metadata and tagging tools. Moreover, where relevant, CGMs demonstrated reading apps and platforms. These demonstrations not only served to provide a richer understanding of the production processes, but also of the value added to the digital comic by CGMs as it moves through the workflows. In this way, the interview objective was not simply to match the individual production patterns to those chains, circuits, or cycles that already exist (described in Chapter Two) but to discover possible new or variant patterns.

Although there was a baseline interview specification, interview questions were customised based on the individual CGM interviewed. Moreover, a formative approach to the interview questions was adopted with each successive interview: in other words, questions were revised, added or deleted based on responses in previous interviews. In this way, although there were specific topics for which data was to be collected, the approach to the interviews was 'semi-structured' allowing for segues as dictated by the participants' reflections on and responses to the questions. However, the interviews were focused: while the researcher's responses were generally kept to a minimum to avoid bias, intervention was required in some interviews at certain points either to encourage increased response or to steer participants back to the topics necessary for data collection.

Comics creators

Comics creator interview questions were developed in much the same way as CGMs: designed to answer research questions, but in an open style to encourage elucidation, deliberation, and even tangential comments. Where CGMs were asked about production and distribution processes, creators were asked about their creative processes, including to what extent these were digital using such tools as tablets and digital pens, for example (see Appendix IV for interview specifications). Creators were encouraged to demonstrate creative practices where possible. In some instances, the creators spontaneously took me on a tour of their studios, demonstrating the various tools they used, their digital and print publications, and merchandise and storefronts. In addition, they were asked about their relationships and processes with creative team members and editors, where they were applicable.

Readers

As noted above, because of the hesitancy of some readers about whether or not they could be considered digital comics readers, space within the interview needed to be given not only for the adequate response to research questions (for example, did they have a process for reading—apps, social media; did they communicate with others about comics etc.), but also how to get these readers to think and open up about their reading. For committed and even regular comics readers, the interview questions based on research questions were enough to provoke complete and lengthy responses during interview and observation sessions.

But the more casual readers needed context to get them to recall when they would 'incidentally' read comics and what this might lead to, for example looking for other comics issues or instalments, or looking at the creator's feed or website. The reader session was composed of two parts: the semi-structured interview and the Interactive Think Aloud (ITA) session (see Appendix IV for interview specifications). During the interview session, sometimes at the beginning (if I thought the reader might have a difficult time with identifying digital comics reading) or before the ITA part of the session, I would show them a slide which contained the following categories, descriptions, and questions:

- Casual Digital Comics Reader
  I enjoy reading comics, usually when they come up in my social media feed or if someone has shared a comic with me. I may even follow a few comics on Insta, Tw, FB, etc. I don't usually make a special effort to read them though.
- Regular Digital Comics Reader
  I enjoy reading comics regularly, for instance receiving notifications for the next instalments or issues through an app, a dedicated creator website, or Insta and other social media feeds. I look forward to reading the next instalment. Reading digital comics is a daily-weekly-monthly activity. I read many different types of things, like novels, non-fiction, etc. Digital comics are one among many types of things I read.
- Committed Digital Comics Reader
  I enjoy digital comics, and they are pretty much the only thing I read, at least during my leisure time. In addition to reading, I participate in

discussions about comics and go to comics conventions. I like to give feedback to creators regarding the comics I read.

I also asked them: Would you consider the last type a comics fan? How would you define a comics fan? (categories adapted from Barker, 1993, p.159). Getting the readers to consider where they fit in this scale of digital comics readership led them to think about how and when they encountered comics.

I followed this part of the interview by giving them an example scenario of what my online reading and viewing looked like in the space of a day as a lead-in to the ITA part of the interview. Providing interview participants with relatable scenarios is a common HCI method often used with interface design (see the next section for more on the influence of HCI), allowing them a different way of looking at activities and behaviour: “Developing scenarios or use cases … allow one to understand end users’ abilities, skills, environments, devices, and tasks” (Xia et al. 2022). In another study which served as a pilot for this research (Berube et al., 2024), I had left the ITA activity very open, not providing a specific scenario, simply asking the readers who had identified themselves as committed comic readers to take me through their reading process, apps, or social media feeds they consulted. This request was enough to promote their ruminations on their consumption, reading, and technology use. But I needed a more guided prompt for the casual readers in this research, using the following scenario:

“For the next part of the session, I will ask you to recreate your customary way of reading comics online. I’ll give an example: in the morning and evening, I’ll pick up my phone and begin to click through wild bird cams, checking out chat to see what I’ve missed, then discussion boards, and might go to Twitter. Then I’ll open a few books to read on Kindle. So, as a casual reader, why not talk me through how your day starts and comics you may see on the way or have seen. For a more committed reader, what reading apps including comics you might click through looking for new instalments, new titles. While doing so, I ask that you ‘talk me’ through it, not only telling me what you are doing, but showing me and explaining why you do it this way”.

This scenario resulted in their thinking about their own reading ‘rituals’ during the day and proved very effective in demonstrating to them how they could talk me

through their comics reading. Indeed, leading them through their own range of comics experiences during the interview resulted in some who had identified themselves as Casual readers (during pre-interview email exchange, for example) changing that designation to Regular readers. In this way, they discovered themselves as comics readers through the interview process.

3.3.3 Think Aloud Observational Sessions (Readers)

The Think Aloud approach (TTA) to collecting data has its origins in psychological research but more prominently and recently in usability testing, especially where the completion of information tasks or searching is involved (O'Brien and Wilson, 2023; Makri et al., 2010).

The researcher in these disciplines effectively had no role during the TTA session: the researcher was to be silent during the user's speaking through the task. Makri et al. (2010) cite several studies where "the researcher did not intervene unless … asked … a question" (p. 337). However, Interactive Think Aloud (ITA) approach allows for a more active role for researchers and is widely used according to O'Brien and Wilson (2023) who caution: "Although the practitioner literature provides lots of advice on how to intervene, there is no standard protocol for ITA". Moreover, advice on its use is often contradictory (p.115).

In this research, I employed ITA for the rich data collected while the reader is making their way through their reading process. The research did not include a usability test, although readers mentioned unprompted usability functions during the session. Moreover, users or readers in this instance were not given a task, per se, but asked to replicate their reading 'process' or 'approach' (see previous section), so they could speak of anything that they thought was relevant to their reading

I chose the ITA approach cognizant of the risks of "participant reactivity": "researchers aim for participant behavior in the study to be as close as possible to user behavior in the real world. Any behavior that is 'a reaction to being tested' is known as participant reactivity" (O'Brien and Wilson, 2023, citing Oates, 2012, p. 132). Therefore, I adopted strategies to minimize this, including telling readers that I would only comment if I needed clarification or further explanation.

The virtual nature of the sessions both facilitated and limited the setting of a ‘natural environment’. Braun and Clarke (2013, pp. 97-103) stress that a virtual session differs from a face-to-face session in that both types call forth unique sets of data. For example, while physical observation in the virtual environment is often restricted to facial expression and some hand gestures, the fact that the participant is in their home environment and not physically confronted with a researcher may allow for a more relaxed response. In this sense, there is less intervention on the part of the researcher.

HCI, Rapid Ethnography, and Participatory Design

The combination of researcher-led interview, reader-led ITA, and (video and recorded) observation in this research eliciting rich data approached a “short-term” or “focused ethnography” where “short fieldwork can be characterized by intense moments that result in deep and valid ways of understanding” (van Voorst, R. and Ahlin, T., 2024, p.1, summarizing Pink and Morgan, 2013). The short field work can also occur online to observe interactions in the digital environment. HCI has been influential in this type of ethnography: Pink and Morgan (2013) refer to “Rapid Ethnography” developed by David Millen, HCI design scholar. Millen (2000) maintained that a “better understand[ing of] users…user environments, the interaction between the two [can be achieved] in a shortened timeframe” through ‘‘more focused observation, better selection of informants, multiperson research teams with greater informant interaction and better data analysis tools’’ (Millen, 2000, p.285 as quoted in Pink and Morgan, 2013, p. 352). This research has adopted these techniques, including a form of “multiperson research team” through the involvement of the supervisory team, as well as BL and HCID staff in recruitment and facilitation of interaction through sampling.

This incorporation of “ethnographic and ethnomethodological methods” (Bødker et al., 2022, p. 21) was combined with the introduction of participatory design to inform what is known as the second wave of HCI:

> …a focus on real activities, real use of computers by real people, as a replacement for the first wave’s modeling of people and their activities. The first wave approach was model-driven and focused on the human beings as subjects to be studied, from the outside by the detached researcher through

> rigid guidelines, formal methods, and systematic testing, as discussed by Bannon (1991) (Bødker et al., 2022, p. 20).

Bødker et al. refer to Bannon's chapter in *Design at Work: Cooperative Design of Computer Systems* entitled 'From Human Factors to Human Actors'. The title expresses the fundamental change in HCI from the mid-1980s to the 1990s. Bødker et al. observe that the introduction of participatory design was instrumental in dispelling "human factors thinking [of that time] in general because of the view of the human being as a passive topic of study" (p. 21). This participatory design focus in HCI methods has been effectively applied to comics in an applied setting (see Chapter Four for an example of participatory design in this research).

HCI methods, such as ITA, that emphasize the "human actor" have reinforced and supported the objectives of this research focusing on the makers in digital comics. Moreover, adopting an approach such as rapid ethnography has meant collecting data not only on what participants say but what they demonstrate as they review their reading (Marda and Narayan, 2021; van Voorst and Ahlin, 2024). As mentioned previously, my situation as a doctoral researcher in HCID, the Centre for Human-Computer Interaction Design, has provided the opportunity to learn about and use HCI methods for interdisciplinary research into emerging technologies.

3.4 Data Coding and Analysis

Interview data was assessed according to an inductive approach to coding which formed the basis for thematic analysis (Fereday and Muir-Cochrane, 2006; Braun and Clarke, 2013; 2019, 2020). Although the interview questions and thematic framework provided a notional basis from which to identify and group codes, the codes themselves evolved inductively and in a formative, iterative way as more data accumulated.

This process represents why thematic analysis has been important to an understanding of the data: because of its inductive approach, it is a flexible form of analysis that allows for initial notions and personal assumptions. More importantly, even though the data is what guides analysis, "analysis from the bottom (the data) up…analysis is always shaped to some extent by the researcher's standpoint, disciplinary knowledge and epistemology" (Braun and Clarke, 2013, p.175). While this research has not been "guided" by any pre-existing theoretical foundation (for

example, feminist theory, etc), theoretical concepts derived from the literature review (Chapter Two) have formed a framework that has informed the research questions and the data collection instruments. Essentially, the research design and analysis were supported by “wider socio-cultural themes” (Clarke, 2018, p.3, referencing Ellis, Adams, and Bocher, 2011) inherent in the subject of comics itself.

For example, one theme derived from the CGM interview specification—Submission (Creator Submission of Comic to CGM)—was expanded to include the conditions under which these submissions were made: through commission (invitation by CGM) or through cold submission (unsolicited submission to CGM). The distinction became a determining factor differentiating a ‘traditional’ publishing model (CGMT) for digital comics from a self-publishing digital comics model (CGMI/S). The distinction is important to an understanding of how freely available digital tools and access to the web have affected the process by which comics creators make their works available to readers, arguably leading to the democratizing effect of the web, as reflected in the literature.

The themes were also used as a basis for constructing process diagrams and analysis for process patterns. Audio interviews and screenshots were transcribed and coded using NVivo, a qualitative analysis software package. Some semantical adjustment was required so that the thematic analysis approach could be applied. However, it did facilitate repeat coding and theme sweeps, as data were added and themes evolved. The empirical data gathering for this phase was organized around these evolving ‘codes’ or ‘themes’ as initially identified in the interview scripts. This approach provided a format not just for the analysis but also for the reporting of the findings.

3.4.1 “Enacting Thematic Analysis”: Theoretical Assumptions

The “bottom up approach” does not mean that “data is king” and that no assumptions or researcher interpretation inform the analysis. Reflexive thematic analysis acknowledges the role the researcher plays in interpreting the data:

> The researcher’s role in knowledge production is at the heart of our approach! Reflexive TA needs to be implemented with theoretical knowingness and transparency; the researcher strives to be fully cognisant of the philosophical sensibility and theoretical assumptions informing their use of

> TA; and these are consistently, coherently and transparently enacted throughout the analytic process and reporting of the research (Braun and Clarke, 2019, p.594).

Therefore, it is important for the researcher to acknowledge how and what theories have informed even the most data-driven of research:

> We intended our approach to offer the qualitative researcher flexibility in terms of the theory informing their use of TA, and how precisely they enacted TA…, but in doing so, it required the researcher to articulate the assumptions that informed their approach and how exactly they enacted TA. It offered an approach that required reflexivity, theoretical knowingness and transparency (Braun and Clarke, 2019, p.592).

While I would maintain that this research is constructivist in approach, there are certain parts which are essentialist, for example the consideration of what constitutes a digital comic: it was important to set a baseline definition and to maintain this when approaching possible participants. In addition, the research addresses how a digital comics reader is defined. Again, a range of definitions helped to determine the sampling, recruitment, and interview questions. However, while the definition of digital comics might be construed as critical in approach, the definition (s) of digital comics readers was very much experiential, not only because the reader participants' opinion of this was important to the research but also because of the large gap in empirical research on readers and the persistent conflation of them with fans in comics studies (Barker, 1989; Cedeira Serantes, 2014, 2019). Ultimately, this research "[prioritises]…respondent/data-based meaning" (Byrne, 2022, p1397 summarising Braun and Clarke, 2012).

In addition, it is an inductive, data-driven approach firstly because data was not measured against a pre-defined codebook, but rather "open-coded" (Braun and Clarke, 2013). Although the research is influenced by a theoretical framework, it is not defined by it. It could be argued that the research questions themselves and how they influence, for example, interview questions, could have resulted in a deductive analysis (Byrne, 2022). However, the research questions were developed in such a way as to downplay researcher assumptions and to explore digital comics from the perspective of the main stakeholders: creators, CGMs, and readers (see Cedeira

Serantes, 2014 on themes and coding, p134; Byrne, 2022 as above). What influenced possible themes were the interview questions which were designed to address the topics raised by the research questions (Byrne,2022; Braun and Clarke, 2012, 2020).

However, there was one theme across the data sets that "[resided] in the data waiting to be found": that of a preference for print over digital comics. In the first data set collected from CGMs, the issue of a preference was immediately raised by the CGMs themselves, and this theme persisted across all datasets, with digital comics creators and digital comics readers. It can be argued that such a discussion could arise from RQ1.

Research participants were not asked for their definition of a digital comic, nor were they asked which they preferred. A possible reason for this topic arising from the data is the definition of digital comics adopted for this research, the consequent sampling conducted, and the cohort assembled. For example, the CGM interviews began with large and small press traditional publishers (not by design but by scheduling convenience) producing graphic novels which could be described as "print-first", maybe even "print-exclusive", so minimal according to their opinion was their digital output. For whatever reason, these publishers felt it necessary to assert their preferences for print in the face of questions focusing on their digital output (CGMT, CGMI, CGMM) (see Chapter Five).

As the other two datasets were collected, print-preference continued to assert itself (with exceptions, for example, among some webcomic creators). However, a sub-theme, digital format, emerged especially with readers (DCR1, DRC2) who indicated that they had and still do read downloaded PDF versions of digital comics produced by traditional comics publishers: in fact, for DCR2, they read downloaded PDF versions of comics produced by one of the CGMMs interviewed (DCR2 and the CGMM in question were recruited independently). This sub-theme, suggested by the research questions and consequently present in the interview questions, in turn gave rise to latent codes across the datasets associated with 'format perception' or 'perception of readable formats': in other words, a disconnect between what CGMs or creators think they are producing (print-first or print exclusive), and what the readers were reading (digital first or digital exclusive). In the end (and see discussion

in Chapter Five), it may be that these terms do not or should not be applied, as a few CGMs (it has to be said in the self-publishing category) indicated (see Chapter Four).

3.4.2 Coding and Conceptualizing

I have maintained in Chapter One that this research is reported through the voices of the participants which should indicate that the codes would be mostly data-derived or participant-generated (Braun and Clarke, 2013, p. 207 ff.). However, it would be more accurate to say that the coding was largely a combination of participant-generated and research-derived.

The research questions and, consequently, the theoretical framework derived from the literature review guided data collection, especially interview questions. The coding and subsequent themes reflected the emphasis of the research questions and the theoretical framework, and in this respect, the coding and themes can be considered researcher-derived.

However, the research participants did take me in some unexpected directions. For example, I had not expected that by adopting a wide-ranging definition of digital comics (see Chapters One and Two), I would be speaking with people who not only did not think they created or published digital comics, but also who had very definite opinions on the relative (and sometimes superior) merits of print. I could have adapted my definition based on initial interviews with CGMs which went in this direction. But maintaining the definition and recruiting comics creators and readers based upon the definition led to richer data and a richer understanding of what the ‘digital’ in digital comics could mean. As my understanding of ‘digital’ in the context of the research deepened, so did my discussions with the research participants, especially digital comics readers and how they identified as such (see 3.2.3 above on sampling of comics readers and Chapter 9).

3.5 Ethical Considerations

The research achieved approval according to City St. George’s ethical requirements and according to ethical considerations common to studies using qualitative research methods. It underwent ethical review at City St. George’s for all three phases of data collection with CGMs (publishers), comics creators, and comics readers. Because the research specifies adults (18 years of age and over),

participants were not classed by the ethics approval process as being vulnerable. There were no foreseeable risks or harms, or possible side effects for participating in this study. Personal data, comments, and any other information provided were de-identified or anonymised. All data has been kept confidential and secure, firstly on password-protected, encrypted local hardware devices and then uploaded onto a City St. George's approved and supplied secure cloud storage (OneDrive).

To ensure project agility (ability to respond and adjust to risk and change) and completion in a timely manner, a risk assessment analysis was conducted, and ethics approval was sought and granted (see Appendices I-III). The ethics proposal included the following key practices and processes to ensure proper management, protection, security, and anonymity:

- No personal or organization names have been used in any publication, unless otherwise specified through the consent form (see Appendices I-III).
- No audio or video screensharing interaction recordings have been used in academic presentations or made available publicly. Audio portions of the interviews were transcribed, and screenshots of relevant screensharing interaction (with appropriate consent) were taken. Participants were given the option to have their video turned off during the interviews and participated in screensharing recording based on their consent.

The collected data underwent a de-indentification process:

- Once the de-identification process was completed, the key to identities was kept in a password-protected and encrypted file and saved to City St. George's approved secure research storage (OneDrive).
- Only the main researcher and supervisors were able to review audio recordings, transcripts, and video recordings of screensharing during the analysis phase.
- Both audio and video screensharing data were encrypted and stored in files and a folder protected by a password on a password-protected encrypted external hard drive and were managed by the doctoral researcher. The doctoral researcher then uploaded this data onto City St. George's approved secure research storage, e.g., OneDrive.

All these points were covered in the Participant Information Sheet and Informed Consent Form which were supplied to the participants in advance of interviews to make sure they had time to read them, ask questions, and understand the study (see Appendices I-III).

There was an additional ethical consideration related specifically to comics content. Some digital comics content can be considered objectionable or distressing. To ensure that neither researcher nor participant was exposed to such material, a careful review and selection process of content and provisions was undertaken to exclude such material.

3.5.1 Qualitative Research, Comics, and Ethical Considerations

Because of the visual nature of comics with art and text which sometimes can be challenging, there are specific ethical considerations that apply not only to participants in a qualitative study but also to the researchers themselves. However, there is a gap in comics studies literature analysing methodological approaches from an ethical perspective, possibly because there is little empirical research conducted in the discipline.

Participants

Privacy and anonymization are particularly necessary in such research where particular emotions, for example shame, embarrassment, or fear and defensiveness, can be experienced by participants relative to the comics content. While a hallmark of the qualitative interview method is creating a non-judgmental environment with carefully crafted questions, and even neutral facial expressions and tone of voice, the participants themselves may be reluctant to talk about the kinds of comics they create or read, despite the assurance of anonymity. Gazso and Bischoping (2018) referred to an interview participant's experience as follows:

> …and Andrew likely [had a] rightful expectation that his participation in the interview was voluntary and its interaction should do him no harm. After all, the interview interaction essentially involves asking the participant for the 'gift' of revealing their experiences and perceptions and thereby inviting an intimate understanding of their lives (ROTH, 2005) (p.10).

Researchers

By the same token, researchers conducting qualitative interviews that involve Think Aloud and observation of creators and readers may encounter material that they find distressing. This would certainly be considered a risk factor in an observational comics interview, and one way of mitigating this factor is to discourage participants from using such content during the sessions. Gazso and Bischoping (2018) maintain that

> …feminist methodologists proposed that epistemological weight be given to what researchers felt during interviews, even —or especially—if it was not voiced 'on the record' in ways that would satisfy empiricist standards (Stanley and Wise, 1983). As feminist practitioners, we, like Kleinman (2007), understand investigating our discomfort to be part of connecting the personal to the political (p.4).

However, this kind of mitigation has some drawbacks that can be deleterious to research, as Gazso and Bischoping (2018) note above when they speak of the "gift" research participants bestow. For instance, the definition of distressing material would be challenging: where does one draw the line regarding misogynistic imagery or storylines? It is still relatively acceptable for female characters to be scantily clad or highly sexualized, even among female comics creators. If a researcher were to preclude these types of comics, there is a danger of severely limiting the research.

Indeed, beginning the recruitment and data collection processes with content prohibition not only severely restricts the scope of the research, but it can also cause participants whose material may not necessarily be offensive to opt out of participation. Recruitment is all about, for the most part, getting as much opt-in from participants as possible.

Moreover, beginning the research in such a way can create the judgmental environment that researchers work hard to eliminate. Even participants who might brave the proscriptions may feel restricted in what they say or demonstrate as reading or created material. Again, this type of response works against the type of environment researchers try to provide: one that is confiding, safe, and objective.

For this research, I opted not to restrict the type of material that participants could show me or discuss.

3.6 Chapter Conclusion

This chapter demonstrates a research approach that situates the “human organism”—CGMs, creators, readers—at its centre. Moreover, the phases of research during which each maker group was consulted did not necessarily produce perspectives shared or in common among all participants but linked themes that constituted important aspects of each group’s experience of digital comics. This rich collection of data was achieved as a result of the recruitment and sampling that produced cohorts strong in “information power” resulting in a type of focused or rapid ethnography ranging across all possibilities of digital comics. The strength of the cohorts and the use of data collection and analytical tools, such as HCI methods, that focused on experience produced findings informed by the researcher and the participants: no one necessarily leading the other but both exploring the nature of digital comics together.

This chapter reviews how participants were engaged in the research. The findings chapters identify their responses not only to digital comics but to the research methods employed. In this chapter, I have detailed the methods and methodology applied in all three phases of research with CGMs, creators, and readers. These phases, as described above, in analysis became linked by themes shared in participant data. Presenting this data to preserve the linked themes has resulted in more of a monograph style for findings chapters, i.e., presenting the work as a series of chapters interrelated and linked by common major themes, as opposed to isolating the participants in their own chapters, treating each phase as a separate ‘study’. This linked series of themes in Chapters Four-Six constitutes a theoretical and thematic framework of process (production of culture), technology (materiality, haptics, platform studies), and communication (communication, reader response), all representing elements in the digital lives and ecosystems intersecting with digital comics. As such, it foregrounds the research as a holistic and human-centred investigation of digital comics creation to consumption practices.

Chapter Four
Production of Digital Comics Culture: New Makers, Roles, and Ways of Working

Chapter Overview: This chapter introduces the first theme of the findings: new makers, roles, and ways of working in the production of digital comics culture (Theme 1). Creators, publishers, and readers have identified and described new ways of working within the digital environment. In fact, the findings necessitated rebranding 'publishers' as 'comics gatekeepers-mediators' (CGMs) and separating 'reading' from 'consuming' to articulate and foreground these changing roles. The findings in this chapter focus on the comics publishing process, workflows, and routines that contribute towards the outcomes of that process with the digital comic as the final output for consumption. The chapter is organized according to the basic publishing linear process, beginning with the expanding roles and creative workflows of comics creators. After reviewing the role of book publishing editors (4.2), the chapter proceeds to the CGM production process. For some CGMs, the digital process remains linear; for others, it involves a changed relationship with creators or self-publishers, resulting in a fluid and diverse publishing environment (4.3). The chapter concludes with an examination of digital comics readers' consumption routines (consumption as everyday activity), emphasizing the distinction between consumption and reading, as well as the introduction of new types of consumption by new types of readers (4.4).

Identifying these processes and workflows also highlighted how the use of various platforms, especially in the cases of creators and consumers-readers, contributed to the development of personalized 'ecosystems' that are user-generated instead of platform-owner generated. This theme will be further explored in Chapters Five and Six.

The findings in this chapter respond to Research Question 2: How do UK creators, publishers, and readers make and consume digital comics? What processes are involved? These findings, and those from Chapters Six and Seven,

form an empirical basis or foundation for the study of digital comics within a theoretical framework including production of culture, technology and materiality, and communication. Together, they comprise an empirically grounded framework of theory as well as major themes derived from the data collected.

4.1 Introduction

> "The traditional print-on-paper book, and the industry that had grown up over a period of some 500 years to produce this object and distribute it to readers through a network of retail outlets, constituted, in effect, a channel of communication that put one set of individuals (writers) in communication with another set of individuals (readers) through a particular medium (the book) and a ramified network of organizations and intermediaries (publishers, printers, wholesalers, retailers, libraries, etc.) which made this communication process possible" (Thompson, 2021, p.15).

Processes are the building blocks of culture that underpin the creation, production, distribution, and consumption of digital comics. They are the engine driving communication at all levels on comics and non-comics platforms. In Chapter Two, I analysed different types of publishing processes from chains to circuits, consisting of series of activities fuelled by the kind of communication and collaboration illustrated by Thompson above. In effect, the processes of creation, production, distribution, reading, and consumption are "channels of communication" upon which a digital comics culture and ecosystem are built.

The chapter is organized to reflect a basic linear publishing process, including themes and subthemes from creation to production to consumption. For most of the interview cohort (although there are exceptions), creators began the publishing process not just with the act of creation, but also with the choice and implementation of technology, thereby expanding their roles within production and distribution activities (4.2). The themes work together in this section to demonstrate the extent to which creators have claimed control over the creative process. This control continues into the next part of the process, production (4.3), as illustrated by the various digital self-publishing production processes where the creator is the main player using CGM platforms and tools to create and distribute. Self-publishing for comics creators offers more fluidity in production and business models in general.

The process models of traditional book publishers (CGMT, CGMI) and even tech, gaming, and media companies (CGMM, including traditional comics publishers, CGMCom) demonstrate publishers in control of the digital publishing process and especially the production workflows. For digital comics readers at first glance at the end of this process, findings are focused in this chapter on their consumption routines (as everyday activity), on the degree of decision-making or agency in consumption, and the manner of consumption, in other words, how and where do they encounter comics (4.4). The reader's apparent passivity (according to various depictions of creation-publishing processes, see Chapter Two) is challenged by these findings which suggest a more nuanced role for the reader.

The findings give rise to an empirically grounded framework where the makers' lived experience of digital comics is grounded in making activities: creation, editing, production, distribution, consumption, and reading. Within this production of culture framework, makers describe their practical experience with digital comics (Chapter Four); their negotiation with their daily companions, the containers for digital comics including files, devices and platforms (Chapter Five); and how through these making activities they communicate with each other and with the texts, building their own personalized ecosystems (Chapter Six).

4.2 Creating Digitally and Digitally Creating: The Expanding Role of the Comics Creator

4.2.1 Introduction

The findings concerning comics creators, their roles, and their processes vis-a-vis the final output, the digital comic, highlight their raised profile in the overall publishing process. As described in Chapter Two, they did and do play a pivotal, although not dominant, role in print publishing. However, the advent of digital publishing provides the opportunity to exert more influence over production, to have more control over the outcome, and, in some respect, have more ownership and acknowledgement. To a certain extent, this changing role is the result of the 'digitization of creation'.

For example, graphic novels in print go through the editing and production processes predominantly as PDF documents before being made available to the

public, or published, in print. This digital-to-print transformation illustrates not only "the digitization of publishing" (Clark and Phillips, 2020; Thompson, 2021) but also the digitization of creation. In producing the comic, whether the intended outcome is digital or print, the tools that enable creation and production are digital for comics creators and CGMs. Comics creators embrace a range of software tools and programs to achieve the final file, the finished comic to be sent to an editor or to be uploaded to a self-publishing platform or website. Overall, creators were willing and often enthusiastic adopters of different and new software tools.

Comics creators in this research, for the most part, created and transferred comics digitally, using several tools, including tablets, digital pens, scanning[8] and image making, graphics, and management software. But the process was not always digital: CCI1, who is an illustrator and has the storyline and text provided by the comics writer, still drew line art by hand using pencil and paper, which they eventually scanned for colouring and conversion into a digital format. In addition, CGMI6, an editor, printed out the comics submitted for editing and then uploaded the comics with the manual edits to a desktop publishing tool to be returned to the creator for further consideration.

Whether creating digitally or manually, eventually the comic must be converted to an electronic format to expedite sharing with other creative team members (CCI1), sharing and working with an editor (CCI2, CCT2), and then disseminating across self-publishing platforms and websites (CCC1, CCW2). Indeed, comics creators evolved their own creation processes, largely digital but also digital combined with manual creation including papers, pens, pencils, and light boxes. CCT2, below, illustrates not only the number of different techniques that can be used for just one comic, but also the variety across the comics of one creator.

[8] The scanner has figured prominently in the digitization and electronic sharing of comics: Priego (2011) includes many examples of comics creators using scanners to digitize their comics. At the time of his writing, "the culture of widespread amateur digitization (Terras, 2010) and online sharing of illegal scans of printed comics is thriving" (p.233). Priego rightly predicts that scanners would become cheaper, available to more people. This research demonstrates that scanners are still important for creation purposes, although more sophisticated scanners may still be beyond financial reach.

4.2.2 Creative Process and Creative Ecosystem

CCT2, who both writes and draws their comics for a book publisher, described the process of creating and working using several techniques and tools, some digital, some manual. The process begins with what can be presented to the editor for initial feedback. For some comics creators, the text or story comes first. They may pass a story by the editor just to ensure that the editor likes it. According to another creator, CCI2 who self-publishes online and is published by a small press, “I have to have something that I can show him to get feedback on easily so it's easier for us if I just type up a script that he could look at”.

CCI2 explained the process in more detail:

> Once I’ve got a full script [written digital text], I usually work with [an editor] who gives me feedback on that. I make edits. I’ll make a PDF for [editor] because that's just easier for [editor] to read through so I would save all my pages as a JPEG for that reason and then make that into a multi-page PDF for [the editor].

Both comics creators then get down to the work of matching text to drawings in digital files of comics panels. According to CCT2:

> Once I think it's looking good, I create digital files for each page with the panels laid out, and with the speech bubbles and the text laid out. Then I draw into that because that shows me how much space I have for each panel and how much space is going to be taken up with words. So there's a lot of stuff that happens before I even start drawing: figuring out where the words are going to go is quite important. That dictates a lot of the visual stuff like where a character is facing and who they're talking to. It's helpful to have the words down so that you know what's what. Then I draw the whole book in as rough as I can. And then [the editor] will do a second pass editing, just to see visually if all of the storytelling is working and then, if that's all good, I do a final version of all the pages.

The creation-editing process described above was applied to one of CCT2’s comics and was probably the most straightforward process that they described. They

evolved different processes for different comics, using again a combination of digital and manual tools:

> [For one comic] I would just open that in Photoshop and tweak it a little bit, might fiddle with the colour slightly, but with [another comic], I might colour it completely in Photoshop on another layer or a number of layers. [Another comic] I suppose [was] the most complicated that I've done because basically I would do the line drawing in ink…Then, using a lightbox…I placed a new layer of paper on top of the line drawing and then water coloured it. So that meant I could scan the line as solid black in a bitmap file. Then I scanned the watercolour version separately and put them together in layers in Photoshop. Then I would tweak the watercolour, and I probably copied the layer two or three times and altered that balance of colour.

The evolution of comics digitization seems to be all here, from the light box that allows for going from pencil to ink (the solid black line that outlines a drawing) and the scanning to putting multiple-scanned layers into Photoshop where the colour can be "tweaked'. It might be of some significance that CCT2 had a career in graphic design which would allow for some facility with working with different tools. However, other comics creators in the study demonstrated different techniques and the use of multiple software tools to achieve the finished comic. Essentially, in one creative workflow, CCT2 described what was once a multiple-person process for producing a comic, gathering traditional and digital tools and graphic platforms around themselves into a type of personalized creative process ecosystem (Figure 14).

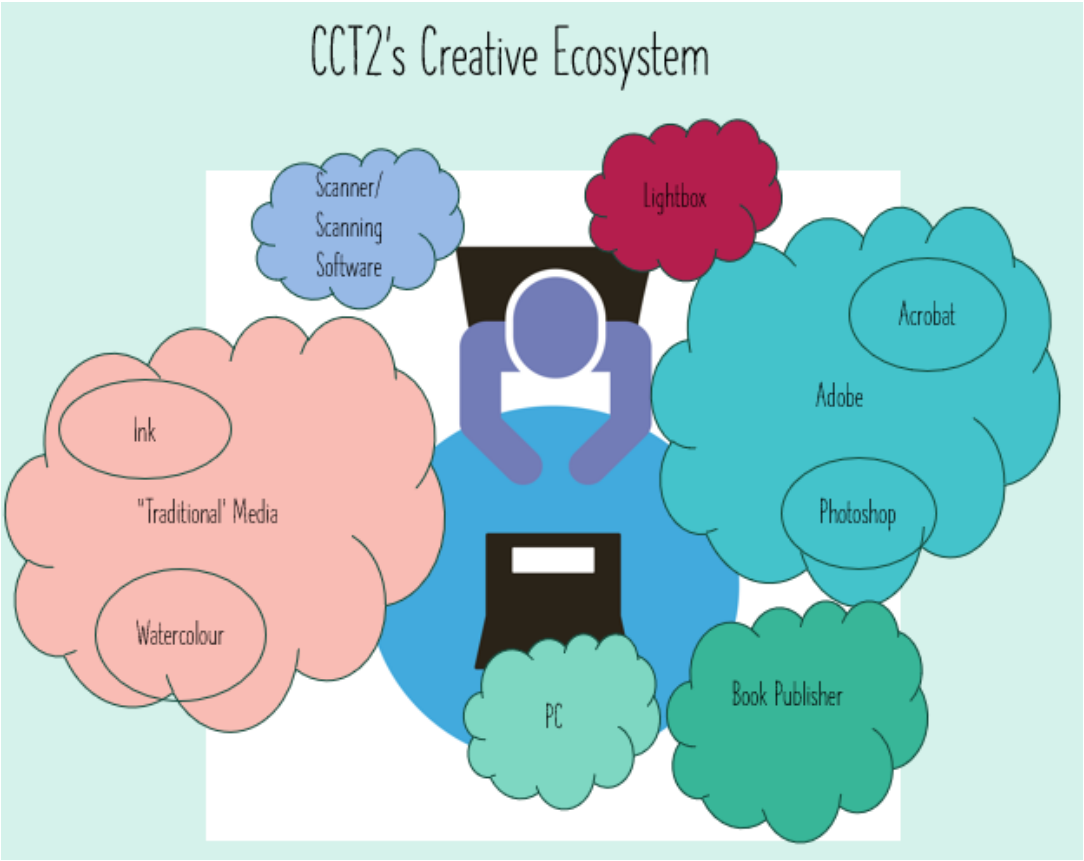


Figure 14: CCT2's Creative Workflow Ecosystem, identifying tools and platforms

4.2.3 Where the Comic Begins: Ideas and Tools

Where the comic began, as a drawing or as a story, was a sub-theme among the comics creators interviewed. Whether they started with pen or pencil on paper or with a digital pen and tablet, most of them expressed a preference for beginning with the story, with CCI2 stating:

> I know people working in really different ways, but for me, because drawing is the time-consuming part, I don't want to waste time by drawing stuff I'm not going to use, so I just try and get the story figured out first.

CCI2 spoke frequently about working with paper as an aid to help them visualize the look and feel of the finished product, in their case a print graphic novel (which may or may not have a digital version). Of note here also is a preference for a certain type of pencil for drawing:

> I do love working in pencil. I've never worked in ink, and I do have favourite pencils. I favour Castile pencils; they are the ones that I really like. But to make a long book like my first book which was very long, the amount of paper I got through…I do the whole thing in a rough first draft, scan it, and then print those pages out to light box over them for the final art. So, I do the entire book twice on paper and end up with reams of paper that just went into the bin at the end.

This description combines the love of working manually with a pencil with a concern about the amount of paper drafting required, resulting in an acknowledgement of what is to be gained by working digitally.

While one comics creator had a combination of digital and manual processes and tools, another had a mostly pen-and-paper process until the end. According to CCC1,

> “I'll get the whole thing done, the whole script which will be about 20 pages. It might only be four pages of actual writing [the rest is artwork]. I’ll sit down and do the thumbnails, and so I sketch out the whole thing. This will be by hand on paper. I find it a lot easier when I can arrange the whole thing on the table in front of me. It'll be very rough. But I’ll have all of the action there; I can see what everything is and where it all goes”.

Whereas CCT2 and CCI2 were creating comics, specifically graphic novels for editors from book publishers, CCC1 was a webcomic creator. This is an important distinction. While it is true that CCT2 and CCI2 retained the overall ‘conceptual vision’ for their creations, they still needed to pass rough drafts by editors who could conceivably veto various parts, or perhaps all of these initial drafts (although no creator experienced a complete rejection). Hence, CCI2’s “not [wanting] to waste time drawing stuff I’m not going to use”. Regardless of how much easier digital technology has made this back and forth with the editor, there is still a sense that things have not become so easy that time and effort are not of the essence. CCC1, on the other hand, as a webcomic creator, could produce any number of drafts in whatever way was best for their creative and editing processes. They could take as much time as necessary (or at least as much time as a possible weekly publishing schedule would allow). They “see what everything is and where it all goes”, as the

“conceptual vision”, “the all-seeing eye” (Priego, 2011), the control and final decisions to publish were all down to them. The only other arbiters in the process would be the readers, the only “constraints” and “limits” (Priego, 2011) whether or not they took the time to read it.

Some creators did not begin with the story, but with a sense of the characters or with an idea. According to CCC1,

> I start off with an idea about something usually, see something awesome and I think, oh that's an interesting idea, I like that concept. And then I try and think of a character to match up with it.…So I’ll have these ideas kind of floating around like this thing or that thing you know, but it won't become a story until I can come up with a character to go with the idea.

Creative inspiration can come from anywhere, whether from an “interesting idea” or visualizing on paper. The creator participants all had their own ways of beginning as well as their own processes which embraced all kinds of digital and analogue technology.

4.2.4 One Thing Leads to Another: Experimentation

The multiple digital methods for creation, combined with drawing by hand on paper or tablet, give the impression that the act of creating comics can be technically complex or even complicated. However, none of the creators in the study felt burdened by all the technology: the only burden expressed was a financial one that prevented upgrade or experimentation. Indeed, they felt that the software in particular allowed them freedom to experiment and more control over getting the comic to look exactly the way they envisioned: CCW1, a webcomics creator, said getting a Surface Pro and using a flatbed scanner was “the dream”. While comics creators working with book publishers would use a variety of tools to create, the webcomics creators in the research more often expressed a desire to continue experimenting with new and different software in search of the most visually effective comic.

CCC1 detailed their graphic software evolution, demonstrating an interest in continuing to try something new:

> I used Gear Up [stock illustrations] for a long time. And then Paint Shop Pro, that was quite a while ago, I think. I started off with Paint Shop Pro and then I used Gimp. And now I'm using Manga Studio, though I've just finally got a copy of Clip Studio Paint so I can try and do that now.

CCC1 described a creative process earlier in this section that was mostly print and manual. Despite how well this manual approach worked for them especially when editing, they still expressed an enthusiasm for trying out new graphic software, mixing traditional and new methods to achieve the desired outcome.

For CGMO3, a webcomics creator, it was not necessarily about using new software, but using software in a new way to conform to their requirements:

> Just out of habit, I use Adobe Animate, it's what I've always used. I don't draw in a traditional sense. [Recently] I have started to use vector graphics software and libraries where you can build directly from common symbols. I like the way it works. Though it's designed for animation, I'm mostly using it to do still imagery, but that's fine. Then I use Photoshop or whatever image editing package I prefer at the moment for formatting and prepping stuff for the web. But nothing too fancy. When I did a lot of experimental stuff, I mostly worked in Adobe Animate as well, because it allows you to create interactive content really easily. I'm always on the precipice of trying to learn Unity, and I will at some point try and nail it down because it seems like the most useful gen tool set for creating interactive content now that Flash has completely gone. So it is that kind of mix of stuff.

This enthusiasm expressed by comics creators not only for trying out new software but also for mixing them with traditional approaches provides another way of looking at digital disruption. In the creative sense, it may appear to add to the burden of creators, but in this study creators embraced the disruption in the pursuit of not only enhancing their comic output but also having control of how specific aspects of that output are produced.

The expertise of comics creators with different software packages and tools in some instances was a necessity, even when dealing with large book publishers with design and production teams. According to an editor for CGMT2, a book publisher:

> It's usually a PDF. So normally the creator will submit to the editor whatever form is easy to read. They would then be in touch with our production department. At that point, again, it kind of exits my remit, but it might be that they need InDesign files or layered art files, something a bit more complicated than a PDF.

Comics creators, whether they create digitally or manually, were interested in learning about digital tools, or at the very least upgrading the tools, whether they be tablets, software, or digital pens. This interest in learning, especially among those who publish mostly in print, is supported by Berry's (2020) *UK Comics Creator Research Report* where one of the key themes to emerge from the findings was a desire for more "skills development – including creative skills, such as using digital tools" (p.75).

4.2.5 The Go-Between: Editors and Creators

Where these comics files went next, to be produced digitally or in print, depended on how the creator wanted to be published: to try to make it through the gatekeepers of the mainstream publishing industry; or to go it alone retaining all their rights but being responsible for production, marketing, and distribution; or, via a middle road, such as a small press CGM where they retain a larger share of rights and royalties with editorial support.

As observed above, comics creators working with book or comic book publishers sent early drafts to editors, mostly of stories, before committing to drawing. But this back-and-forth of the editing process, leading into the production process, was exclusively digital, no matter the individual publishing process (categorized by CGM type). At least one small press editor would print out a copy of a graphic novel for editing and then would upload edits to a desktop publishing package as noted above, but this was not a common practice, not at least among those CGMs interviewed.

The link between the comics creator and the traditional publisher is the activity of editing. In this instance, for large and small book publishers of comics in this research, the creator starts to relinquish some control to the publisher who now takes over to prepare the work so that it can be made available to the public. The process which up until this point could have been both digital and manual, becomes entirely digital. Building upon what the creator had submitted and what had been agreed during editing, the main process of production takes over the product, using the PDF generated in the editing process to continue 'adding value', through design work, layout, and formatting. As an editor for CGMT2 explained above, editors relinquish their roles at a certain point in the process, at which point it "exits my remit".

Regardless of the roles they have given up, editors are the lynchpin in the relationship between creation and production for large and small publishers deciding on the release of the comic into the production process. This is most evident in those CGMs who operated along a 'work-for-hire model': the creative and editing processes conform not according to the development of the ideas of the creator but of those of a publisher or funder. Essentially, they follow that 'traditional' comics business model described by Dowthwaite and Greenman (2014), in that they "discover and manage talent" according to the product or brand they are developing. This management of talent role is down to the editor. CGMM2, a multimedia publisher of comics, explains the role this way:

> It'll be controlled by the editor, the whole way through that [production] process, regardless of different collaborators. Then it goes to the designers who will compile that into the book, the comic. And then they'll again check by the editors and then it'll be sent to the printers.

For small press and independent publishers, desktop publishing software helped them to cover a range of roles, when they did not get third parties to cover these. According to CGMI6,

> I sometimes do an enormous amount of work on the manuscripts. In that sense, I am an editor [as well as managing director], because I do the graphic novels. I do the production as well. Yeah, so I'm all hands to work which we

would otherwise get a designer for. There's been a couple of books where we've asked a designer to work on it.

Even before the production process, editors may have to assist the creators in what has largely become a creator role: formatting a document for submission. According to CGMI6,

> I think two of the authors had InDesign and put it in pages. But I took that over from an early stage. And they were just providing the shape. What is a general rule, the authors, and it is mostly authors [as opposed to illustrators], submit their pages in Photoshop and they will add their text in layers. So, although it would be ideal to have the text in InDesign, it doesn't work, and there are so many different styles, so it's a lot of editing from InDesign into Photoshop and then back out again.

The editor is the conduit between creator and publisher, either supporting the creative inspiration or reinforcing the publishers' vision. Those participants who were editors or editors combined with other administrative or production roles (for small presses, for example) demonstrated that 'editor' is an evolving concept within digital publishing.

4.2.6 Section Conclusion

The focus in the processes presented above, in addition to digitalization and digitization, is the disintermediation of certain roles subsequently adopted by creators as a result of digital disruption. Essentially, the creators in the research were more influential and exerted more control not only in creation but also in some of the traditional production and distribution roles, even when dealing with book publishers. For example, creators in this research describe doing the pencilling, inking, colouring, and lettering themselves. This is true whether the creator is writing a graphic novel for a book publisher or a webcomic for upload to a personal website. What assists them in taking on these activities is, of course, the digital technology, supporting not only drawing and colouring but also the creation of the different layers of the artwork.

With digital self-publishing participants, not only is the disintermediation of the distinct roles and tasks evident, but also the virtual elimination of any identifiable

publisher along with its production process. These roles, including editing, can be taken on by the creator or third parties engaged by the creator. The creator then 'publishes' either to a personal website or a publishing/distribution platform. Creators can choose to distribute over multiple platform channels. In this way, they generate their own 'ecosystem', drawing together different types of platforms and media to create and distribute.

In this section, creators have provided a view of the beginning of the making process. In the next section, CGMs talk about their individual production processes.

4.3 The Digitalization of Publishing: Diverse CGMs Mean New Processes and Platforms

4.3.1 Introduction

Scholars refer to the "digitization of publishing" or the conversion of print output into digital (Clark and Phillips, 2020; Thompson, 2021). However, digitization can only happen within the "digitalization of publishing", the transformation of publishing through the disruption of digital technology. Both the mapping of UK publishing paths (Chapter Three and Appendix V) and the CGM interviews revealed an industry deeply affected by digital technology: processes, business models, and outputs. Processes are entirely digital, regardless of the published output. Where the creative and editing processes in some cases included working with print drafts of the comic, according to this study, the production processes of even the most resolutely 'print-first' CGMs are exclusively digital.

Despite this whole digitalization of production processes, there is a discernible division in the interview sample between the primary outputs of traditional publishing and self-publishing still driven by market imperatives (Chapter Three, see also Jane Friedman's Book Publishing Paths, 2020-2024):

- Print-First: The print comic is the primary objective of the overall publishing process, and a digital version is produced as a secondary or supplementary product
- Digital-First: The digital comic is the primary objective of the overall publishing, published before print which is produced as a secondary or supplementary version

- Digital Exclusive: The digital comic is the only objective of the publishing process.

In general, most large book and comics publishers in the research released print and digital versions simultaneously. However, small-press publishers were still more likely to release a digital version later. One small press publisher, CGMI6, for example, explains:

> We play around with it, see what works. We were not earning very much on our digital sales for the graphic novels. So we like to leave that until we feel it would be good to advertise it and to have it as a separate promotion. I think we delay a bit, simply because we want to give a good start to those print copies…I think it would be a mistake to put them out too early digitally. Whereas with something that is non-fiction and topical, as it were, I think it's worth doing [publishing at the same time].

According to this research, no CGM was found to be print-exclusive—that is, publishing print only. Even the most dedicated print comics publishers, usually small and independent press publishers of graphic novels, "dabbled" as one participant put it, often by making the PDF versions available on popular storefronts, such as Gumroad or Big Cartel. This activity did intensify, however, briefly during the pandemic years (Brinton, 2021).

While traditional publishers, both for books and comics, have digitalized their processes, they still produce a traditional product, print. If self-publishing has influenced them, it has been in their publishing a digital output as a secondary product. Some, especially in the multimedia category (which included comics publishers, see Appendix V), had taken the further step of dedicated onsite storefronts as well as apps (CGMM2, CGMM4, as well as CGMD1) which they demonstrated and explained during interview and observation. The inclusion of consuming and reading options meant that these CGMs operated as platforms, having more direct interaction with readers than those from the CGMT and CGMI categories.

But self-publishing has had an impact on comics publishing not just in the version of the product, not just in the apparent lack of gatekeeping making publishing open to all (this is not always the case, see Chapter Six 6.2.4), but in the

diversification (although some would say fragmentation, see Benatti, 2024, p.10 for example) of types of CGMs and production models—publisher, platform, project, individual—and the manner of production and distribution. Self-publishing and the popularity of webcomics have contributed to the rise of the platform (and apps supported by it), which has also enticed traditional publishers to participate or to platformize through apps and storefronts (see Kleefeld, 2020 on webcomics and newspapers). These aspects of comics publishing are represented in the research sample.

4.3.2 Book Publishers Publishing Comics: Digital Production, Print-First

Among those CGMs interviewed, business models and priorities drove their digitized production processes as well as defined the nature of the communication CGMs had with creators and readers. Business priorities determined whether a CGM operated on a print-first, digital-first, or digital-exclusive basis, and if it operated under simultaneous distribution practices. Generally, the mainstream and small press book publishers of graphic novels (CGMT and CGMI) interviewed, whether multinational or small press, controlled the process from commissioning and contract to publishing and distribution (CGMT2, CGMI2, CGMI6 for example, although CGMI1 was an exception to the genre of output and this level of control, see below[9]). This was also generally the case for multimedia, tech, and gaming companies (CGMMs) publishing comics, even more so as their contractual relationship with creators was based more on a work-for-hire business model similar to traditional comics publishing (CGMCom). Those CGMs in the CGMI/S (indie and self-publishing) sub-categories, including self-publishing and distribution platforms, collectives, crowdfunding sites, and social media platforms, for the most part had less control of the digital publication, ceding editing and production as well as promotion and rights to the creators/self-publishers.

The CGMs interviewed generally divided according to those whose production and businesses were based on a print-first model and those who were digital-first or

[9] For the purposes of this research, ‘control’ indicates that the participant in the negotiation and production processes, who initiates and manages more parts of the process, makes more financial investment and takes more risk, retains more rights and royalties, etc.

digital-exclusive. Traditional CGMs in the sample, both CGMTs and CGMIs (except for digital-exclusive CGMI1), published on the print-first model.

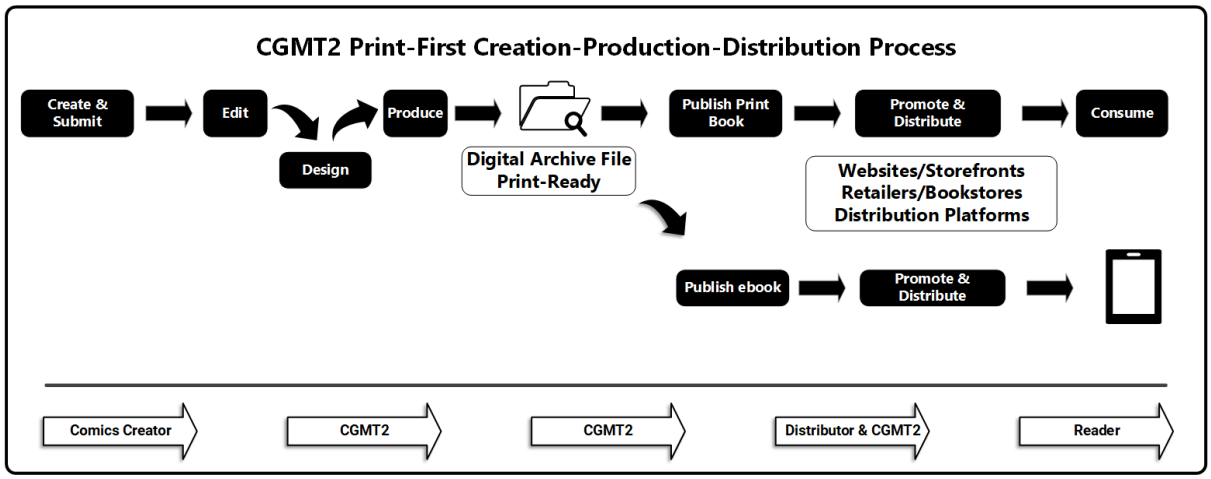


Figure 15: CGMT2 Comic Publishing Process (Print-first, simultaneous distributor)[10] CGMT2 is a traditional book publisher producing graphic novels. The process is mostly linear, with the most transactive communication happening between the editor and the creator. The CGM is mainly responsible for the promotion. The production of an ebook is a separate workflow within the company which disrupts the total linearity of the process. There was not much direct, substantive communication with the reader. See Appendix VIII for enlarged view.

For example, CGMT2 (see Figure 15), one of the Big Five publishers (see Appendix V), produces and publishes[11] graphic novels. It is a print-first publisher for all of its publications, producing digital versions in ebook format for reading on devices. Individual teams manage each stage of the process, from editing to print and ebook production. The production-to-publication process is streamlined to produce a large quantity of books efficiently, with graphic novels constituting a small percentage. Ultimately, one universal digital file composed of flat pages in PDF format is produced for print and digital publications. Adobe's InDesign[12] is used throughout the process, for editing and production, to produce digital and print file versions. eBooks are produced from this file with little alteration, maybe some adjustment to colouration in the case of graphic novel artwork. Digital-only

[10]The CGM process diagrams are divided into two sections: at the top, the focus is the activities of the process, and at the bottom the actors performing those activities.
[11] In these publishing processes, the outcome of production or producing is a print-ready digital file, which is then used to publish or make available to the public the book, either in print or digital form.
[12] Adobe InDesign is layout and page design software for print and digital media. See https://www.adobe.com/uk/products/indesign.html

functionality would require more adjustment, perhaps creation of separate files in different formats (Amazon's Panel View Magnification[13] cited as an example, one that CGMT2 did not choose to offer as an option to readers). These adjustments would require more financial investment into the process, as would converting from a print-first to an XML workflow[14]. Print and digital graphic novels are simultaneously released to such distributors as bookstores, digital platforms, and retailers. Print sales continued to be profitable, and readers still demonstrated their preference for print through sales.

It is a publisher-led, linear process, negotiating with comics creators at the beginning, and distributors and, by extension, readers at the end. The publisher-producer essentially stands between the creators and readers.

CGMI6, an independent publisher producing graphic novels, exemplifies a production process that is even more print-first than CGMT2 (see Figure 16). Its main priority is to publish print, with the digital version produced and published after print versions (if at all for some publications). Financial investment has been focused on print because of a commitment to the physicality or materiality of it, and because print is preferred by its readers. It has admittedly come late to digital publishing, demonstrated by a production process that is less linear or streamlined than that of CGMT2. Beyond editing, designing, and producing a print-ready file using Adobe's InDesign, it relies on third parties to print and distribute the print version as well as to create and distribute the digital version.

[13] Amazon's Panel View Magnification provides the following functionality: "To overcome [issues with high resolution images] and other accessibility concerns, Amazon encourages the use of customized content and our Kindle Panel View feature, which optimizes the content for a high-resolution reading experience". (see https://kdp.amazon.com/en_US/help/topic/G9GSTY4LTRT39D4Z#panel_view and for Kindle Comic Creator https://kdp.amazon.com/en_US/help/topic/G79CTKR8BX79E96L)

[14] Instead of producing documents for publication using bespoke software like Adobe with a PDF output format, documents are encoded in XML (a markup language) from the outset of the process to build in flexibility for publishing in a variety of formats, for example EPUB, HTML etc., and on multiple platforms (McGlone, 2013).

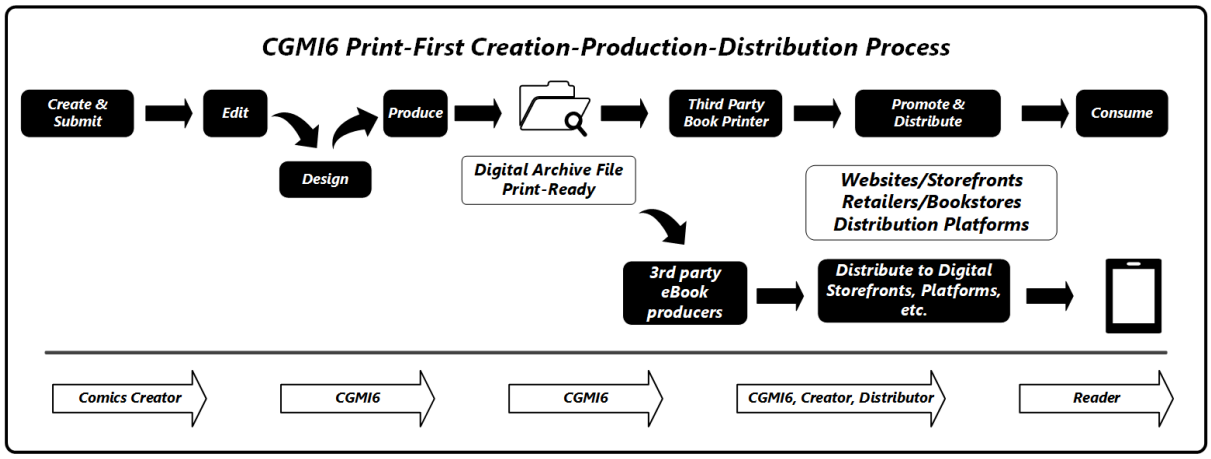


Figure 16: CGMI6 Comic Publishing Process (Print-first, simultaneous distributor) CGMI6 is a small press publisher producing graphic novels where the most transactive communication happens between creator and editor. The CGM promotes but a certain amount is expected from the creator. All printing, ebook production, and distribution take place through third-party providers. As with CGMT2, the added process for digital versions makes this less than a purely linear process. There is little direct, substantive communication with readers. See Appendix VIII for enlarged version.

While the process for CGMI6 is essentially similar to that of CGMT2 in that its production output is a digital print-ready file, printing and production of a digital version, as well as distribution, are handled by third parties. It publishes about the same number of graphic novel titles in a year as CGMT2 (3-5), but it only publishes graphic novels (as well as thematic maps), whereas CGMT2 is a multinational publisher with a catalogue of many other types of books attracting more revenue. Essentially, the two models represent the difference in scale of two CGMs publishing the same type of material, graphic novels.

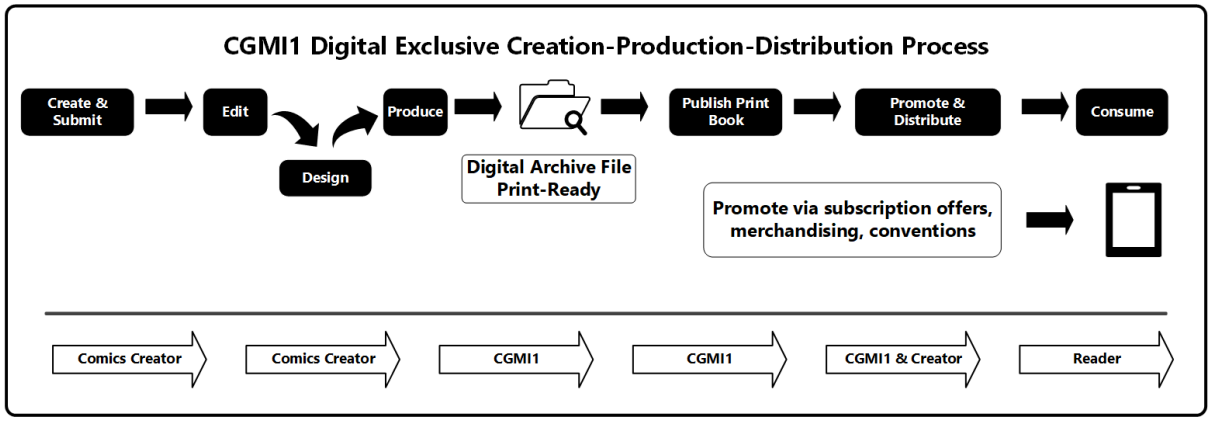


Figure 17: CGMI1 Comic Publishing Process (Digital Exclusive) CGMI1 publishes comic strips online exclusively on their dedicated site. They will do some editing and production, but the creator is expected to do most of it as well as a good deal of promotion. The CGM engages in some promotional offers. The CGM had little substantive interaction with readers, with conventions being the most direct. See Appendix VIII for enlarged version.

Different in scale and business priority from CGMT2 and CGMI6, CGMI1 (see Figure 17) provides an example of crossing CGM categories. For the initial purposes of analysis, it was placed with CGMIs because its royalty model resembled that of most of the CGMIs. It also acted in a design and editorial sense like a CGMI: a small team performing design and some production functions in conjunction with a third party. However, it also acts as a CGMI/S in that it retains none of the royalties; creators can distribute their comics elsewhere. Moreover, alone in the CGMI category, its business and production models were digital-exclusive (other CGMIs interviewed were print-first).

4.3.3 The Comics Legacy: Gaming, Media, Tech Companies Publishing Comics through Apps and Platforms

While CGMTs and CGMIs are mostly large and small press book publishers publishing graphic novels, the CGMM category includes gaming, multimedia, and tech companies that have either obtained the IP for UK legacy comics or for more recently published graphic novels. Traditional comics publishers (CGMCom), DC Thomson and Titan for example, crossover into this category as illustrative of traditional, mainly print comics publishing which has become part of multimedia companies. In a sense, this category of new players in comics publishing is a kind of bridge between the traditional book publishers (CGMT and CGMI) as well as the

traditional comics (CGMCom) work-for-hire model of creation and indie and self-publishing categories which broaden the scope of who creates and who publishes.

CGMM2, a multiplatform company which began life as a gaming company, produces comics in much the same way as CGMT2. It is a print-first company, having bought the intellectual property rights for ‘legacy comics’ (those published formerly by traditional comics publishers). It has also leased the rights to third parties for game development, while creating comics from games it has produced. It is a simultaneous distribution publisher and has recently decided to go digital-first with some of its titles as a result of the pandemic (according to its website), business decisions which may signal a change in future production processes. CGMM2 presents an interesting case in that it produces comics similar to the same processes and business models of such traditional comics publishers as DC Thomson, Marvel, and DC: creators are commissioned to write stories for established characters and are paid a flat fee, relinquishing rights. However, because it is (and was originally) a gaming company, it has licensing arrangements with other companies that created comics from some of their games. While there is a print-first orientation, CGMM2 does release print and digital versions simultaneously: these are offered on their storefront, the digital versions in PDF format. They also offer an app for their digital versions, where comics can be directly purchased. The app was built in-house using their expertise as a technology company: CGMM2 spoke at length of the hidden costs and version-changing of running an app. They observed that not many publishers could afford it, leaving it to the likes of ComiXology and then Amazon to provide their comics through apps. Their app was seen as “a way of empowering readers to read them in the way that works for them”. It has also recently started to produce digital-first publications; these increased during the pandemic.

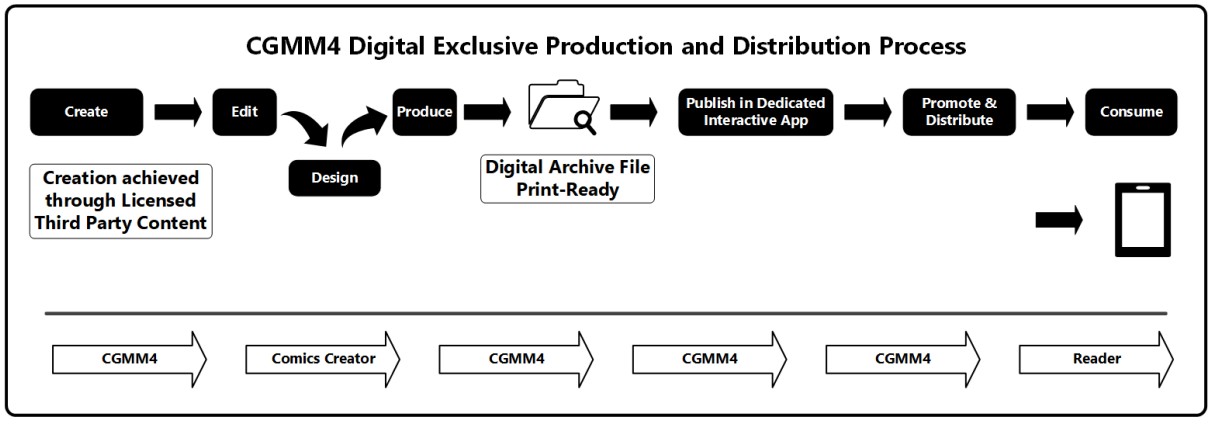


Figure 18: CGMM4 Comic Publishing Process (Digital Exclusive) Whereas the traditional large and small press CGMs publish the creative output of others, CGMM4 commissioned creators to produce digital versions of graphic novels whose licensing they purchased for their interactive app. The creators used CGMM4's dashboard to produce an interactive version. CGMM4 does all the promotion. There was little substantive interaction with readers. See Appendix VIII for enlarged version.

Similar to CGMM2, CGMM4 (see Figure 18), a technology company, commissioned content and bought the licenses for titles. But, as a technology company, it is digital-exclusive in its approach to producing comics, even developing a creator's dashboard that offers functions like image and narrative selection as well as branching functionality. The dashboard provides some editorial gatekeeping influence over the production of content before it is uploaded to the app:

> We've always had in the back of our mind that we needed to do a consumer application of [the graphic novels], the consumer version, rather than doing something which was sort of looking to replace Word or a final draft or something. That was really where the app came in, where we wanted to show what [CGMM4] could do. All of this [development] chronologically took place from 2015 onwards. We started properly building [CGMM4] as a platform in about 2017 and then launched the app.

Specifically in the development of the apps and the building of platforms, CGMM2 and CGMM4 illustrate a significant break from the more traditional, book-based CGMs, CGMT and CGMI. At a certain point, they were not just interested in production and distribution but in targeting the consumers-readers directly offering all-encompassing and enclosing apps and platforms.

4.3.4 Self-Publishing: Multiple Publishing Paths to Digital Comics

Representing self-publishing, the CGMI/S category differs significantly in publishing processes and business models from the CGMT, CGMI, and CGMM categories. In this way, the division between the traditional categories and self-publishing categories is similar to that identified in Friedman's Book Publisher Paths (2019, 2021, 2023-2024). The main difference between digital comics categories identified in this research and Friedman's paths is the bridge category, CGMM, consisting of companies that are not traditional book publishers but specialize in technology, gaming, and other media.

Within the CGMI/S subcategories, there are different approaches to supporting, distributing, and promoting. The common feature across the publishing processes of those interviewed in most of the subcategories was the role of the comics creator as self-publisher, taking on all creation, editing, production, and marketing activities of the traditional publisher. The main role for CGMs in these categories is not publishing but hosting and distribution, almost in the same way as booksellers and news agents act as an avenue for distribution in print publishing. The CGMW category, consisting of webcomics self-publishers, differs from other CGMs in the CGMI/S category as the CGM in this instance is the individual creator/ self-publisher (instead of being a service or platform through which a self-publisher distributes) publishing on their dedicated website and social media accounts as well as third-party platforms like WEBTOON.

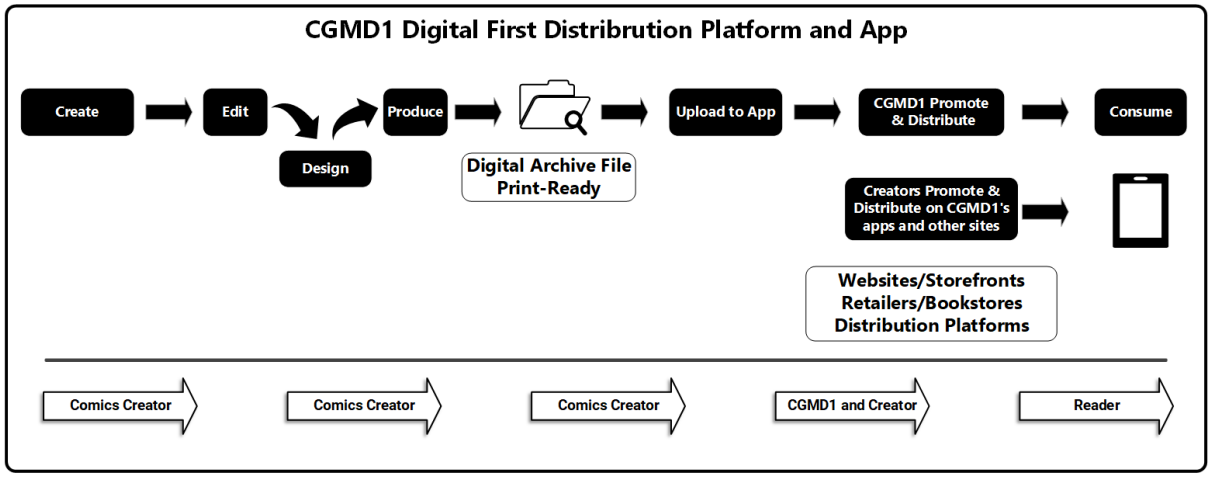


Figure 19: CGMD1 Comic Publishing Process (Digital First) CGMD1 provides a platform for digital comics and a marketplace for print comics. The creators are self-publishers who do all the production and uploading themselves. CGMD1 had recently provided the option of producing a print version to sell in their marketplace. CGMD1 does minimal promotion onsite, as creators are expected to assume this responsibility and can publish on other sites. CGMD1 had little substantive interaction with readers. See Appendix VIII for enlarged version.

For the other sub-categories, the relationship between the self-publisher and CGM is exemplified by the process presented in Figure 19. CGMD1 distributes comics created and produced by others through its app and website. Self-publishers must create their own profile record on the website and, to a certain extent, manage their own accounts as well as upload their comics to the site. While print versions are priced per book, the digital versions are not priced in that way: readers must pay a monthly subscription fee to use the app, and part of that is shared with the creators. CGMD1 is only one avenue of distribution, as all rights are retained by the creators/self-publishers.

4.3.5 The Circuit (?) Approach to Publishing Processes: Crowdfunding, Project Design, and Webcomics

In the above examples of publishing, the processes are linear, a straight line from creator to reader. Most of the CGMs interviewed, as well as some of the creators, had more interactive or feedback-based (usually of a “like” or “not like” kind) communication, than transactive or creative (see Chapter Two and Chapter Six for further discussion of types of communication), if they had any at all. According to the Darnton (1982) and Murray and Squires (2013) Communication Circuits (see Chapter Two), the publishing chain is expressed more as a circle than a line,

although it is a tenuous circle with the dotted line at the end between readers and authors (see Thompson, 2021, in Chapter Two for the problems with trying to make the process circular in this way).

But there are examples of creator-CGM-readers processes that do approximate the circuit, including readers in a more explicit way. They are, as expected, found mostly among the CGMs in the CGMI/S subcategories and, for the most part, the creator (as illustrated in CGMD1's process diagram, see Figure 19) is the dominant actor in the process. This research posits a different way of looking at more platform-based, participatory creation-production-distribution processes that self and independent publishing has introduced. Distinct from the process models above, each directly involves the reader in a different, more active way, some with the creators determining the communication, but one in particular, crowdfunding, where readers dictate if not creation then publication.

Crowdfunding

The self-publishing models described above mostly follow the production-distribution process where the creator would publish directly on a dedicated website, and to social media or other platforms, such as CGMD1. There was at least one creator/self-publisher who not only published to a platform but gained the funds to publish the PDF and print version through crowdfunding on Kickstarter. Although staff from crowdfunding platforms were not available for interview in this research, there were creator participants who had published in this way. For example, CCD1, who responded to CGMD1's call for participation in this research, started the production and publishing process with an All or Nothing (AON), rewards-based campaign on Kickstarter (as opposed to Keep It All platforms which gives the creator what has been collected even if it falls short of the goal). According to Dowthwaite (2017), there are a few different types of crowdfunding campaigns, which depend on the level of expectation of remuneration from the "backer", in this case a webcomic reader, involved:

"The most common way to distinguish crowdfunding platforms is based on the type of return that the backer receives (De Buysere et al., 2012). There are commonly four main types: equity-, lending-, donation-, and reward- (including pre-sales) based models. A fifth model, subscription-based crowdfunding, is also emerging, particularly in the creative industries. There are also hybrid models, in which platforms offer a combination of certain types of return and other funding methods" (p.59).

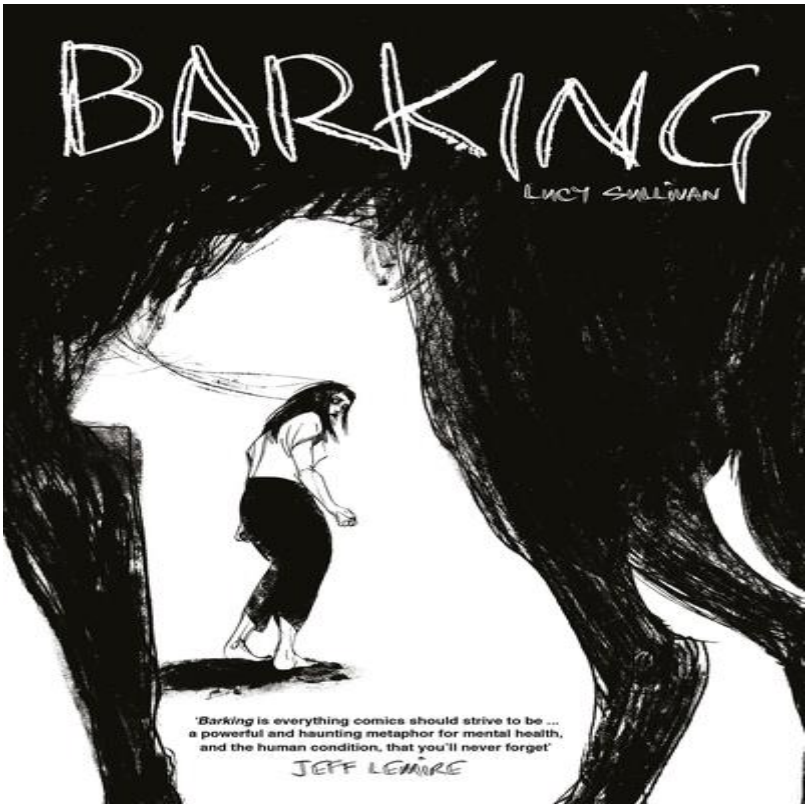


Figure 20: Cover for *Barking* by Lucy Sullivan, a graphic novel originally self-published by the author (2018), then crowdfunded and published by UK publisher Unbound (2020). Republished in 2024 by Avery Hill. Digital version published as part of crowdfunded publication is no longer available, Avery Hill version available on Amazon Kindle.

Regardless of the type of crowdfunding model or platform, the difference in this business model is that it dictates that the creator negotiates directly with the potential readers (as opposed to those publishing processes identified above where the creator negotiates with the publisher or platform), devising a campaign that will be likely to attract them (see Figure 20 as an example; note the publishing trajectory, from self-published to publisher crowdfunding to traditional small press). It is useful

to revisit Thompson's (2021) diagram of crowdfunding (Figure 21) and how it disrupts the linearity of the publishing processes diagrammed above:

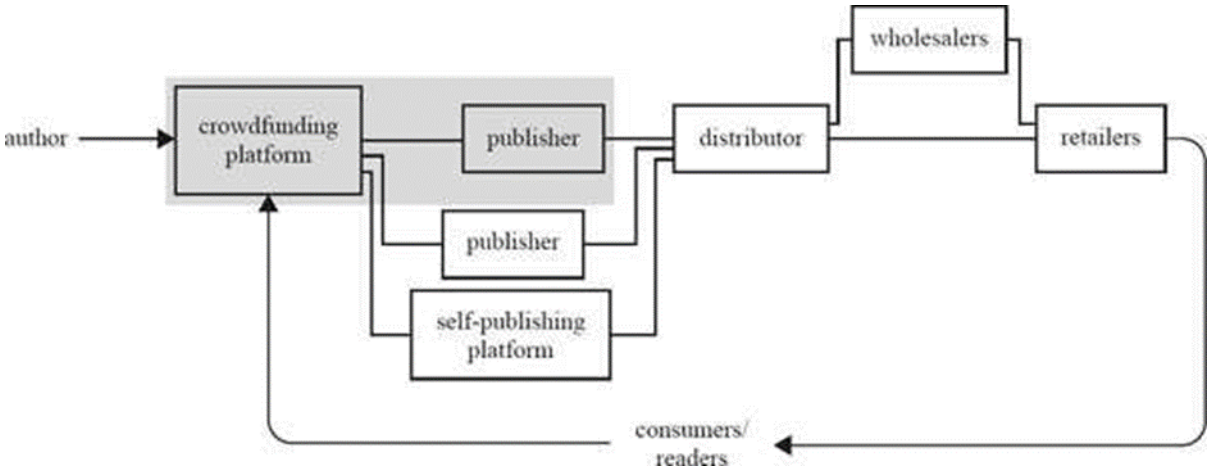


Figure 21: "Book Supply Chain for Crowdfunded Publishing" (Thompson, 2021, p.459, Figure 12.7) (repeated from Figure 8)

According to CCD1, a comics creator and blogger, the Kickstarter campaign for their graphic novel was the first time they earned money for a comic: "when I say I've made money, I mean it was the first time it took me over what it cost me to produce it". Even so, it took a while for CCD1 to decide to use Kickstarter. When they finally decided on a campaign, it was after they had completed the comic:

> When do I do a Kickstarter for this comic, and [what if] nobody's interested and nobody pledges or aren't all in?... what I did, though, was I waited until I'd finished every strip, and all of the artwork was done. And then I started the Kickstarter because it was important to me that it wasn't one of those Kickstarters where people send lots of money, and then they are waiting for a year [to get the comic]. That seemed acceptable to me.

CCD1 shows here not just a commitment as a creator but also as a publisher and distributor intent on fulfilling their contract with the readers. In this way, they highlight the direct impact that not only reader finance has on the creative process but also reader expectation.

Webcomic co-creation

The CGMI/S publishing model, with the production and distribution roles allocated respectively to creator/self-publisher and CGM (platform, collective, etc.), also introduces opportunities for readers to participate in creation, introducing a

circuit-based process model as opposed to the largely linear process models of CGMTs, CGMIs, and CGMMs. For example, CGMM2 engaged the reader through an interactive branching narrative that predominantly follows a linear story. However, it is important to distinguish between the interactivity used in CGMO3's comics and that used in CGMM2's comics. CGMM2 offers interactivity in the reading experience: the reader is presented with a series of choices, or branches, to follow in the narrative, these choices having been programmed into the production process of the comic. For CGMO3, readers are encouraged to interact and, to a limited extent, participate in the creation of the comic, in essence, stepping into the creation and production processes. This is accomplished by asking the reader to procure and throw a die and report the results on social media or CGMO3's blog, thus determining the direction of the narrative for the following week's instalment (see Figure 22).

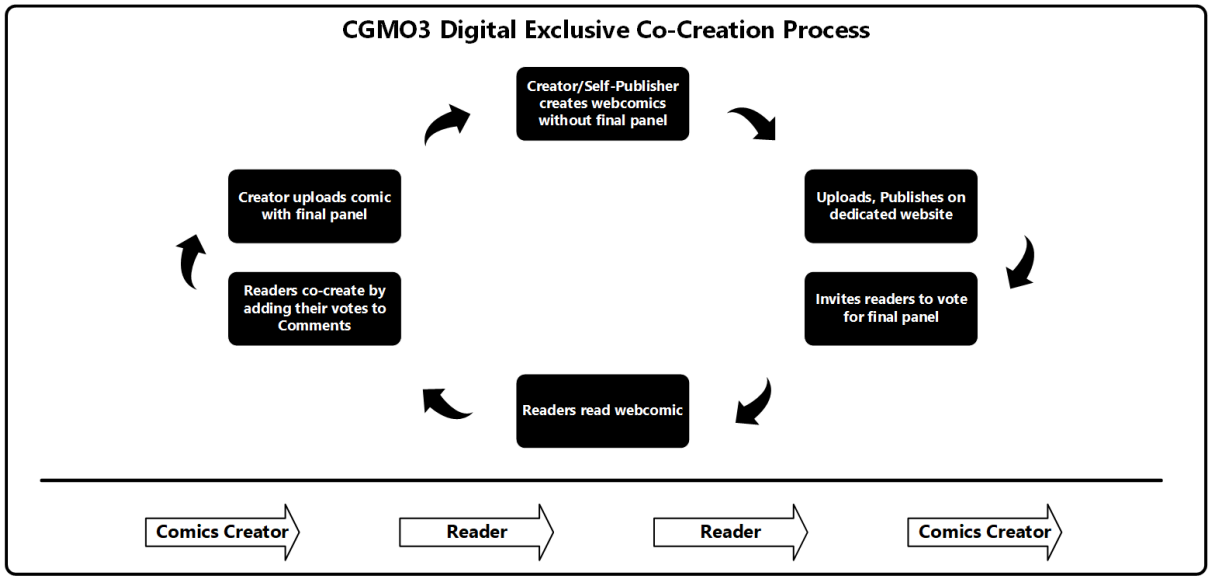


Figure 22: CGMO3 Interactive (Transactive?) Comic Publishing Process (Digital Exclusive) CGMO3 invited readers to co-create by deciding the final panel of a specific webcomic. This process describes a circuit of continuous, repeated activity. Although it involves co-creation, the creator is still in control of the process by only allowing certain options for the final panel. See Appendix VIII for enlarged version.

In this sense, of all the CGM publishing processes, CGMO3's was more cyclical (for some of the comics created but not all) in that the reading or consuming does not mark the end of the process but is one stage in the continuous creation and publication of the comic, in this case a webcomic published weekly.

Comics projects, applied comics, and participatory design

Participatory design, the involvement of stakeholders in the creation and development of the design of websites and services, is not necessarily a new approach to comics in applied settings. For example, a well-known method, comicboarding, uses comics in education as a method in brainstorming sessions to promote creativity. Children are led through a series of panels and then left to fill in blank ones themselves (Moraveji et al., 2007; participant-created comics in research is understudied, see McNicol, 2019). In a sense, it resembles the level of interaction encouraged by CGMO3 with the webcomic above in that the children are completing the comic. Moreover, the children appear freer to fill in the final panels in whatever way they see fit. However, the children are being led through the process in much the same way the webcomics readers are, with CGMO3 and the researchers respectively controlling that process. This control by the creator or designer is a characteristic of participatory design: the steps for participation are controlled by the creator and designer, and this control, these steps ultimately shape the participation and the result (see Frauenberger et al., 2015, on the influence of researchers in participatory design research).

For example, CGMO1, a grant-based indie publisher managing comics projects for cultural institutions, leads all aspects of print and digital comics creation, production, and distribution with input from the funding institution as well as third parties providing technical and design services. The cultural institutions retain all rights to the comic created upon the completion of the project (see Figure 23). In this sense, CGMO1 reflects those in other categories, specifically CGMM2 and CGMM4 where commissioning also underlines who is in control of the creative process and the rights: for the project described in this research, it was the cultural institution that commissioned CGMO1 to oversee the whole process. However, in the implementation of this process, CGMO1 resembles a small press or independent publisher where a small team, with the assistance of third-party tech and design, produces a digital comic. It also differentiates itself from the CGMI/S and more traditional categories in that its business model is not driven by print or digital production (the particular project discussed in interview was digital exclusive). The outcome of the project publishing process is dictated by the funding institution, but more importantly it is also up to the audience the project is trying to reach:

> I wouldn't use any of those terms [digital-first, print-first etc]. I think it depends on the project and what the discussions are with the project team. I don't run as a traditional publisher. I think that that discussion around distribution and what the comic is going to be and how that's going to meet the needs of the audience and the researcher and how it's going to be distributed, they are conversations that we have right from the start of project planning (CGMO1).

While CGMO1 operated under a project-based work-for-hire contract with cultural institutions and universities, it departed from the more linear process models described above in its participatory design approach with readers. The interaction between CGMO1, the creator/project team, and the cultural institution is indeed participative and transactional as CGMO1 assists the funder in realizing its vision. But in Figure 23 below, the process, when including readers, is further realized as a participatory circuit. Even though the participants are dealing with essentially a finished product in the beta version, their feedback can have a tangible impact on what the actual finished, published product will look like.

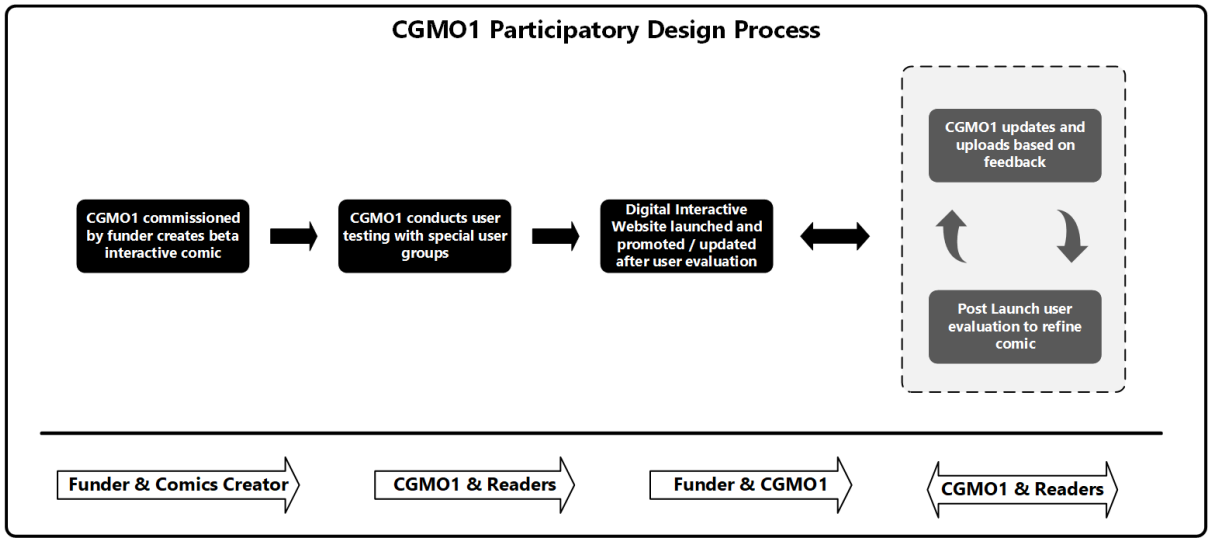


Figure 23: CGMO1 Comics Publishing Project: Participatory Design within the Publishing Process (Digital Exclusive) CGMO1 is a collaborative comics project management organization, creating applied comics for cultural, academic, and other institutions. The collaboration is demonstrated in this process model, beginning with the project funder and involving the readers through participatory design in a repeat circuit at the end. See Appendix VIII for enlarged version.

In Chapter Six, CGMO1's process will be discussed in terms of the level of communication with the participants or readers of the comic. Here, the details of the

design process are considered as a workflow within the overall publishing process of the comic.

CGMO1 talked through one specific comic or comic-based project, an example of an applied comic—a comic that instructs or provides information. Generally, it was commissioned by a cultural institution, on a fixed-term contract, applying project management principles and HCI-type design and evaluation methods. The comic was designed initially by the project team with specific audiences in mind (for example, young archaeologists), from a specification provided by the funder (who can also be classed as a reader or audience of a sort). The funder requested specifically that the content be in comic form and digital, based on known audience preferences.

Based on this specification, CGMO1 built in feedback mechanisms: designed a comics beta site not just for testing and evaluation with readers, but also to encourage participatory design. In the process diagram above, the intended audience is invited into the design process at least two times, pre- and post-launch; there is a third feedback loop at the beginning of the process, if the funders are considered part of the audience. According to CGMO3, every effort was made to relinquish control as the designer, during the participatory phase as well as the evaluation phase:

> For a lot of the projects, that's been all of the projects really in some form, there has been some planned evaluation or follow-up with targeted groups of readers. But never trying to stand over everyone’s shoulder and see what they make of it. [For this comics project] I did talk about that with the young archaeologists group. And there are other projects, for example, there's a fascinating project that was more about young people making comics. They were involved as creators right the way through. There are projects that are very much a co-produced model right the way through, and there are others where it's more of a collaboration within the creative team, followed by evaluation with the audience.

CGMO1 comes closest to a cyclical workflow in the replicating activities and the lack of a finite ending to the process (post-launch evaluation as a cycle). Both of the publishing processes of CGMO1 and CGMO3 were affected by readers: while

CGMO3 reflects the reader involvement with experimental comics including webcomics, CGMO1 highlights the way the digital comics publishing process has been adapted to new contexts and readers.

4.3.6 Section Conclusion

In some ways, the publishing process, usually starting with the creator handing over the comics to the editor, then to the production team, and then onto distribution, continues to follow the linear path. For book publishing, the most intense level of transactive communication is between the editor and creator at the beginning until the content conforms to a version that is deemed publishable. The findings in this chapter reflect the different types of processes for production including the linear chains and circuits reviewed in Chapter Two. While all creation to production processes were digital, in that the transfer from creation to production in traditional publishing and self-publishing took the form of a digital file, the creative workflows themselves offered a mixed approach, analogue and digital. And the distribution outputs for the most part were also mixed—digital and print—regardless of the type of comic. For self-publishers who had taken on the production roles normally allotted to publishers, platforms that assisted with these services as well as distribution figured prominently in their publishing process. Indeed, traditional book and comic publishers also looked to third-party platforms for the distribution of digital and print publications.

The digital platform CGMs are the key conduit between creators and readers, instead of the publisher and bookseller. Another theme from the findings was the way traditional book and comics publishers in the research explored different avenues adapting to the creators' and their own new roles. For example, some ventured into platform development, becoming more involved in distribution through apps and storefronts, while others gave more control to creators, in terms of royalties and promotion, for instance. Moreover, the comics content ecosystem has been influenced by more diverse players from media, tech, and gaming companies.

In this section, the multiple types of processes for production have been reviewed, as well as the opportunities for readers to be involved especially in self-publishing models. In the next section, readers speak about their part in the publishing process, specifically through consumption activities.

4.4 Consuming Digital Comics: A New Understanding of Comics Consumers and Consumption Practices

4.4.1 Introduction

Regardless of the type of process, the main objective for creators and publishers is to get their comics to the readers. This is usually viewed as the distributors' role. Whether the comics are for sale or freely available, all need points of distribution: online and offline bookstores; newsagents and news online; digital storefronts, multi-functional platforms (self-publishing, distribution, discussion) and apps, and social media. Distribution is the 'making available to the public' part of the publishing process, a form of communication, whether through promotion, or simply through the act of providing a platform through which the consumer-reader meets with the comic. Because it is part of this research to view distribution as a kind of communication, it is treated in more depth in Chapter Six where the multiple channels of communication that happen around the making process are discussed.

From the research findings, consuming and reading came across as two distinct behaviours aligned with different categories of findings. Consumption as a practical behaviour fitted with the other practical activities of production of culture, namely the stages of the making process in this chapter. Reading, as a means of communication with the content and others about the content, was more aligned with the other methods of communication that run through the processes upon which production of culture is built, and so fit in with Chapter Six where these are considered in more detail.

In this section, that interaction, the consumer behaviour—the steps leading to purchase (or acquisition by other means in the case of webcomics) and those after—as described by research participants provides a more nuanced understanding of what consumption is for comics consumers-readers.

Reading and consuming/consuming and reading

Two types of activity often conflated in the literature that have traditionally 'completed' the making circuit or chain have been identified in this research. Consumer behaviour is aligned with practical behaviour that leads to the acquisition or purchasing of a comic (not necessarily in the sense of ownership but not

excluding it, and not necessarily in the commercial sense, see section on webcomics) and incorporating it post-purchase and pre-reading into everyday life, together with future acquisition. The qualitative data here points away from the traditional scholarly view (in book history and publishing industry scholarship, for instance) that equates consumption solely with the act of purchase or does not view it as distinct from reading (for more on consumption, the more expanded view in the digital ecosystem, and its conceptual relationship with reading, see Chapter 2.5.3).

Reading, the second type of activity at the end of a making chain, encompasses the act of reading as well as the responses and immersion invoked during and after that act (see Chapter 2.5.3 on reading, specifically reading-response, and consuming behaviours). Of course, there is overlap between the consumption and reading behaviour, as explored below, for a frequent activity before acquisition is trialling and sampling or reading to discover potential interest (free samples, free issues, etc.). In this sense, consumption and reading can be viewed as on a continuum where the consumer turns into reader the deeper the engagement with the content (while still exhibiting consumer behaviour, such as reading completion, see Chapter 2.5.3). In this chapter and throughout where relevant, I will use the term ‘consumer-reader’ as a way of foregrounding this distinction (see Chapter 1.2.1).

For this chapter on processes of digital comics creation, production, publishing, and consuming, findings revealed two aspects of consumption: firstly, the active or passive role consumers-readers take in the steps leading up to the acquisition or purchase part of consumption (are they intentional or incidental participants?), and secondly, if or how their reading of digital comics is incorporated into their daily routine or life and forming the basis for future consumption. For both aspects, findings were focused on the degree of decision-making or agency in consumption activities leading up to acquisition or purchase as well as the manner of consumption, in other words, how and where they encounter comics. Specifically, the findings are concerned with behaviours around consumption, even for the most incidental consumers

The reader’s apparent passivity (according to various depictions of processes and chains, see this Chapter, Chapter Two, and Chapter Six on communication, as

well as in the makers' descriptions of readers) in the creation-publishing process is challenged by these findings which suggest a more nuanced, multi-faceted role for the consumer-reader.

4.4.2 Consuming Is Intentional: Decision-Making and the Intentional Comics Consumer

The use of the word 'consumption', as the last activity in the digital comics publishing continuum, is interesting for all that that word implies. The definition is simple, straightforward: the finding and use of a resource, whether it is for sale or freely available. But what might appear to be a straightforward transaction can be composed of multiple parts or micro-actions (or "micropractices" according to Bramlett, 2015, see below). Some occur before purchase or acquisition as identified by the participants in selecting webcomics or app-based comics: for example, trialling which includes paging or scrolling through samples (a skimming kind of reading) (see Chapter 2.5.3).

The findings in this research begin in that period before and after purchasing: readers spoke of how they came to 'discover' or 'find' comics; how and where they encountered them, whether they were intentionally searching or came upon them incidentally; and how these comics fit into their lives in a way that invited reading completion and possible future consumption (see Lee et al. 2021 in Chapter 2.5.3). For some, searching was a purposeful activity, akin to shopping for specific items, and for others, it came about when they were looking for something else or looking for nothing at all. This section will treat purposeful or intentional consumers-readers, while the next section considers more incidental consumers-readers.

The pre-purchase part of the consumption process for intentional consumers-readers is imbued with agency or intentionality. In consumer models, decision-making and what it says about a consumer is just as important to the process, perhaps what drives it, as the uses made after the purchase. This activity is also known as 'consumer buying behaviour' or 'decision-making styles' (much has been published on these consumer activities, see, for example, Mothersbaugh, et al., 2024; Burns, 2011; Sproles and Kendall, 1986).

The reader participants in this research spanned the range of decision-making styles associated with finding and reading digital comics. For example, DCR2 and

DCR4 (see below) exhibited what is termed both “nominal” and “extended” decision-making. Nominal decision-making, at one end of the consumer scale, is also known as ‘habitual’ decision-making in that there is little purchase involvement (little effort in the act of purchase) and little decision-making. An example of nominal decision-making in purchasing digital comics would be subscription services provided by apps and platforms. Extended decision-making is at the other end, consisting of “an extensive internal and external information search followed by a complex evaluation of multiple alternatives” (Motherbaugh et al., 2024). An example would be abandoning a series subscription to find something entirely new to read (“alternative evaluation”). Limited decision-making, while not as involved as extended decision-making, includes some form of discerning that requires more effort than nominal decision-making, for example, still reading through the series, but not all the issues.

DCR2, a digital comics blogger, spoke first of a childhood involved in the active search for comics, initially at the corner newsstand, which sold mostly mainstream British comics, and then a comic book shop. These early days of print comics reading established comics preferences that have extended into their digital comics reading, and even the kind of publishers that solicit them to review comics:

> There used to be a comic shop near me when I was younger, and me and my brother used to go there a lot. Eventually it closed down. Then it just got very difficult [to find comics]. I would pick up comic books at bookshops and things like that. And then I sort of discovered, around that time, that the iPhone was getting popular, iPhone3 or 4, where you were getting these apps where you could buy and read a lot.

DCR2 regularly and intentionally sought out comic books to buy by visiting the local comic book shop. The comic book shop was convenient and so made selection and buying (decision-making) easy. Browsing in the shop would involve extended decision-making, reading through trialling or sampling various comics to decide on a purchase, for example. But nominal decision-making would also be involved: issues of favourite comics would be available on certain days of the week, so their purchase would not require much decision-making. The closing of the shop did not stop the search, the purposeful seeking out of comics to buy. It was not until they discovered

the ease of access and selection with apps on iPhone that they were able to replicate that experience of the comic book shop of their youth.

DCR2 goes on to talk about the digital subscription process and how this ensured that they were continually receiving the comics of their choice. DCR1 spoke of a similar childhood of frequenting the local news agent to purchase comics:

> I just carried on getting the *Eagle* regularly and all of these comics weekly, sometimes going to the news agent down the road on my own with my 15p to get a constant supply of comics and had piles of them in the room.

These trips to the bookstore and newsstand exemplify a mixture of decision-making styles. For example, both DCR1 and DCR2 are making nominal decisions: they visit the stores to automatically purchase the next comics in the series they are reading. However, this is not the only activity in which they engage when they are there. They exhibit extended decision-making in that they stay to browse among other new comics, reading through them (trialling or sampling them), deciding on purchasing them. This combination of decision-making persisted each time they engaged in the consumption of digital comics, largely through comics apps, webcomics sites, and PDF downloads of graphic novels.

This same kind of combination can be found in webcomics consumption. Although there is no purchase activity as such in the sense of commercial exchange or physical transfer, there is the same process of selection, trialling or sampling, and the sequential consumption of a weekly series. In the next section, DCR4 illustrates this form of decision-making in a description of their morning webcomic reading routine.

Consuming but not purchasing: freely available webcomics

The intentional consumers-readers, DCRs1-4, began their day with comics but combined that with incidental reading throughout the day, on social media, discussion forums or by sharing with other readers. This consumption and reading routine was also true for DCR3 and DCR4, two of the intentional webcomics consumers-readers.

DCR4 combined intentional consumption behaviour with their reading routine, for example trialling or sampling (decision-making as if they were in a comic book

store) new webcomics including them into their regular reading in the morning to see if they fit in with other reading (see DCR4's 'menu' of comics reading below). For example, DCR4 began their day by checking in on webcomics creators' pages they had bookmarked. Not only were they bookmarked, but bookmarked in a sequence which dictated in what order they were read. DCR4 has never varied from this reading sequence, with some titles forming part of their reading since they were a teenager. Each page is bookmarked, and they made a point of telling me that these bookmarks have been on their laptop and in their browser in this order for ten years.

There are several things of interest here, beginning with the reason for this particular sequence. They begin their morning reading with *xkcd*, a one-panel comic, on purpose: DCR4 describes their reading sequence like a meal consisting of a starter, main, and dessert. *xkcd* is a short bite to begin the meal, non-narrative, one panel, the perfect starter. *Gunnerkrigg Court* is the main meal: it is a webcomic that has been running for 14 years, and they have been reading it from its inception, so it is a comic with which they feel a relationship. *Questionable Content* and the *Kill 6 Billion Demons* are like dessert for them: they take a little less time to read, and as they are relatively new to DCR4, the relationship with them is still forming; in other words, they are still 'deciding' (see Figure 24 below for reading sequence). While the "starter" and "main meal" represent nominal decision-making (much like DCR1 and DCR2 going to the shops to get the next issue), dessert can be seen as either extended or limited decision-making where DCR4 is sampling comics to fit into the starter or main categories. These comics are consumed as part of an extended morning routine that may include yoga and scrolling through social media feeds (where they are likely to encounter, incidentally, new comics). DCR4 draws around themselves a personalized digital comics content ecosystem, entirely user-generated.

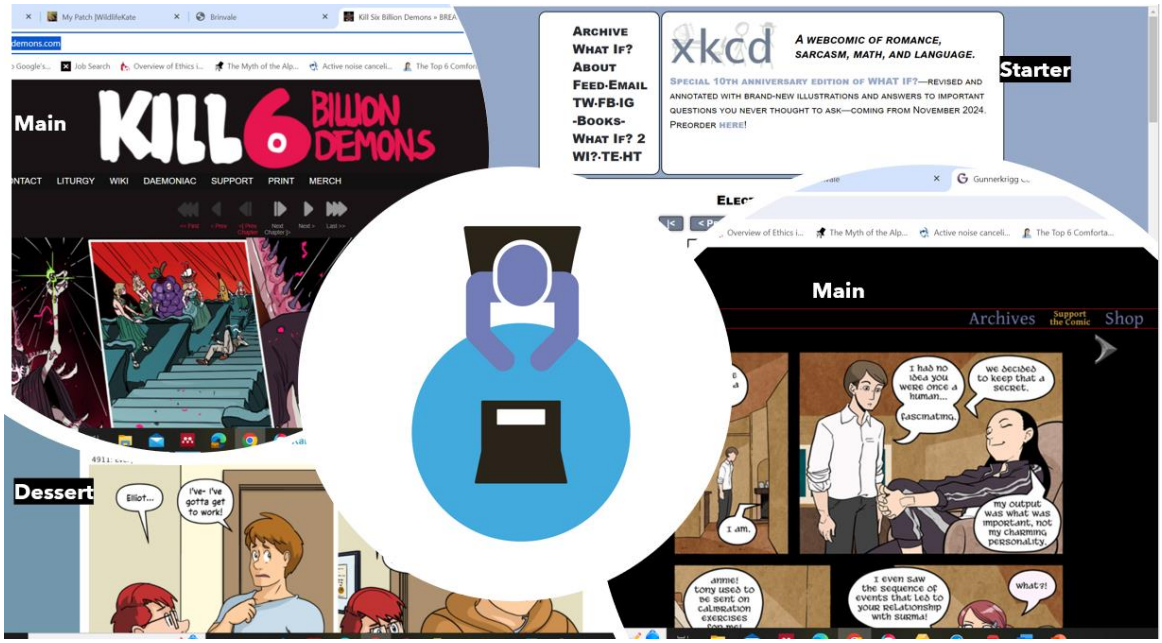


Figure 24: DCR4's Morning Reading Process (Personalized Content Ecosystem)

And DCR4 did speak in terms of relationships when talking about these comics, primarily with the characters but also with the comics themselves. Almost 30 years of age at the time of interview, they started reading *Gunnerkrigg* as a teenager. They have essentially grown up with the comic:

> I feel a strong sense of connection with these characters now. I don't know how it's going to end. I know that it's kind of roughly coming towards an end, but there's a lot at stake. I'm really curious to see what happens next.

The creator has indicated in a blog post that the story is eventually winding to a close, and DCR4 was concerned about this:

> I would be really sad if they finished… I will have to find something else to read. I don't know what I'll do. And I read them on a very regular basis, and they form an important part of the routine of my week. I may not spend a huge amount of time in the community of other people talking about them, but the characters and the stories have a lot of meaning to me. I care about what happens to the characters and the relationships they have. But you don't need to be vocal [in online discussion to care about them].

It is indicative of the demands of the "like economy" (see Chapter Two) that DCR4 assumes that participation is a form of demonstration of caring about stories and characters and feels the need to assert this care despite their lack of involvement.

This reading involvement, identification, and response will be examined more closely in Chapter Six. On the subject of reading digital comics and daily routines, DCR4 speaks of this loss as, among other things, creating a gap in the morning reading routine, a gap that will have to be filled with another comic (more consumer decision-making over future reading). This concern is characteristic of the level of integration this consuming-reading has in their “nexus of practice”.

4.4.3 Incidental Comics Consumers-Readers: Overlapping Patterns of Information Encountering, Consuming, and Reading

It is generally accepted or understood that self-published digital comics have introduced comics to wider readership (for example, see Kleefeld, 2020, “Audience Participation”, pp66+, but there are those that contest this view, see Squires, 2019; Woo, 2020), not only through more inclusive story lines and characters, but in a sense more directly through a wider distribution which allows readers who do not deliberately seek out comics to come across them incidentally. Accordingly, it would seem that where there is no intentionality of consuming and reading comics, as with DCR1 and DCR2 above, there cannot be much in the way of consumer decision-making. Stopping mid-scroll for lack of interest can only be considered the most nominal of nominal decision-making, but it is a quantifiable consumer behaviour in the digital ecosystem that can measure consumption after purchase (see Chapter 2.5.3).

According to this research, it could be argued that comics are increasingly being discovered during readers’ everyday reading routine. About a third of the reading sample ‘woke up’ with comics (DCR5, DCR7, DCR10) not because they intentionally accessed them (although others in the reading sample did, for example DCR1, DCR2, DCR3, DCR4, DCR8, DCR9), but because they came across them when checking WhatsApp messages first thing in the morning, scrolling through social media in the morning and at night, or consulting the daily newspapers online. This “information encountering” behaviour or “accidental acquisition of information”, a kind of “serendipity” overlaps with consuming (decision-making about what to read, what to click) and reading behaviours, without a ‘purchase’ as such happening (Erdelez and Makri, 2020 who discuss the overlapping models of information search,

seeking, and encountering; for other studies on casual information behaviour or incidental reading online, see Elsweiler et al., 2011 and Kohnen and Saul, 2018).

When thinking about consuming behaviour, it is important to consider not only single instances of consumer behaviour but also cumulative instances, for example, throughout a day. Daily living is made up of a “nexus of practice”, activities that build upon each other to create culture. Something as simple as buying coffee can consist of a series of “micropractices” that connect to similar or different activities practiced by others (Bramlett, 2015). According to Bramlett (2015), “the quotidian consists both of routine practices, which include actions and behaviours, and ingrained assumptions” (p 248). For digital comics, opening a news or social media app connects to the interwoven activities of information-encountering, consuming, and reading behaviours.

Although Bramlett refers to the quotidian as it appears in comics about everyday life, the same principle applies to the acts of consuming or purchasing comics, as well as reading them and how this integrates with everyday life. While this research considers reading for leisure, not reading for information, learning, or work, some of the readers discovered digital comics while reading the day’s news online, taking in information, and combining it with a type of leisure reading, typical of newspaper reading.

Essentially, digital comics reading, especially encountered incidentally (or “accidentally” or “passively” as Erdelez and Makri, 2020 describe it), is absorbed into broad, overlapping patterns of consumer, information-encountering, and reading behaviours (see, for example, Gong et al., 2024). In this research, these patterns illustrated in the incidental comics reader’s ‘nexus of practice’ are explored in this section.

For example, DCR5 did not consider themselves a comics reader initially. But when we started to go through their reading routine in the morning (see Chapter Three for Interactive Think Aloud activity), it revealed an interest in comics:

> Whenever I wake up, I tend to just sit and scroll through the same news sites each morning, so I check the BBC. They don't do comics, but then I check the Guardian. If they have comics, and particularly on the weekend when I'm going through the regular news update, if there's any of those comics on that, I'll open those and then go through all of my tabs. So, it's kind of alongside [those information-seeking and encountering activities].

DCR10 had a similar routine:

> First of all, I check the news headlines because I'll get the Guardian by the time I wake up. Then I'll have the UK headlines and the Australian headlines emails. So I'll have a flick through those. I have a flick through Apple news, see what's gone on, just as a cursory glance.

DCR5 and DCR10 exhibit a type of nominal decision-making, in the sense that they are not active in their search for comics but only read what is before them in the course of other reading. There is no search for other types of comics. In other words, the reading of digital comics is incidental. However, there is some limited form of decision-making that resembles consumption behaviour: pausing in scrolling to decide whether or not to read the comic, to click if necessary.

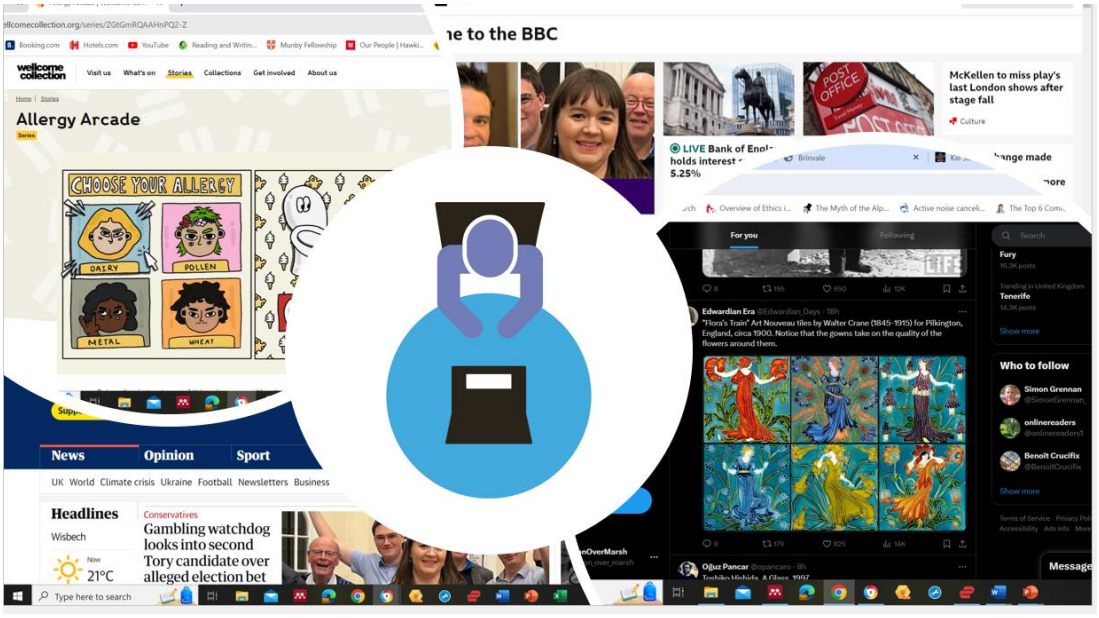


Figure 25: DCR5's Morning Reading Process (Personalized Content Ecosystem)

As illustrated above, DCR5 had a morning wake-up reading routine that included comics in a largely incidental way. In other words, they run across comics

while reading daily news sites like the BBC or the Guardian Online (see Figure 25 above). Once they had seen a comic (a quick read is an inducement to stop and read), they read it, and if they liked it, went looking for more issues or instalments (information-encountering leading to consuming and reading). This may lead them to the creator's website or the creator's social media feed. What has started as incidental reading involving nominal decision-making becomes intentional and purposeful, involving a type of extended decision-making where their enjoyment is an inducement to search for more. DCR5 began the interview (even preceded the interview) by indicating they were a casual reader. But after discussing their reading routine and the comics they liked, they categorized their reading as falling between casual and regular practice (see Chapter Three for explanation of these types of reading practice).

Consuming and reading while not consuming and reading: intentional readers and distraction

Over half of the reader participants began their day with online reading that included intentionally or incidentally digital comics, and more specifically webcomics. And, for at least two readers, webcomics were encountered as part of a distraction from their work or studies. In other words, they were not purposefully seeking them out (intentional) or purposefully seeking out information and only encountered webcomics during that activity (incidental, accidental, etc.). Rather, they were not seeking out anything specific: "simply [drifting] off into cyberspace with no particular goal in mind (Rodgers et al., 2017, see also Rodgers and Sheldon, 2002). This behaviour is typically referred to as "surfing", "Internet idling", or more recently, "killing boredom internet use" (Doty et al., 2020, p.105, referencing Tzavela, Karakitsou, Halapi, & Tsitsika, 2017). Distraction reading is considered one of the distinguishing factors between traditional and digital reading (Mangen and van der Weel, 2016; Liu, 2022). The digital comics readers in this research both avoided and pursued webcomics as a distraction from their professional and academic work.

DCR8 illustrates distraction and the dangers of distraction, talking about what happens when they "allow" (can distraction be a matter of choice or involve decision?) themselves to be distracted:

> I don't really go into comics at this point [in the morning], because I'm usually on my phone. I look at the news, I go to Instagram. I check if anyone's messaged me overnight, you know, just general morning nonsense. Then when I get to work on the computer [PC], at this point it's about 11 o'clock, and I say to myself, it's too late to work. It's too late at this point. It's too close to lunch. This is an excuse to not do any work. So I go on and start reading on Comic Fury [webcomic publishing platform].

DCR8 had distracted themselves with news and social media messaging to the point that they then had an excuse to distract themselves even further by reading comics online until they must work, presumably sometime during the afternoon. In this way, they combine distraction reading with intentional reading, where their reading of comics is both intentional but in a way that they are still being distracted from work.

DCR9 provides another example of this combination of intentional and distraction reading, but in a different way:

> So for a typical day I try not to get into social media in the morning, because it kind of sucks me in. During the day I work, so usually comic stuff happens in the evening. Or what I do is when I'm idle or when I want a diversion or something like that, I open my social media feeds [where they usually read and encounter webcomics].

DCR9 uses intentional reading as a distraction, but a purposeful distraction, almost as a reward during the workday. They were a dedicated user of Mastodon where they intentionally (through following specific feeds) and incidentally (through encountering comics) read comics at intervals during the day and in the evening (see Figure 26).

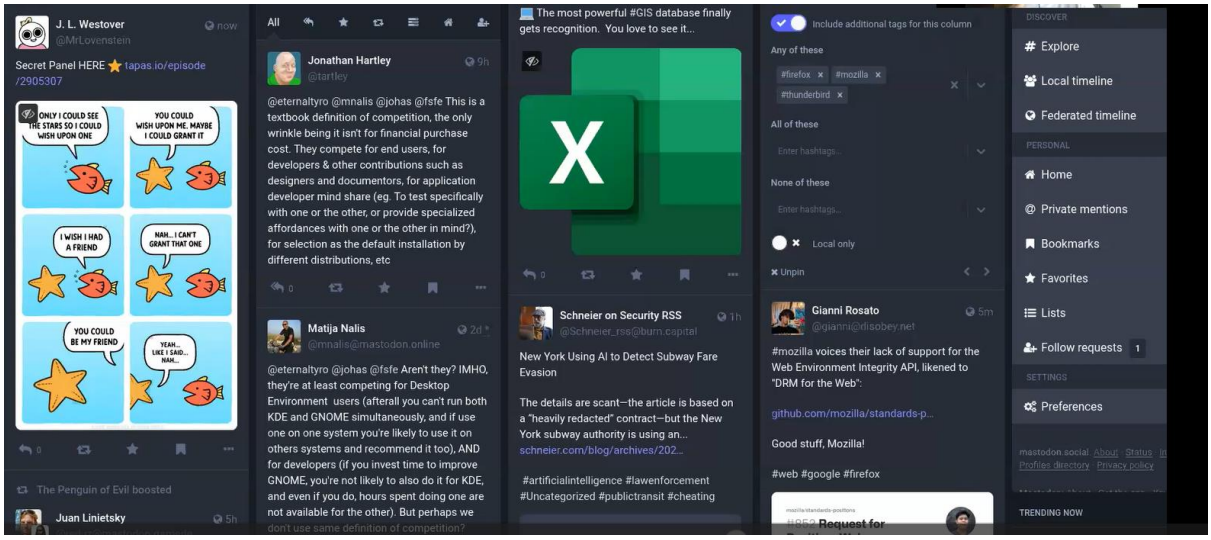


Figure 26: DCR9's Multiple Feeds in Mastodon including Webcomics (Personalized Social Media Content Ecosystem)

The web has made consumption, and certainly consumption of digital comics, easier and a more frequent activity. It can be argued that the purported increase in readership can be attributed more to the digital environment that promotes seamless, frictionless consumption than to any purposeful gravitation of diverse users to the subject matter of comics. This area still bears further research. For this research, readers, especially those who only incidentally read comics, illustrate this rationale for increased consumption of comics, with the result that they often became dedicated consumers and readers of them. More specifically, the findings illustrate that readers rarely display just one specific consumption (decision-making) and reading style: their information encountering, consuming, and reading blends different styles oftentimes simultaneously.

4.4.4 Revisiting Process Diagrams with Expanded Consumer-Reader Role

DCRs1-4 exemplify readers as active consumers of digital comics, not passively receiving, but purposefully searching out and consuming comics in the number of ways on offer in the digital environment: phone apps, digital subscription storefronts and services, and crowdfunding platforms. The nominal decision-making of subscription services, even Kickstarter (once they have decided which comic they wanted to support), still implies a level of action more likely to happen post-reading: deciding whether or not to continue subscribing and reading.

The role of consumer-reader illustrates that the reader has a more active part, indeed two parts, to play than originally envisaged in the publishing process, value, and communication models covered in Chapter Two and in this chapter. This active role changes the appearance of most publishing process model diagrams, as users now have two functions within it: that of consumer and reader with multiple tasks to perform. Moreover, these functions form their own circuit in that reading leads to more consumption.

Perceived in this way, even the most linear model looks less so at the endpoint of the process, with at least some form of consumer-publisher platform, storefront, or app feedback loop, and even multiple distribution paths.

Thompson's diagram of a reconfigured Digital Book Supply Chain (see Figure 4) demonstrates that, once the archived PDF file left the publisher, it was distributed in many directions as print books, audiobooks, and ebooks. I have reconfigured CGMT2's linear book publishing diagram (Figure 15), still including the branching ebook and print book production (but not audiobook as in Thompson's diagram) and distribution streams, but this time including the roles of consumer and reader and their activities (Figure 27).

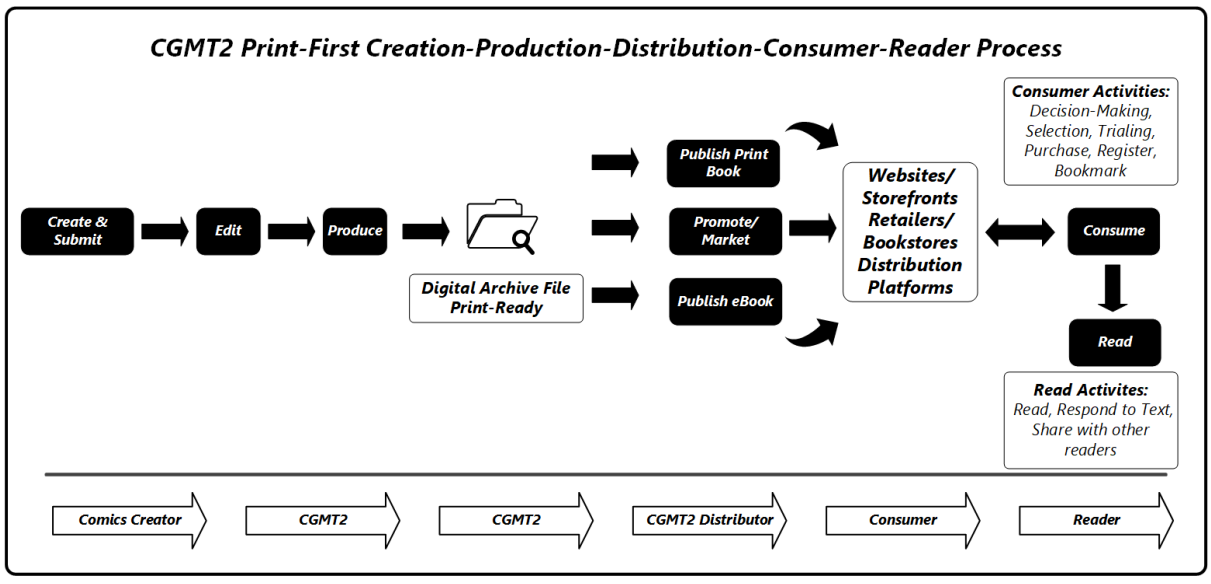


Figure 27: CGMT2's linear publishing (with branching distribution) revised to include consumer and reader activities. Note that the arrow between consume and read can go in both directions as reading leads to more consuming. See Appendix VIII for enlarged version.

This revision introducing the consumer-reader as an active participant in the publishing process is used here as an example to illustrate a new understanding of the consumer-reader role: all of the above diagrams can be similarly revised (although there is not room here to do so).

As mentioned above, the diagrams in this chapter end with identifying distribution paths after production and do not include the consumer-reader. This was not only to isolate and illustrate the activities of production and distribution, but also to reserve the inclusion of the consumer-reader for the point in the chapter where their participation would be analysed. Figure 27 demonstrates how this new understanding of the consumer-reader can apply to even the most traditional publishing. However, this role is best illustrated with a self-publishing diagram where the creator is using a self-publishing platform (including consuming, reading, and discussion). While the above diagrams apply to specific research participants, Figure 28 identifies in a universal way the more active roles of platforms and readers in the digital comics ecosystem, platforms such as Comic Fury, a favourite site for DCR8 who used all the functionalities of the site—creating, publishing, reading, discussing.

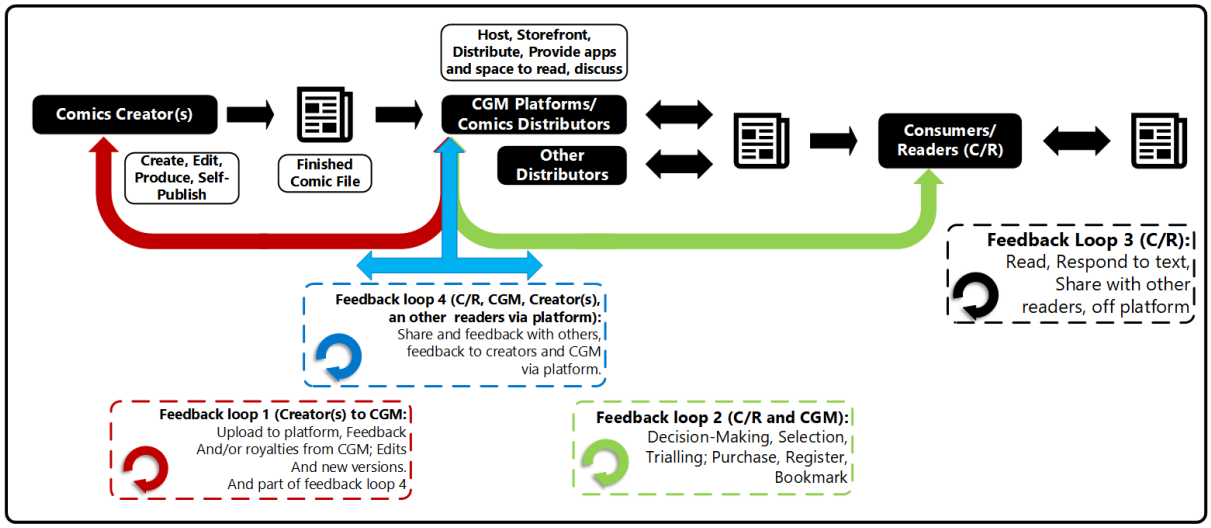


Figure 28: Digital Comic Self-Publishing Process (platform) and Feedback Loop. See Appendix VIII for enlarged version

With self-publishing platforms like Comic Fury and WEBTOON (and CGMD1, see next chapter), the CGM platform combines multiple functions, sometimes web-based and sometimes through an app, that are creator and consumer facing: creation tools and publishing, hosting, distribution, decision-making, sampling, purchasing or download, reading, responding, and discussing. These activities form

the feedback loop for creators and the CGM platform, and the consumer-reader and the CGM. Essentially, the CGM platform stands as the communication conduit or digital market and meeting place (see Chapter Five for research participants in this role) for creators and readers. In addition, there is a central place for readers and creators to discuss, for creators to read, provide feedback, and respond (see Feedback Loop 4 in Figure 28; see Chapters Five and Six for DCR8's explanation of this type of communication on Comic Fury).

Rather than a circuit-based approach, highlighting specific feedback loops that arise from the creation-production/distribution-consumption continuum allows for the multi-directional nature of the communication that takes place. This especially applies to the consumer-reader, not at the end of a process as a passive recipient, but as an active participant feeding back into the process through consumer behaviour, reading behaviour, discussion of content, and even in some instances through participatory design or co-creation. The diagram above also introduces the reader as an active participant in creation after consumption, through response to and immersion in the text. This role will be explored in more detail in Chapter Six.

4.4.5 Section Conclusion

For most of the processes represented in this chapter, it may initially appear that the role of the reader has not altered much in the changeover from print to digital production of comics. From the various process models, those of communication and value for example mentioned in Chapter Two for book publishing and including Priego's (2011) model for mainstream comic publishing, the reader is there at the end of the diagram to receive the books or comics, with little indication how these make their way into their hands. The distributors receive the works from the publisher, but under whose agency are they transferred to the reader? Another prominent theme from the findings concerned the passive representation of the reader in these processes and how it masked the extent of their activity as consumers, seeking out and selecting the comic, purchasing or downloading it, and then reading it. While it is true that consumption happened incidentally for some readers (DCR5 and DCR10, for example), others were active, intentional consumers, even while describing themselves as passive because they did not share or discuss on social media (DCR4, for example).

Because readers are not generally perceived as being part of creation-production, the traditional making process, their role is somewhat diminished in the diagrams representing it, merely as the receivers of the text. The findings from this research, in this chapter and Chapter Six, reveal not only the relatively new role of co-creation especially with self-published or project-based comics, but also the agency of readers as consumers and makers transacting with the text to consume and create in a much more nuanced way than heretofore presented.

4.5 Chapter Conclusion

This chapter is organized purposefully to demonstrate that none of the makers operate in isolation from each other: they all have critical roles in the production of digital comics. Other studies of publishing processes (Darnton, 1982; Murray and Squires, 2013) report findings group by group—authors, publishers, and readers. But the purpose of combining the findings of each group in one chapter is to demonstrate that their activities are integral and interlinked in such a way that without one, the process cannot be completed. Moreover, this chapter also establishes the processes of making as the framework for the themes introduced in the next two chapters, essentially based on communication through and with the technology that not only drives these processes but is also the engine of the digital comics and personalized ecosystems (see Chapters Five and Six). Through the processes and the devices, the makers of comics communicate with each other and the digital comics text and content, essentially creating user-generated personalized ecosystems.

The findings in this chapter demonstrate the disruption wrought by technology on UK comics creation and publishing practices and how UK practices fit into a wider publishing context. In this sense, UK processes are indicative of the split between mainstream and traditional publishing and self-publishing. These differences include business models, production workflows, and the re-assignment of roles within those workflows. Creators, whether they are self-publishers or contracted to traditional book publishers, have to be more conversant with graphic software, often juggling traditional creation methods with new digital tools.

However, both types of comics publishing share the fact that they are all digital publishers regardless of their output, although for large book publishers and increasingly small book publishers, output is both digital and print. In the next

chapter, the influence of print among the research participants in their creating, publishing, and reading preferences will be examined more closely. The themes in this chapter, dealing with processes, especially from a creator perspective, demonstrate that print or manual methods still have a place in what is very much a digital world.

The findings also reveal that the readers do have a role, and an active role, in the creation-production process aside from being mere recipients, the endpoint in that process. Readers, even the most self-identified passive ones, engage in several activities that bring them intentionally or incidentally (or “accidentally” through information encounter leading to consuming and then reading) together with digital comics. This is especially so if they are regarded in their role as consumers. In this sense, a new approach to diagramming the creation-production-consumption process in publishing, and especially digital comics publishing, was required. In this chapter, an initial sketch to include the consumption practices of readers has been offered.

The findings on the publishing process in this chapter—creation, production, consumption—work together with technology, especially the containers in the next chapter, to present the framework that produces the cultural object.

Chapter Five
The Container Is Real:
The Material Experience of Digital Comics

Chapter Overview: The findings in this chapter introduce the 2nd theme of the materiality, embodiment, and haptics of digital comics containers. Specifically, they reflect the experiences of the research participants, especially creators and readers, making their own personalized digital ecosystems courtesy of their 'digital companions'—smartphones, tablets, laptops, and desktops. But these companions are not the only containers wrapped around the digital comics content. The chapter is largely organized according to three aspects of container: digital file, device, and apps and platforms which are intrinsic to the digital comic experience. Creators and the CGMs in the research were dependent upon the "first container", the digital file, and in some instances happily so, for its malleability and changeability provided the ease and speed of transfer from one part of the making process to the other. Readers were not always convinced, especially as impermanence meant lack of ownership. Still, access to PDFs on file-sharing platforms allowed them the opportunity not only to avoid cost but also the trappings of other platforms (5.2). At the same time, they demonstrated a close relationship (true, sometimes antagonistic) with the second containers, devices, used for creation and also to enhance the reading experience. It was not uncommon for readers especially to emphasize the physicality of the devices as adding to or detracting from the reading experience (5.3). Readers, and sometimes creators, had to negotiate with an additional container within which the comic is enclosed—the apps and platforms that at once provide access while they encompass them within their "walled gardens" (5.4). This is not to say they have left print behind: in fact, participants expressed a kind of "container nostalgia" when it came to print comics (5.5).

The findings in this chapter respond specifically to Research Question 1: Are digital comics a distinct form of comics with unique affordances shaped by creators, publishers, and readers? In addition, the findings respond to Research Question 4: Does technology, for example, social media, apps, platforms, etc., facilitate communication and relationships among creators, publishers, and readers?

5.1 Chapter Introduction

People participate in multiple digital environments daily. The findings highlight research participants going beyond ‘participating’ to ‘living’ in those environments or ecosystems. While a digital ecosystem may be understood to be a combination of technologies that are data-driven and provide information, it is more than the sum of its technical aspects: an important aspect is the symbiotic relationship humans have with those technologies to create and consume content while communicating with others.

The processes and routines illustrated in the previous chapter are predicated on the technology that underpins them. If the technology fails, the technology described as disruptive in the first place, then more serious disruption, maybe even collapse, would occur. This collapse would destroy the various digital ecosystems and communities, as well as those important to comic publishing, production, creation, reading, and all the kinds of communication that bring a comic, digital and print, into being. While in Chapter Seven, the nature of communication is analysed, in this chapter the focus is on how the technology influences that communication so dependent on it.

The making of print comics took place in an environment supported by electricity and electronics, whether they be light tables, printing presses, and photocopiers. The comics creating, producing, and consumption activities described in the previous chapter are not simply supported by digital technology: they take place within an exclusively digital (and electronic) ecosystem. Ecosystem, because what is being described is more than just a digital environment or surroundings, but the interaction between that environment and those that populate it. Even some of the non-digital activities, such as hand-drawing, were conducted in preparation by a creator for that interaction, for digital conversion. So, research participants not only reflected on the ‘how’ of technology they used every day in connection with comics, for work or leisure, but also whether or not that interaction contributed to the making, producing, consumption, and reading of digital comics. It is a common experience to reject a website, platform, or service if the technology makes the interaction too difficult, too expensive, or even intensive, or intrudes on that interaction. How does

that experience relate to the creation, production, consumption, and reading of digital comics?

The “crystal goblet theory of typography” (Warde, 1955, see Chapter Two) indicates that (book)readers especially want the containers to disappear so they can focus on content. The research participants, and especially readers in general, had mixed feelings about the devices that were such a fixture in their lives, for reading comics as well as performing other activities. Analysing the making of digital comics is not just a case of considering how software and devices are used, but also the nature of the relationship participants have with the devices with which they create and read. In the sense that a paintbrush is an extension of an artist and the way they relate to the world, devices have become extensions of those who use them, essentially “digital companions”. Carolus et al. (2019) observe that there has not been much study of these and indicate the importance of more research into “these [entities]…that [need] to be handled, touched, and interacted with” (p. 916).

While Carolus et al. (2019) specifically refer to smartphones, their findings are instructive in framing the feedback from research participants, especially creators and readers. Their relationship with and response to digital comics at a technical level was wrapped up in the wider uses they made of a range of devices including smartphones. Participants in this research used many types of devices and in different combinations. Whether they were using devices for work, or leisure, or a combination of both, they were invariably spending a large part of their day interacting with and through them, formatting them for their individual comfort, being in continuous proximity to them. This relationship informed their response to digital comics, what constituted a digital comic, whether it had its own unique offerings, or was just a digital facsimile of print. For example, the CGMs who reflowed legacy comics (superhero, sci-fi etc) to apps and those who read them more often considered the digital versions as stand-ins for print, while those who created and read comics for such platforms as WEBTOON more often saw the digital comic as a unique format (even when there were print versions).

Some participants in this research had a strong preference for print comics, especially the container, the haptic experiences of pages, and the comics as a physical entity. This also influenced their view of digital comics, as noted above in the

instance of legacy comics and also graphic novels. Some of this preference was reflected in the collector experience of ownership (Resha, 2020; Stough and Graham, 2023; but there is a sense of ownership for downloaded PDFs, see below). Some CGMs, especially those with the rights to legacy British comics, published with an eye to this type of consumer, for example, reprinting classics in print and digital editions. This is true even for some creator/self-publishers who produce digital-exclusive comics, such as webcomics. As demonstrated in the previous chapter, creators mix and match digital and print practices for creating comics, which extends to this chapter where they talk about the physicality of a webcomic in paper form helping them to visualize when drawing and organizing by panels. So, while there may be a whole-hearted embrace of digital tools, some still 'think' or visualize in print.

In interview and in the Interactive Think Aloud (ITA) sessions, readers in particular discussed their relationships with devices as well as apps and platforms, and whether they contributed or detracted from the reading experience. In other words, did the 'digital' of digital comics dictate their response and experience? As with creators, readers used any number of devices or software to suit a particular reading or creative experience. This changing of devices even extended to particular types of comics, accessibility (smartphones are difficult to read with for the visually-challenged, for example), bulkiness or weight of device, and readability of text and images.

5.2 The Comic Contained: Digital Files

5.2.1 Introduction

Considering the strong feeling for the print container even in the face of wishing it away to focus on content (crystal-goblet), the "lowly digital file", a poor substitute indeed for the haptics of print, has much to surmount. But as 'malleable', 'impermanent', or 'changeable' as it has been described, it is still the major output of the publishing production process and the basis for both print and digital publications. For some research participants, however, one particular file format did confer a sense of permanence; for example, in Chapter Four the output for traditional publishing production processes was usually a PDF (considered an archive copy upon which publication versions were based). For creators, a JPEG or TIFF also

acted as a permanent copy. For readers the PDF meant not just permanence, but ownership not to be found on apps.

5.2.2 Creators Working with the Digital File

The creator participants discussed file creation from a working perspective. For comics creators, the most important goal is the quality of the art, the comic drawing, and how to preserve that quality digitally. So, file types are critical to preserving not only the work but also the quality or resolution. For example, comics creators in the research often used PSD (Photoshop Document) files or TIFF (Tag Image File Format) files, both noted for ensuring the quality of the image without the loss of detail. JPEG was also frequently used, although there was a risk to detail. The most common file format to save both text and images was PDF.

As illustrated in Chapter Four, not only were comics creators adept with various types of technology to create, but they were also accustomed to dealing with multiple files and types to produce the finished comic. For example, CCI2 explained that they worked with both JPEGs and PDFs, and that the final comic was a multiple-page PDF. Although paper was often used for conceptualizing, CCI2 was aware of the amount of it needed to create which would influence how often they would resort to paper. While working with files could be restrictive, digital pens and the related software restored the freedom that paper afforded.

There was sometimes difficulty not just with working across different file formats but also separate software:

> I draw using Procreate on the iPad with the Apple Pencil so all I need to work is just the pencil and the iPad…I work with TIFFs if it's for print, JPEGs if it’s to go online. I also use Photoshop. So I’m often taking the files in between the two programs. Photoshop is so much, much better for laying out text digitally. I have a [font] of my handwriting that I use…So for small comics I’ll hand-letter it, but for a book I just use the font. I can only really do it in Procreate, but it's not quite as good…So I will take the same file, insert it into Photoshop to lay out the text, and then save it and take it into Procreate to do the drawing (CCI2).

For some, dealing with different file types across software packages was not always easy:

> You save them as JPEGs for webcomic web sharing, because it's better for web sharing, but the final files for those would be PSD. But if I'm working [at a comic publishing job], it's a TIFF, and then I turn it into a PSD because it needs to be compatible with Photoshop. So if [I am creating a] final digital file, probably a custom PSD, and a JPEG if I need to share online, but yeah sorry that is confusing (CCW1).

Creators mentioned working with software like Photoshop and Procreate, but those creating graphic novels often spoke of file formats for Adobe InDesign:

> Once he's [illustrator] got an image that he's drawn on, then he exports that to an image file, and then he'll probably send those to me. I usually end up doing the layouts because I'm more experienced with InDesign and design and production software in general. He'll just send me over the image files and I'll lay them out and make the final PDF (CCI8).

Photoshop was predominantly the software used for working with images. CCW2 described it and the virtual PSD templates as "a pleasure" with which to work, "a program made for making comics". However, they observed that the multiple features of the software made it feel "bloated". It was difficult to work with files which is why they preferred to work with the templates.

DCR11 (and CGM03) also spoke of working with vector graphic file formats for creating images, as opposed to bitmap (or pixilated) files. They display in a way that is based on mathematical equations offering more scalability, "'til the end of the galaxy", according to DCR11. Essentially, the files and the related software facilitated working with images, trying different colours and sizes, for example, with immediate results that could not always be achieved when working with paper.

5.2.3 CGMs and the Official Output of the Production Process

CGMs accepted comics in several different formats: PDF, JPEG, and TIFF were common. The finished product, whether print or digital, was initially submitted in electronic form, mostly via email. CGMM4 planned to provide a dashboard through which creators could develop their stories and put them together with images. The

product of this dashboard experience would be a file format that was customized in-house and then uploaded to the app. In a sense, comics creators working with the CGMM4's dashboard could consider themselves self-publishers as they would be creating and producing their own comics. However, CGMM4 explained that allowing creators to create (or originate) their own stories and artwork is part of future development. CGMM4 still planned to specify the narratives and artwork, as well as retain the intellectual property and distribution rights, at least for the present.

Whatever format the work was submitted in, CGMs often converted it to PDF format, the flat files referred to by CGMT2 and reflective of publishing processes that are still print-focused to varying degrees.

For most of the CGMs interviewed, the outcome of the production process was a print-ready PDF file that could be converted to a print product, used to produce a digital product, or easily converted to EPUB format for use on an ebook reader. The reliance on PDF as a digital format upon which to base print and digital publications was evident in the number of CGMs using Adobe's InDesign, from the editing to the beginning of the publishing process. One CGM even cited a preference for accepting comics texts that had been created using InDesign. The functionality of the software allowed them to streamline the whole publishing process:

> The artwork will be imported into InDesign. Obviously, there'll be lettering layers, colouring layers. So that's all combined in InDesign. We export PDFs for print, and then we have scripts that we run to enable us to generate PDFs that then will be used within the app (CGMM4).

The InDesign software functionality also allowed for accepting different file formats from creators:

> They [creators] give us the JPEG and TIFF files and individual files for each page. Then we'll take those and, using InDesign, package it up into PDF format… which we then have sent to the printers (CGMI2).

CGMO3 differed from the rest of the CGMs interviewed in the software used to drive the creation and production of its experimental comics. Moreover, while all the processes were linear in execution, with definite beginning and ending points as evidenced by the diagrams in Chapter Four, CGMO3's publishing production process

was more circular, largely because of the emphasis on interactivity within the process itself (see Figure 22 in Chapter Four).

While earlier versions of CGMO3‘s webcomics were produced using flat images in JPEG, GIF, or PNG formats, CGMO3 had started experimenting with Unity software as a means of increasing interactive functionality. Unity is a design platform used for creating 2D, 3D, and real-time interactive animation and has been used predominantly in gaming.

5.2.4 Readers‘ Relationship with the Digital File

While creators and CGMs experienced the digital comic file from a working perspective, readers’ relationship with it took on a different context which ranged from portability to ownership and sharing. Some readers spent time negotiating with files, especially PDF downloads, while others did not have to engage with this container at all. For example, readers of webcomics on social media were just interacting with the platform, and the webcomics were just a part of all the media available, including graphics, video, photos, memes, and text. Negotiating with the format mostly happened when size had to be adjusted, for example, if the font was difficult to read. For webcomic readers, there was no suggestion of difficulty with this first container, while those who read through apps expressed frustration with comics that were digitized and even born digital in apps.

Graphic novel and traditional comic book readers often read in PDF format, because this was a popular format originally [and still is] for publishers to release and monetize digital versions. Crowdfunding comics creators also released versions of their comics this way. But sometimes, PDF file-sharing was the only or easiest way to access back copies, according to DCR5:

> For example, recently I started reading *Invincible* (a superhero comic) online. So, I basically pirated a huge collection of *Invincible*. [It] was on a file-sharing platform or something, some Torrent files [used for distribution in file sharing] that I picked up from there. Each volume is a separate PDF file. I have to open one after the other, and sometimes I lose track of where it was [because they were not labelled sequentially] (DCR5).

DCR11 read comics mostly in PDF format, sometimes acquiring them through file-sharing sites (see Figure 29). Initially, this was motivated by a lack of funds as a student. But, as with DCR5 (and DCR1 and DCR2), a sense of ownership also played a part. Because PDFs could be downloaded and saved on a personal device, publishers and platform owners could not 'reclaim' them (as happens with titles downloaded to a Kindle, for example). It did not matter that DCR11 could not call up these files easily to read through during the ITA portion of the interview, because they were buried in years of stored files. They knew they had them and could retrieve them if desired.

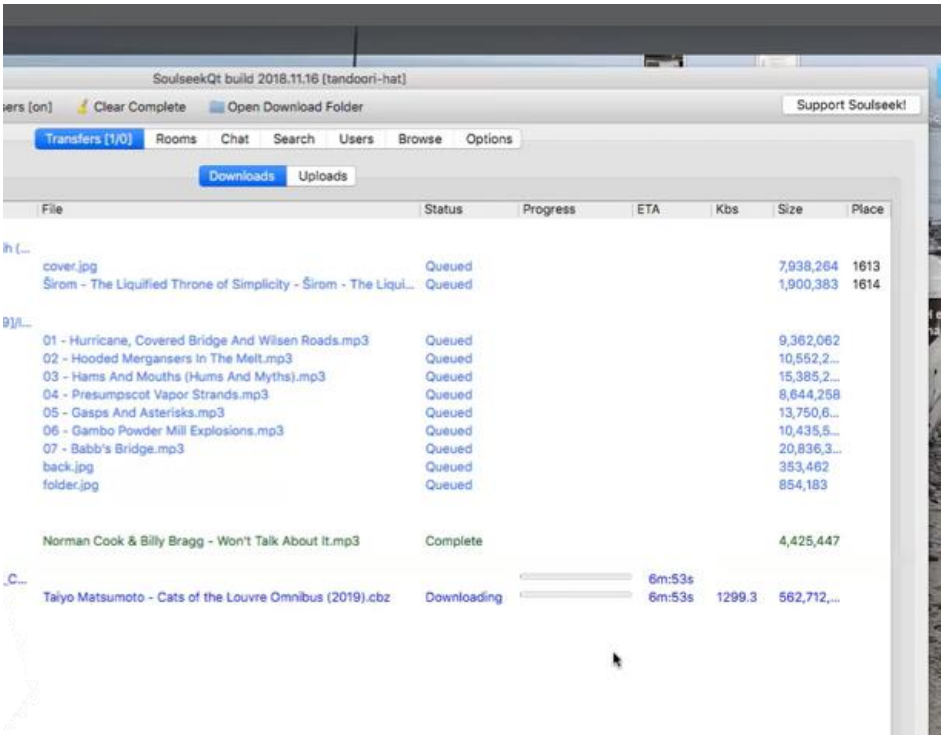


Figure 29: DCR1 accessing a graphic novel, *Cats of the Louvre* by Taiyō Matsumoto, on a music file-sharing site

DCR1 mentioned NFTs (non-fungible tokens) and the elusive sense of ownership with a digital file:

> It's funny because [there's not] really a correlation between the consumption of a comic and the possession of a file that has it. There is a comic that exists in a file. Then there is the idea of setting that file as an NFT which is really if you like having a digital code. It just happens to have an image [which can be copied and pasted from elsewhere]. There's supposedly some pretty strong

things there in place that allows this [copying and pasting] not to happen. But you can get the image represented in the NFT.

DCR1 maintains that while in theory NFTs are purportedly owned by individuals and available for public consumption, in practice they can be copied. It may be true that the copies do not have the same monetary value as the original. However, it is not always clear if it is the file format or the artwork itself that is considered original and to be valued, especially if the artwork is reproduced elsewhere. DCR1 felt that NFTs gave the illusion of sole ownership, but digital files “want to” or “are made to” be free, even in the face of all kinds of rights and commercial safeguards. The evidence of file-sharing among the research cohort illustrated perception of digital files is not just an economic but also an access imperative dictating that comics can and should be owned by all.

5.2.5 Section Conclusion

Comics creators and CGMs have become accustomed to handling images and texts in different file formats. However, the industry, whether it be traditional publishing or self-publishing, has settled on PDF as the final output of creation and production (although webcomics are often uploaded as JPEGs). This may be down to the ubiquitousness of Adobe products in publishing production (even those creating images in Apple’s Procreate must eventually convert). As rigid as some creators and CGMs felt PDFs to be, comics readers in the research had a different relationship. The readers were most aware of PDF as a physical entity because of the friction entailed with downloading and storing, but also because of its use in other parts of their lives, in the workplace, for example. They liked the usability and interactivity of apps and were not necessarily aware of the file container in which they were delivered. From a crystal goblet perspective, this immersion was considered positively. In the end, PDFs afforded them access, ownership, and stability that was somewhat akin to the relationship they had with print comics.

5.3. Containers Within Containers: Devices as Digital Companions

5.3.1 Introduction

The research participants continuously stressed the relationship, the friction or lack of it, that they had with their devices. They were at once the lifelines that

connected to the digital ecosystem as well as represented it. Research participants spoke of this constant presence and its impact on work and leisure in various ways throughout the sessions. In a sense, the findings in this chapter are not just about digital comics, but also the relationship to ‘digital’ itself.

What comes across in the interviews and the ITAs, explicitly and sometimes implicitly, is that while there may be a preference for print, the impact of digital devices in other aspects of the research participants’ lives had much to do with their reading of digital comics: concurrently reading and talking about reading with others online; collaborating (sharing files) in creative activities such as drawing; providing financial support for comics they enjoyed online (much like supporting bloggers, vloggers etc). There are many ways people live their lives online, using devices as “digital companions” (Carolus et al., 2019) in those activities, that overlap with encountering, consuming, and reading digital comics.

The findings on interaction with technology are, by definition, focused on creators and readers, as their relationship to technology is the most personal. Traditional CGMs of graphic novels and even tech and media publishers of legacy comics mostly discussed technology from a commercial, business environment: what was used for editing, production, and distribution, as illustrated in the previous chapter. CGMs or “cultural content producers” or platform “complementors” (Nieborg and Poell, 2018, p.4276, see Chapter Seven) spoke of contributing their content to their own or to third-party platforms. There were those, such as CGMM2 or CGMM4, who created their own app and platform environment, while others, such as those in the CGMI category, only contributed as far as PDF versions on third-party storefronts or sometimes their own websites. As indicated in Chapter Four, their level and form of contribution depended upon their business model’s investment in digital publishing.

5.3.2 Creators and Their Technology: It’s Complex

During interview, both creators and readers related their experiences with using multiple devices. Whereas CGMs commented on the more material aspects of comics in general—the look and feel of print comics, for instance—essentially the output of the production process from a commercial perspective, comics creators and readers spoke from a more personal perspective of the devices, software, and

platforms they used to read and create, and how much this technology added to or intruded on those activities. Self-publishers in particular who were also creators spoke of the means of production differently as this was also how they created, the technology being the conduit to the personal act of self-expression, much as with pencil and paper (which was also the technology of expression for a few).

This personal act could be achieved in some cases using multiple devices. For example, CCC1, a webcomics creator, developed a complex system of devices, including a laptop and tablet, with which to draw:

> What happens is I take the ink work, and I scan it at a high resolution. I have a laptop and a tablet. I draw on the tablet, but the screen is separate. I have an older laptop, and I have another screen on an arm. And I have the tablet. So, when I'm working with the tablet, I will plug it into my laptop, but the image will come up on the other screen. I'll be working literally with the tablet in front of me with a pen, and there is the second screen in front of me. I am looking at that and drawing on the tablet. I will touch up the ink as necessary, anything I want to change, and get rid of any smudges or marks, and set the stage to add colour because, yes, I will do all the colours. And then I'll do the lettering. The colouring and the lettering are digital, but the ink is traditional media scanned.

In Chapter Four, CCT2's collection of online and offline tools was envisaged as a personal ecosystem in which they created comics. CCC1's digital environment also acted in this way: not just a 'collection', but an environment where the creator and the tools interact and interrelate, inseparable for creation (Figure 30).

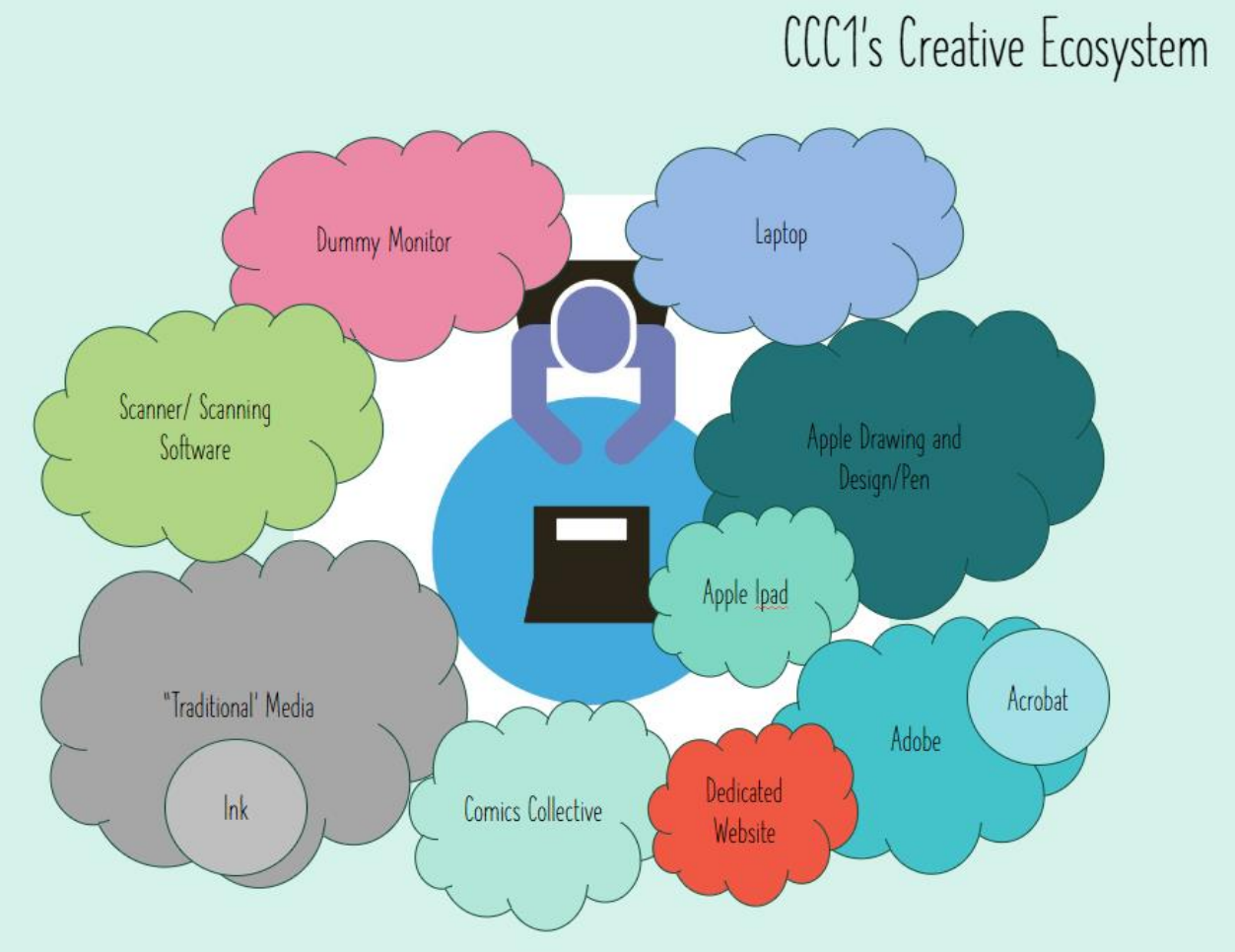


Figure 30: CCC1's Personalized Creative Ecosystem

Essentially, the laptop acted as the engine and storage for this configuration, the tablet the drawing pad, and the extra screen provided greater visibility. As confusing as this configuration sounds (and appears), CCC1 was entirely comfortable with it. This workaround afforded them a kind of portability (because they were working from a laptop as opposed to a desktop) with a greater vision-related accessibility and file creation functionality. All of this might have been achieved with just one device, but they devised it because it suited their way of working. More importantly, their laptop was more than a tool: it was an extension of themselves, with a level of customization developed over time, experimentation, and experience. CCC1 was one of the creators who liked to experiment with multiple graphic software packages. An engineer by trade, their structure for drawing was not down to lack of finances but to devising innovative solutions that would enhance creativity.

When creating their one graphic novel, where more space and time were required, CCC1 ensured that their surroundings (chair, cushions, etc.) were conducive to working with their iPad using Procreate and an Apple pencil. They also required a laptop to be handy for references to images or scripts. However, although the digital technology expedited the process for them, they often fell back on the materiality of print to help visualize:

> I sometimes cut sheets of paper into a little empty booklet, and I start writing with a pen on those pages, just planning out what happens on each page. Then I'll sit and type up what I've done into a digital document because I just find it really helpful to think what's going to fit on a page as I'm going (CCC1).

CCW1 did reveal the problems with using multiple devices and what can happen when access is lost, and finance is not always forthcoming:

> It completely depends on the project. I used to ink, but I didn't have a scanner. And then lockdown happened, and I lost access to the scanner which was on university property. Then I moved more into drawing, but I wasn't very good at it. And then my laptop sort of busted. So, then I used my big fancy editorial pay cheque to buy a Surface Pro which I now use as my drawing tablet. This all happened, it all came about rapidly in under a year.

However, some creators were tempted out of their comfort zones, whether that be with manual drawing or using outdated devices. CCW2, a webcomics creator, harked back to the early days of webcomics creation, of manually drawing and then scanning or taking a photo:

> I've never had much money to buy things, and I also think about buying too much. I feel like you have to buy equipment, and it can be really prohibitive. You can make a really popular comic on the Internet by throwing it on paper and taking a photo of it with the phone. You could still make a comic that way. I think people should do that more, but they don't.

CCW2 was willing to admit, though, that they had been converted:

> But I did a talk at the Apple store, and they gave me this iPad. It just gave me this sense about acquiring stuff, and it can be nice. Aside from that, when I was using it, I was like ‘Oh, this is actually very nice’. It helps with making the process a bit quicker.

From these examples, it is not necessary that the physical device disappear for the act of creation. Creators made a conscious choice to use one device over another to create, out of comfort, functionality, and accessibility, and these requirements could even vary from comic to comic. In a sense, it was not necessary for the device to 'disappear', because the choice of the device was the point, the extension of their creativity and their creative selves. In this sense, creators in their loyalty to their devices treated them as companions to create with, to get along with, because in the end they derived much from the relationship—their ability to create.

5.3.3 Now You See It, Now You Don’t: Readers and Devices

There were some reading experiences where readers wanted the devices to disappear, while for others the specific functionality of a device created the experience (WEBTOON smartphone scrolling, for instance). Owning multiple devices (which all readers did) provided the opportunity to mix and match depending on the experience desired.

Regarding the ownership of multiple devices, there was an interesting implicit (and sometimes very explicit) subtheme of the affordability, keeping them up to date or upgrading when necessary, as well as updating and purchasing software. Even some of the students in the research who began to read digital comics for financial reasons had multiple devices (for example, DCR8 and DCR11).

All readers used some combination of laptop or PC, smartphone, and tablet. The reasons for their preferences were individual to their own comfort and accessibility requirements. Often, they involved the haptic sense of touch. For DCR9, this was true for their preference of a laptop over a desktop or tablet:

> [Reading] *Invincible* [superhero series, on the laptop] started getting really painful, so I transferred the files to my tablet. I started reading it on the tablet. [But I like reading on a laptop] because on the laptop you have to use a mouse or a trackpad to select a file, open it, and that’s easier than a tablet. I

> don't have a touch screen. I think it [the laptop] is easier to use than the touchscreen, to flip through the pages, and scroll and zoom. I don't prefer touch screens, generally because they make laptops heavier.

DCR9, who worked in tech, did admit that they had an older laptop which they did not want to upgrade because the customization that had evolved had provided a degree of dependability and comfort. They also had to admit that they had friends with newer, touchscreen laptops that did seem lighter. However, this improvement did not motivate them to buy a new one.

DCR1 described the relative experience between the desktop and laptop and, as with DCR9, mentioned the mouse as a determining factor:

> I far prefer my desktop I'm talking to you on now, because it's like a nice big screen, and I have a comfortable chair. It's easy to navigate the file system, and it's just a nice experience. I've got a decent mouse.

They did use a laptop sometimes, especially if they were travelling, one that belonged to their partner with their partner's customization. But they mimed working on it, all hunched over, in a coffee shop, for example. In addition, the mouse was a "little weedy bar in the middle" and was difficult to manoeuvre, making scrolling not as easy as on the desktop (note with DCR1 and DCR9 the emphasis on using the mouse instead of keystrokes or touchpad). As with DCR9, the comfort levels achieved with their chosen devices meant they were not inclined to upgrade their devices.

Regarding the phone, DCR1 initially did not read on it, and especially not for leisure. Again, comfort was a factor. But the COVID pandemic persuaded them to give it a try:

> On the phone? It would just be for having a quick look at something. The last time I did any kind of reading on it is sometimes in bed. But usually we would rather be curled up with a [print] book. I have the distinct memory of working from home during the pandemic, though, and downloading the *Judge Dredd* compendium on my phone. It was *2000AD*, and it was free, and I was squinting away.

This description illustrates two formerly print-entrenched entities: a print-first CGM adjusting pricing and distribution during the pandemic to promote digital editions free of charge, combined with a somewhat dedicated print reader overcoming physical barriers to use a device to download free digital content. Both were learning, if not to love digital, then at least to appreciate its conveniences and commercial affordances during the pandemic.

Accessibility combined with functionality was also the impetus for using different devices for different comics. According to DCR3,

> When I'm reading WEBTOON, I tend to read several comics, whether it's several issues of the same series, or several series at the same time. So, I find I can read on my mobile phone maybe 2-3 episodes. But once they go beyond 4 or 5, I get tired holding the phone, and my eyes [tire as well]. I find [I am at] my more comfortable chair, at the big screen more and more.

This experience is at variance with what WEBTOON was designed for: smartphone vertical scrolling. DCR3 acknowledges this and also admits that the smartphone can still be preferable to laptops and desktops:

> Having said that [about the awkwardness of the smartphone], the more enjoyable reading experience, especially for WEBTOON, is still on the phone as opposed to the desktop. With the phone, the WEBTOON app takes over the entirety of your screen. Everything you're looking at is WEBTOON. With the larger screen [of the laptop or desktop], there's noise [see below for the distractions] all around the platform. WEBTOON is not geared to be seen on a landscape screen. And, I cannot expand it to fill the entire screen without losing definition. The phone, to an extent, can be more immersive, because everything you're looking at is the comic.

In a sense, DCR3 is describing a common reflow problem with apps designed for smartphones but used on larger-screened devices. The desktop and laptop environments run on prompts and intrusions, and not just from advertisements: “Messages come through on your computer, like an urgent email or a message from my family” (DCR3). In Chapter Six, immersive reading will be considered in more depth, but this is an example of how one device can offer that experience more than another, even when other aspects of the device challenge accessibility and comfort.

Readers' relationships with devices were different from those of creators, more diffuse especially as they included smartphones. As observed above, smartphones have become more than a device or tool (although no creator used phones for creation): they are daily, hourly companions that are conduits to a wider world of interaction. Smartphones are personalized and customized, perhaps even more so than a tablet or laptop. Moreover, as demonstrated in Chapter Four, the act of reading comics, especially with a phone or tablet, is often included within a range of other types of reading, gathering information, and communicating (view strengthening, emotional bonding, etc.) during the day.

The device in this sense is not meant to disappear to enhance the enjoyment of the content: a choice is made for a specific device expressly for its physicality, its functionality, its accessibility, and how it easily fits in with other activities throughout the day (uses described by DCR1, DCR3, DCR9).

Readers made frequent references to the haptics of touch, specifically scrolling through a touchscreen in contrast to using a mouse, as noted with DCR1 and DCR9. While they described the experience in terms of functionality and comfort, DCR8 felt that it allowed them more control: "I just feel it's slightly, weirdly, more controllable slash physical when I'm scrolling with a mouse for some reason compared to the switch and flick on the phone".

DCR8 equated this feeling as akin to that sense of touch one feels when holding a print book: "you just basically can control how many lines it goes. It's just more of a sensory feel, really, for me". DCR8 used a mouse exclusively. What was important to them was the ability to scroll and click with the mouse, line by line and panel by panel. For them, this represented more interactivity with the comic through the device.

For DCR8, it went beyond the physicality of using the mouse: it was the ease of working (or not) across various tabs and documents that was attractive:

> Really, I think it's also because I just prefer sitting on the laptop and getting a bit distracted when I'm reading, and then just going back to the thing that I'm doing, you know, that multi-tasking feel. Yeah, it's easier to get that with the laptop than the phone. So, I think that's basically why I do that.

This can be contrasted with DCR3 above who prefers the almost book-like quality of using an app on the phone to read, where all other distractions can be tuned out, unlike reading on a desktop or laptop. Of course, settings could be changed on phones, desktops, and laptops to tune out distractions. But these changes can sometimes be difficult and time-consuming to accomplish. For DCR3, to turn these off just to read for pleasure would not be worth the bother and would be even more of a distraction. Whereas, for DCR8, the distraction is welcome, allowing them the sense of accomplishment from “multi-tasking”. “Multi-tasking” included using the laptop instead of the iPad to create comics, “which was very strange for my parents”.

DCR3 equated the scrolling with the mouse on the desktop with scrolling through the screen on the phone. It was easier with the desktop if they had to catch up and read many comics. There was a certain amount of physical motion using the mouse. With the phone, the body is static, except for hands and particularly fingers. As a result, “I actually experience stress with my shoulders, almost permanently seizing up because of repetitive stress injuries”. In this respect, both DCR3 and DCR8 express the same sense of physicality with the mouse at a desktop: with the touchscreen of the phone, there is not that degree of latitude and control.

Changing orientation, size, and zooming were other important functions that could only be achieved through reading digital comics. Although size changes can be made on desktops and laptops (as well as zooming), the experience on mobile devices, combined with ‘flipping’ the device from portrait to landscape, enhanced the reading experience. According to DCR9,

> I don't aim to go through webcomics quickly. I take my time with it, and it [smartphone] makes it possible for me to adjust the sizing. And I can quickly turn it around and adjust the orientation if I want, if a panel is vertical.

These options, combined with portability, could tempt DCR9 from reading on their laptop. However, in the end, the laptop won out on the size of the screen alone, although orientation could be a workaround if necessary: “Generally, the only problem is that the screen size is small, but otherwise I like the experience. Usually, if the comic is large, I turn my phone around and horizontally just use it in a landscape”.

DCR2, a lifelong print comic reader though a digital comics blogger, also liked the sizing and zooming functionalities of devices when reading digital comics. These functions allowed more options for reading than print. Indeed, the functionality and portability of most devices contributed to making reading digital comics an enjoyable experience. In this sense, readers did not want the container to disappear because it contributed to this experience, not just from a convenience perspective, but from an interactive perspective. As DCR8 observed, they felt like they were interacting with the comic through the device, even when the comic had no intentional interactive elements. For some, the mouse made them feel more active, more interactive than mere scrolling on a phone. However, for others such as DCR3, reading a comic via an app on a phone created more of a sense of the device disappearing, as well as other distractions, making the experience more immersive.

Some readers are not looking for physically interactive experiences, but for immersive experiences where they are “lost” in the stories. This experience will be covered in Chapter Six.

5.3.4 Section Conclusion

In this section, creators and readers display a relationship with devices—smartphones, tablets, laptops—as complex as that with the print comic: there are times when they enjoy and want to experience the physicality of the device, as well as times when they want it to disappear so they can immerse themselves into the story. Creators are just as much interested in the devices they use falling away, so that those devices become extensions of themselves, their creativity, and are part of the embodiment of that act. It is not that they do not feel discomfort with the device and so become aware of it in a negative way. But because of the ubiquity of devices in their lives, there is an acceptance, and if they own more than one device, workarounds that make for a more comfortable experience.

5.4 The Seamless Environment: Apps and Platforms

5.4.1 Introduction

The example above of DCR3 torn between reading WEBTOON on a smartphone and a desktop illustrates not just the importance of the accessibility and functionality of device containers. It also highlights the container within the device

container through which CGMs and creators publish, distribute, and create, and readers access digital comics: apps and platforms. CGMs indicated their "complementor" relationship with apps and platforms as part of their business models (see Chapter Four), while creators in this chapter and Chapter Four spoke mostly to the use of graphics and software platforms. Webcomics creators were more likely to relate their creative experience with their own dedicated websites, with only occasional references to the use of social media. CCW2 was the exception as they created a webcomic specifically for distribution over social media which informed the appearance of the comic by restricting the number of panels.

For most of the readers who were vocal about using platforms (except DCR4), reading digital comics happened in specifically comic environments, such as WEBTOON or other comics apps, as well as non-comic environments, such as social media and file-sharing platforms, and instant messaging systems. For the participants, what was required of these platforms and apps was not just ease of use, but a seamless environment in which they could communicate, create, publish, and read, essentially live, if not all of their lives, then a significant part.

5.4.2 Reading and Relating

An issue often expressed regarding the reading of comics on apps, and especially print comics that have been reflowed, concerns their readability: is it the same as the print comic (the specific one they are reading digitally) or a print comic (in general)? Regular comics readers, especially of legacy or classic comics in print, often evaluated comic apps according to these questions. The desire for this conduit for reading digital comics to resemble known reading experiences relates to "mind maps" or "cognitive maps":

> These manoeuvres between platforms, browsers, devices, apps to get the reading experience to adhere to their preferences indicate that readers approach the digital environment with "cognitive maps", that is preconceived mental models for what that experience should be (Bjornson, 1981; Thayer et al., 2011; Zifu et al., 2020) (Berube et al., 2024).

In a sense, this is what DCR3 was looking for when reading WEBTOON (albeit vertically): the fully immersive experience of reading a comic book without digital distractions to tempt them away, an experience afforded by a print book where

the materiality of the book falls away (although the distractions may still pertain). Their reading through an app on a smartphone more closely resembled this experience than their reading on a desktop. This functionality affords the comfort of familiarity, a sense of security that nothing jarring or disrupting will intrude on the reading experience.

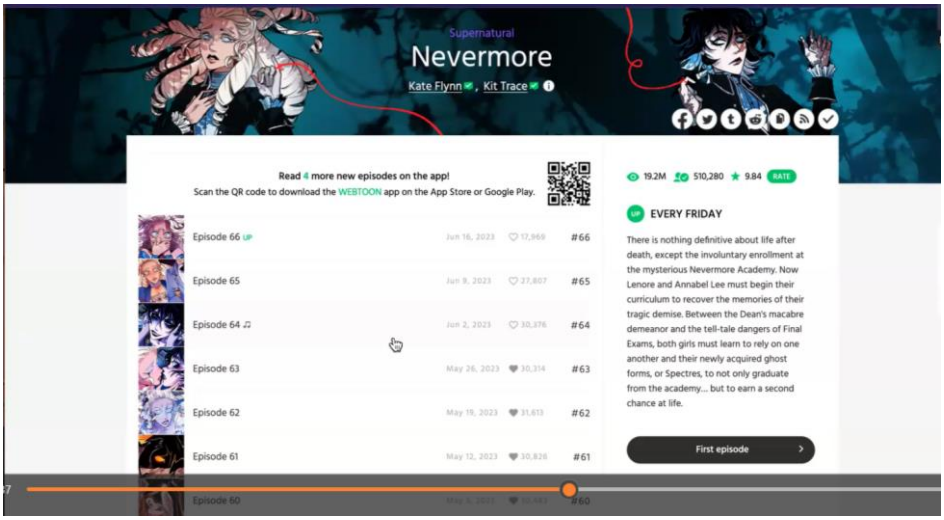


Figure 31: DCR3 Reading *Nevermore* by Kate Flynn and Kitt Trace from the WEBTOON Platform on the PC

As with smartphone apps, for example WEBTOON, the reader is afforded this immersive experience so that this container within the device, part of the digital comic and its experience, falls away, and all that is left is the reader, the device, and the comic. In some cases, it takes a little bit of adjustment to get the app or platform to behave in the desired way. For example, DCR3 configured their WEBTOON app in such a way as to be able to focus on the freely available comics, avoiding the options for paid preview access a month before free versions are released.

WEBTOON is specifically designed for vertical scrolling on a smartphone. As noted above, scrolling on a phone posed some accessibility challenges for DCR3. Vertical scrolling itself could prove an obstacle to ease of reading and an immersive experience as well: it was time-consuming, and sometimes the scrolling made it difficult to go back to find something earlier in the comic. Scrolling also caused DCR7 to give up social media in favour of reading newspapers online. With social media, for instance their Twitter account, the scrolling gathered such a speed that absorption was a problem: they could not take in information at a deliberate pace. They spoke of the scrolling promoted on social media as being addictive:

> I’m just coming out of that kind of habit on the news app. I'm still reading a lot because I haven't yet broken that habit of having to scroll or having to constantly look at something. I started using *Guardian Online*. And it's now my easiest way of news consumption for all things.

There is a drawback to reading a newspaper online: “it does take a lot of scrolling on the *Guardian* before you actually hit the comics”. But DCR7 still found that they were discovering more comics this way and deliberately seeking them out in the newspaper. But, as noted in Chapter Four, for comics they liked, they would circumvent all the scrolling through other information in a newspaper app by going directly to the creator's site to get new issues pushed to them. DCR5 also discovered comics through the *Guardian Online* while perusing the headlines for daily news. Despite sometimes having to go to “the bottom of the page”, they found they would deliberately look for comics they had enjoyed previously:

> You're reading them, and you're enjoying them. And you're looking [for them]. On the *Guardian*, there are a few that I like on there. Every time they come up, I will read them. So, I guess that's somewhat regular.

This is not to say that DCRs 5,7, and 10 are reading comics avidly, but they are reading online newspapers regularly, despite container problems (scrolling, ads, etc.), and in doing so, reading digital comics regularly.

Another noncomic environment that introduced research participants to the regular reading of comics was messaging apps or systems. Aside from reading comics in news apps, DCR7 frequently encountered comics through WhatsApp and Signal. Not only did they read them, or parts of them, on these apps, but they were often a focus for discussion and “view strengthening” (Beall et al., 2023, this response to comics will be covered in Chapter Seven) when about politics and social issues. In fact, DCR7 cited comics in WhatsApp messages and profiles as being the major source for news from their home country. Their preference for sending and receiving articles and comics, especially those that are politically sensitive, on WhatsApp and Signal as opposed to social media platforms was “for privacy reasons, and I guess just political hatred”. Signal was their main communication tool because of its “end-to-end encryption” protecting DCR7 and their contacts (both apps are encrypted, but Signal, created by among others a WhatsApp developer,

has more security features). They characterized their Twitter use as “passive”; it was the only social media platform to which they subscribed, something to which they had to “succumb” for academic reasons:

> I'm trying to come out of that again for the fate of my academic career. But apart from that, I follow a lot of people. I actively look for information, for useful things, look for entertainment, and that's where comics comes in, and also find ways to keep abreast with things that happen in [home country].

DCR7 found comics while looking for “useful things” such as “information” or “entertainment”. For them, digital comics are not just entertainment; they are also a source of that “information encountered” in searches (see Chapter Four on information encountering). As such, they are shared with others and so spread the information. In Chapter Six, digital comics as part of the language of communication, persuasion even, on the web will be explored in more detail.

5.4.3 Importance of Environment to Experience

Sometimes, it was not the functionality, scrolling, or storefront layouts that made the enjoyment of the comics difficult. The environment of comics platforms could often detract from consuming and reading, even drive readers away altogether, thus depriving them of comics. One well-publicized example has been the fate of ComiXology, once dominant in the offering of comics online as well as innovative in developing the ‘panel by panel’ or cinematic option for reading comics. Since its takeover by Amazon, there have been subscription and storefront problems especially for international readers, as well as functionality in moving the app over to Kindle. According to DCR2,

> I do think Amazon ruined ComiXology. The reading experience was right. The storefront was great. Now, obviously, it's with Amazon. If I want to get anything from ComiXology, I have to log on to the computer, buy it, and then download it. And you can't have subscriptions. It's really bad what they did.

A selling point for reading comics through ComiXology was the app and the selection of comics: at one time, the big commercial comics publishers and the independents sold through ComiXology, which was not only convenient from a consumer perspective but also provided a seamless reading experience that

promoted a kind of immersiveness. As of this writing, the big publishers like Marvel and DC have their own reading and storefront platforms and apps, forcing the consumer and reader to go in and out of separate apps and storefronts. Amazon has not been able to compete and, more importantly, has not had the will, seeing comics as more of a loss commercially, evident from the layoff of staff at ComiXology (Alimagno, 2023; Simons, 2023).

DCR8 also expressed dissatisfaction not just with other creator/reader platforms, their “terrible policies” and “issues”, but also with the platform which they have used as a reader and creator for the longest time, Comic Fury:

> Because I joined it when I wanted to do my comics, and I just fell into the pit over there. And now I have no way of escaping. I've never really read anything from Smack Jeeves, the other webcomic host, and that died or Tapastic [now Tapas].

DCR8’s problem with Comic Fury had more to do with disagreements on the site’s Forum which will be covered in more detail in Chapter Six. For this chapter, the key point is the frustration they felt over what they perceived as the dearth of comics creation platforms where they can also read and discuss comics.

5.4.4 Section Conclusion

In this section, the technical aspects of platforms and apps are considered not just in terms of functionality, but in terms of the degree of comfort, almost familiarity, that allows for a more immersive experience. Creators and readers (in DCR8’s case, both) also spoke of policy and commercial environment as detracting from the experience. Some of the readers especially spent a considerable amount of time on platforms, including Comic Fury and WEBTOON, as well as social media. In a sense, it was a ‘lived experience’, so any changes that intruded on that experience—to functionality, even appearance—made them aware of the technical environment which spoiled the creating and reading.

5.5 “Container Nostalgia”?: The Legacy of Print

5.5.1 Introduction

According to Chartier (1992), authors do not write books but texts that can be turned into books (see Chapter Two). However, some comics authors (writers as well as illustrators), as noted in Chapter Four, set out to write comic books, specifically graphic novels, with direct reference to the material form (placement of panels and art, colouring, for example) in the creative process. In other words, they are not just typing out a manuscript with no concept of what form the end product will take. They are creating print comics, and especially the physical format associated with them (see CCI2 below, for example). Some creators of webcomics did express an aspiration for turning the digital comic form into a print book, in much the same way as budding authors aspire to a publication in print (see CCW1 and CCC1 below, for example). This association of the comic form with a specific physical format, this “insistent materiality” to which the makers referred, for some has its roots in childhood reading (Gibson, 2019). However, Murray (2012a) refers to “new technologies and digital transformations [as] challenging the very notion of the book”, one of these challenges being the ”attachment to the codex form” or “container nostalgia”.

This nostalgia essentially echoes what research participants maintained: the print comic is here to stay. ‘Nostalgia’ may not be the exact word here: some participants did look with nostalgia on their print-reading days of childhood. But, as demonstrated in Chapter Four, they brought their comics consumption practices and preferences (see DCRs 1-2 above, for example) into the digital environment while still enjoying print reading. Findings reveal an insistence on the superiority of print, especially from the CGMs (see CGMM2 and CGMI2 below, for example), having everything to do not only with personal preference, but also the continued marketability of comics classics and the desirability of graphic novels. Despite these preferences, it must be noted that the data collected revealed a mixed economy among readers, including those who enjoyed digital and print comics as well as those who expressed a clear preference for digital comics.

Talking about print

In Chapter Two, the propensity for writing about digital comics in relation to print comics was noted in comics studies literature. In research that is resolutely committed to digital comics, I feel some explanation for the consideration of print here is required. As noted in Chapter Three, although the thematic codes ascribed in analysis are mostly researcher-derived (in that they reflect the research questions and theoretical framework), there was one set of codes that was entirely data-driven or participant-generated (Braun and Clarke, 2013, p. 207). Print comics invariably were mentioned in most interviews, but there is some context that might account for the expression of this preference.

This research took an expansive approach to what types of comics would be included in the digital comics category and, therefore, subject to study (see Chapters One and Two). The types of comics, represented by the CGMs, comics creators, and readers chosen for interview, ranged from graphic novels to webcomics, manga, comics strips, and applied or educational comics. Despite the overall commitment to producing digital comics (or at least digital versions of their print comics), the inclusion of print-first CGMs of legacy or classic comics as well as graphic novels meant there would be strong support for print, if only from a commercial perspective. Similarly, creators (or authors?) of graphic novels were interviewed, and, predictably, they not only expressed a preference for print, but also wondered whether their work was published in digital form (they were). In this regard, most comics creators and CGMs reinforced the literature consulted for this research where, even when digital comics were the focus of a publication, they were often viewed in relation to print comics. They spoke of print comics enough to represent a subtheme.

The attachment of collecting

As noted above, this affinity for print comics has been termed “container nostalgia” or “attachment to the codex form” (Murray, 2012). This “attachment” turns into “nostalgia” particularly when enjoyment of comics goes beyond reading and becomes “embedded in the collectability and rarity of the comic as artifact as well as for its content” (Murray, 2012a). Although comics collectors, collectability, and the act of collecting were not a focus of this research, participants (DCRs 1-3, 11, for example) spoke of their collections and the act of collecting as part of consumption

from childhood. According to DCR2, “digital does work. But sometimes you want the whole collection of it. Then, you can just sit down, pick it up, and read”. And, of course, collecting is a shared enthusiasm (even competitive). DCR2 speaks regularly with a friend about old and new comics, not just the reading but combined with collecting: “I will ask, first of all, are you collecting the series? Let me know when you read the final issue”. It is important to note here that comics publishing, especially of the superhero variety, has assiduously courted readers through the route of the object (and assorted associated merchandise). In this way, the consumer decision-making and other activities discussed in Chapter Four can be related to collecting. Indeed, in marketing terms, one of the results of this courtship, the collector, can be identified by the “consumer need for uniqueness” (CNFU) which most often manifests in the search for material (or in the case of comics, print) artefacts (Stough and Graham, 2023). Ownership figures prominently in the quest for and relationship to the comic: “for consumers, merely touching an object resulted in an increased sense of ownership (Stough and Graham, 2023). This also applies to comics readers (Pierce et al., 2001).

Although creators and CGMs especially, as conveyed in the findings below, did not always associate it necessarily with ownership, they did describe their preference for print most often according to touch: something that can be held in the hand, something with a spine. When they considered digital comics, they could not make the same correlation owing to the material differences in containers. When they were describing their experiences with print comics, often through the haptics of the senses, in one part of the interview, some of the participants would contradict themselves by talking about their relationship to devices, if not in the same manner, then in a way that was still informed by the senses.

Print essentially is the legacy device or container through which comics are experienced. It is important, therefore, to consider what research respondents had to say about print as context for how they discuss their “digital companions” through which they experience digital comics.

5.5.2 Comics Creators: Aspire to Print

That digital comics are difficult to separate from print comics harks back to the various definitions of digital comics (Chapter Two), certainly, but also the perspective

that most digital comics are just an electronic version of the real comic, the print comic. Downloadable PDFs, from publisher websites, crowdfunding websites, tablet platforms, and file-sharing sites, are just an alternative format for a publication that is intended to be print from the outset. This perspective was put forward by several CGMs and comics creators in this research and is also represented in the literature (see Chapter Two). A related view is that digital comics are essentially and uniformly webcomics and, therefore, created and published from the outset as a digital product. In other words, the creator intends that it is a digital comic, just as another creator's intention is a print comic (see Chapter Two for Kleefeld, 2020, on authorial intention as the final arbiter on whether a comic is digital or print). The author's or creator's intent (of a comic or book) can be at variance with the published reality. And there it may conflict with the reader's intent: where and how the reader first encounters it.

In almost the same vein, CCT2, whose creative process, according to their own words (see Chapter Four), is almost completely digital, responded to my request for interview:

> Lovely to hear from you. And I have no problem at all with talking to you, answering your questions, being recorded, etc. etc. However, the one thing I need to mention is that I don't do online digital comics. Well, I can think of one which was collaborative and for which I was one of many artists and drew one page. But that's all I can think of. If you're still interested to talk to me despite my lack of experience with online comics, let's fix a date (email to researcher 14 May 2021).

However, their work is available on Kindle, and as such may be the primary point of access for readers. Kleefeld (2020) does observe that because of potential conflict between creators and publishers regarding the version of the product (although some publishers might be inclined to agree with creators, see next section), "intent cannot be used exclusively as criteria" (p.3). Even so, he maintains that "intent still generally trumps initial publication venue" (p.3).

The research findings, to a certain degree, indicate that print comics still loom large for comics creators and readers. Even most webcomics creators/self-publishers, by definition digital-exclusive or at least digital-first, considered

publication in print as an ‘aspiration’. For some comics creator participants, print was not just what they did or intended, but what they preferred.

For example, CCW1, a webcomic creator who also works as an editor for a print-first comics publisher, retained a belief in print as being the ultimate end-product:

> I’ve only ever done… webcomics, but even that is so inspired by print culture, by *Archie* comics and old media. I'm obsessed with print, obsessed so I generally do think of things as sort of having some sort of an end [print] format.

They go on to describe a webcomic that was designed and formatted with Instagram in mind, and how it would have looked different if the objective was a print format. Regardless, the potential for reflowing or revising for print was always considered a possibility. Another webcomic creator, CCC1, had been working on turning their webcomic into a print book for 15 years. At the time of interview, the draft was 460 pages long, indicative that reflowing can indeed be challenging. They acknowledged that in this state, it was not “print-able” and required a lot of work to try to make it so.

However, a few webcomics creators/self-publishers created both digital and print comics, depending upon the desired audience, funding terms, the subject of the comic, or personal preference. For example, CCI2 did not have a lot of experience with graphic novels; their career was originally in illustration for children’s books. But an editor interested in their ideas for a graphic novel encouraged them to try creating short-form comics as an introduction to the form:

> He encouraged me to make some scenes which I did. I made eight issues of it… that I self-published. It's a print magazine, but I sell it in print and digitally. And I've also produced all sorts of other little scenes and art books and illustrated things that I sell online.

Nevertheless, CCI2 maintains a strong interest in print publishing:

> I think it's a mixture and I’ve always been quite print-focused just because I like print media. I’m quite nerdy about paper and things like that, and how things are presented, so I do enjoy stuff in print, but I’ve drawn comics that I’ve only published online.

Digital comics as the proving or training ground for print comics, especially the long form of graphic novels, indicates a view of them as ‘basic’ or ‘simpler’, just a few “scenes”. In the same vein of digital versions being draft stand-ins for print, digital drawing was seen as a streamlined prelude of getting the comic to print, even as a means of saving paper as with CCI2 in the previous chapter: “I end up with reams of paper that just went into the bin at the end [of drafting]”. CCI8 collaborated with illustrators who used tablets for drawing and observed how much more streamlined the process can be when not working with paper:

> Illustrators they worked with] both do now [work on a tablet]. I think they actually do all of that stuff apart from little sketches on a tablet which I think works out really well. I'd say most people, certainly in the digital space, webcomic space are probably working on tablets, because you can draw straight into a file, and you've got your vector file there and it's ready. But I’m old school myself.

CCI2 and CCI8 regarded digital drafting as a means to the main end product, the print comic. CGMO3, a webcomic creator and self-publisher, observed that publishing digital versions first as a prelude to building an audience is easier and “cheaper”. This is a practice adopted by traditional book publishers, not just by publishing digital versions first but also in recruiting self-publishers who have already built an audience on the web. It is also usually combined with marketing on social media. In a sense, this is “audience-first” publishing (Dowthwaite and Greenman, 2014).

However, CGMO3 does not just build an audience but lets the audience determine the version:

> Some stuff was designed to do that webcomic to print route and some stuff these days I'm just happy to publish it on the web…It depends on the series…I definitely wouldn't be attached to print. It's just another format for me…What my view of it has always been is that different formats have different audiences, so there is no point of publishing print to reach an audience that won't read it.

Indeed, the CGMI/S category (largely self-publishers and self-publishing initiatives and platforms) provided more mixed feedback as to the relative values of

print and digital versions than those creating graphic novels for book publishers. CGMC1, a creator with a webcomic collective, maintained that while members were committed to the web format, an eventual print version was something to which to aspire. Indeed, the collective can be viewed as supportive of this aspiration, as part of the tools for creators offered on its website includes a list of master printers. According to CGMC1, “there's maybe some kind of expectation that they're going to be printed at some point or maybe always like that to happen”. The aspirational element of the print comic represents more than a preference for its physicality: there is a sense of having officially arrived as a creator, as being officially recognized. CGMC1 indicated as much when speaking about webcomics creators and print.

The many references to print throughout the interviews demonstrate that there is a strong link between print and digital, and a consideration of the latter cannot be made without acknowledging the former. However, for at least two CGMs, it was not a case of preference for one over the other. CGMO3, as noted above, maintained that whether a comic would be print, digital, or both was specific to the individual comics or the intended audience in question. For CGMW1, the fragility of digital publications had to be acknowledged: there were still access and legacy format problems with webcomics, in particular. A print comic would generally be available for longer, barring distribution problems. Nevertheless, there is just as much satisfaction over a well-made (illustrated, designed, etc.) webcomic as there is for a print comic.

For CGMO1, a project-based comics creator and publisher, audience and funder requirements mattered more than preference for digital or print. While many clients preferred print, it had to be acknowledged that some digital functionalities provided new approaches and new audiences:

> There are things digital can do that print can't do…Hyper linking I think is interesting. There's different things that you can do with page layouts and the way that information is presented on the page. Where it's something that goes in a new direction or different direction from print, I think that's interesting, there's strong potential there.

As highlighted in Chapter Four, the creative process is predicated on digital technology. While creator participants acknowledged and even embraced this aspect, the aspiration to print remained strong. However, those creator self-

publishers, such as CGM01, demonstrate the influence an audience can have on what is finally produced.

5.5.3 CGMs: Print Dominates the Business Model

Before discussing their production workflows in interview (see Chapter Four), CGMs expressed varying opinions of what could be considered a digital comic, not only in the interviews but also in the exchange of messages prior. For example, while all produced digital versions, at least two CGMs did not associate these publications with 'digital comics': "Do you mean comics published online and in ebook format?" (CGMT2). Others regarded their digital versions as somewhat of a distant adjunct, not something that could be formally considered a digital comic: "All we do is convert our print materials to digital format. There's nothing particularly special about that process. We don't do webcomics" (CGMI7) or "We're predominantly print and we've kind of dabbled in digital a little bit" (CGMI2), and even "I fear we are not the best examples of a digital comics publisher" (CGMI6). Digital comics are those "conceived…as a digital product first and foremost" (CGMM2). For these CGMs, it was clear that digital comics were webcomics, born digital for the web. In other words, intentionality, even in and despite the production of digital versions in their workflow, was reserved for the print product.

Essentially, book publishers large and small producing comics, usually graphic novels, considered their digital outputs as a different and often subsidiary format to the print version. In other words, they did not consider the digital version to be a distinct form, just a different format.

A preference for print was not confined to CGMTs and CGMIs, those with the more traditional publishing business and production workflows among the cohort. CGMM2, a multiplatform company providing an app for digital reading, maintained that

> …words and images on a page are still profoundly powerful, and I think probably the physical side of comic books is still the dominant form…I think at least up until today, the dominant form for young readers is probably the physical format but for one exception: unlicensed manga translations being freely available on the Internet.

The CGMTs and CGMIs took on varying degrees of financial risk to produce both print and digital versions. This investment was highlighted in such areas as author advances and production values. High-value production of print graphic novels specifically was often emphasized as part of promotion on websites and social media. CGMI7's web page speaks of "groundbreaking and beautiful work" as well as "high editorial and production values", while CGMT2's Tumblr page talks of its beautifully designed print graphic novels. These comments illustrate that much care and attention are given over to the production of the physical object: the comic, and especially the graphic novel, is intended to fulfil more than just the desire for something "with a spine" (CGMI2).

However, the digital version could be considered a 'beautiful object' but only as a replica of print:

> The content is exactly the same. While there is something different about holding a physical comic/graphic novel in hand, and while I prefer reading physical comic books over digital (my answer is different for longform books and novels, where digital can offer superior UX, but that's not the topic of discussion), yes, the artwork within can be and usually is [beautiful]…Any deficiencies will be solely down to the capabilities of the reader's app or device. Of course, there will be exceptions to this — if a graphic novel has artwork spanning gatefolds [double panels opening across pages] for example, or if a special type of paper has been utilized (CGMT2 in follow-up email).

Regarding this comment, CGMT2's ebook production manager stressed that this was a personal, subjective opinion. However, those interviewed in the CGMM category also expressed the same opinion on the materiality, or the superior or preferable materiality of print. And even those whose publications were digital-first or digital-exclusive did not necessarily invest in XML workflows or the production of any kind of digital-only functionality that could not be reflowed. Indeed, branching narratives, where readers have choices over the direction of stories to a certain extent can be reflowed: this type of narrative began life in print, often as trails and tabs, folded pages, or print comics with digital components (Kashtan, 2018; Wershler et al., 2020).

In the previous section, some creators referred to digital comics as a prelude or draft version of print comics. Similarly, CGMD1, who runs a print ‘marketplace’ for comics (people can sell second-hand comics) as well as a self-publishing platform and app for digitized comic books, talked about the digital comic almost as in service to the print comic. Their promotion of the app on the website (it was a relatively new development when they were interviewed) almost competed with the encouragement of print sales, especially by collectors:

> I like to think that the…app is a way of people discovering their next favourite comic book and that they will go and invest in the print copy either from the high street store or direct from the creator [on the platform]…They'll want to find out the next comic book that they need to invest in… I was always very careful not to have the app as a competitor to that. We wanted people to use the app to discover these comic books and having a portable way so that you can still collect the physical one and keep that all bagged and boarded if you need to and in the mint condition and read the comic book on the app.

As discussed above, the print comic provides the potential for being a collector’s item, as well as offering an enjoyable reading experience. CGMD1 implies that there is not the same attraction for the digital comic.

CGMD1 also refers to the material importance of print, equating it to the collection of other types of media:

> And the thing with comic book collectors, the same with vinyl collectors, is that they want to have that hard copy in their hands. They want to be able to touch it, smell it, read through it, all that sort of stuff. It’s a very tactile thing.

CGMD1 raises a few interesting points here about the haptics of touch and print comics and about the priorities of collectors. But more importantly is the point that the app is in service of the print comic (and not the digitized comics offered solely through it). At the same time, it represents a dual economy of a sort: print for collecting and preserving and digital for reading. This view of the relationship between print and digital, especially by creators, illustrates Stough and Graham’s (2023) research on collectors and ownership as motivation.

5.5.4 Readers: A Mixed Response

The readers participating in this research had a mixture of perspectives relating to digital and print comics. The mixed, but in some respects, predictable assortment of opinions and experience had something to do with demographics (readers filled out a brief survey before interview, see Chapter Three). The predictability mostly came through a divide between those aged 40 and over who began their comics reading life as avid print readers, and those under, especially in their 20s, who began reading comics in digital format regularly. *The Beano* was a real print touchstone, especially for older readers: “I was really really into them as a small child almost, always into *The Beano*, *the Dandy*, *Whizzer and Chips*” (DCR1). For a few, especially those with UK childhoods, *Beano+Dandy+Eagle* then onto *2000AD* was a common trajectory through print comics, although the graphic novels of Neil Gaiman were cited by a few respondents: CGMI2 and CCC1 read through Gaiman’s graphic novel collections, for example. These works were mentioned especially by webcomics creators as influential in childhood and young adulthood, *The Sandman* being a particular favourite. DCR4 had only read it online, on the phone:

> I don't know why I'm more flexible with reading *The Sandman* on my phone. It may just be that it feels outside of the narrative flow of the webcomics that I normally read [on my laptop], maybe something that I just think, ‘Oh, I have a bit of time now. I could read a bit of that’.

Others who had read *The Sandman,* mostly creators, had read it in print. However, DCR4 demonstrates here the reader's relationship with devices, the mix and match depending upon the comic.

This avid print reading generally continued into adulthood although usually tempered by finance. DCR8, for the most part an exclusive reader of webcomics, especially on Comic Fury (a creator platform on which they created as well as read), stated that if they had the space and the finance (“space is the main problem and the dust”), they would buy print comics and might to a certain extent even prefer print comics. However, they went on to temper that preference by saying “there are more options for reading online” and “you can adjust the screens” on a device:

> But there's a lot of comics that work better digitally, because you know of all the image files and all that, and also the interactivity, and also the increased chances for gamification.

Moreover, a different type of issue with space worked against print comics: “I don't need to dominate a chunk of my desk to the books, while I also talk to people online while reading the same thing” (DCR8).

The issue of finance, especially among the students of the research cohorts, weighed heavily on the choice to read digital comics. But it was not always their finances that were of concern. DCR2 felt strongly about supporting creators through Kickstarter:

> I do get things off Kickstarter. Sometimes there's something I want to support. But if it's from America, and the postage is more than the book, then digital does make sense. And sometimes there's a series that I've read digitally, and I thought, you know what, I want to support them. I'd love to have that in print. Sometimes the look of it and reading of it in print is still there.

For a couple of readers (DCR3, DCR10), digital was the preference for reading comics because of physical challenges such as failing eyesight or arthritis in the wrist which made holding books difficult. They emphasized the ability to enlarge the screen, to zoom in, all the functionality that is unique to digital reading. It was this functionality as well as other functions that encouraged DCR2 to explore digital comics:

> There is [more control with digital comics]. And I think there are a lot more options that perhaps people aren't taking advantage of. I remember when Marvel tried playing around, and for a little while they were using virtual reality for their comics. So with their physical comics you scanned a QR code and you've got extra things like that.

DCR2 felt that if people were willing to experiment, whether it was with functionality or a new format, then they would see the benefits of digital comics.

5.5.5 Section Conclusion

The regard research participants had for print was often driven by haptics, business models, ownership, and budget. While there was some firm affinity for the print container among CGMs tied to business models, creators lured by the desire ‘to be published’, and readers brought up on a print diet of comics, there was a preference for digital functionality that sometimes belied this ‘harking back’ to print. Moreover, as readers demonstrated, there need not be a ‘harking back’, an ‘either/or’. Digital or print did not necessarily matter, but whatever suited the context of creating or reading.

5.6 Chapter Conclusion

On the face of it, it would seem that the digital technology necessary for the creating and reading of digital comics is more of a hindrance than a help. There are certainly the advantages of a physical comic book that can be held, owned, and potentially appreciate in value. But the drawbacks of the device containers for digital comics must be seen in a larger context. As Carolus et al. (2019) suggest, mobile devices, as well as desktops and laptops, are not just technology to be used. Devices, especially smartphones, have become external extensions of all aspects of daily life. People participate in multiple communities online as well as engage in other forms of communication, this despite problems with the technology itself, the expense, and mental and physical health issues that are a constant part of living within a digital ecosystem. This is the nature of most of the issues expressed by readers, and for the most part they worked around the problems because they not only enjoyed reading comics but also being able to read them online, for whatever reason.

This chapter demonstrates that this experience of reading and creating must be considered within the total context of all daily digital use. For example, casual, incidental readers usually encountered digital comics during other online activities (DCR5, DCR7, DCR10, for example). If they experienced problems with devices, it was not expressed in relation to digital comics but as a part of this wider experience. The committed readers and especially those who grew up reading print comics were more likely to frame their problems with devices as problems with reading digital comics. In other words, they read other material on phones and tablets, but these

issues became more problematic for them when they read digital comics. As suggested above, this perception of digital comics proceeded from “cognitive comics maps” which not only expected but demanded that digital comics act and look in the same way as print comics, whether or not they were derived from a print comic.

Committed comics readers were also more likely to read comics on comics-dedicated platforms, whereas incidental, casual readers read, as a matter of course, on non-comics apps and platforms. Their whole approach to reading digital comics proceeded from the ecosystem or community where they encountered them: as they came across them incidentally, there was no ‘comics’ expectation in terms of what they looked like. This expectation was much higher for those specifically using comics apps with more of a background in reading print comics. Some were more flexible, for example those who read webcomics regularly, about reading on apps and comics platforms as well multiple devices.

A takeaway from this chapter is not just the ubiquitousness of digital devices but the multiple devices owned and used to read comics, and in at least one instance to read from the same comics platform. This also applies to the creation of comics: creators not only engaged with multiple software packages but also multiple devices. They did, however, usually start from one device, often a tablet that became an extension of their creativity, their creative self. And, as with one example, they would use any configuration necessitating other devices instead of giving up this device.

Ultimately, the experience of the comic is connected to the experience of the device, the haptics, the challenges, and how this experience is an extension of the user. The experience of digital comics cannot be separated from the device containers that enclose them: experience, device, container are all components of the digital comic. This chapter demonstrates that these devices are not just technology or appliances to be used, but that they themselves are so ubiquitous as to be the constant companions of the research participants. Moreover, it illustrates how personal the use of devices is, the choice of file, or the functionality of a platform. All of these parts of a digital comic contain or embody the people, their preferred content, and social preferences, essentially lives lived in the wider digital ecosystem.

Chapter Six
Are We Really Communicating?
Communication and Relationships through Process, Platform, Content

Chapter Overview: In the previous two findings chapters, the processes and routines of making digital comics (creating, producing, distributing, consuming) and experiencing them through various containers have been explored, revealing a diverse comics ecosystem of makers, content, and technology, both comics- and non-comics-based, often responsive and adaptive according to circumstances. In this chapter, introducing the 3rd theme, research participants discuss and demonstrate the type of human (and human-computer) communication that drives these processes, serving as the catalyst for the development of the wider digital comics ecosystem and, in turn, personalized user-generated ecosystems. This communication immediate and extensive in amount of information, media, and messages shared varies, however, in substance and type across the creation-production-consumption continuum (Section 6.2). The previous chapter demonstrated the importance of platforms as the containers for access, and in this chapter, distribution (and the platforms providing it) is viewed as the engine of communication, the nexus of online communities (Section 6.3). Of the main drivers of this communication, digital comics readers perform two roles: as consumers, as explored in Chapter Four, and in this chapter as responsive readers who not only 'create' comics in their response and sharing but also their own ecosystems of which digital comics are a part (Section 6.4).

These findings respond to Research Question 3—What kind of communication takes place, what kind of relationships or communities are developed among those who create, produce, distribute, consume, and read digital comics?

Also, they address Research Question 4—Does technology, for example social media, apps, etc., facilitate and influence this communication and these relationships?

6.1 Chapter Introduction

Communication is the thread that runs through the findings of the previous chapters on processes and digital containers. Platforms can be seen as the engines of distribution: they have magnified the quantity and, to a certain extent (and because of that quantity?), the diverse quality of that communication. The findings in this chapter illustrate the influence of communication between 'actors' or makers in these 'spaces', at the same time as they illustrate the type of communication that takes place. Moreover, they stress the importance of communication: its importance in the production of culture and of the role digital comics play, especially in the wider digital ecosystem, the digital comics ecosystem, and personalized user-generated ecosystems. The influence of comics fans on content and the industry has often been cited (see Pustz, 2016, p.274, for example; although Martin Barker, 1989, makes the opposite claims in his work with a UK comics publisher), implying a transactional level of communication that makes them a part of comics creation. While the number of online blogs, comic news sites, fanzines, and discussion groups seems to be evidence of fans as vocal ("a vocal minority" as Gabilliet, 2010, would have it), creators, CGMs, and readers in this research present a very different picture. An important motivation of this research was to analyse this communication and to understand its potentially more nuanced role in the production of culture and digital comics ecosystems, as well as in the wider digital ecosystem.

In Chapter Two, types of communication were reviewed that have helped to highlight how makers of digital comics not only communicate about them, but through them. These include linear communication, essentially a one-way message from sender to receiver. In addition, there are multi-directional types: the interaction or interactive model, where simple feedback is exchanged with creator and reader alternating; and the transaction model, where there is simultaneous and co-creative communication.

The product of the making processes is, in a material way, the digital comic. However, in a larger sense, it is the digital comic as a form or manifestation of communication that brings makers together in sometimes flexible and sometimes stable communities of interaction and transaction (Narula, 2006). In addition to the communication models mentioned above, data was analysed according to instances

of ‘communicating value’ to other creators, publishers, and readers through financial transactions as well as other support given to the creative process. When finance or creative input could not be provided, creators were still encouraged by CGMs that would host; provide software tools and advice; promote, discuss, and market; and provide editing and proofreading services. This whole range of support would have originally come from a traditional publisher. Taken together, the communication models, values, and support offered laid the groundwork for building comics communities.

In analysing the types of communication, this chapter revisits the two containers of Chapter Five, devices, apps and platforms, but in such a way as to understand whether they have facilitated interaction among the makers. There is no doubt that the ease of communication is predicated on devices, apps, and platforms (Guigar et al., 2011). All this time saved should result in more time spent communicating and building relationships, it could be assumed (and it has been maintained by Guigar et al.). However, the responses from the research participants—creators, CGMs, and readers—were mixed when it came to communicating with each other. For example, while creators and editors of book publishers described a ‘transactional’ type of communication (where they are simultaneously involved in the act of creation), creators and readers (even in the cases of self-publishing) often communicated in an ‘interaction’ fashion (where the creator sent out the comic and the reader would send feedback, for example to the comments section on a webcomic or social media page). Often, keeping the communication at this level was purposeful on the part of the creators, setting boundaries between the readers and influence on the content (see Butler, 2021). There were exceptions to transactional interaction that were not entirely creator- or CGM-controlled (see CGM01, CGM03 in Chapter Four), mostly on self-publishing platforms that also provided discussion boards and where creators and readers were interchangeable (see DCR8 below).

This last example introduces the presence in the research of personalized user-generated ecosystems, where digital comics readers created their own kind of super-platform environment in which to read and interact. These included digital comics content platforms and apps, but more often non-comics platforms including social media and news sites. These platforms acted at once as distributors and

conduits of communication. Not only did these ecosystems contain platforms as a way of accessing digital comics, but also offline content and tools (as seen with creators in Chapters Four and Five). In these ecosystems, digital comics readers could opt in or opt out, avoiding algorithms and even other people while focussing on and responding to the content.

The overall organization of this chapter follows the digital comic and the communication pathways as they go from creator to CGM to distributor-retailer to reader, always with the focus on what kind of communication is taking place, and what it says about the digital comic and its place in the digital ecosystem at large and the personalized ecosystems of creators and readers.

6.2 Communication According to Creators and CGMs

6.2.1 Introduction

Digital technology has brought more immediacy to communication among comics creators, CGMs, and readers in that it is more quickly sent and received (Guigar et al., 2011; Manzerolle, 2014; Dowthwaite, 2017). However, the quality of that communication varies. Findings reveal that the level of communication at the beginning of the making process, specifically creating, editing, and sometimes producing, is the most intensive. For example, creators attained a level of transactional communication, in other words, communication that leads to creative exchange adding value and meaning, with other creators in a team environment. This exchange extended to feeling supported among their peers, namely other creators they met when attending conferences.

Creators and book-based CGMs (of graphic novels, for instance) engaged in a high level of transactional communication. This type of communication involving editors did not just occur in the making of graphic novels: multimedia companies (CGMMs), including traditional comics publishers, collaborated closely with creators, mostly through editors, to achieve the comic vision as did comics projects managers in the self-publishing category (CGMI/S). Transactional communication did not just occur over content: creators and CGMs engaged in ‘value communication, in other words, ascribing quantitative, financial value to the comic and the creator’s work, and to readers through pricing and promotion.

While creators and CGMs demonstrated varying levels of communication with each other, their perception of their relationship with readers appeared to be mostly of the interaction, feedback type (praise for the comics, for example). Creators and CGMs expressed concerns about allowing readers input on the creation side, wanting to preserve boundaries and ownership of the content.

6.2.2 Creative Teams, Creator Support

In this research, most of the creators both wrote and drew, while one was an illustrator with no real input into the text or story (CCI1: “I’m totally reliant on other people telling me what to draw”). Teams of authors and illustrators did not figure predominantly in the research cohort. However, there were examples of creators working together on projects and creators who worked directly with cultural institutions to produce comics. This collaboration to produce a digital comic was often achieved remotely; in other words, the creator was not necessarily required to be on site regularly.

Graphic novels were often produced by book publishers, with creators working closely with editors. According to CGMT2, the editing process could be a protracted one:

> At all stages of editing, we go back and forth with the author. Then there's also galleys and proofs and things like that. We always work with a proofreader as well, who's just a final set of eyes.

This “back and forth” suggests the significant role the editor can play in the content of the comic. Editors are not only offering support but also contributing to and adding value to the comic. However, although the creator essentially created the message, the digital comic, in the hands of the editor, it came under the publisher-controlled editing and production process (see Chapter Four for creator-editor relationships).

It is no surprise that creators controlled virtually all the processes that led to the final digital project in the self-publishing categories. However, this did mean being alone with the text at the beginning, with no editor presence, and for some, if they are doing all the work, no team members. Indeed, it might mean less support and input from others throughout the process. Creators/self-publishers did find other

avenues for support online and in person. For example, CCC1 published their webcomics through an online collaborative (CGMC1) where support as well as software and design tools were offered to members:

> The idea is to support each other as a kind of community. [On individual webcomics sites] you have the [collective's] banner at the top of your site, and you can go from that banner to any of the other comics [in the collective]. So, the point is that the banner at the top of your comic is giving traffic to other people; it's sort of mutual.

CGMC1 was not a faceless platform leaving the creator entirely on their own, but a community of creators who were a tangible presence in the creative process. The platform's role will be explored in more detail in the next section.

DCR8, who was interviewed as a reader but was also a self-publishing creator, spoke of the support and input received on self-publishing platforms, such as Comic Fury. They spoke of the mutual support given by reading each other's work as well as through discussion: "I'm friends with a few webcomic creators, and I just keep on reading their stuff as well". They also mentioned being approached by other creators who liked the comics they published (see below).

This mutuality, collegiality, was also mentioned in connection with comic conventions; comics creators, especially those who were self-publishers, felt supported not only by readers (if they had a table at the convention selling merchandise, print versions, etc.), but more importantly by other creators. According to CCW1, "conventions are my time to shine. I love a convention. That's where I would sort of really gear up and [introduce] new comics". CCI2 spoke of "never [having] a bad experience talking to anyone at a convention or festival" and that it was a great place to "meet people who make books that you think are incredible…and just have a chat". CCI8 also emphasizes the people, communities, and physical spaces:

> It's very much about that kind of physical thing. It feels so strange obviously, in this post-COVID period, but it used to be so based on conventions, about people, and about this sense of community. And to [me] and to us at [comics publisher name] that always felt like a physical thing, I think that was so

grounded in the physicality of those spaces, but also in the physicality of print as well.

Although CCI8 felt that the benefits of the physical space of conventions were connected to the physicality of print, it is important to note that webcomics creators and other self-publishers appreciated the space for the people they met and the reminder that they were part of a community. This was not connected to the kind of comic they produced; they were as interested in print as they were in digital comics. But they were particularly interested in meeting other webcomics creators, a community within a community.

CGMC1, the webcomics collective represented by a creator for interview, talked about creators supporting each other through reading:

> I think you suddenly have a different interaction with something when it's your friend's comic. I feel like those are in a different category in my mind. When you say favourite webcomic, I tend to be thinking of ones that aren't [a friend's comic], and I don't really know the creator because I'm consuming that as a fan. Whereas when it's something where I know that person really well, it's got this kind of other [meaning] even if I don't know where it's going. I am reading it as a reader, but I'm still like I know the process behind this.

A few research participants mentioned the creator-reader dynamic in terms of comics creators being comics readers and vice-versa. Here, CGMC1 describes this particular type of reading where the focus is not only on the content but "the process behind it", including the drawings, the panels, and the colouring.

The largely linear production models of book, comic, and multimedia publishers (as represented in Chapter Four) can be viewed as closed digital publishing ecosystems, in the sense that they are closed off from any substantive, transactional communication with readers. The closed nature of some digital publishing ecosystems relates to the original biological definition of 'ecosystem': "a functional unit with recognizable boundaries and an internal homogeneity" (Smith, 1973). In the digital publishing ecosystem, the readers appear to be beyond those boundaries, with the creators and publishers providing the "internal homogeneity" through which the works are controlled.

Squires and Markou (2021) discuss publishing ecosystems as an overall system composed of multiple publishers: “First, an effective publishing ecosystem needs to have business start-ups; developing companies; and established companies (e.g. Tiers 1–4, and ideally larger)” (p.435). Even so, it is implied that the ecosystem is composed of those who work with creators or with publishers, so excluding readers. What this study of digital comics demonstrates is how platforms have allowed other agents, namely readers, to have a direct influence on the publishing ecosystem (Tomasena, 2019).

6.2.3 Communicating Value: Creators and Book-Based CGMs

The commercial book and comic publishing production process (for graphic novels as well as legacy comic titles) follows the initial conversations between the creator and the CGM, whether they concern contract negotiations or editing and design: “Over the years, a lot of the projects start with conversations and discussions and scribbled notes on a piece of paper. And at some point, that becomes the project plan” (CGMO1).

Although the approach described by CGMO1 may be somewhat informal, the emphasis on communication, the formal and informal parts, is critical. The publishing process begins with communication, the message (comic) exchanged between the creator and CGM. However, the initial stages of the process include more than one type of exchange, the first of which is not necessarily the transfer of the digital comic object. Sometimes, in the case of CGMTs, CGMIs, CGMMs (involved in more traditional, commercial publishing) and some CGMI/S, the first step in communication may be initiated through an agent, or a cultural institution, or a CGM may know of a creator’s reputation through social media. Creators do not always send in finished comics, but ‘treatments’ or proposals to attract the attention of the CGM and commence negotiations. The negotiations between creator and CGM are often the first step, followed by the transfer of the digital object, which set the workflow and communication process in train.

6.2.4 Discovery, Collaboration, and Partnership

Not only do the negotiations between creator and CGM set the communication and production process in train, but they also are an illustration of a type of transactional communication that often presages the treatment of the work:

protracted and substantive in the service of creating meaning, as well as adding and communicating value. Dowthwaite and Greenman (2014), in their research into online comics business models, discuss “communicating value” (p.71) and the “four factors [that are] important to business models: activities, financing, people, and value” (p.1). While a popular conception of the first contact between creators and publishers is of creators (authors) sending in a manuscript (cold) usually to languish in a pile of many such, the CGMs in this research cohort often deflected that move in favour of seeking out creators who had already proved their value, either through previous publications or on social media, for example.

For the most part, book publisher and multimedia CGMs would open communication with well-established contractual arrangements for royalties and rights, in other words communicating value in a quantitative, financial manner. But more innovative arrangements consisted of establishing partnerships and collaboration with creators, not just for promotional purposes but also for the sharing of royalties. These types of collaborations and partnerships, occurring mostly but not exclusively with small press and independent publishers, signalled a type of communication and relationship between CGMs and creators that acknowledged not only financial risk but also an almost personal belief in the value of the comic. CGMs in this position often consisted of a small, dedicated staff. A subset of the types of communication previously discussed (above and Chapter Two), value communication requires of CGMs and creators a belief in the comic that is then communicated to consumers. As a result, this communication happens from the first interaction between CGM and creator and proceeds throughout production, distribution, and consumption, establishing relationships across the creation-production-consumption continuum.

Discovery: prize-giving, reading, and scrolling

Some CGMs interviewed largely initiated and determined the contact with creators: through agents, commission, or prize-giving, including those for “first drafts” (CGMT2, CGMI6, CGMM4, CGMO1). Others encouraged it via uploads: CGMD1, a platform-marketplace for selling print comics, promoted conversion to digital formats to upload to its app. Others, such as CGMI1, accepted unsolicited (‘cold’) submissions from creators.

In the CGMM category, the initial communication with creators occurred in a fashion similar to the ‘work for hire’ model favoured by well-known American comics publishers such as Marvel and DC (corresponding British CGMs would be Fleetway and DC Thomson). Comics creators would generally have an established reputation before CGMMs would take a chance on their work. Interview participants cited social media, for example Twitter or Instagram, as channels for finding creators, their work, and most importantly, their readers.

CGMTs and CGMIs interviewed found creators, for the most part, in a similar way. According to CGMI2, “it gets to the point where all you're doing is replying to people saying you don't want to publish their books which is probably the least fun thing to do. So, I tend to prefer finding new creators”. Consequently, CGMI2 “[ended] up reading [other small press publications] just looking out for creators”. CGMI2 refers to this as a kind of “curation” of creators, selecting for approach those they like. But their “curation” did not rest solely on previous publications: “We tend to learn about them through social media and also going to lots of shows [conferences and conventions]”. In addition to established creators, they also found self-published comics creators and their work on Twitter and Instagram.

The value for CGMI2 was not necessarily to be found in creators having a huge following on social media:

> That's always a bonus. But some people we go with have followers below the hundreds, and we see it as part of what we do. We work with a lot of new young creators, and what we do is bring exposure to their work and increase knowledge of it. That's primarily what we're known for, really, is discovering new talent.

The emphasis here for CGMI2 is not just in the discovery of new talent, but in the communication of their value, raising their profile among consumers and the comics creators’ and readers’ communities. What was implied through the interview was that this “being known for discovering new talent” also communicated their value as a small press publisher, thereby attracting this new talent who would perceive CMI2 as a worthwhile publisher with which to be associated.

While some small presses might work with agents, for the most part, those interviewed in this category and other categories (CGMM, for example) worked

directly with creators. For CGMTs (large, traditional book publishers), for example CGMT2, initial contact was usually made through agents, although there might be some interaction with creators through social media. That a creator is represented by an agent was already a demonstration of value especially for large book publishers, a method of “curation”. Still, CGMT2 spoke of scrolling through social media accounts for much the same purpose as the small press publisher, CGMI2: to discover new talent. This demonstration of value through social media is a relatively new way of discovering talent, allowing the publisher to learn discreetly about creators—their talent, their marketability, their audience—before even making an approach. Publisher control of the production process was discussed in Chapter Four, and another form of that is illustrated here, before the creator even knows they have the publisher’s attention.

In addition to the filtering of creators via agents or prior knowledge through social media, CGMs interviewed applied other forms of selection when considering publications. All CGMs interviewed resorted to some form of selectivity, whether it be explicit (submission or membership requirements) or implicit (rejecting or pulling material based on objectionable content, etc.). CGMC1, a collective, even looked at reputation as a criterion for membership. In this instance, reputation does not refer to publishing record but whether a prospective member would disrupt the community, behaviour-wise. Another, CGMD1, said once a title was uploaded, it was not automatically available on the app. It had to be ‘approved’ first (hardcore, gratuitous, or violent sexual content considered unacceptable), and then made available on the app within 24 hours.

Of all the CGMs interviewed, apart from the self-publishing categories, CGMI1 was the only one to accept cold submissions (they resembled self-publishers in their royalty arrangements with creators). While there was some acknowledgement that creators published were often known to them, CGMI1 had a particular sympathy for new creators and the nature of publishing on the web:

> I think a lot of the creators are people that are just breaking into [publication], who are really just too glad to be in a publication that's put out by [CGMI1 editor]. So it's a good jumping off point for people. But whether we're doing them any favours... I mean, there's mass unemployment, except it's not called

> unemployment, because we're freelancers. And, it's not even a contract, but it's you're doing it yourself and publishing for yourself.

CGMs were not just earning based on a share of sales; some relied heavily on conventions in much the same way creators did, as well as on merchandise and ad revenue, and especially on collaboration with creators on promotions. This was especially true for those in the self-publishing (CGMI/S) categories, including platforms, collectives, and webcomics creators. CGMI1 also depended upon conventions, but not to sell merchandise as such:

> [CGMI1] has been affected by COVID insofar as there are no conventions going on. We sell cards at them that give people access to back issues. That was a major source of income.

CGMI1 enticed new readers with access to back issues, access that could only be acquired through cards handed out at conventions. They were promoting their comics and providing access, but in such a way as to communicate the value of the most current content by driving readers to the website for back issues. Readers in this study often spoke of beginning with a new comic by reading all the back issues first. This strategy of creating desire for the current issues through free back issues demonstrated a knowledge of comics readers and their consumption and reading processes. Not only were conventions a main source of income for CGMI1, but also a way to meet with creators, both those who had published with them and new creators.

In the next subsection, CGMI1 demonstrates this sympathy for the financial plight of their creators, illustrating that instead of “royalties”, partnership and collaboration allow both CGMs and creators some degree of control as well as financial risk-taking, communicating belief in the value of the comic.

Taking a risk: contract or partnership?

The amount of time spent negotiating royalties or other forms of remuneration, such as flat fees, often indicated the amount of risk the CGM was willing to take in accepting a publication. In the case of the CGMI/S sub-categories, this negotiation could be minimal to non-existent, sometimes just a terms and conditions statement on a website. But for others, the negotiation could be more protracted.

CGMT2 supplied author advances, upon the signing of contracts (“on signature”) and against royalties, while the CGMIs interviewed generally did not. However, advances could be paid on the proviso that they were to be deducted from the royalty payment: “We can do a small advance and then it would be a 60/40 royalty split, but primarily what we've done is a 50/50 split” (CGMI2) (see more about “partnership split” according to Murray and Squires, 2013, below). The relationship between advances and royalties largely required recouping production costs, depending on sales. And while CGMI2 felt the distribution of risk in their royalty split was worth it for them and creators, they drew a line at working with creative teams because there realistically would not be enough to go around:

> It tends to be just one creator like 95% of the time. We don't really like working with groups of people. I mean, the sort of money, I kind of feel bad. The profits aren't going to be enough to pay more than one person really.

However, the lack of remuneration was not the only element preventing them from working with teams:

> They have a way of dealing with their relationships as well, which we don't want to have to deal with. It's more the unity of vision that we like [of working with one person on a comic and offering] them [that] kind of help.

This perception of working with a team directly would dilute “the vision” is interesting from the control aspect of the value of the comic: dealing with multiple people might be complicated, more difficult to exert that unity of vision. Indeed, it is not necessarily clear here whether the unity of vision is being ascribed to the creator or the CGM.

While advances could be higher with CGMTs, CGMIs were generally more generous with the royalty split. What a comics creator can earn per item sold, on the face of it, increased in the CGMI category, but earnings at first glance can be even more significant in the CGMI/S (self-publishing) categories. CGMDs, for example, act more as distribution and retail platforms, taking a percentage of sales to recoup costs, while the comic creators absorb the production and promotion costs themselves. These costs and labour can detract from earnings. It is also in the CGMI/S (self-publishing) category that more investment in digital-first and digital-exclusive comics publications could be found: for example, by the members of the

webcomic collective (CGMC1), the distribution-retailer platform which developed an app for digital publications (CGMD1), and the self-publishers in the CGMW category.

For the small press publishers (CGMIs), investment in a digital publication was seen as posing less of a risk financially, and in a way testing the waters for print. According to CGMI2,

> Recently we discussed the option for creators where, if they had a book that we didn't think would make particularly a lot of money by costing a lot to print, we would only do it as a digital version. I think there's definitely a way forward there, especially for kind of very niche creators.

In a sense, this approach reflects the scrolling through social media accounts by CGMI2 and other CGMs looking at self-published creators: the success of a digital publication and the attending audience it could bring made it worth the risk to print. CGMI2 was merely bringing this approach in-house, because they felt there was some value there but not enough to risk a print run.

CGMM4 commissioned work (as did CGMM2), paying comic creators a one-time only fee, a business model similar to the ‘pay or work for hire’ teams of Marvel: in fact, CGMM4 “took it as a huge compliment” to have its business model compared to Marvel. However, CGMI1, which bridged the small press and self-publishing categories, operated on the partnership model as identified by Murray and Squires (2013). They describe “direct partnerships with creators, rather than via literary agents. Instead, they offer a very generous royalty share” (p.9). CGMI1 and CGMI2 both had a similar agreement with creators. CGMI1 described the royalty split as being shared among creative teams, including the comics creators featured on the website and the CGM itself. Moreover, CGMI1 expressed concern about not paying up front and how they addressed it: “when I set it up (royalty share), because we weren't paying people up front, I tried to make it a very good deal for the creators on the back end”.

Unlike other small or independent presses in this category, CGMI1 is digital exclusive to the point that its founder was described as “anti- print” (CGMI1). They believed that the relationship between the creators and themselves should be without constraint on both sides because that was what the digital environment was all about, or should be. Both sides assumed the risk of publication (loss of

investment in time, resources, etc.), and both sides reaped the rewards. According to CGMI1, “you get as much as you’ve put in. That’s how much you get”.

Other royalty payment models included a payment each time a title was accessed on the app. This was the case for CGMD1, a self-publishing platform provider. They firmly believed in sharing the royalties each time something was read on the app, for which readers paid a subscription.

Small publishers, such as CGMI2 (and CGMI1, CGMI6, as well as platform CGMD1), extended the concept of partnership to promotion and publicity. For example, CGMD1’s sharing of royalties and promotion was seen as part of the partnership agreement:

> A lot of the creators are very, very hands-on with the stuff. So essentially, I got the website built and I got the app built…But the great thing about all this is the creators are also doing their own self-promotion. So it all feeds into the whole thing, and I guess another reason for using the royalty split is because I feel that all the creators are a part of this project.

CGMI2 did not just see it from a partnership perspective, but from that value communication mentioned earlier: the involvement of the comics creators sent a message to prospective consumers:

> We do quite a lot with the creators where we can. It's always best to have as much involvement from them as they want to give. We push them a little bit but not a lot, like if they don't want to do podcasts, or doing video, perfectly fine. We just figure out what they're happy to do. Because they're benefiting from that. They're linked into how the book sells, and they're always pretty happy to do whatever. And they will be pushing us as much as we push them to do a bit more on that.

Here, CGMI2 expressed the partnership as an interdependence, for mutual benefit, a different relationship as expressed by traditional book publishers and multimedia companies who take most if not all financial risk and therefore control. The smaller publishers share the risk with the creators. According to CGMI6, “we are very much dependent on our comic creators and audience. So, you know, not just comics readers actually, the creators themselves, supporting one another”.

In other words, the partnerships between the small press and platform CGMs and creators fostered a community where the communication was not just around enhancing the content but building the kind of support with creators and readers that communicated value.

Webcomics and crowdfunding

The relationship between creators and CGMs, including CGMTs, CGMIs, CGMMs, and some project-based CGMI/S, appears supportive and transactional, if not all the way through, then at least at the beginning when both parties are hopeful of risk rewarded. But what of self-publishing creators, specifically of webcomics? It would appear that there is no support between creation and distribution, as they are often on their own during all phases of creation, production, and distribution, 'communicating' with nothing else but their website or a platform.

There were, however, other avenues for creative communication, for support with tools, hosting, software, and where creators could interact with other creators, other people in general. For example, comics collectives figured among the self-publishing CGMs, including CGMC1 whose business model was discussed above. The support offered was explicitly demonstrated for this research in that three participants came from the collective via snowball sampling: CGMC1 recommended creator CCC1 who in turn recruited their reader, DCR8.

While CGMC1 could not supply actual financial support, they encouraged other options, such as merchandise. These avenues for revenue were adopted by the webcomics promoted by CGMC1, and described as follows by Guigar et al. (2011, as quoted by Dowthwaite, 2014):

> The basic webcomics business model is to offer free-to-the-consumer, ad-subsidised content, which then trades on audience loyalty by selling books, t-shirts, merchandise and original art. This audience loyalty is cultivated through social media (p.121).

Dowthwaite (2014, 2017) mentions another type of webcomics business model, which she calls "patronage", also known as crowdfunding (Kickstarter, Patreon, etc.).

Individual webcomic members of CGMC1 adopted the common model of offering merchandise or even print versions for one-time payments while the weekly

online content was free. But a few creators, of both webcomics and graphic novels, relied on Kickstarter (CCI1, CCI8, CCD1) as well as Patreon (CCI2, CCC1, CCW2). While these large-scale crowdfunding platforms allowed direct communication between creators and readers, they did not offer the more personal support of a small platform owner like CGMD1. But support from a platform CGM was not the reason for engaging with these revenue-generating options: as Dowthwaite (2014, 2017) mentions, and as do the creators listed above, what was most appreciated was the direct support, the signal from the reader of value and loyalty.

There is more on creators and CGMs describing the nature of their interaction with readers in the next section, including more detail about what happens on crowdfunding sites. Interaction with creators and CGMs as described by readers will feature later on in the chapter. There is a distinction to be made here between how CGMs and creators perceive reader communication and how the readers themselves perceive it, which speaks to the nature of communication in the digital and especially social media environment.

6.2.5 Communication Within Certain Boundaries

In the introduction, the oft-cited comic fan's influence on comics content and the industry was mentioned as a motivation for investigating communication as it occurs in the making process. In this research, according to the creators, this influence was often demonstrated by reference to Kickstarter or Patreon campaigns (see below). This explicit show of support had some similarity to CGMs who invested financially in comics (through production, promotion, etc.) and where value was communicated. Aside from this very tangible support, the communication with readers as described by creators and CGMs was not only of an interactional kind ("love your comic!), but in certain instances, this was the only kind of communication accepted by them.

CGMs, social media, co-creation

CGMs interviewed were asked about their communication with readers: how it happened, the context, the content. While most traditional book CGMs defined communication with readers as essentially customer service (in fact, while interviewing CGMT2, a customer complaint popped up on their computer, sent over from the customer services department), they also cited social media accounts as

evidence of communication. A review of these accounts, however, revealed that they were mostly promotional and did not necessarily represent the give and take that would indicate reader participation in narratives and artwork. Social media, such as Twitter, was useful for some CGMs to identify creators who had already published or had a readership. In this instance, traditional CGMs (CGMTs, CGMIs, and also CGMMs) would use social media to make contact. More substantive input, unless specifically instigated by the CGM, was considered problematic.

Some CGMs provided just the kind of platform for potential reader co-creation. CGMM4, for example, explained reader participation in terms of the branching narrative of graphic novels offered through their app: “A milestone on that journey is that the reader is inside the story and part of the story. It's a new thing. And we need to get people accustomed to that”. However, actual interaction with readers appeared to be aspirational at the time of interview: “the entire reader question is something that will evolve”. Although CGMM4, given its gaming background, was interested in co-creation or participation in creation at some level of the narrative itself, it was only within the controlled environment of response that the CGM created. The potential for creators to write and draw their own stories, and for readers to participate, was part of future development.

Boundaries and intellectual property

The hesitations expressed by CGMs for any input outside of contracted content concerned intellectual property and copyright. The length of time intellectual property and copyright were held depended upon the type of CGM, and this was often related to the perceived financial risk. In the traditional book and comics categories, CGMT, CGMI, and even less traditional CGMM, rights were retained by the CGM for some time: CGMI2 indicated five years, longer for CGMTs observing the usual copyright arrangements of 70 years. For the CGMIs, it was customary for rights to ‘revert’ to the comics creator after a period, but CGMTs might also revert rights through termination clauses in the case of titles not selling well. During the time that the CGM owned the rights, comics creators could not then distribute their own work in the copyright period but could promote it on social media. CGMI1 and CGMM4 were the exceptions here. CGMM4 retained all rights to the comics they had thus far published, because content was originally licensed and adapted on a

commission basis: the comics creators involved were paid a flat fee for their work. The dashboard and a more open model “[shift] the dynamic very much into the makers’ [CGMM4 is referring to creators here] favour and we want that. We want to support that”. However, at the time of interview, this open model had not been implemented. CGMI1 worked with creators in an opposite manner, retaining none of the rights to the comic strips published on their site: “We really can't do anything with the material because [the CGM] has no rights to it”.

Attitude towards direct reader input into comics content depended, for the most part, on the rights situation. For CGMM2, working with commissioned content as a means of building up legacy comics for which they had procured the rights, interaction with readers on the level of fan fiction was something to be regarded with caution:

> It's tricky as an IP holder, as a copyright holder. You have to be very careful with how you engage with things because there's a lot of infringement as well. And where somebody is basically infringing, is seeking to make profit of our characters that means the creators aren't getting any royalties. We have to be careful with that. That said, there have been long running fanzines, not for profit, but we as the publisher, we were very much arm's length for that kind of stuff. So, if it's done for pleasure, then I think we're going to have some tolerance, but we have to be very careful where people then take that and monetize it.

This caution was shared by CGMTs and CGMIs, demonstrating a certain risk aversion where intellectual property rights were directly challenged, even by the most enthusiastic and supportive readers. This fear of infringement is reflected throughout the creative and especially multimedia industries which are always looking forward to potential earnings, even and especially if they are ones of which they have not yet conceived. This concern was expressed by the traditional book publishers, especially the large ones, when it came to digital publications. Sections in contracts regarding digital versions were sometimes purposefully vague so that publishers could take advantage of potential future earnings. Thompson (2021) confirms this: “the year 1994 is important because that is the year many publishers first began to realize that they needed to add a clause to their standard author

contracts that dealt with ebooks and expressly assigned ebook rights to publishers" (p. 104). There was no place for readers (or even creators) who might disrupt these opportunities.

Comics creators maintaining boundaries but seeking input

Comics creators, with some exceptions, expressed the same need for boundaries. However, while the CGMs' concern was with commercial interest and infringement, creators were mostly concerned with the control of the narrative and the creative process itself, essentially the potential invasion of that narrative and process. Both CCT2 and CCW1 regarded themselves as "old-fashioned" or "old school" when it came to taking on anything more than interactive feedback from readers. At first, CCW1 expressed enthusiasm:

> I will do polls and stuff like that because I think reader comments are quite fun [on Twitter]. They feed me a lot of the time, and it's nice to get, especially when there are not any conventions [during the pandemic] to gather some feedback, to get people saying, 'I really enjoyed that'. In that sense, I seek it out a little bit.

However, a bit later in the interview, they expressed reluctance over more transactional feedback:

> I think that's not always a healthy thing. I think I'm quite old school in that point of view and think that readers should be kept a little bit at arm's length in terms of plot devising…You've got to write for yourself.

Some creators were concerned that readers would try to take the plot or characters in directions that they, the creators, would not like. CCT2 related a "slight anxiety about giving ideas out too early before they germinated" and allowing readers to "[see] my processes". For them to be receptive to new ideas, it would have to "resonate with me," which was a common reaction when these suggestions were made.

But what about when a creator wants or needs reader input?

About a quarter of creator participants had some reservations about accepting any suggestions from readers, with one expressing a definite aversion and one being receptive but only if they had solicited the feedback. One noted that the only time

they had any real communication was through crowdfunding. Crowdfunding, in fact, seemed to be the type of platform where creators would most often solicit more substantive feedback from readers. One comics creator described their interaction with readers as a constant checking in each time they uploaded a new chapter of their book. As noted in Chapter Four, CCD1 was the only creator who had mounted a Kickstarter campaign which was based on the All or Nothing platform: where the funding goal must be achieved completely for the publication of the comic to be financed (CCI8 had a Kickstarter campaign as well, but as part of a small publishing press for which they worked). This type of campaign does not necessarily require a lot of interaction with the readers or supporters. Indeed, CCD1's Kickstarter page included only three updates over the course of the campaign. The Comments page records a little more activity, mostly "thanks" for copies received. However, a few readers did suggest, as a reward, the inclusion of a postcard bookmark and a digital (PDF) copy which CCD1 took under consideration. The print copies were accompanied by audio commentary. Of the various crowdfunding models mentioned in Chapter Four, the rewards-based model looks to have the most potential for sustained interactional, even transactional communication between creators and readers, depending upon the level of rewards.

There were creators, similar to CCW1 above, who explicitly tried to solicit comments from readers but got little reaction. Social platforms like Patreon and Kickstarter seem the perfect sites where more substantive feedback can be expected from readers. Presumably, readers on these sites are there specifically to support creators, financially and with encouragement. CCI2 had asked readers-supporters on Patreon ("people are paying me per month on there") as well as on their blog and YouTube channel: "is there anything you're interested in or you'd like to see more of?" They did not get any response, although their friend frequently received specific requests for comics topics. CCI2's interpretation of this silence is that "I've found so far that all the people on Patreon just seem to be happy to quietly support my work".

As a self-published author, CCI2 had been posting not only on Twitter, but also on Facebook, Instagram, and Patreon:

> I definitely interact with them [readers] a lot online. I don't find that I get a massive amount of stuff along the lines of what they would like to see more of. I guess occasionally someone might suggest something but it's more just if someone likes an image or a page that I post that they might comment on. I do get quite a lot of messages from people who've read the books, and they want to tell me that they enjoyed them, which is really, really nice. I reply to everything like that for sure. I don't get a lot of people having input necessarily. I'm just seeing what they've enjoyed.

CCI8 felt that the major reason for being on Kickstarter was that it was where "the money and passion" were. The small press with which they worked is largely print-first, occasionally supplying PDF copies. The Kickstarter campaign was a bit of a test for their potential readers:

> I really, really miss [conventions] and sales-wise, yes, it's a big deal as well. That was a big part of why we did the Kickstarter: to see if the passion and the money that wasn't being spent at those conventions would actually be money that people were willing to put on the table for a crowdfunding campaign. And it turned out that it was, which is great.

The crowdfunding model of interaction presents one level of challenge, not only to get readers to engage but also to get their financial and, in a certain sense, emotional support. It does not represent any desire for readers to contribute to the actual content, essentially substantive transactional communication. In a sense, it represents a type of linear communication where interactive feedback was desired, the type of feedback that could support them through the creative process.

This almost reluctance over what could be perceived as reader intrusion was illustrated, similarly to CCW1 above, by CCI2 who did express some conflicted feelings regarding the feedback. In those few instances where CCI2 had more substantive feedback, "too much …can be annoying…and just way off what I would be interested in".

This last remark reflects CCT2's comment about suggestions "resonating". There does appear to be a line for creators beyond which reader input is not acceptable. Those comments that support the creator's existing comics, such as with CCW1 and CCI2, are welcome, but anything "way off" their scope is not always

welcome. CCI2 is an interesting case in point, explaining the effort put into Patreon to garner new ideas, and then not necessarily expressing any disappointment when not receiving any, just the satisfaction of being “quietly supported”. In addition, they were happy to get supportive feedback on social media, but not too much. For creators, there is a line they are continuously negotiating with readers, especially through social media and crowdfunding accounts.

Specific examples of reader engagement

Three creators/self-publishers specifically engaged readers for a more substantive, transactional type of communication, through game activities (CGMO3), project-type beta testing (CGMO1), and using a comics generator (CCW2).

CCW2, a webcomics creator, described a rather unique view of readers: as “something to go against”, almost describing “an intimate relationship” but in the opposite direction:

> The moment when I had a readership is when it makes it feel like there's a purpose to things, and I have something to react against …The kind of stuff that I make… doing stuff on social media is so directed, and I enjoy it. From quite early on, as soon as I got an audience… a few thousand people, it was then really fun to go against them…I like having expectations and going against that…In the case of [comics title] it is almost poking fun at an audience for liking the same joke. If you know the same joke, even the audience [seems] silly for liking it, but it's also something that I like making and enjoying.

What CCW2 describes here is a kind of reader response, a positive reader in aggregate response, that does influence the creator, but in such a way as to inspire a push-back. And while this creator derives enjoyment from “working against” readers, in a sense taking seriously what the readers expected, they go onto say that they are not into “pandering to an audience” or “doing exactly what they always want”: “as soon as you start doing what people expect you to then they [will get] bored, so it doesn’t really work”. Interestingly, this creator offered readers an alternative way to create or co-create: through a comics generator. There are many types of comics generator software on the web, where users can enter text or a story, for example, that is then turned into a comics strip. CCW2 offered a comics

generator where readers could create a version of CCW2's comic from previous issues of the comic: in this way, CCW2 subverts the act of creating, almost saying, "see how easy it is". What is described by CCW2 is a type of reader influence that works because, while the creator appears to disdain them for liking the comic, they take the readers' expectations very seriously indeed.

But there were a couple of creators who, to a certain extent, allowed readers to co-create. These were the exceptions to the linear form of communication among the CGMs interviewed. As discussed in Chapter Four, CGMO3 actively engaged readers not just in discussing the comics on the website and through social media but also in participating or interacting in the creation through assisting in determining the narrative progression. There was no concern about intellectual property rights as the comic was (and is still) freely available.

CGMO1 was also offered as an exception in Chapter Four, in that their funders were essentially their audience: both in terms of the funders as supporters of the comics and readers of the comics. CGMO1 was immediately connected to and communicating with the audience of museum-goers, including school children, academics, families, and professionals, facilitated by the funders and the CGM's trialling of comics during the development phase. Moreover, CGMO1 continued to be involved in the post-publication phase (or in this case, the post-launch phase), conducting user evaluation that could feed back into further enhancement of the comic. The potential readers were very much a part of the creation or participatory design process, especially because of the usability concerns, as well as the content and narrative component.

This communication with CGMO1 happened at two key junctures: pre-launch testing and post-launch feedback. Admittedly, CGMO1's workflow (see Figure 23) is not perfectly cyclical, in the sense that not all activities are replicated over time (the commissioning and design elements, for example). But nor is it linear in the same ways as CGMT2, for example. Communication with readers and re-development replicate throughout the finite process where, although CGMO1's involvement ceases, the readers' interaction with the comic and the funding organization does not. In terms of the readers' interaction with the text or website in this case, there is

some interactional communication or experience, in that the reader ‘acts upon’ the text to access additional information through the hyperlinks.

Is the reader's experience here more transactional, the reader more consciously involved in the building and designing of the comic? The reader is certainly more active on these fronts, and then, of course, the hyperlinking in the comic itself promotes a more layered experience of the comic. Still, while there is a sense that there is more participation from the reader, the comics creators-producers still exert control in directing that input. This is true for the kind of participation encouraged by CGMO1: readers are offered different options for ending the weekly webcomic, but they do not in reality have a choice; they choose an option by a random game of chance, but essentially the game chooses the option for them. The manner of participation in the creative process defined the nature of creator-reader interaction for most of the cohort.

6.2.6 Section Conclusion

In this section, creators and CGMs exhibit varying degrees of relationship, depending on the type of publishing and the stage of the publishing process. Graphic novel creators working mostly with traditional book publishers illustrated the most transactive kind of communication to an extent of almost co-creation with the editors: the creative vision belonged to the creators, but they receded from interaction as the graphic novel made its way through production (depending on the size of the publisher they might be involved in promotion). A similar level of communication occurred between multimedia CGMs (including the publishing of legacy comics titles) and comics creators but almost in the opposite direction: as part of a work for hire contract, the creative vision belonged to the CGM, and the editor was the conduit through which that vision was communicated to the creator.

The kind of contractual or financial relationship between CGM and creator indicated who had the power and control, as well as the kind of value ascribed to the comic (CGMT2, CGMM). However, this last could be deceiving, for according to some interviewed, investing less or sharing risk with creators did not mean that they did not value the comic: in a sense it meant that they not only valued it, but they also valued their relationship with creators more [CGMD1, CGMI1, to a certain extent CGMI2].

In this strictly commercial environment, whether work for hire or royalty-based, the process and the communication about the process were very much in the CGM's control. And, in a sense, this translated to communication with the reader. Interactive feedback of the "I loved the comic" type was encouraged (although creators and CGMs in this research were not overwhelmed even by this communication). But both creators and CGMs were wary of any type of reader communication that intruded on or sought to influence the story and characters.

The only examples of readers approaching any kind of transactive communication with creators, and according to creators, were in the self-publishing environment of webcomics and the comics project, as noted in Chapter Four and above. However, the creator and creative team retained control of the process of communication or feedback. Although creator participants used a combination of social media platforms, three major purposes for doing so were cited: publishing and distribution, broadcasting or promotion, and communicating with other creators. In addition, 'following' or 'friending' a creator was construed as feedback in a passive way.

6.3 Making It Available: Platforms as Communication and Community

6.3.1 Introduction

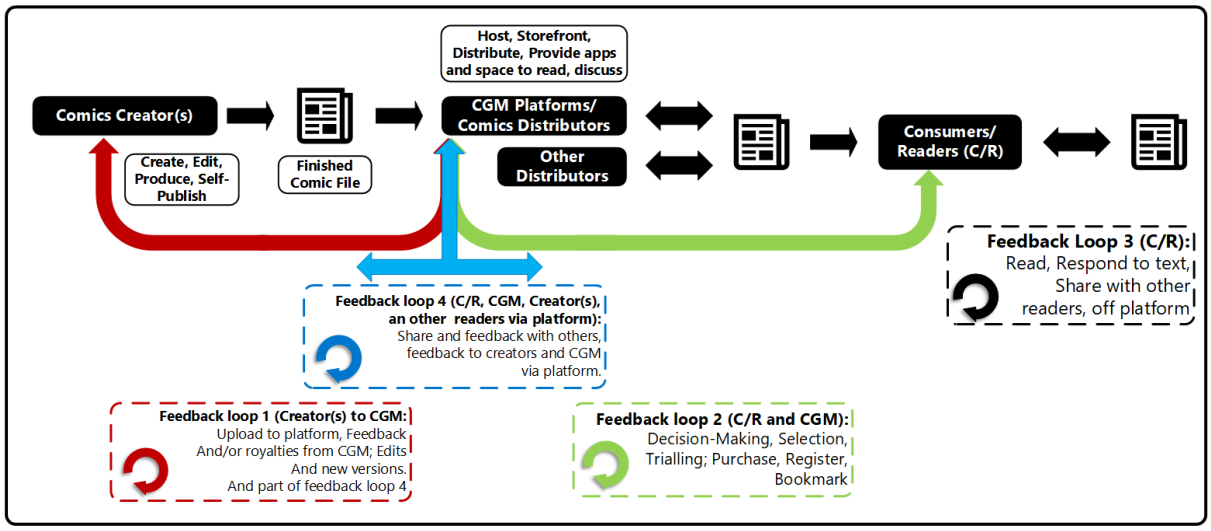


Figure 32: Digital Comics Self-Publishing (Platform) Process and Feedback Loop (repeated from Figure 28 in Chapter Four) See Appendix VIII for enlarged version

The findings above predominantly identify the transactive communication that happens between creators and CGMs, through editors (in the case of small and large traditional book and comics publishing), webcomics creators, and comics

project teams. CGMs representing self-publishing platforms can be said to exert one type of transactional communication through gatekeeping and editing which may happen through human and digital intervention, for example the return of submissions because of formatting errors or questionable subject matter (see CGMD1 above).

This type of transactional relationship that has an impact on the meaning, formatting, indeed creation of the digital comic, is part of a larger digital comics communication model based on the findings from this research (see Figure 32). As significant as that impact may be, it is only one part of the communication conduit in general. In Chapter Four, Figure 32 was considered from the point of view of the reassigned roles for the creator and the expanded activities of the reader. This chapter illustrates the multi-layers of communication with platforms as the main conduits.

The digital comic progresses along the communication pathway of creators, editors, and CGMs, eventually arriving at a point where it will be made available to the public. In this section, the findings highlight the importance of the distributor or retailer platform as a digital comics communication channel to reach potential consumers-readers.

Not only has digital technology disrupted the creation and production processes but also the distribution processes and arguably, if not “the social settings” at large, then the sense of community built around individual and local stores (Woo, 2011, p.125). Digital comics retailers and distributors include publishers, comics and non-comics storefronts, comics and non-comics self-publishing and reading platforms, social media platforms, collectives, and personal dedicated websites. They also include non-comics distribution sites such as crowdfunding sites, social media, file-sharing platforms, and instant messaging services. One change in the digital ecosystem is the role of self-publishing CGMs (such as CGMD1, for example) which has adopted two roles in the communication model: part of the transactional feedback loop with creators, acting in a somewhat similar fashion to publishers, as well as the conduit through which readers engage in activities as consumers and readers.

6.3.2 Creators and Platforms

Before looking at the experience of platform CGMs with their creators and readers, it is worthwhile to understand why platforms have become important to creators in helping them to self-publish and potentially to be seen by more readers. In the new type of ‘distribution and feedback infrastructure’ (see Figure 32) where the creator or ‘author’ has taken on an increasing amount of responsibility, there is the hope that these activities will help to gain a wider audience. However, the additional time and effort can be onerous, especially where resources are lacking. According to CCW1, “I want to do another webcomic again and actually properly set up a website for it. I just don't have any time”.

CCW1 listed the following channels for distribution that they used: Gumroad, Etsy, Instagram, a personal dedicated website, as well as independent comics shops when they published in print. It must be remembered that these channels require continuous updating, maybe subscription fees, to give the appearance at least of being current and up-to-date. CCI1 referred to the continuous maintenance, “the feeding”, required of all these distribution channels, feeding that included trying to reach out to readers when the opportunities presented themselves. In the old publishing model, the gatekeepers were publishers, agents—people. In the new publishing and distribution model for webcomics creators, time and effort become gatekeepers of a sort, depriving creators of the time it takes to reach an audience of readers.

These channels can be particularly useful for comics creators looking to attract publishers. CCI2 encountered their publisher-employer in the following manner:

> As I said, it started before I was working with them, and we just connected on Twitter. They were publishing books by artists that I really liked, and [the publisher] has always been very active on Twitter and chatting to people and things. They would occasionally respond to tweets, and I would respond to their tweets, and then I think that's how we connected.

Reader sharing of content will be considered further in the chapter, as this activity can also be considered distribution as communication, including views, opinions, and humour. In the digital environment, as demonstrated by the findings in

Chapters Four and Five, digital comics readers seek out comics in digital comics places—apps, creator platforms, individual dedicated websites—but they are not necessarily required to do so to encounter comics. As with print newspapers, comics can be part of total information consumption through newspapers whether they be print or online (see Chapter Four on reader consumption). But, especially with webcomics, readers are encountering comics in other areas of their digital lives, specifically through social media, including the sharing that happens in this environment. Because of this requirement to meet the readers where they are, webcomics creators especially in pursuit of an audience have to take a more diversified approach to distributing their comics online. In this sense, comics creators/self-publishers have more contact with the point of distribution, the online distributor-retailer platform, than they have had before.

In Chapter Five, creators and readers spoke of their experiences with these types of sites from a more technical perspective. Here, retailers and other distribution sites are considered in their intrinsic role of promoting or facilitating communication, especially between creators and readers. Of the CGMs interviewed, four represented comics publishing platforms and collaboratives that helped creators to publish and promoted their work. Participant creators and readers commented on their experiences with these and other platforms. These findings highlight that platforms can be more than online shops by being human-centred and promoting a sense of community where roles overlap: creators are readers and vice versa; publishers are retailers and vice versa.

6.3.3 The Digital Comics Platform as a Nexus of Community

Digital comics platforms certainly cannot replace comic bookstores as the centres of geographically local comics communities. But they do not have to: they do provide a meeting place for creators (especially self-publishers), readers, and potentially publishers to gather; they are essentially digital marketplaces. As DCR2 noted about ComiXology in Chapter Five, the storefront, together with the reading, has to be “right”. This “rightness” creates the social environment that encourages return visits.

Based on the mapping exercise that provided a sample for CGMs and creators/self-publishers, the digital comics ecosystem diagram (Figure 33) divides

them according to types of platforms and websites where digital comics can be found.

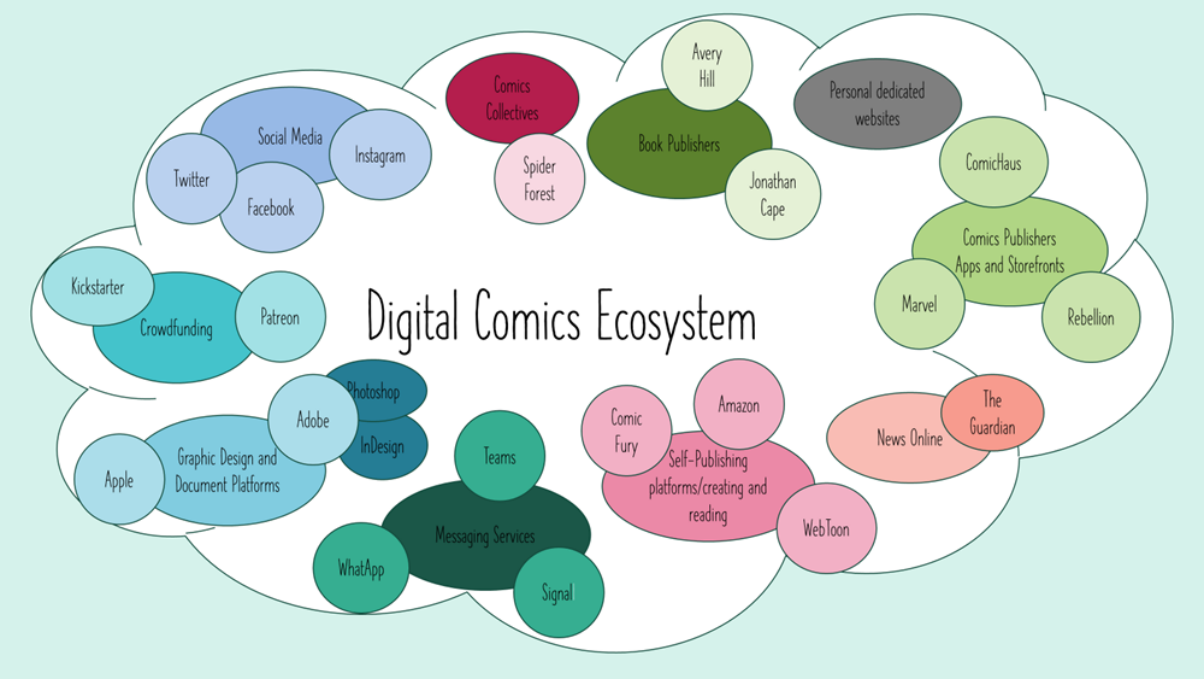


Figure 33: Digital Comics Ecosystem, as described by comics publishing mapping exercise and research participants

While the entire research cohort—creators, CGMs, readers—used storefronts and platforms, four of them represented distribution platforms of a kind through different combinations of retail, reading apps, creation support, and promotion.

CGMM2 was originally a gaming company publishing legacy comics in print. They turned their attention to direct consumer interaction by providing an app within their platform of various media offerings. For CGMM4, as mentioned in the previous chapter, the app was focused on creating and repurposing content for an interactive reading experience. Their attention to the consumer came after piloting this content, appealing to them directly on their nascent platform. CGMM2, because they are a gaming company, devoted a lot of development time and resource to their app (which did not have the interactive, branching capabilities of CGMM4's at the time of interview). They were more interested in the consumer side of the application, as it and other publishing activities were part of their business model. Although they became more directly consumer-focused through the app and storefront, the same kind of fostering of a community as illustrated by CGMD1 below did not come through in interview.

According to CGMD1, a UK-based comics marketplace,

> …because it's a small operation, we're doing this as a kind of a love project. We haven't got the budgets Amazon and ComiXology have. So it's always been word of mouth, just building it up slowly and surely over the years. We've got to the stage now we've got a couple of thousand books on the app, and readers and creators seem to love it.

The way CGMD1 describes it, the community built around the marketplace is small enough (although growing) that it has the localized feel of the comic bookstore, so much so that they were putting together a comics anthology of those publishing on the site:

> Even though a lot of people use eBay and Facebook Marketplace [to buy physical comics], we wanted to create a little niche place where people could buy and sell their comic books. But we found that so many indie comic book creators were getting in touch with us and putting their comics [up for sale] that we decided to launch a comic book ourselves. We featured some of the up-and-coming writers and artists by putting them in an anthology.

This kind of support indeed gives the site a community feel, while at the same time launching the CGM as a publisher in its own right. In this role, they are willing to accept unpublished comics creators with only PDF copies of their work, producing print and digital versions. The addition of the app was also in response to creators wanting to upload digital copies of their work. The CGM has always been willing to provide as much help as possible to creators.

CGMD1 made a point that was reflected in other interviews: that comics creators are comics readers, and if comics readers are not already, they usually aspire at least to be comics creators:

> … I think the whole community who create comic books also obviously are massive comic book fans and are using [CGMD1's]app as readers as well. And I think that the majority of the readers of [CGMD1] would be creators…And also, there a lot of people who are reading comic books, who have no talent whatsoever, like myself, who just want to read a comic book.

In what might be considered a testimony to the type of community CGMD1 had built, they were able to engage six creators through their social media account, willing to be interviewed for this research. One of these, CCD1 (who spoke about their experience with Kickstarter as well, see Chapter Five and below), published digital copies of their work through CGMD1's app, as well as print copies. CCD1 did, however, have reservations about offering digital copies of works also available in print, largely to do with the pricing model for each. First, they expressed the opportunities:

> You can sell your print books through CGMD1. For me it's another option, another place for people to find it and buy the book, or if they want, with that membership[subscription] they've got [through the app], they can read it online. So it's another option…If I put that on CGMD1 and people read it digitally [who would have not read it otherwise], that's good.

There is a realization here that there is a whole other audience to be gained through digital publication. Of course, there is a danger to the saleability of the print book, but for CCD1, the risks ultimately outweigh the drawbacks:

> The other side [is that it is] stopping somebody buying my [print] book, so this is the thing you have to think about. Then I thought well, just do it [offer it digitally]. You know, I sit in my room with them all in a box, not letting people see it. I thought, just do it.

CCD1 demonstrates the range of motivation for engaging with a distributor-retailer platform, especially when it comes to promoting digital versions. CGMD1 depicts these conflicting views in Chapter Five when they spoke of the competition between promoting digital and print versions: they were careful not to promote the app too heavily for fear of scaring off collectors looking for print copies.

However, there is no such conflict for CGMC1, the webcomic collective that also offers free hosting and support for creators' dedicated websites. CGMC1 is a not-for-profit collective that promotes the webcomics it hosts and does not attach any requirements to what the sites look like, their content, or the way they generate revenue. All that is required is a CGMC1 banner on each site to promote the collective and the webcomics it supports. The selection of members and consequently the type of webcomic supported is not prescribed:

> I think it's fair to say that we tend to be fairly creator-focused. I mean, we have this [CGMC1] site and would like people to come and use it and find other comics. I think because it's got this kind of community focus, we're not tending to look at things and say, ‘Oh, that'll be good because it fits our brand’.

They believe that because of this creator-focused community, whose webcomics do not have to fit a particular audience, they are open to a wider readership:

> But because we're not thinking about fitting a pre-established sort of base of readers, we would be fairly open to having quite a wide range of kinds of stories. So, I wouldn't say that we particularly try and target certain readers, perhaps not a good idea for us.

CGMC1 did go on to observe that they might in the future think of a more curated approach to certain webcomics to attract readers, but only if they felt that the collection was deficient in that type of comic. They observed that they could “be left behind” if they did not pay more attention not only to specifically cultivating different reading groups, but also to how much traffic is generated on the site, through the banners, for instance.

CGMC1 maintained that collectives that are also involved in hosting, distribution, and promotion, such as theirs, are necessary for creators and readers alike. Creators have been increasingly caught in the difficult position of having advertising revenue opportunities evaporate (CGMC1 referred to the comics advertising service, Project Wonderful, which folded in 2018), leaving them with little option but to distribute through major commercial comic platforms like Tapas, WEBTOON, or social media. Although the major sites might afford a wider dissemination, revenue is not guaranteed, and what is earned is shared with the platform. CGMC1’s website acts as a mirror site to the creator’s dedicated website, so the reader traffic flows between the two. Readers are essentially not just reading one independent comic but are plugged into a community of freely available webcomics.

There are several activities on the CGMC1 site that support and promote community, including spotlighting individual genres of webcomics on their home page each month, involvement in yearly community meetings, as well as forums on the site and through Discord. Creators are expected to generate their own

promotional materials, but sometimes there is a conflict with overenthusiastic creators who are also readers:

> I think it's really hard [discussions on forums where creators heavily promote their comics] because a lot of webcomic readers are also webcomic creators. Yes, very kind of insular, and it's just like a general problem [not just for their discussion list but others similar to it].

CGMD1 had also mentioned this crossover between comics creators and readers. While it can be argued that such a crossover also happens in print comics, the digital environment provides more encouragement not only for this kind but also for another kind, that between a publisher and distributor-retailer. For example, CGMD1 is a digital community marketplace that also acts as a publisher (producing anthologies and a platform for self-publishing) and a distributor-retailer (making available digital comics of all kinds through its app); and CGMC1, the webcomic collective, provides hosting and self-publishing services, support, and promotion.

CGMC1 recruited a webcomics creator for this research, CCC1 (who, in turn, recruited DCR8 as a reader participant who reads CCC1's webcomic and also is a creator on Comic Fury). CCC1's experience of trying to find stable website hosting for their webcomics reflects the point made by CGMC1: it is not uncommon for creators to go from one commercial platform or ISP to another, especially as these platforms can have a short life. CCC1 valued CGMC1 for the community and hosting but also referred to another side of being part of the collective, namely playing by community rules. CGMC1's site must have the most recent version or issue of the comic first, and creator-dedicated sites (mirror sites) must be one issue behind it (unless the creator is also using a Patreon-support type service). Creators cannot host their dedicated sites through any other branded commercial comics sites, like WEBTOON or Comic Fury, nor should they be a member of another collective. CCC1 did not consider these rules to be particularly onerous. But the big platforms did still exert a siren-like call of wider distribution. With CGMC1, there is the bonus of potentially being a big fish in a smaller pond of approximately 100 webcomics. However, the size of the pond may become an issue.

The rules of delaying instalments on dedicated mirror sites were not just about promoting the collective first, but also about grabbing the readers' attention for the

collective's site, for example, that the webcomic can only be read through CGMC1 in its most up-to-date form. Because the webcomics are freely available, the way to attract readers to CGMC1's site (in a kind of quid pro quo with creators) is to provide exclusive first readings. In a sense, there is a similarity here to the kind of offer WEBTOON provides to paying readers: the most recent instalments are for those who subscribe, while non-paying readers are usually at least one instalment behind.

DCR8, a reader of CCC1's webcomics, spoke mostly to their participation on one of those commercial platforms, Comic Fury. DCR8 came to this research as a reader of comics, but, over the course of the interview and ITA session, revealed that they also created on the platform as well as participated in forum discussions. Their experience regarding community will be further explored in the next section.

6.3.4. Section Conclusion

As demonstrated above, distribution is essentially the act of publishing or 'making available' to the reading public. Where production is contained within an organization or part of self-publishing, distribution is where the real act of communicating to readers begins. While the examples above from research participants include relatively small platforms catering mostly to creators but also considering readers, other CGMs, especially from the multimedia category, CGMM, both produce and distribute digital comics as well through online storefronts, apps, and subscription services. Moreover, they have multiple social media accounts reaching out to readers, for example Twitter, Instagram, Facebook, Twitch, TikTok, and Discord, among others. According to Antonini et al. (2020) (as noted in Chapter Two), "the content life cycle is defined by two components: the infrastructures of distribution and of feedback" (p.6). They go on to align these infrastructures with the activities of "content creation" which begins with the creator, and "content experience" which is "motivated by reader curiosity". Both activities require resources from the feedback and distribution infrastructures.

As noted above, comics publishers in the past have used various avenues to attract and engage readers, through comic books themselves as well as such retail outlets as comic bookstores. The roles taken on by CGMMs and other traditional or legacy comics publishers in the digital environment are not necessarily new or prompted by the digital disruption of the production-distribution process. While

smaller CGMs might be able to reproduce the local community experience of comic bookstores, the larger CGMs hope to create a broader “content experience” where readers are consuming a brand or a stream of content at multiple locations, in much the same vain as Marvel Unlimited and its tie-in to the Marvel Cinematic Universe.

What impact this onslaught of content has on digital comics readers, all types of readers, has been little studied from the reader’s perspective. In this chapter, the CGMs and comics creators have had their say about readers reading their comics and using their platforms, storefronts, and apps. In the next section, readers will speak for themselves about communication with CGMs, comics creators, each other, and with the digital comic itself.

6.4 Beyond the Boundaries: Readers Squaring the Communication Circle

6.4.1 Introduction

In Chapter Four, readers in this research demonstrated that consumption was not a simple activity where the reader is a passive recipient in the creator-publisher-consumer continuum. Consumption of comics is not only a complex set of activities involving decision-making, trialling, selection, purchasing, and feedback: consuming and reading involve and are multi-layered levels of communication. Consumers-readers begin communicating value by the very act of purchasing (or downloading or clicking on) the comic, thus responding to the value communication undertaken by CGMs and creators through promotion.

But this is not the only way readers communicate value and contribute to the making process. In a sense, the readers in this research demonstrated how the traditional communication circle or circuit can be squared: in other words, illustrating what seemed to be impossible up until this point, bringing the reader firmly within the making process, with solid and not broken lines (see Figure 32, especially Feedback Loop 4).

In this section on communication, data from readers address that “weak and diffuse loop” of Darnton’s (1982) referred to by Thompson (2021) in Chapter Two, not only squaring the circle (owing to the appearance of feedback loops) but doing away with it as an unsuitable way to represent the making communication process at its

most complex. At first, it would seem that the proposed model (Figure 32) conforms to the linear making process, where consumers-readers receive the comics and provide at most interactional or phatic communication (the social pleasantries that connect people, see below). While self-publishing, project-based, and webcomics creators described a sometimes transactional communication with readers above, the readers did not necessarily view their communication with CGMs and creators in the same way (6.4.2). Readers described communication that approaches transactional or creative with other readers. Their continuous presence on social media and self-publishing platforms demonstrated substantive and, in certain contexts, value communication (6.4.3). For the most part, though, they reserved their most substantive, most meaningful communication for the digital comic itself, reflecting Narula's (2006) definition that includes "interaction between ourselves…and with our…internal environments (p.2; noted in Chapter Two).

6.4.2 Creators and CGMs: Like, Follow, Support

Reader participants appeared, for the most part, not to interact directly in any substantive way with creators or CGMs. In response to being asked about interaction with creators, DCR9 was fairly direct: "no, the short answer is, no". After more discussion, they said:

> Sometimes. If the author, the artist, is fairly new to Mastodon when you follow them they tend to follow you back. And I've seen at least one instance of a comic artist liking a post I've made that is not comics-related. So that does happen. But apart from that, there hasn't been any interactions.

This is indicative of the kind of interaction most readers described, essentially the purportedly passive communication of 'likes' and 'follows', or maybe feedback of the positive comment kind. This can almost be equated to phatic communication, a similarity to the everyday pleasantries of life on a social media platform. However, it goes beyond in that it does communicate that readers value specific creators, and in this particular instance, that the creator values the reader. This exchange also communicates value on a financial and promotional level, as more likes and follows place the creator's account more prominently in the algorithm, and, for some platforms such as YouTube, likes can also be monetized. Likes, follows, subscribes, and other click-based participation (the 'like economy') on a certain physical and

intellectual level can be construed as passive; however, the way they communicate value, financially and algorithmically, can be significant for creators on platforms (see Nieborg and Poell, 2018, especially page p. 4278, on “positive direct and same-side effects”).

Some maintained they had no contact, through social media or any other type of platform, with comics creators:

> As you might be unsurprised to hear at this point, I don't follow Twitter or their Instagram accounts or anything like that. I don't follow any of these creators on any of the platforms, and I don't know if they do have TikTok accounts… they might (DCR4).

DCR4 also maintained that they did not “follow specific personalities”: they only used TikTok “for the videos”. More importantly for them, “I follow…the artist's intentions through the work”. They go on to say that “I have a sense of all of their personalities. Of course I do”. But this information is gleaned from a glance at the comments on creators’ dedicated personal pages from time to time. The news-y type of information, such as when the next issue is being released, “I don’t need to be told”. The impression is that DCR4 would rather focus on the comics and not the creators.

At certain points, and not uncommon for semi-structured interviews, the participants seemed to contradict themselves. For example, DCR4 and DCR7 both maintained a certain passivity when it came to communication with creators (and DCR3 a reluctance based on professional reasons). DCR7 called their feedback “passive”, amounting to likes and follows on Twitter. The most active they got was retweeting during a time “when a lot of things [were] happening in a political context”. However, both DCR4 and DCR7 (as well as DCR3) were supporters of comics creators through Patreon, an explicit way of supporting and communicating value to the creator. According to DCR4:

> Whenever Patreon came out, I thought, well, I read every time they come out, so I feel like I should support the creator. And you know, if they've got 10,000 people reading it, and everyone puts in a dollar a month, then they've got the salary they need to keep doing it.

After describing a purposeful distance from creators above, DCR4's contribution to and concern for their support feels personal in a way they cannot express through comments. It is related in a sense to the psychological support creators described from readers in crowdfunding. DCR7 contributes to the support of "at least 2 to 3 comics" they follow, by "boosting" (online donations) or making one-off payments on funding pages, like Patreon. DCR7 felt as strongly about this type of support as did DCR4:

> I've done it in small ways, not large amounts, and I have not committed regular subscription style funding, But I know these are independent, artists who are trying to [make a living]. That's a sort of diminishing tribe, and their work is so important.

Patreon's claims include "Creativity Powered by Fandom" and "Creators. Fans. Nothing in Between", yet neither of these reader participants mentions engaging in any direct type of communication with creators through the platform. They did, however, feel strongly about supporting webcomics creators who make their comics freely available. For DCR7, this also amounted to an almost political stand, even equating the webcomics creators to journalists in their editorial content.

6.4.3 Sharing Value and Views with Other Readers

Readers described more occasions of directly communicating with other readers online. DCR3 talks about sharing comics with others online, but cautiously:

> In terms of sharing. I'm not terribly good. That is, I have shared. We [partner and teenage child, also comics readers] do with family and friends, but mostly word of mouth or sometimes by sending them a link directly, but not on social media. This is partly because I'm a bit apprehensive about that, but also because I'm aware that my social media presence is bound up with my professional identity, and I don't want the two things to get too mixed up.

DCR5 noted the role of the pandemic in their own increased sharing online, "Oh, I might send the one that I saw…I think it's probably the pandemic. And everybody was emailing each other. Everyone". Otherwise, they were not ordinarily a sharer on social media. DCR7, as noted in Chapter Six, shared often but was also cautious of the environment in which they shared. They shared or had comics

shared with them on WhatsApp and Signal because of the secure environment. There was a particular way of sharing on WhatsApp that they demonstrated in the ITA session:

> Finally, another way I also encounter comics… is people putting them out in their WhatsApp status. I remember, because a few days ago, when I saw that I even took a screenshot just to share in this interview… And most of these again tend to be political commentary.

WhatsApp is an example of a community online in that users create different WhatsApp groups for different purposes and people. DCR7 described an online multi-national community of friends sharing political ideas and opinions in a secure environment, with digital comics as an important way to convey them. This is not just sharing, not just communicating the value of a comic, but sharing with the specific purpose of view strengthening and as such, a specific example of Human-Information Interaction (HII) (see Beall et al., 2023). View sharing, view strengthening, and view change are all ways of interacting with information online (McKay et al., 2024; Beall et al., 2023; Figeac and Favre, 2023), and in a sense can work as a continuum, led by information seeking. DCR7, to a certain extent, describes this progression as follows:

> It [comics via WhatsApp] does two things for me. It brings my attention to issues in case I've missed them. So, it's factual at that level. But at the same time and in addition to it, it also shapes my opinion. It is a very opinionated way of communication which is why I think it also pushes me to share with more people.

Although DCR7 does not exactly describe information-seeking, they go on to talk about their political awareness online, of being on the lookout for information about events in their home country (so not necessarily information-seeking, but information awareness or sensitivity). The shared digital comic, in turn, shapes their view and consequently "pushes" them to share with others. Moreover, DCR7 introduces unwittingly what can be perceived as a major problem with communicating complex issues through the 'sound bite' of comics: that they are immediately perceived as factual. DCR7 will mention "polarization" below, but in their comments do not seem aware of how perceiving this type of information as factual

can contribute to polarization. Indeed, in another part of the interview, their following of certain comics is not based so much on information-seeking or awareness but on political alignment:

> The choice to follow and support is because I see an alignment in my opinions and like their takes [on issues]. It resonates with me. And that's why I'm following… I see an agreement to some extent, which is when I start following them, and I am open to them having an influence on how my opinions evolve over time.

It is specifically a digital comic that is the most suitable vehicle for sharing this view: “And a comic becomes a more effective way for me to do the sharing, and I guess with the sharing again in some cases it's also helps me start a conversation”. DCR7 goes on to describe why the digital comic is particularly useful. They talked about the difficult political climate in their home country, “a very polarized situation” where even discussing issues with friends and family is fraught, never mind having these discussions with colleagues in the workplace. But DCR7 “[realizes that] the more polarized the situation is [the more] important to have these conversations”. But for those who want to share, even perhaps strengthen or change views, “long pieces” are not effective:

> Comics are both very direct in communicating a point and easy for somebody to read…If I send a long commentary, I know most of my friends are not going to read it. If there's some burning issue, at least in my opinion a burning issue, that I want to bring up with them, it becomes hard for me to push them to read long pieces. But and as an alternative, a comic is not only easy to consume, it's also provocative, and when it's provocative, it can in many cases elicit some response, and I get to have a bit of a conversation.

DCR7, a doctoral researcher, stresses that the place for such sharing is important. They avoid sharing views through their social media account or personal website, for example, as they will often give these account details out to research subjects or colleagues. They admit that “it's so hard to discover and or even maintain these sorts of relationships if you make your opinions known. That's just the situation right now. So, I don't post anything”.

But instant messaging services that are secure (end-to-end encryption), such as WhatsApp and Signal, are safe spaces for discussion. DCR7 is not the only one who regards them in this way:

> I know a lot of politically active people, for instance, all of whom will put this comic [dealing with an event that has been “buried” by news media] on their WhatsApp status. I know a lot of people broadcast comics on their WhatsApp status as a way of immediately getting people's attention (DCR9).

DCR9 is an example of someone using broadcasting comics on their Signal profile: “So if the comic is particularly striking, I tend to download it to my phone, and I usually have it up as my Signal status, or I just share it on Instagram”. However, they were just as concerned about the sensitivities of sharing online. Their solution was either not to share at all or to create accounts in such a way that they are entirely anonymous.

The comments here reflect what might at first appear as a conflict: the fact that it is a comic does not matter; it is the message. That it is a digital comic matters because it makes it easier to both convey and share a political view. It is very like a content vs. packaging debate. DCR7’s comments encapsulate both positions: “I'm already making a choice about which comics I'm following. I'm following them for their commentary and less for the medium that they use”. However, as noted above, the medium of digital comics was important to them as a way of getting a view over succinctly and provocatively. This appreciation of a digital comic for its content and its format or packaging was a theme across a few of the casual or incidental reader participants who read comics in a non-comic environment.

Oversharing: when communication is too much

DCR8 is an example of the aforementioned ‘creator as reader/reader as creator’ dynamic. Recruited by CCC1 for this research, they originally identified themselves as a reader, specifically on Comic Fury (this was not where they encountered CCC1’s comics). However, in the interview and ITA session, it became clear that they also created and published on the site. This dual role on the same site gave them a unique perspective on the communication between comics creators and readers. At first, they claimed that they would not “dare” approach a creator: “I can in some circles talk to them, but I just don't do that because I'm like a ‘leave you alone’

sort of person. Because people want privacy. Give it to them". But they had another creator approach them on Comic Fury: "She was the first one to say 'Hi, I like your stuff'". DCR8 was a bit taken aback as they thought this creator's work was better than their own ("I was very, very confused"). They found that they both liked each other's comics and started to engage on that basis. However, things seemed to have "devolved" from there. DCR8 tried to discuss ("complain about") another creator's comic—a "terrible" example of "how to draw a comic"—with this creator, "and it just devolved into a complete mess".

In fact, DCR8 was on somewhat of a hiatus from the Comic Fury forum at the time of the interview, and the implication was that this interaction was the cause. But they had had a more positive experience sharing comics they liked with friends on Discord, presumably in a digital community not necessarily comics-focused. But even this environment was problematic: "I haven't done it as much as I'd like to recently. But that's because my finding new stuff thing has stopped for quite a bit, because I was getting really exhausted of finding new stuff". DCR8 was overwhelmed with the sharing of new comics and needed a break, as they needed a break from the discussion on Comic Fury. What they described in interview seemed to be an "excessive and compulsive use of social networking sites" (Zheng and Ling, 2021, p.1; this research represents a systematic literature search and analysis on this topic) that is known as social media fatigue, well-documented in the literature. Although most of DCR8's friends who are also comics readers are on Discord, and although the nature of the sharing is positive ("This is good. This is actually making me laugh"), there was still such a sense of being overwhelmed that required a break.

This was not the only example where somewhat more spirited sharing, even transactive in its desire to provoke deeper discussion, did not work out for a reader participant. DCR2, a comics blogger, said, "My online posting activity is almost nil in general". This lack of participation occurred because every time they tried to post outside of their Substack newsletter, "it just goes wrong". These two examples of problematic communication with other creators and other readers raise important issues about sharing and discussing comics online, and especially on platform-based communities such as forums. For example, DCR2 is a comics blogger, and while one can believe that they might not participate much on other platforms, they did not indicate the nature or level of communication on their own Substack

newsletter. They review comics publications which implies being part of a discussion environment, although that would depend upon the number of subscribers and how active they were. Regardless, they were not inclined to be specific about what happened when they did try to share or support on other platforms.

DCR8 is an interesting case in point in that they readily admitted that they were trying to start a combative discussion, but they expressed some confusion about the reason why things went so wrong. For readers like DCR7 and DCR9 who were cautious about sharing and discussion on an open forum, DCR8 presents a contrast in their desire for open conversation, even if it were at the expense of another comics creator.

From the examples of communicating and sharing above, communication online can be tricky, or “messy” as DCR8 put it. So, it is no wonder that there were other reader participants who really “could not be bothered”. DCR4 was forthright, although maybe a little defensive, about their lack of communication with anybody regarding comics:

> For the most part, I'm an incredibly passive consumer. And it's how I've always done it, and I've been very happy doing it. If there's been a particularly controversial moment, I might scroll down and read the comments [on a dedicated webcomics site]. But for the most part, I am not particularly interested in what people have to say. That's honest, and there's nothing wrong with not being interested in other people.

DCR4 saved all their communication for the text and so did other reader participants, as the findings in the next section reveal.

6.4.4 Response, Immersion as Making

Are people necessary for communicating, creating meaning and value? Most of the examples from the findings have illustrated how creators, CGMs, and readers communicate with each other about digital comics. This communication with people, whether it be one-to-one or, in the more communal settings of social media and instant messaging services, many-to-many, is a complicated, sometimes ‘scary’ (see DCR7 above) business. But Barnlund (1970) describes another form of communication, with inanimate objects such as a text, and maybe more crucially with

the self: “Meanings may be generated while a man stands alone on a mountain trail or sits in the privacy of his study speculating about some internal doubt” (p. 47). Or, reading a digital comic and in this way contributing to the making of a digital comic. In examples of communication circuits discussed in Chapter Two and this chapter, the “weak” link (according to Thompson, 2021) has always been the representation between authors and readers. But what these communication circuits have not accounted for is the crucial communication, or response, to the digital comic (or text of any kind). Readers, as demonstrated, do try to reach out to others, especially other readers, but first comes that relationship with the digital comic itself. In Chapter Four, findings on reader consumption were analysed so as to provide a deeper understanding of how readers function in the production-distribution process. In the same vein, findings on reading, immersion in, and response to the text are assessed in such a way to understand reader response and maybe what could be considered a kind of co-creation. This co-creation is not necessarily fan fiction or beta testing a comic website, but still an act of imbuing meaning to the text. It is the type of communication and co-creation that Davies (2019) describes as happening between creator and reader through the text: “shar[ing] in the space the creator has constructed for us, and collaborat[ing] in a mutual act of meaning-making” (p.2).

For example, some readers described exactly the “pulling in” (McCloud, 1993) experience created by comic authors and the text where full immersion or absorption occurs. DCR4 put the experience in a space and time context

> Do we stop and remember how long summers used to feel, and just absolutely the amount of time spent doing nothing apart from just devouring books and not feeling any shame or embarrassment, or guilt, or anything like that. I'm not thinking, ‘Oh, is there something else I should be doing?’… Well, I've been engrossed in this world that you know I've had built around me by the author. So, you might be thinking, oh, this is a long Sunday, but I've been somewhere else for the last two weeks.

Here, DCR4 attempts to conjure up for the researcher the sense of timelessness from childhood, the sense of time in terms of the connotations of summer in childhood (no school, for example), what that time affords—a complete immersion in books. There is also the emotional component to this context: shame,

embarrassment, and even the lack thereof. As the researcher, I was completely absorbed by the image they conjured up, as there was a relatability to it.

Of course, sometimes there is a conflict with the text and the creator. DCR4 mentions “this world…that I have had built around me by the author”. Although this description appears to refer to creator control, the reader is still entirely aware at the same time of these constraints. According to DCR4, as a reader, they are wishing for the narrative to move faster, because they are eager to learn how everything turns out:

> You feel torn. You want to express real understanding and sympathy with the artistic creation. But, on the other hand, as the reader, you would say, ‘Hurry up, I want to know the end’.

Immersive reading and the attending responses understood in this way can be considered the ultimate example of communication between reader and creator: the creator and reader do not meet on a platform but within the text. This sense, of anticipation and impatience in connection to the comic narrative but at the same time empathy with the creator, demonstrates that the responses here—reader and comic, reader and creator—span immersion in the text and communication with the creator.

Immersion and response

So, the reader can be fully immersed within the text and yet offer responses although connected which are external to it. For example, upon calling up an immersive context for reading above, DCR4 then brings in two other elements: adulthood (where shame and embarrassment live, but also some self-determination) and webcomics:

> Last night I kind of found myself [thinking], ‘right, you know you got to stop now. You gotta go to bed. You need to get off the screen. [But] I'm enjoying the story. I find the characters really funny. The writing is great, and I'm having a good time reading this. But I need to stop’ … I have that with webcomics. And about a year ago I got a book, and it wasn't even particularly good. But I was reading it. And then I thought, ‘I'm just going to finish reading’ [and by] 2 or 3 in the morning, I [had] read the book… And I'm going to have a miserable

> time tomorrow. But you know, that's tomorrow's problem. But it was my decision.

DCR4 is expressing that kind of immersion that appears to be all about the text, but at the same time there is a sense of deliberate response and understanding about why the comic exerts that kind of effect. In both senses, DCR4 can be perceived as both an empowered and disempowered reader (Hatfield, 2022), but disempowered willingly, “it was my decision”.

This seems exactly the kind of identification of a “disempowered reader” that comics scholars have warned against (maybe largely in reaction to Wertham’s concern for the negative impact of comics, especially on children in 1954). But DCR4 is not describing that kind of passivity, and indeed in the ITA session did not appear as a passive or vulnerable participant in this interaction. Neither did DCR3. They described just this same type of immersion in the comic: “you don't realize you've read a lot until your eyes start to [ache] and my shoulder, and I have to work with this”. As with DCR4, there is this sense of embarrassment as an adult, “I can't tell people it's because I've been up all night reading”. DCR3 had the added onus of living with family (DCR4 had roommates) who might seek to curb such an indulgence: “the rest of my family do remind me it's late”. But it cannot be helped because “now I need to finish this episode. Look, I like to know how it ends”. For DCR3, when they are fully immersed, “you know everything falls away”, including their family, their job, all their adult responsibilities.

Perhaps this kind of immersion is reflective of what Wertham (1954), Barker (1989, 1990), and Frome (1999) describe as the power of comics on young, vulnerable minds. Only in the adult version of this scenario, what is being so deeply affected is responsibility, family, job, the very definition of what adult behaviour is. Moreover, it also means leaving critical faculties behind (Keen, 2007). But DCR3 and DCR4, despite what might be a similar feeling of embarrassment, expressed a decisiveness in persisting with the reading as well as a discernment about what is being read (if Wertham’s belief in the low entertainment of comics is put to one side). DCR3 goes on to explain how a particular comic, *Nevermore,* based on a work by Edgar Allen Poe on the WEBTOON platform (see Figure 31), affects them, draws them in. But only under certain conditions: “I'll probably not spend too much [on]

reflecting about how the author or authors have achieved the effect that they are having on me [if they did not have a lot of time, or they just did not want to focus on that]".

But when they had more time, and they allowed more critical faculties to contribute, they noticed certain elements and the effects they have on them personally:

> I might actually stop and go, 'they are being clever' or 'they're referring to something that they did a while ago', or 'look here the colours match and suggest what a character is feeling'. I might notice how they are changing perspective. In this particular panel [at this point DCR3 is taking the researcher through the comic], you're looking directly, straight at Anabel which suggests a closeness. And she's looking straight at you, perplexed, asking for something. You're an external observer looking at them, and you're supposed to provide more details in a way not just from their faces but from the position of their countenance.

This contribution on the part of the reader comes close to McCloud's (1993) reader as "equal partner" (p.68), even to a degree, co-creator in filling in the elements that are implied by the creator. It is this "communion" with the comics creator to which Davies (2019) refers, an implied trust that each will get the meaning without it being explicitly expressed. In DCR3's example, it takes the character breaking the "fourth wall" by looking at DCR3, the "external observer", pulling them in (McCloud again) to become involved in the action.

Research on immersive reading, not just of comics but of fiction in general, sometimes focuses on the effects of such a level of involvement, mostly in "that readers' experiences in literary worlds should and will carry over into their ordinary living" (Bruns, 2016, p. 352). The concern is not so much the living in the alternative world of fiction, but in the inability to leave it behind, or at least to be unable to take it into the "real" world to good effect. Bruns (2016), summarizing Marc Edmundson (2004), suggests that "readers deliberately choose, after the effort of testing the work, what they will bring back from the literary encounter" (p. 352). DCR3, in a sense, enacts this process above in their observations of what is happening in the comic and what they get from the comic. In addition, and in keeping with

Edmundson's (2004) fiction that can provide a "world view", DCR3 spoke of their embrace of comics representing all kinds of perspectives, especially if the inclusiveness is coupled with compelling characters and stories. DCR3 was the dedicated WEBTOON reader of the cohort and maintained that the inclusiveness was part of the reason for choosing to read comics on the platform, believing that the manga influence played a part. Not only did they then express a "narrative empathy" (Keen, 2007) with the characters, but their reading across WEBTOON comics also reinforced an empathy outside the world of the comic and into the "real world".

For DCR8, being an avid reader of webcomics did not mean that they suspended their critical faculty. In the above section on sharing, DCR8 experienced conflict when attempting to critique a fellow creator's work. In the same spirit, they read through a comic during their ITA session, providing the following observations:

> I like reading this, but at the same time, I'm like 'can you be a bit more unique?' I go out of my way to find these [kind of comics]. So that's basically, possibly my problem. But I find they go: a poor girl meets a rich guy. And then she changes, and he's heartbroken. I'm sitting and going 'oh, my God, what's going on? What? What's the trick this time? What's the extra flavouring?'

DCR8 acknowledges that their preference for a specific type of webcomic means encountering more cliched narratives, which can be frustrating. It has not necessarily dampened their reading, but it contributed to the feeling of being overwhelmed by new comics, as noted above.

McCloud's (1993) version of readers is as active participants who, through their immersion in the text, create with the author, in the same sense as Davies's (2019) communion between reader and creator. Even Hatfield's (2022) "disempowered reader" is fully present with the text. All versions of readers value comics: it is worth the time, space, and effort they put into it.

Serious or fun: different comics, different responses

But this perception of the reader and by extension the text does not account for yet another kind of reading, as exemplified by DCR9:

> He draws some kind of satanic symbols on the ground…And then basically he brings [on] the devil and then says that you can have my soul if you help me

> find love. And it's like a really funny story. Where the devil helps this person who's like a nerd, who's awkward, become smart and find love. And then the devil is finding things [out] about himself that he didn't know about. And so there are these really interesting comics that sometimes I tend to want to read [when I want] something mindless.

DCR9, who previously in this section spoke of comics as "striking" enough to share, refers to "interesting" comics as "mindless", in other words, as not requiring any thought and not necessarily any degree of immersion. They are just meant to be enjoyed. DCR9 had spoken about reading comics that are quick to read, especially as they scroll through their Mastodon feed.

DCR3 had spoken of reading webcomics in a similar kind of quick succession. Even DCR4 who only reads webcomics talks about quickly reading them, at least initially. The implication is that, in direct opposition to immersion, comics can be dispensed with quickly, do not require too much attention.

One reader can consciously enjoy the comic and, if necessary, critique the experience of reading a comic at the same time. The ability to combine critical distance with enjoyment is what makes the whole reading experience worthwhile. Another reader enjoys a comic specifically because it does not make demands upon their critical faculties: they are "funny", they are "interesting", they are "mindless", all of equal value making for an enjoyable reading experience. These two readers exemplify the two extremes of comics reading experience: comics as a literary expression worthy of critical engagement, and comics as light entertainment simply to be enjoyed for that reason.

6.4.5 Section Conclusion

In this section, readers have offered their suggestions for what they contribute to the making process, not necessarily explicitly, but even more significantly through demonstration of what they read, how they read, and how they communicate about it. What is striking is their individuality in how they accomplish these activities and within what kind of context.

The immersive experience of reading as an adult does not have to mean losing control or putting aside critical faculty. What came through strongly in reader

interviews is that they have their most intense experience not just with other readers but with the digital comic itself. Moreover, this intensity means entry into the story, picking up on implicit cues from the creator, in a sense, participating in the meaning of the comic itself.

6.5 Chapter Conclusion

The organization of this chapter follows the digital comic and the communication that propels it, from creator to CGM to reader. While comics creators and traditional CGMs may have the most practical as well as creative transactional communication, communication that imbues meaning to the digital comic is not restricted to these two stakeholders in the digital comics communication process of creation, editing, production, distribution, consumption, and reading.

In addition to the communication models introduced in Chapter Two, including linear, interactional, and transactional, research participants spoke at length of other types. Support, on crowdfunding sites and at conventions, for example, not only communicated financial assistance but also a sense of value for the work and of the creators themselves. This second type of communication, value communication, occurred in contract negotiations between creators and CGMs and with readers through promotion. Readers in their consumer roles in turn signalled value through purchase of comics, and then as readers through support on crowdfunding sites; through likes, follows, and other click-based participation on platforms; through sharing with other readers; and through response to the text.

Creators experienced their most substantive, transactional communication within creative teams, and in publishing with editors with book CGMTs and CGMIs, as well as multimedia and comics CGMMs. Both CGMs and creators expressed reservations over communication with readers, when it happened, preferring more interactional, almost phatic, feedback such as likes and follows, as well as positive comments about the work. Any more substantive, transactional attempts at input by readers were not necessarily welcomed because of concerns for IP and a certain protectiveness over narrative and the creative process.

Readers, for their part, participated mostly in what is described (by readers themselves) as passive communication with CGMs and creators: likes and follows with not much more than interactional or phatic communication and positive

feedback to creators. However, there were exceptions with webcomics readers on comics and social media platforms describing more protracted contact. In addition, some of the readers supported creators through Patreon and Kickstarter: this type of communication and support, as with likes and follows, signalled value for the creator and the content (as mentioned in Dowthwaite, 2014, 2017; Dowthwaite and Greenman, 2014; Dowthwaite et al., 2015).

Readers described the most substantive communication as occurring with other readers on platforms, both positive and negative experiences. A few readers looked on comics as a primary means of communicating information, especially of a political nature, and of view strengthening and changing. Moreover, their responses to the text, regardless of their own feelings about the comic being “light” or “serious”, described a type of immersive reading where the reader brought into being the comic world begun by the creator.

Chapter Seven
Inside (and Outside) the Digital Comics Ecosystem

7.1 Introduction

This research is grounded in the stories of 'making' digital comics by UK creators, traditional and self-publishers, platform owners, comics collectives, and consumers-readers. I have gathered and assessed these stories from across the creation-production through to publishing-consumption continuum according to the themes suggested by the makers themselves. A literature review revealed a noticeable gap in comics studies research not just of digital comics themselves, but also of qualitative empirical studies focused on them and their makers. This gap necessitated taking a wider approach to the scholarship considered, as well as the data collection methods and type of analysis applied. This kind of research, not only into comics publishing but also into the wider publishing context, introduced other influences on digital comics that have been little considered from an empirical perspective. This perspective includes the various levels and types of communication in a digital ecosystem; communication and embodiment from a sociological and digital perspective; the concept of production of culture and comic works; and the influence of platforms on the making and distribution of, and communicating about and through, digital comics. Using these concepts and theories as a framework, I selected research methods that were human-centred, not content-centred, and employed in such a way as to elicit a rich variety of experience within the making continuum.

The resulting findings are grouped around three major themes that describe the various aspects of the making and experiencing of digital comics within the larger context of digital culture and ecosystem (here listed with related research questions):

Theme 1 Production of digital comics culture: new makers, roles, and ways of working (RQ2)

Theme 2 The container is real: the material experience of digital comics (RQ3, RQ4)

Theme 3 Communication and relationships and how they transform through process, platform, and content (RQ3, RQ4).

These three major themes, encompassing the nature and unique offerings of digital comics (RQ1, see 7.2), at once describe digital comics according to their makers—creators, CGMs, consumers-readers—as a means of communication and creative expression. They point towards a new way of studying them that embraces a digital sociology approach. This new method explicates an understanding of digital comics that is derived from a larger digital context: of technology, of ecosystems, and of readers as makers. The focus encompassed by the themes describes the experience of digital comics from creation > file >process >production > distribution > platform/app or website > devices > consumption > reading, and all the communication that drives, describes, and is the experience along the way. This new way of studying digital comics includes traditional sociological research methods, such as interview and survey, as well as new approaches (new as applied to comics) from Human-Computer Interaction research such as Interactive Think Aloud (ITA), user scenarios and activities, and online interactive demonstrations not only of apps but also of maker spaces. The motivation for research is at once to undertake and develop a holistic and human-centred investigation of the processes, use of technology, and communication that contribute to the making and experiencing of digital comics.

The emphasis on platforms in the findings suggests that digital publishing has already entered a new phase. What increasingly came across in interviews, even with traditional book and multimedia publishers (demonstrating their apps and storefronts), was the pervasiveness of platforms and apps. While digital technology has affected comics and book publishing processes, the rise of the platform has arguably had a greater impact. Publishing processes have been revamped by the disruption of digital technology, true, but ‘platformization’ has not only caused changes to business models, but also to relationships with creators, readers, and distributors. For creators and readers, platforms have made creating, reading, and communication easier (Guigar et al., 2011; Manzerolle, 2014; Dowthwaite, 2017). At the same time, they have ““colonized” creative processes and distribution, directly competing with creators’ websites (see Benatti, 2024, p.7 on creators controlling their own websites; see also Kim and Yu, 2019), as well as introduced an uncertainty (but also flexibility) in consumption choice, reading ownership, and social experience, essentially the “stifling of the webcomics medium” (Benatti, 2024, p.66; Kim and Yu,

2018; see also Gillespie, 2017, 2018; Gerlitz and Helmond, 2011, 2013 on platforms).

Readers (and sometimes creators) especially in this research sought to subvert this “colonization” (intentionally and incidentally) in drawing around themselves multiple platforms which they visited daily, dipping in and out of content and social ecosystems, including those for digital comics, news, games, work, and university, among others. In this sense, they create their own personalized digital ecosystems.

This new, more digitally sociological approach to comics that focuses on how users interact with technology and content is critical, given the changes that have happened in the recent past as well as those anticipated in the near future: the worldwide web and personal websites>personal mobile devices>self-publishing>social media>platforms/apps>AI. Comics in the digital ecosystem, as part of the “repertoire of consumable options” (Hernández and Bautista, 2023), will be swept along with these changes, and makers especially will feel the effects.

In this chapter, I will revisit each of the themes from the findings, discussing their implication for this research and the issues they have raised.

7.2. Unique Affordances of Digital Comics (RQ1)

> “What should matter to scholars and historians is not some elusive and chimeric formal essence but what particular communities say about and do with the things that count as comics to them” (Wershler, Sinervo, and Tien, 2020).

And

> “A comic is what is produced or consumed as a comic” (Hague, 2014, p. 27).

Over the time I have been collecting data for this research, I kept in mind one objective: to represent digital comics from the perspective of makers as a lived experience. This is not to say that theoretical, historical, and visual and textual analysis have not contributed to the framework of method and methodology. However, they have had a prominent place in comics studies, causing a gap in qualitative and sociological studies. Comics studies, a relatively young academic discipline, has had a lot of catching up to do in defining its brand of criticism, even its

own taxonomy and referencing (Priego, 2011), essentially its own version of scholarly discourse about comics. The literature review in Chapter Two demonstrated that there is plenty by way of definitional, descriptive study of digital comics, a preponderance of which treats with the file container and its constraints upon the content. Some have tried to move beyond the container, looking at the technical, communication, and distribution environment of the digital comic, such as Antonini et al (2020). Moreover, some do acknowledge that there might be other ways that consider how they are made and what people make of them, for example Murray (2012b); Wershler et al. above (2020); and Hague above (2014).

For my part and that of this research, comics have always been about popular culture, as Wershler et al. have it, “what communities say…and do”. And so, this research takes this last set of scholars at their word: it is a holistic, human-centred approach to what digital comics mean to the people who ‘make’ them. As a result, Research Question 1 concerning the unique affordances of digital comics is not associated with a specific theme, because each theme, as well as the aggregation of the themes, is imbued with the explicit and implicit explication of what makes a digital comic a form wholly unto itself. In essence, they explore and represent the nature of digital comics.

According to the research participants, digital comics are more than a file; they are all of the containers discussed in Chapter Five that enwrap them. Even for the most resolutely print-loving among the participants, these containers combine to offer features that make them convenient to preferable under certain circumstances. For example, they make catching up on back issues easier and less expensive (DCR2, DCR9). Working with them, especially in the editing and team creative process, is quicker and easier (CGMT2, CGMI6). In their digital archive format, they are easily translated to print and ebook formats, according to CGMs (but they would be more easily so if traditional publishers adopted XML workflows instead of those predominantly based on Adobe products, according to CGMT2). It is not just that digital comics are a unique offering, but that they are digital and comics: these components are what set them apart from any other kind of narrative reading on devices and apps. Because of these unique affordances, digital comics are more than a halfway house between print comics and other media (games, TV, movies, etc.). But, while this research refers to a theoretical framework that supported

analysis of the data, the main emphasis has been on digital comics as a lived experience, whether it be creating, producing, distributing, consuming, and reading. It is true that some of the participants still spoke of the experience, the materiality, the haptics of print. However, a majority of the creators and readers 'lived' in the digital ecosystem in which they were 'experiencing' digital comics specifically for their unique affordances of content combined with digital technology and functionality

The functionality, especially the ease of transfer afforded by the file container, makes them a perfect vehicle or package of content to be ported around the digital ecosystem, comics- and non-comics-based, in much the same manner as their cousins, memes. Hernández and Bautista (2023) support this view in their research on the meme platform 9Gag (which also includes webcomics) and its Instagram profile. As "cultural commodities" or "consumable options" (Hernández and Bautista, 2023), digital comics, and especially webcomics, have been readily disseminated across platforms because of their modularity and ability to be "reworked and repackaged" (Nieborg and Poell, 2018, p. 4276):

> Comics have joined the new practices of digital distribution and consumption, involving in their ideation, production, and exploitation, different aspects that once seemed alien to the industry. In this new scenario, the webcomic is presented as a cultural object that adapts the comic to the Internet ecosystem in a sort of remediation that connects with the needs of younger consumer profiles by making the medium transparent (Bolter & Grusin,1996) since there is no longer a physical format that delimits in pages the time and space of users' consumption (Hernández and Bautista, 2023, p. 2).

If digital comics are "consumable options" (Hernández and Bautista, 2023), these options are contingent upon the relative stability or instability of platforms. According to Nieborg and Poell (2018), platforms are not "static objects" in and of themselves (aside from sweeping digital innovation) but are "continuously in flux": this is their natural state (p. 4278). Digital comics, as products of "cultural production" (p.4276) and ultimately "consumable options" (Hernández and Bautista, 2023), are "contingent…cultural commodities", that is "dependent on a select group of powerful digital platforms" which essentially require them to be "modular in design and continuously reworked and repackaged, informed by datafied user feedback"

(Nieborg and Poell, 2018, p. 4276). This dependency on the platform environment should affect comics studies research: as platforms and ecosystems evolve, so should the study of digital comics as the products of them.

7.3. Practices That Make Digital Comics (RQ2) (Theme1)

Thompson (2021) describes the linear nature of book publishing in the past and to a certain extent in the present:

> In the past, when publishers looked beyond themselves, they tended to focus their attention on authors and retailers. Publishers were service providers who were linking creators of content (authors) with consumers of content (readers) via the intermediaries of the book supply chain (retailers and wholesalers) (p.465).

This is almost an exact description of traditional comics publishing. It could be argued that comics publishers had a more direct connection with readers than any other type of publishing through columns in comics books, merchandising, and conventions. However, they mostly remained at a remove from their readers, relying especially on comic bookstores, among others, to fill in the gaps (see Barker 1989, 1990; Sabin 1993). Perren and Felschow (2017), in case studies of DC Comics and the then creator-led Image Comics, maintain that how "executives and creatives imagine, cultivate, and engage with their fans is in part a function of how these different companies are structured" (p. 11), as well as their size. Moreover,

> …relationships between comic book executives, creatives, and fans in some cases are differentiated along company lines. In other cases, however—such as when creatives approach their work from their own position as fans—variations in business models can have less of an impact on the stories that are told or the ways fans are engaged with by creatives and executives (p.317).

Creator-owned companies, such as Image Comics, through lean organizational structures and more agile business models, can create a more dynamic kind of interaction with readers and facilitate the same type of communication with creators.

These descriptions reflect UK comics publishers, or CGMs, mapped and interviewed for this research. The book publishers and media companies (CGMT,

CGMI, CGMM) had different relationships with creators and readers depending on their size and structure. For most in these categories, their primary relationship was with creators, either helping them to realize their vision for the comic (CGMT, CGMI) or supporting them to realize the publisher's vision (CGMM).

Even within these somewhat restrictive conditions, as well as the more free-wheeling ones of self-publishing, creator and reader participants in this research illustrated their changing roles and the potential impact on CGMs. To some extent, these changes have been affected by the increasing influence of platforms on self-publishing and the influence they have on traditional publishers.

7.3.1 Diverse CGMs Mean New Processes and Platforms (RQ2)

Chapter Four provided a selection of the different means of producing and distributing digital comics by a variety of Comics Gatekeepers-Mediators (CGMs). It was not that many years ago (maybe 20, give or take) that listing comics, and especially UK comics publishers, would not have been a difficult or time-consuming task (although 'underground comix' did add more diversity, especially those that were self-published). However, in embarking on an exploration of the digital comics publishing environment, it immediately became apparent that not only was it a much more intensive activity, but also why it had become so. Self-publishing, of course, as in all areas of publishing, accounts for a great deal in terms of number and diversity (of content and creators/self-publishers, for example).

But there are also new players in comics publishers: book publishers, large and small, mostly concerned with graphic novels, as well as tech and multimedia companies creating and publishing comics from games, for example, or acquiring the IP for legacy UK comics. All of these, according to interview and the mapping exercise, no matter how print resolute, had at least "dabbled" in digital.

Moreover, comics project teams (or individual creators) create comics, user interfaces for academic and cultural institutions, as well as conduct research where the creation of comics is used in an applied way, to explore mental health, support education in various subject matters, or just to encourage creativity in adults and children.

Another new player is the platform—self-publishing, crowdfunding, and distribution marketplaces—some providing apps for a more ‘exclusive’ experience for the reader and even creator: exclusive in the sense that a user could spend a considerable amount of time on the app (or platform) in several activities including buying, selling, reading, writing, and discussing.

All these different and new influences on comics publishing have had the effect of bringing comics to new audiences (see, for example, Benatti, 2024, citing Gustines and Stevens, 2022). But they have also created ‘grey areas’ for comics. For example, there is much discussion regarding the nature of the graphic novel: is it really a comic or some distant relation? And can the comics remediated from these largely print publications, produced by small and large book publishers, be considered digital comics as such, or just an electronic version (and not always a good one) of the original? While the first question is specific to the graphic novel, the second is one that concerns all comics (even webcomics when they are remediated to print) and that continues to be much debated among comics studies scholars. However, as mentioned above, this is because the consideration of digital comics usually stops at the file and its relationship to the content, and not to the other components of digital comics: devices, platforms, and apps.

Platforms: an innovation or a threat?

What the “era of digital comics” (Resha, 2020) has accomplished above all else is the distribution of comics in such a way that they are not just niche content produced for a niche set of readers tied to physical locations or one physical print device. With a lot of help from platforms, people ‘view’, ‘read’, ‘like’, ‘share’ comics, people who do not even consider themselves comics consumers-readers. This contribution of content to platforms was not confined to creators and readers: almost every CGM interviewed did contribute either to their own or to more centralized platforms like Amazon and ComiXology (which was taken over by Amazon and has disappeared as a platform and app in its own right in December 2023, see Alimagno, 2023; Simons, 2023). Nieborg and Poell (2018) observe:

> …there is a noticeable lack of scholarly analysis of the platform complementor relationship in its different facets. Consequently, there is little guidance on the nature and composition of complementor communities: what motivates cultural content producers to contribute to platforms, what strategies do they develop, and how do platforms support, ignore, or bar them (McIntyre and Srinivasan, 2017) (p. 4276).

These "complementors" are not just self-publishers but also small and large publishers of comics content. This wider distribution in the digital ecosystem, including comics and non-comics ecosystems, means an increase in users and the user data that make them

> …'contingent on,' that is, dependent on a select group of powerful digital platforms. In the West, these are Google, Apple, Facebook, Amazon, and Microsoft (GAFAM), which allow content developers to systematically track and profile the activities and preferences of billions of users (p. 4276)[15].

This dependency, as these platforms move more completely into AI, could lead to, in some cases, an unwitting (or witting?) dependence on AI itself to deliver content and services (Luitse, 2024). Of course, the power and influence of a platform are relative to those complementors with which it deals. According to Nieborg et al. (2024) "power in platform markets and infrastructures [are] relational but also highly uneven, resulting in power asymmetries and unequal dependencies" (p.5). An example of this is the changes in Twitter (and not just in its new name, X) brought on by its takeover by Elon Musk. As a platform that "operates at a very large scale

> …it is in a unique position to set rules and standards that are favourable to the platform itself, as well as to those groups of "complementors" — platform-dependent corporations — and end-users a platform deems (more) valuable

[15] There are variations on this list of "powerful" platforms, for example "As of September 2023, these gatekeepers are Alphabet, Amazon, Apple, ByteDance, Meta, and Microsoft — with online travel agency Booking.com added in May 2024" (Neiborg et al. 2024). Another example suggests that "Amazon, Microsoft, and Google have become three of the dominant developers of artificial intelligence (AI) infrastructures and services (Srnicek, 2022)" (Luitse, 2024).

(Rietveld et al., 2020) (Nieborg et al., 2024, p.5) (Twitter/X here is my example and not one mentioned specifically by Nieborg at al.)

Twitter at its inception as an example of an “emerging or niche platform…[had] much more of an incentive to keep all its users on board” (Nieborg et al., 2024, p.5). But at this stage, the current platform owner has made and is making changes likely to lose users, apparently an acceptable risk (see Pazzanese, 2022).

Comics platforms (with their apps), such as American comics publishers, Marvel Unlimited, DC Universe Infinite and UK comics publisher Rebellion, have come to dominate digital comics publishing as well as transmedial or crossover media creations. But a potentially bigger platform player, WEBTOON, has evolved over the last decade. DC has published *Batman: The Wayne Family Adventures*, and Marvel experimented with *The Eternals* in 2022, on WEBTOON (an example of “complementor” activity). Moreover, Marvel has adopted WEBTOON-inspired vertical scrolling, “infinity scrolling”, on its app. There is not much evidence that WEBTOON poses any threat to DC and Marvel, however: according to Benatti (2024), the genres popular on one are not on the other (WEBTOON: Romance and Fantasy; DC and Marvel: Superhero). Moreover, they are not competing in the same market, despite DC and Marvel’s experiments with webcomics.

7.3.2 The Expanding Roles and Responsibilities of Creators (RQ2)

Digital disruption or innovation has not just influenced publishers, who they are and their processes. It has also affected creators and readers, who they are and their respective roles. Creator and reader participants spoke of their daily activities, demonstrating a degree of control over such processes as consuming, creating, production, and ongoing communication.

Throughout the interviews with creators and CGMs, an altered landscape was presented, in some cases completely transformed, in others with mixed results. In the self-publishing of digital comics, the creator is now the “all-seeing eye” (Priego, 2011, p.197, see below) and has the overall conceptual vision (for example, see CCC1 and CCW2 in Chapter Four). This role for the creator pertains even to a certain extent when working with large and small book publishers: the creator has the “conceptual vision” and expedites this vision by taking all or most of the art-

related roles. The editor here is more of a facilitator of that vision, assisting the creator in realising it (for example, see CGMI2 and CGMI6 in Chapter Four).

“The all-seeing eye”: Comics creators and the business of self-publishing

It is one of the unique characteristics of self-publishing that the creator or author takes on more roles, in fact the roles often ascribed to the publisher in traditional publishing. Indeed, this is evidenced in the self-publishing process models provided in Chapter Four, as well as creators’ descriptions of how they work and the tools they use. What comes through strongly in the creator testimony is that digital technology has also increased the responsibilities of comics creators of print comics, graphic novels for example, in the book publishing environment.

In the digital environment, comics creators, such as CCT2, habitually take on the roles of writers or scripters, penciller, inker (where the light table comes in), colourist, and letterer, combining the outputs of the represented activities into separate digital files (often separate layers) for each page. It is the change in the tools themselves, from manual to electronic to digital, that has combined all of these activities into a workflow for an individual, the comics creator, evolving their own creative ecosystem of online and offline tools (see Chapter Four). Whether a team including writers and illustrators, or just one comics creator fulfilling all or most of the roles of writing-editing-drawing, the creative process is iterative, depending on feedback at every stage: from other team members, from publisher editors, from third-party designers, from crowdfunding supporters, or just from the multiple drafting of one creator.

What is different in digital self-publishing is not just how widespread it is, but how much more accessible the digital tools are for creation and self-publishing, and how much easier using these tools has become (Benatti, 2024). Of course, the self-publishing of underground or alternative comics only required pencil or pen, colours, and even staplers. But they also required an electronic means of making multiple copies to distribute to a wider audience. The main difference between production and distribution by a photocopy machine and digital technology is scale. What the creative process and workflow as exemplified by the creators in this research point to is the incorporation of multiple creative activities and roles into the one role, comics creator, and the one ecosystem, the personalized comics creative ecosystem.

In addition, the comics creator, especially in digital self-publishing, assumes other functions that had belonged to the traditional print comics publisher. In traditional print comics publishing, there were (and still are for those publishing according to this model) two levels of authorship: “that of a market author-function and a textual author function” (Hibbett, 2023, p. 83, summarising Freeman, 2016). The “textual authors” are those to whom credit for creation is given, in other words, those who appear in the comic book issue’s credits. The “market-authors” are the corporate producers or publishers under whose banner the comic book is issued. The general public, not necessarily comics readers, may be familiar with Marvel as a producer of comics, not so much with the individual creators or authors involved (although fans and collectors usually are; Woo, 2012, points to “the emerging divide between readers and collectors”).

Comics creators could also be considered “Author as Franchise” which Freeman (2018) explains as an entity that evolved out of 1920s-1930s licensing across the then popular media of newspapers, pulp magazines, radio, and comic books in the US (using Edgar Rice Burrows as his case study). Transmedial licensing today, of course, includes movies, television, and games, and has become a bigger business. “Author as Franchise” has made inroads into digital comics self-publishing. Webcomics creators offer merchandise, experiment with sound and motion (Goodbrey, 2015 on sound, and examination of one of Goodbrey’s comics in conjunction with motion in Smith, 2015) and reach into gaming (early webcomic creators sought to appeal to this audience not just because of content but also immediate access to them, see Kleefeld, 2020). This reaching across media does not always work to the creator’s advantage, especially when self-publishing creators begin to negotiate with large or multinational companies. Alex Norris, a UK comics creator known for his WEBTOON comics as well as for the *“Oh No!”* webcomics or *Webcomic Name,* thought he was negotiating with a game company, Golden Bell, to make a board game based on the comic. At the time of this writing, Norris is locked into a legal battle with the company (from 2017) “which has used this as an opportunity to take all of my intellectual property, and has even claimed ownership of Webcomic Name as a whole”. Norris maintains that he did not sign his rights away, but Golden Bell has been able to prolong the court case (Alverson, 2023).

While Norris and *Webcomic Name* is an interesting example of transmedia, from digital first webcomics to old-fashioned board game (produced by a company that issued a cease-and-desist order to a publisher who was bringing out *Webcomic Name* in print form), it also highlights the hazards to self-publishing comics creators contracting outside of comic or book publishing.

There are hazards negotiating with traditional publishers as well: Thompson (2021) speaks of publishers writing contracts in such a way as to cover future digital formats, thereby limiting creators' ability to publish in new formats elsewhere. Moreover, under the work-for-hire contracts favoured in comics publishing, comics creators are still fighting for rights to their creations, digital (including over non-fungible tokens or NFTs) and otherwise. There continues to be conflicts with publishers, including British publishers, over print royalties and rights. Pat Mills, for example, of *2000AD* and *Judge Dredd* fame, has taken Rebellion to task, advocating a French model of copyright which compares more favourably to the British. He claims that British copyright "has nearly destroyed British adventure comics and continues to harm the industry by not attracting or retaining top talent, or encouraging creators to give of their best" (Johnston, 2019; see also Burt, 2021 on Marvel's Stan Lee's conflict with creator Jack Kirby '"who was very very good at creating comic book art and very very bad at getting paid for it"', quoting from Evanier, 2002).

Making a living

Becoming an "author as franchise" may not simply be the case of capitalizing on opportunities to expand to other markets so much as it is often economic necessity. According to former UK Comics Laureate Hannah Berry's study of UK comics creators in 2020:

> Despite its growing audience and increased sales figures, the scrappy, rough-and-ready frontier of comics is not a reliable source of income. There is barely enough of an industry for more than a handful of creators to sustain a career in comics alone. According to the survey, 87% of creators rely on income from at least one other source outside of comics, and of those who said comics was their primary occupation, only 62% said it was their main source of

> income. Much as we love comics, having an actual career in it is like pulling teeth (p5).

It has to be acknowledged that a significant number of the respondents to Berry's survey were primarily creators of print comics. However, according to this research and others (Kleefeld, 2020, for example), creating digital comics is not any more conducive to making a living. A significant number of comics creators in this study did not make their living from comics, a few taking up work-for-hire contracts with publishers and cultural institutions. As in the Berry study of comics creators, they did not have any negative feelings about work-for-hire, nor concern about rights. They were happy enough to have steady pay for a while. According to CCW1, working as part of a collaborative team in the contractual environment was an advantage, and not just a financial one:

> What else is there, but collaboration? The collaboration of comics is where the magic happens. When you self-publish stuff you write and draw yourself, you don't get that magic. The magic is in the collaboration element of it. But the industry itself of comics, I guess it's the necessary thing because that's how I cash my cheques every month. But there's a lot of exploitation in the comics industry.

Indeed, while there has been much discontent over mainstream comics publishers retaining rights and licenses in the work-for-hire publishing model, some creators, as demonstrated by CCW1, are happy for the regular pay cheque. Hannah Berry's *UK Comics Creator Report* illustrates just how desirable an option a 'flat fee' can be: for those respondents who reported it "regular 'work for hire' in 2018/19… generated the highest average income compared to other direct sources - £11,295" (p. 42). The distinction here between the sometimes isolating experience of self-publishing and the "magic" of collaboration seems to get at what potentially can go wrong in a collaborative, community environment (exploitation) and how self-publishing can be the antidote ("you write and draw yourself"). For the comics creator, it can be a difficult decision: go with the steady income and community or maintain independence, control, and ownership.

Just as comics creators are retaining more control over their product, new(er) technology might endanger that control, for example, AI. However, in the interviews

and observation sessions, creators spoke at length of the many digital tools they used in the creative process, with some always open and eager to try the next new thing, including comics generators.

7.3.3 New Roles for the Consumer-Reader (RQ2)

> "Sooner or later every ecosystem changes; it just requires the correct precursor."
>
> (From "Reassortment", Season 5, episode 8 of television show *Person of Interest*, aired in the US on 24 May 2016 on CBS)

While there is scholarship tying comics to digital ecosystems and how they are affected (Priego, 2011; Lamerichs, 2020; Antonini et al., 2020), there has been little that focuses empirically and exclusively on the makers, especially readers (some exceptions: Barker, 1989, 1990; Serantes, 2014,2019; Perren and Felschow, 2017, for example). That this research is based on the lived experience of makers, in other words empirical evidence, has been key to a greater understanding of how their roles have evolved and a greater consideration of the specific aspects of these roles. Moreover, as noted in the quote from *Person of Interest*, the changes in precursors[16] and their roles have a direct impact on ecosystems. For example, as a result of reader interview and observation, I not only noted the difference between the user as consumer and the user as reader, but also that these roles can be complex and more layered than presented in comics and other research. Moreover, these roles are encompassed in a sequential process of their own at the end of the creation to consumption continuum, as the comic has to be acquired (or consumed) before it is read, shared, and discussed (and then onto more consumption for future reading).

Readers do not simply purchase comics; as demonstrated in Chapter Four, they engage in various ways of encountering comics, intentionally and incidentally (terms which can also be ascribed to explain the type of reader). From that point, on social media or a comics app, they engage in decision-making about whether or not to consume, even trialling free samples or reading more about the comic creator (as

[16] *Person of Interest* was a television series about the creation of an AI 'machine' that collects and collates data to predict terrorist and other violent attacks. 'Precursor' is a term used in science to indicate a substance from which another substance is formed. As has been noted previously, the platform-based ecosystem changes as its actors or users change (see Lamerichs, 2015, for example in Chapter Two on platforms "[yielding] to complex user cultures").

DCR7 described in their discovery process of the creator who published with the Wellcome Trust). It is important to note here, as the example of DCR7 illustrates, that consumption is not just a commercial transaction: the steps towards consumption (the acquisition of the comic, whether through payment, download, or bookmark) pertain to freely available webcomics as well.

Although not necessarily derived from empirical research, some scholars, including those of comics studies, have considered users or consumers especially on platforms. Lamerichs (2020) refers to the “data savvy user”:

> However, the rise of platformization has also given range to data-savvy users, who have a high degree of algorithmic literacy. They are aware of the pitfalls of platforms, and also adopt tactics to effectively mobilize hashtags, recommendation algorithms and advertisements among others. Such users have also been described as ‘data fans,’ who ‘adopt individual and collective strategies to influence metric and semantic information reported on digital platforms and social media’ (Zhang and Negus 2020, 493) (p.214).

This view can be contrasted with how Busi Rizzi (2023) defines the consumption experience of comics through platforms above, where users or readers are “curbed” or “channeled” in an effort to deter piracy (p.118).

Busi Rizzi here reflects some of the findings regarding reader participation in creation from this research: most of what is considered reader participation or co-creation (direct input into content) is entirely controlled by creators, the options they have for response and in what manner (see examples of CGMO1 and CGMO3 in Chapter Four). Moreover, he also reflects how platform studies scholars describe the relationship with end-users: the larger the platforms become, the more data they take, and the more rules they can impose on those users, with little consequence. As Harold Finch in *Person of Interest* (who claims to have created social media to develop datasets with which to train the AI machine) observes: “Turns out most people were happy to volunteer it [their data]” (from ‘Identity Crisis’, 2013).

“The like economy”

Value communication—likes, follows, shares, subscribes—can be expressed as support for a comic or comic creator (see 7.5.2 and Chapter Six). But it is also a

type of communication that can be easily monetized and, therefore, be considered part of consumption. Several readers considered their attempts at communication as passive: in the form of likes, follows, or maybe a more active sharing. They did not seem entirely aware that they were participating in the “like economy” (Gerlitz and Helmond, 2013), where perhaps they exerted a certain amount of influence on the success or failure of a work or comics creator. They only classed direct support, through Patreon or a crowdfunding site, as an active transaction of a financial nature and even with this they felt it was something they should do, especially if they had not paid anything for the comic. However, if we consider Lamerichs (2020) above and Gerlitz and Helmond (2013), consumers-readers can experience a different type of participation, perhaps influence over content purely from a consumption perspective. Of course, this is not a new concept. When consumers buy a lot of something, it encourages the creators and producers to produce more. Conversely, if they do not, creators and producers have to rethink their product and marketing. Literary fiction has also been subjected to the same influences and not just in the digital environment. Charles Dickens, in his serialized works, changed narratives, character directions, and sometimes depictions in direct response to readers’ input or those upon which the characters were based (Johnson, 1969)[17]. What is new is how platform owners in particular began to realize the value of these “social buttons and counters” (Gerlitz and Helmond, 2013). This realization came about with the Google search engine and its introduction of rankings.

So, the financial transaction does not just happen with the purchase of the comic. It is also the part consumers-readers play in “the exchange value of the informational web” (Gerlitz and Helmond, 2013), incidentally or intentionally. In the “informational web” sharing is not just the act of sending a link, not just the act of communicating: with the creation of the hyperlink analysis algorithm PageRank, Larry Page at Google was able to “[calculate] the relative importance and ranking of a page within a larger set of pages based on the number of inlinks to the page, and

[17] These readers were his friends, though Johnson does say: “The novelist's tenderness for the sensibilities of his readers made him chary of causing gratuitous… offense, even when some compromise of artistic purpose was required”. Instances cited by Johnson concerned changing the depiction of Miss Mowcher in *David Copperfield* in response to a reader’s letter, and “[creating] the character of Riah in *Our Mutual Friend* in part to make amends for Fagin, after a Jewish acquaintance accused him of anti-Semitic bias”.

recursively the value of the pages linking to it. Therewith Google determined that not all links have equal value" (Gerlitz and Helmond, 2013, p.1350).

As a "consumable option" on the web, webcomics are closely linked with hypertext algorithms especially when shared: "data mining practices reveal an alternative fabric of the web, one that is not organised through hyperlinks placed by webmasters, but one that is based on data flows" (Gerlitz and Helmond, 2013, p. 1361). These data flows include all the "tweets, shares, and likes" which "create links back to the affiliated platforms and may be approached as new types of hyperlinks" (Gerlitz and Helmond, 2011, p.2). As a type of communication on the web, webcomics are part of these data flows and an intrinsic component of the "like economy".

7.4 The Material Experience of Digital Comics (RQ1, RQ4; Theme2)

A repeated refrain, from some participants in this research as well as from the literature, concerns itself with the materiality of print: "something with a spine", "something different about holding a physical comic or graphic novel in hand". For comics studies scholars, this refrain reflects a discipline steeped in the immediate physicality of the comic; in other words, the content directly attached to or on the container, in other words, paper.

The primary reason for representing the view on print comics in research about digital comics (Chapter Five) was not because digital comics cannot be considered without reference to print (a frequent occurrence in comics scholarship, if not only for considerations of remediation). They can and should be more comfortably considered side by side and part of a broader range of reading; that is, if digital and print are viewed as two aspects of the overall category of comics.

The reason for inclusion was primarily to demonstrate, at least in this empirical research, the split between committed print readers (as expressed in childhood memories in Chapters Four-Six) and those who, if not committed to digital comics, are so steeped in a 'digital lifestyle' that the physicality of comics has come to mean (or only means) the three containers referred to in Chapter Five—file, device, platform. There was some residual feeling about print comics among the more committed digital comics readers, but it seemed like every time they went to express it, the positive aspects of the digital crept back in (see DCR8 in Chapter

Five). This split in the research participants is instructive in that those who have fond memories of print reading growing up were more partial to print, all the while being pulled into digital: memory is important here. In Chapter Two, Priego (2011) is cited about the importance of memory when considering comics from a socio-cultural perspective:

> Nevertheless, at least for those readers born between 1946 and 1977, pointing to these examples of comics publications will evoke a series of remembrances, bringing back to life the memory of reading experiences of childhood (p. 61).

Although the split in participants cannot be perfectly aligned according to age, the preponderance of those preferring print roughly corresponds to the range mentioned by Priego (2011), with those later speaking more positively about digital comics. This may not be solely due to a love for digital comics, although a few did express strong feelings for them, especially webcomics. This constant reference to the digital can be attributed, in some measure according to Benatti (2024), to where all the functions of publication reside:

> Instead of a geographically dispersed circuit where physical comics must be printed in one location, distributed to points of sale, purchased by readers and carried to where they will be consumed, most of the phases of Darnton's communications circuit are collapsed within readers' digital devices (p. 65).

The digital as a point of reference is the result of the ubiquity of devices in daily life. I would not even call it 'device use': as cited in the research of Carolus et al. (2019), it, specifically the smartphone, is our constant companion, an extension of ourselves. It can be argued that when we interact digitally, the phone is the first device we reach for. To some degree, devices are not used: they are social actors (Xu et al. 2022; Yus, 2021).

A new research model for digital comics must include and acknowledge these social actors and not as something that detracts from the experience of digital comics but as necessary components of digital comics, not to be separated from them. Those who participate in the digital comics ecosystem increase simply by going about their daily lives online. The importance of the device to the lived experience or to 'ordinary behaviour' or 'everyday life' has been a focus of cultural

studies from the 1990s, summarized and illustrated by the Sony Walkman study of Du Gay et al. (1997, 2013), described in Chapter Two. As important as the Sony Walkman was considered to be in "interaction networks" in the 1990s, it only allowed for embodiment to a certain point: "you can play the actual Walkman but you cannot think with it, or speak or write [sic?] it" (du Gay et al., 1997, p.10). This statement serves to illustrate how far devices have evolved, especially as that most ubiquitous of devices, the smartphone, is now, for all intents and purposes, not only a Sony Walkman but much more. DuGay et al. (1997) go on to say that "meanings bridge the gap between the material world and the 'world' in which language, thinking and communication take place—the 'symbolic world'" (p. 10). Devices have already bridged that gap by becoming the repository, the provocateur, the facilitator for our meaning-making: truly, they are worlds where our "language, thinking, and communication takes place" (Du Gay et al., 1997).

Kashtan (2018) refers to the "crystal goblet model of typography" (referring to Warde,1955; see Chapter Two) which describes the propensity of readers to ignore the physical attributes of the book, unless otherwise dictated, focusing on the content, the story, the information. However, comics, specifically comic books, are said to have an "insistent materiality" (Murray, 2013): readers cannot escape 'the container', the printed matter, the artwork, the arrangement of panels on pages. Moreover, they do not necessarily want to escape it, as demonstrated in the findings from this research.

In digital comics, some of the physical elements have made the transition from print, for example the arrangement of panels (if there are any). But the container essentially has become the device with which the comic is read. Does this disappear, as with a book, or is its materiality insistent as with a comic? And, insistent in a desirable way? None of the research participants spoke about their devices in the same way as those who spoke emotively of the physicality of print comics. They spoke of preferring certain devices over others and of the use of the mouse and clicking as opposed to the tapping of the screen. So, they were aware of the physicality of the devices, at a certain level, and mostly in an indifferent to positive way.

However, there was not the same sense of objectifying the device in the same way that print comics are, because at another level they did not think about the device, question its necessity or presence in their lives. As mentioned above, the device was the receptacle for thoughts, ideas, interactions, in some cases a digital facsimile or at least a parallel of their owners. Moreover, they were a physical extension of their bodies. In *The Phenomenology of Perception*, Merleau-Ponty (1962) uses the analogy of a blind man and his walking stick:

> The blind man's stick has ceased to be an object for him, and is no longer perceived for itself; its point has become an area of sensitivity, extending the scope and active radius of touch, and providing a parallel to sight…The position of things is immediately given through the extent of the reach which carries him to it, which comprises besides the arm's own reach the stick's range of action (pp165-166).

Embodiment is experienced through devices, and as part of the language of the digital ecosystem, digital comics partake in that embodiment. In the case specifically of the smartphone as mentioned above, it indeed "[extends the scope and active radius" of the senses, as well as the mind. With the smartphone, we are only limited by its limits, for example screen size (though creators and readers both got around screen size). The smartphone (or tablet or laptop or Apple watch) embodies our own personalized digital ecosystem, and digital comics are part of the language of that ecosystem. Developments in Augmented Reality (AR), Virtual Reality (VR), and Mixed Reality (MR), according to Goodbrey and Tree (2024 in a presentation at Comics Forum 2024), have been driven "by the popularity and widespread adoption of these devices [smartphones, tablets, etc]". These various forms of "reality" make the device experience more 'real', almost a final frontier of embodiment. Goodbrey and David Tree (2024) have devised "an artist-focused toolkit for the creation of three-dimensional [AR], VR and MR comics" where readers can literally and figuratively step within the comic itself.

7.5 Going in Circles? Communication and Digital Comics Makers (RQ3) (Theme3)

7.5.1 Digital Comics: The Language or Currency of the Web

In this research, I have included several types and modes of communication in order to understand makers: what they talk about, with whom, and why. These types, as identified in Chapters Two and Six, include the traditional models describing explicit levels or extent of communication, such as linear, interactional, and transactional. They also include phatic communication as well as modes that may be more implicit in that they are not necessarily verbally or explicitly expressed: for example, activities such as financial support and using media, including digital comics and memes, for view strengthening and changing, all actions that confer value.

In a sense, the research participants, the makers, demanded this expanded view of communication as identified in Theme 3: communication depends upon publishing, platforms, and relationships. This may seem, on the face of it, an obvious statement to make about communication, but by identifying different types, different levels of communication, even different places where communication happens, the various influences exerted on the making of comics, influences that have multiplied in the larger digital ecosystem, are more apparent.

And these influences are felt most in the different types of activities supported by platforms. Comics creators publishing with traditional book and comics publishers as well as on their own, particularly webcomics creators publishing on their own website, have an increased level of exposure to other creators and readers within a platform environment, whether that be social media or crowdfunding platforms. They can find this type of interaction at conventions, book launches and signings, and maybe the comments sections on their dedicated websites, but not continuously at different levels almost simultaneously (support, interaction, value communication) as on a platform.

One would think that with the amount of abuse reported online that exposure on one platform would be more than enough for creators and readers (excluding CGMs here as more corporate entities). And it is for some. More than one research

participant (DCR7, DCR11, for example) mentioned ‘switching off’ from social media platforms. DCR8 switched off from Comic Fury for a bit after a disagreement, but, upon retreating to what they considered a friendlier environment, they then backed away from Discord after feeling overwhelmed by the number of new comics shared on that platform. So, yes, opting out was not unusual among the research participants, but for most of them, they opted out of one platform to spend more time on another. DCR7 provided another example of not ‘switching off’ but just ‘switching’: they decreased their participation on social media and spent more time on WhatsApp. This switching off within the digital ecosystem is a significant issue, but of equal significance is that for most it was not a complete retreat: they had other options within their own ecosystems that compensated.

Acknowledging these actions and how users construct, purposefully or not, their own ecosystems, assist in understanding that digital comics make their way into these ecosystems not because users are looking for them but because they make up the ‘currency’ of platforms and not just social media platforms. DCR7’s retreat from social media did not mean that they no longer came in contact with digital comics: digital comics are one among many of modes of communication on WhatsApp. Even DCR11, who claimed to be taking a social media break, was reading comics online in PDF format through file-sharing sites. Chapters Four-Six provide multiple examples of creators and readers drawing around them their own creation and reading ecosystems, a daily schedule of dedicated websites and platforms with which they started their days and into which they then dipped in and out frequently.

Because of their inclusion in the “repertoire of consumable options in digital social media platforms” (Hernández and Bautista, 2023, p.1), webcomics are an attractive form of communicating and sharing among those who would not consider themselves to be comics readers, especially as they are often served up via algorithms. In this way, they not only make their way into the reading of non-comics readers, but into their personalized ecosystems of content and communication, or as Hernández and Bautista (2023) would have it “places [them] within a general consumption circuit such as that of digital content” (p.1).

For the most part, the communication that happened around digital comics as described by research participants and especially those who classed themselves as

casual or nonreaders, could be identified according to Yus (2021) as “mediated phatic sociability” (p. 38, quoting Miller, 2008, pp. 395-398). In other words, the glue that holds ecosystems together is not content,

> …but ‘keeping in touch’ is. More important than anything said, it is the connection to the other that becomes significant, and the exchange of words becomes superfluous. Thus the text message, the short call, the brief email, the short blog update or comment, becomes part of a mediated phatic sociability necessary to maintain a connected presence in an ever-expanding social network [. . .]. We see a shift from dialogue and communication between actors in a network, where the point of the network was to facilitate an exchange of substantive content, to a situation where the maintenance of a network itself has become the primary focus (Yus,2021, quoting Miller, 2008).

In this way, likes, follows, and shares are not passive (as some research participants would maintain) and do not only confer a value onto the content, but comprise a form of phatic communication that establishes a presence and connection online. As an example in Chapter Six, DCR8 relates their pleasure over another creator simply saying, “I like your stuff”. This simple, rather generic communication launched an extensive exchange between the two. Multiple exchanges of this kind are the glue that connects and maintains the digital network.

It must be said that phatic communication is often associated with “the lack of quality exchanged” and not with “significantly relevant content” (Yus, 2021, p. 38). Comics, according to some, could be considered the perfect match for phatic communication—light, short, humorous, and not to be taken seriously. But the point here is not the kind or quality of content, but the purpose and function of the communication. As Yus (2021) (and Miller, 2008) would maintain, phatic communication of this kind can be considered “intended” or “non-intended non-propositional effects”. Propositional communication is intentional and explicit. But when DCR7 shares a political comic on WhatsApp, they may be expressing “feelings, emotions, impressions, etc. that are not overtly intended or mentally represented by the communicator but are generated from the act of communication” (p.39). As sharing is often not accompanied by explicit communication, is DCR7 simply signalling their own opinion about the political content? Are they trying to

influence others? Are they looking to start a dialogue? Is it significant that they are sharing on WhatsApp and not an open social media platform? As Yus explains, any one or all of these could describe DCR7's intention, and all are set running once they click the Share button.

Tomasena (2019) speaks of "BookTubers" those users of YouTube who post information and reviews of books, as "not a great business in economic terms" (p. 6). But in much the same way as the different forms of value communication are referred to in Chapter Six, Tomasena goes on to observe:

> However, it is highly positive in terms of the accumulation of other forms of capital, like human capital (the ability to film, edit, publish, and engage with others through social media), social capital (the amount of people who follow them, expressed in terms of the number of followers, subscribers, viewers), and symbolic capital (their reliability, taste, expertise, charisma, knowledge) (p.6).

Webcomics creators especially operate within the realm of social capital, which according to Tomasena (2019) is often "[dissociated with] economic capital" (p.6). But this is to assume that social capital is only expressed in numbers and cannot be connected to economic capital (see Kiernan, 2021 on 'The Entrepreneurial Self'): those numbers of followers can push a site or a webcomic on social media further up the algorithm so as to appear in more feeds. If the webcomic creator relies on merchandise, for example, this means possibly more consumers (harking back here to "author as franchise" as above) (see Dowthwaite's research 2014, 2017, and in Dowthwaite and Greenman, 2014; Dowthwaite et al., 2015).

At the heart of this consideration of communication, and to a certain extent the research as a whole, is that digital comics, and specifically webcomics, are a prominent part of the 'language' used in the digital ecosystem to convey all the activities, emotions, and preferences expressed above.

7.5.2 Digital Ecosystem>>Digital Comics Ecosystem>>Personalized User-Generated Ecosystems

What has propelled them into this language is the platform and what it has meant to the building not just of communities but also of the framework of everyday

digital life. Platforms have also instituted the communication of value through likes, shares, and follows. On platforms, readers appear to be directed in how they communicate with creators and other readers. It is useful here to consider what has preceded the platform.

In the print world, once the final version of a book or comic book had been produced, it was shipped off to retailers (see Darnton, 1982; Stirling, Priego, 2011; Thompson, 2021; Perren and Steirer, 2021 in Chapter Two), namely bookstores and comic bookstores. These were the front lines in which readers not only encountered the published work but also formed relationships with the staff and other readers, talking about the books, getting recommendations, placing orders, having items held for them, meeting authors at book signings, and participating in book clubs. If booksellers were part of a "ramified network" including "publishers, printers, wholesalers…libraries, etc." (Thompson, 2021, p.15) connecting readers to authors, then their particular role took place at the commercial coal face providing that critical link. Moreover, Thompson goes on further to maintain that

> …throughout the 500-year history of book publishing, the publishers have, for the most part, regarded intermediaries like retailers as their main customers: publishers sold their books to retailers or wholesalers, and they left it to the retailers to sell the books to the readers (p. 462).

It could be argued that commercial print comics publishers had more communication with readers, as comic books, a form of "popular serial narrative", were not only print platforms for content, but also for publisher offers, prizes, contests, and letters, or "paratext" described by Werber and Stein (2023) "as a privileged space of readerly communication" (p.77). Indeed, letters columns especially were the engine rooms for comics' participatory culture, functioning in the same way 'fan' forums, comments pages, and chat rolls do for digital comics. Despite this connection between comic book readers and publishers within the comic book, the distribution of the comic books themselves was not directly to the readers, but to the intermediaries who made the comics available to the readers. Comic bookstores, as a locus or even a nexus for comic book readers and creators, played the same key role as an intermediary between creators, publishers, and readers as

the booksellers described by Darnton (1982) and Thompson (2010, 2021). According to Woo (2011),

> In contrast to newsstand distribution, the direct market represents the institution of comic-book collecting and connoisseurship as subcultural practices. Comic shops are not simply distribution points in a commodity chain but also social settings integral to the reproduction of comic-book fandom, yet they occupy an ambivalent position between the comic-book industry and its consumers (p.125).

What has taken over from comic book stores as demonstrated in Chapters Five and Six is the platform. Indeed, the emergence of platform-based buying and selling as well as reading and creating is considered as a distinct phase in the history of digital comics. Busi Rizzi (2023) lists “Platform Economy” as the fourth phase in digital comics culture (see Chapter Two).

I have noted above that platforms are and were designed to keep users on them: Priego (2011) refers to Henry Jenkins’ (2001)

> …one black box controlling the media and it is certainly what Steve Job's hugely popular combos of software and hardware, and Facebook's and Google's centralised, one-account-for-everything web services seem to aim for (pp.21-22).

But Priego also noted in 2011, echoed in this research, that there has been some “resistance” on the part of users in being so confined. Readers, creators, and publishers of comics currently do operate in an “heterogeneous media convergence and interaction” environment that often includes both digital and print, as this research can attest, but according to this research that kind of environment is largely of their own making. There are various attempts at “one black box controlling media” in the comics industry (Marvel Universe, for example), but this impetus is continuously circumvented by consumers-readers. People and their creative or everyday communication are at the heart of what can be defined as a digital comics ecosystem, that is not one but many black boxes. Antonini et al. (2020) offer “a technological analysis of webcomics as an integrated ecosystem of authorial, editorial, funding and reading tools, mediating a complex network of interrelation between the key actors of the webcomics life cycle” (p. 2). Whereas they seek to

provide “a framework of analysis…to guide the design and assessment of content technologies” (p.2), this research is more interested in communication, communication processes and technologies. However, in a sense, the types of technologies amount to much the same thing: Antonini et al. (2020) refer to the “the differentiation between the diegetic space of content experience and the nondiegetic spaces of content creation” (p.2). But it is precisely in these spaces that communication takes place, where “human-based behavior” drives creation, production, and experience.

However, in comics studies and outside of fan studies, it is this human experience, the lived experience that has been rarely examined empirically.

Personalized user-generated digital ecosystems

This research was not exclusively devoted to digital comics on platforms, but research participants including self-publishers, crowdfunders, platform owners and collectives, and especially ‘comic non-readers’, introduced platforms as a foci for communication, distribution, creation, and reading (see 7.5).

Essentially, the people, the makers of digital comics, spoke of how they made them and what they made of them. In demonstrating how they created digital comics, produced and distributed them, consumed and read them, digital comics makers moved in and out of platforms not only daily, but often to complete one activity, say the creation of a comic. As illustrated by the diagrams in Chapters Four and Five, they drew around them various sites, platforms, software, and sometimes offline tools to create their own ecosystems, in other words, user-generated ecosystems. The participants in this research were drawn to the digital comics ecosystem often through non-comics ecosystems, for instance news platforms, social media, and instant messaging services.

This “general consumption circuit” (Hernández and Bautista, 2023) is one populated largely by platforms. Platformization is often spoken of by scholars in terms of economy and businesses, with the emphasis on “cultural content producers” i.e., business ecosystems, such as publishing (Nieborg and Poell, 2018; Squires and Markou, 2021). However, other scholars emphasize another, relatively new aspect of platformization: Lamerichs (2020) and Gillespie (2018) speak of platforms in the following way, using Gillespie’s (2018, p.18) term: “Platforms [are] best understood

as socio-technical assemblages (Gillespie, 2018) that facilitate different communities, and act as mediators and gatekeepers of content" (p. 213).

And, included in this socio-assemblage is not just the "mediators and gatekeepers" in the middle (formerly associated with traditional publishing), but other makers of digital comics, namely creators and readers, or users. The success of the platform is heavily "contingent" (Nieborg and Poell's word, see title of 2018 article) on "datified user feedback", in other words, people.

In light of this feedback (see Figure 32 for the multiple feedback loops identified by this research), it is useful to consider specifically the act of sharing in the digital environment. Not only is it part of the language of the web, but in a way it can be viewed as a more individual user communication, almost a form of hypertext linking that is controlled and directed by the user—user-generated hypertext, flipping the relationship between webcomics in this instance (although it can be any "consumable option") and hypertext.

As with such click-based activities as likes, follows, and subscribes, shares accrue to the user within platforms (designated on the post) and also describe the user from platform to platform (xxx also liked etc). This information can be a sign to other users of the individual's activities and also of the platforms and websites the individual visits on a regular or one-off basis during the day (see Gerlitz and Helmond, 2011 on "Buttons, Counters, Web Economies", pp. 2-6). Essentially, and as observed in Chapter Four, it describes personalized user-generated digital ecosystems (of which the digital comics ecosystem can be included). Moreover, as mentioned above, consumers-readers are not satisfied with remaining in the all-encompassing "black box" that is intended to answer all their consumption and communication needs. In Chapter Four, we heard of creators, in the creation of just one comic, evolve a creative process that included not only multiple platforms, but tools that ranged from manual to electronic to digital, this combination centred around their laptop or PC or even tablet, the repository of a creative digital ecosystem of their own assembly. Readers also did not necessarily allow for any curtailment in behaviour. If one platform did not allow them free expression, for example (DCR8 with Comic Fury), then they would move to another (Discord). Comics as early adopters of the platform society link them to other non-comics

platforms to form distinctly reader-generated comics ecosystems (Lamerichs, 2020, and Ossa 2024).

7.6 Chapter Conclusion

Creators, readers, and even publishers engage with digital comics through a variety of devices that connect them to comics and non-comics spaces. Comics have met with other such containers in their previous history which have launched them to wider audiences, newspapers and broadsheets the most notable examples. Large numbers of readers were attracted to comics through the wide circulation of newspapers: some specifically for the reading of comics, while others encountered comics during information-based or information-encountering reading.

Comics have now combined with new containers—devices in combination with digital ecosystems—which could conceivably challenge the print circulation, including not only first encounters but shared encounters or ‘viralization’. Granted, not every digital comic will have that reach, but more titles will have a chance to be published and distributed than in print publication.

Scholars’ inclination to dismiss McCloud’s “revolution” could reconsider (as some indeed have, see Chapter Two) for ‘digital’ has surely transformed comics, maybe not in a content sense, or even in the most technically innovative way (although this can be argued based on the parameters for innovation). But it has transformed their materiality, their dispersion, their creators and readers, and to a certain extent their publishers, in a way that makes each experience of them both shared and personalized.

Taking together the findings around the themes of processes and practices (Chapter Four), interacting with digital comics technology, (Chapter Five) and the kinds of communication facilitated by the digital environment, including platforms (Chapter Six), add up, not to a defined, enclosed digital comics community, but to a more elastic digital comics ecosystem that embraces comics-based and non-comics-based platforms as well as new types of creators, publishers, consumers, and readers. While comics creators, especially creators/self-publishers, commune with other creators in person and online and with their readers on their own websites as well as social media, digital comics readers, and specifically webcomic readers, have taken comics into non-comic communities using them to reinforce views and bonds

within these communities. For these readers, digital comics have specific affordances that allow them to overcome economic, health, and social challenges.

In this sense, there is no one comics community (including print and digital readers), but a collection of personalized ecosystems of user-generated and user-distributed content. These personalized ecosystems include a digital comics content ecosystem which can constitute comics culture, wherever commonalities of digital creation and production, content, and communication channels are present. As this research demonstrates, these relationships and processes can best be understood through empirical, qualitative research methods that are holistic and human-centred.

Chapter Eight
Significance of Study and Future Research

8.1 Introduction

In her dissertation's chapter on future research, Cedeira Serantes (2014) states:

> The exploratory nature of this project, and its intended purpose of opening up new ways of looking at comics reading and readers, leaves many different and new venues for future research (p. 307).

It was ever thus for researchers exploring those gaps in research scholarship: in fact, during my research, I have had to resist the siren call of "many and new venues" several times in order to push forward with the specific task. In doing so, I hope that I, as well as others, might have the opportunity to revisit them.

The subject of this chapter is not only to consider the significance of the research in the present but also what its implications are for the future. Like everything digital (perhaps everything human), digital comics are about to be enveloped in major changes to the digital ecosystem at large, most immediately in the form of Artificial Intelligence (AI). These changes provide even more of a reason for continuing to examine digital comics in a holistic human-centred way, not just to consider the effects on the comics themselves, but also on their makers and place in the wider digital ecosystem as well as user-generated ecosystems. In essence, it is important to remember Thompson's (2021) advice: "…put people back in, or, rather, ensure that people and their ideas were there at the outset and an essential part of the story" (p. 496). With so much in recent research, projects, and other initiatives focused on 'large'—large data sets, large language models (LLM), large-scale data collection—a case has to be made for 'small data' that provides a human context (see Chapter 3.3.3 on HCI methods, specifically Young and Casey, 2018, on "the sufficiency of small qualitative samples"; van Voorst and Ahlin, 2024, on AI and ethnography; and Malterud et al., 2016, on information power).

8.1.1 Significance

As with Cedeira Serantes, I would hope that future research would include the taking up of this new approach, this new way of studying digital comics, and subject it to “further scrutiny” (p.307) so as to include new (to comics studies at least) research methods that might further clarify their role in the digital ecosystem. This research approach promotes seeing digital comics as entities that are not just digital versions of comics. Rather, the containers that enwrap them—the file, the device, the platform—must be part of any consideration as they are all important components not just to the comics, but to the experience of the comic. These containers themselves, as well as the humans engaging in the experience, demand a certain type of focus, not just to capture the experience in the present but to track the seeds of change for the future. This focus is represented in the findings by the three main themes: process, technology, and communication. All of these are set to experience significant change, and these changes will have a great impact on the experience of digital comics.

As such, this research contributes a qualitative evidence base as well as a theoretical and empirical framework that not only adds to scholarship in a variety of disciplines, such as comics, HCI, communication, platform and ecosystem, reader response, and digital publishing (including book history) studies, but also provides a guide for the study of digital comics in relation to those disciplines. That the research can contribute to the evidence base in so many disciplines is a result of the “malleability” of the file format of digital comics, its accessibility, and the ease with which it can be shared across the digital ecosystem.

In fact, this theoretical and empirical framework is its most significant contribution to **comics studies**, as has been noted throughout the dissertation. It expands approaches to digital comics beyond formalism by introducing a holistic, reusable range of methods that are human-centred. It is not that parts of this approach using these methods have not ever been applied to comics, but that they have not been consistently applied so as to describe the experience of digital comics themselves, set apart from how comics contribute to other experiences, for example in education or health. This is not to take away from research that analyses the impact of comics in these settings, often where most empirical studies of comics

happen. But these studies do not get to the root, the function of comics on a daily basis, in everyday life, not just as a project or in formal settings such as a classroom or doctor's office. This method of analysing digital comics is the significant contribution of this research. The approach to digital comics, combining processes with people, also contributes to **digital publishing scholarship** and that of the creative industries. It is a case study that highlights new ways of creating and producing and especially consuming and communicating within the digital publishing ecosystem as well as the digital ecosystem at large.

In Chapter Two, I reviewed various approaches to the analysis of communication although mostly from a theoretical perspective. These approaches aided in the framing of the analysis of the data that spoke implicitly and explicitly to communication about, through, and supported by comics in the digital setting. This research contributes a qualitative evidence base to the **study of communication** within the digital environment: digital communication specifically as it relates to the creation, production, distribution, consumption, and reading of comics. In this way, it also furthers **visual digital communication scholarship**, adding to such research as Hernández and Bautista (2024) on webcomics. Through this evidence base, it demonstrates another way of looking at comics and digital communication: how they are used as "commodities" and as essential parts of digital communication in multiple contexts especially across platforms. In this way and in the way it demonstrates the making, experiencing, and use of comics over platforms and personalized user-generated ecosystems, this research also contributes to **platform and ecosystem studies**.

The value of **HCI methods** was highlighted especially in that part of the research that considered readers and their interaction with digital comics. As mentioned in Chapter Three, the combination of HCI methods, analytical tools, and focused interaction with makers and readers in particular provides a useful case study for the concept of Rapid Ethnography as developed by David Millen (2020). The ITA method allowed readers to lead the sessions in their own homes using their own devices (a benefit of virtual sessions). Readers not only 'described', they 'showed', through body language, tone of voice, by showing me around their studios, offices, or homes. As with most empirical studies of comics, qualitative methods are used to measure reader response mostly in an applied setting, especially the

classroom and learning context (see Chapter Two). This research focuses on **reader response** as it relates to leisure reading and provides empirical evidence using video and voice recording to illustrate this response.

Digital archives

The research provides an evidence base for libraries and archives to use when looking for support for collection development in this area. The CGM mapping (Chapter Three) and processes (Chapter Four) also inform other areas of collection development, for example, self-publishing. These contributions have already been made to the British Library, a supporting partner of this doctoral research, and identified in internal planning documentation.

The British Library was a significant partner in this research, along with City St. George's, University of London. So, the findings very much speak to its staff as they go forward with policies and collection development for webcomics. The general subject of this research, digital comics and their processes, arose at the British Library from a realization that staff did not know enough about digital comics, and that they needed more information to support collection development and management. The Library's support for access to born-digital content assumes that delivery will be via a PC (even the UK Web Archive user interface was optimised for a PC, although it did reflow to mobile phones). In a national library and specifically legal deposit context[18], there is no support currently for access using a handheld device. However, the smartphone is an ever-present consideration, and the material and daily living aspects of this device draw attention to the possibility that access by PC, even in an institutional setting, might not be satisfactory. Still, the evidence from this research demonstrates that smartphones are not the whole story, and that laptops and even PCs might still be relevant to access to archival materials.

The consideration of digital comics as more than content in digital and specifically file form does present a challenge to library archives. True, a PC is one type of device associated with access to content, but to separate that content from what provides the experience, especially the personalized ecosystem, is to present it

[18] "Legal deposit is a statutory instrument that requires designated content creators to deposit copies of defined publications with a specified national institution (Larivière, 2000, p. 3)"(Gooding, Terras, and Berube, 2021, p. 1155)

in a reduced form. Indeed, it is not just the device that is a component of the digital comic, but the dedicated website, app, or platform upon which the file content can be found. For example, Helmond and Van der Vlist (2021) discuss the changing nature of apps and platforms themselves (not to mention the changing nature of digital files as has been discussed in other parts of this research), specifically the “overwriting their own biographies” (p.205) through the “continuous stream of incremental software updates” (p. 212). Although these changes to files, platforms, and content can seem difficult to overcome, the preservation in archives of webcomics can give some illustration of the diversity of the content, thereby enriching digital collections and access to culture.

But therein lies another challenge for libraries: the sheer number of webcomics, something that was illustrated by the mapping exercise undertaken as part of this research. The number of webcomics identified in the research is notional, the smallest indication of what is on the web. Although they represent an opportunity in the new areas of collecting, and consequently the new readers attracted to the Library’s collection, the resulting issues raised can be prohibitive: technical dependencies (for example, file formats; platform and app; operating system that the platform is compatible with; the devices that support access); as well as rights issues (for the content; for the platform IP, for example surrounding navigation; also if there is a need to collect software).

Still, this research, as well as the recent attention to digital comics by scholars, raises their profile and validates their collection. Moreover, the publisher-type classification created for the research has broader application than comics. These types are seen across all publishing, in part reflecting an increase in self-publishing and platform behaviours.

Moreover, of use to libraries themselves is the knowledge imparted of the creation process and tools which may assist the choice of webcomics in particular, and how best they can be ingested into a library’s digital environment. Working closely with the creators themselves may also contribute to better access for readers. This research makes its most significant contribution to libraries through a better understanding of readers and their expectations, especially the expectations they bring from the platform environment, including access, search, and sharing.

8.1.2 Future Research

This research takes as its starting point people and the processes to make digital comics, including creation, production, distribution, consumption, and reading. It proposes a new and reusable methodology, combining a Human-Computer Interaction (HCI) approach that enables a user-centred interpretation of digital comics within a theoretical framework, including production of culture, publishing, platform, and communication studies. Its objectives are not only to understand the processes themselves but also to contextualize them within a wider digital comics ecosystem that can be comics-based but often is not. Essentially, it proposes a digital sociology of comics. Combining HCI methods with a theoretical framework illustrates the influence of digital comics, the spaces they inhabit, the creators and readers they attract, and the way they are incorporated in the lived experience of personalized ecosystems.

These ecosystems are elastic enough to accommodate and avoid new intrusive agents when necessary. Throughout this chapter, I have referred to the next big thing—AI—in comics making. So, it is no surprise that my recommendations for future research would include using the empirical framework explicated above as a means of exploring, keeping an eye on, this next big thing. For precisely the reason that it is not the next big thing—it is a thing, now, and in comics. Interestingly, some of the new tools for creation specifically resemble existing ones used by some of the research participants, such as comics generators. For example, Chen et al. (2024) “explore the challenges and opportunities arising in the collaborative creation of comics involving cartoonists and Generative Artificial Intelligence (GAI), specifically the AI Image Generator” (p. 292). Kumar et al. (2024) call “comic creation using artificial intelligence (AI)… a booming field where technology intersects with artistic expression” (p.156).

As mentioned above, Goodbrey and Tree (2024) are working on AR/VR/MR to create a new experience of comics. Whether these tools, as well as AI tools, can make their way out of the project environment to a more widespread application remains to be seen. However, what this research would advocate is that new technology of this kind should be paired with the approach to digital comics as described herein: that it be human-centred, focusing on how users can integrate

them in their daily lives, and by extension enhance their lives. I have not dealt with any kind of polemical advocacy or criticism of the digital comics experience and all that entails. There have been those researchers proposing AI, for example, as an augmentation in a good way of this experience, but there also has been much written against AI, the effects especially on creators. Just recently, American comics publisher DC Comics has been accused of using AI artwork in its *Batman* Series (Johnston, 2024), with a response from the comic creator, Andrea Sorrentino, posting a video of himself on Instagram drawing a scene on his tablet to disprove this assertion. That comics generation in this way can be a point of contention demonstrates that feelings about authenticity and creation still run deeply. Will it always be so? This research is one of the few to present the creator's view, their opportunities and challenges, as a research cohort reflecting on shared experience. It can serve as a guide to tracking the creator experience through the challenges and opportunities of AI.

The research approach advocated here has much to offer to reflect these feelings empirically in a research environment. It has contributed to the readers' position in the making of digital comics, not just dedicated readers or fans, but to all those who read comics. It advocates future research that embraces a much wider consideration of reader, as reflecting the experience of those who would consider themselves non-readers contributes to a richer understanding of the experience of digital comics.

8.2 Concluding Remarks

In this dissertation, I have demonstrated the greater understanding of digital comics to be gained by a sociological approach, a digital sociology of comics harnessing the "information power" of small cohorts in the face of emphasis on "large" (LLMs, large datasets, etc.). By adopting a sociological approach supported by HCI methods, I was able to capture and analyse human interaction in digital ecosystems through the lens of digital comics making. Digital disruption, the wider digital ecosystem created by it, and the digital comics that form part of the language of the web, have widened the appeal beyond the 'comics community', resulting in new roles and participants in creation, publishing, and reading. Digital comics have become part of the language and communication of the digital ecosystem not just because they are "modular in design and continuously reworked and repackaged,

informed by datafied user feedback" (Nieborg and Poell, 2018, p. 4276), but because they are more than comics text in file format. Their components also include devices, apps, and platforms, all of which enwrap that file. As such, they are their own unique offering, more than just a halfway house between print and other media.

And as part of the language of the Web, digital comics contribute to the daily life not just of their makers, but of those who would not necessarily think of themselves as consumers-readers of comics. These readers encounter digital comics in many types of content ecosystems that are entirely non-comics-based. As a result, digital comics form part of daily life lived not only in the larger ecosystem, but in user-generated personalized ecosystems, for makers and those who might not initially consider themselves comics readers.

The complexity of the digital comic and the ecosystems within which it resides is best understood through a holistic user (or maker)-centred approach that combines new methods with a multidisciplined theoretical and thematic framework ranging over various cultural factors. I began this dissertation by stating that it has a story to tell about how people in their daily lives interact with their digital 'companions' -- smartphones, tablets, laptops, PCs -- to create, publish, and read digital comics, as well as communicate through them. The focus has not been on the content itself, the cultural artefact that is the digital comic, but on the people and processes that contribute towards its making. The research reflects 'digital humanism' not in its "explicitly political dimension" (Coeckelbergh, 2024) which advocates for social consideration in response to digital change, an Enlightenment view (Prem, 2024), but in its desire to understand human behaviour that is the result of living in this environment, the prelude to that "political dimension" as well as social dimension. In other words, the understanding is the primary objective, is a value in and of itself. In this way, the research is human-focused, not issue-focused, allowing those humans to suggest what is important and how they address issues, personal and universal, as they arise. In an age where it is increasingly difficult to distinguish AI agents from human agency and generated content, this research advocates for a more human representative and critical approach to techno-futures.

Appendices

Appendix I: Comics Gatekeeper-Mediators (CGMs): Ethics, Consent, Information, Recruitment Invitation

Ethics ETH1920-1049: Linda Berube (Low risk)

Date	26 Feb 2020
Researcher	Linda Berube
Project	UK Digital Comics: from creation to consumption
School	School of Mathematics, Computer Science & Engineering
Department	Computer Science

Ethics application

Risks

R1) Does the project have funding?
Yes

R2) Does the project involve human participants?
Yes

R3) Will the researcher be located outside of the UK during the conduct of the research?
No

R4) Will any part of the project be carried out under the auspices of an external organisation, involve collaboration between institutions, or involve data collection at an external organisation?
Yes

R5) Does your project involve access to, or use of, material that could be classified as security sensitive?
No

R6) Does the project involve the use of live animals?
No

R7) Does the project involve the use of animal tissue?
No

R8) Does the project involve accessing obscene materials?
No

R9) Does the project involve access to confidential business data (e.g. commercially sensitive data, trade secrets, minutes of internal meetings)?
No

R10) Does the project involve access to personal data (e.g. personnel or student records) not in the public domain?
No

Ian Cooke is an external primary supervisor for this AHRC Collaborative Doctoral Programme (CDP) studentship.

Name
Stella Wisdom

Title of post
Digital Curator, Contemporary British Publications

Affiliation
The British Library

Provide details of the researcher's insurance cover.
Stella Wisdom is an external secondary supervisor for this AHRC Collaborative Doctoral Programme (CDP) studentship.

T4) Supervisor(s)
Dr Ernesto Priego

Dr Stephann Makri

T5) Do any of the investigators have direct personal involvement in the organisations sponsoring or funding the research that may give rise to a possible conflict of interest?
No

T6) Will any of the investigators receive any personal benefits or incentives, including payment above normal salary, from undertaking the research or from the results of the research above those normally associated with scholarly activity?
No

T7) List anyone else involved in the project.

Project details

P1) Project title
UK Digital Comics: from creation to consumption

P1.1) Short project title
UK Digital Comics

P2) Provide a lay summary of the background and aims of the research, including the research questions (max 400 words).
Book historians have discovered cohesive patterns in the development of ideas, as embodied in print books. These patterns, most often described as cycles, chains, or circuits, follow the book through

R11) Does the project involve deviation from standard or routine clinical practice, outside of current guidelines?
No

R12) Will the project involve the potential for adverse impact on employment, social or financial standing?
No

R13) Will the project involve the potential for psychological distress, anxiety, humiliation or pain greater than that of normal life for the participant?
No

R15) Will the project involve research into illegal or criminal activity where there is a risk that the researcher will be placed in physical danger or in legal jeopardy?
No

R16) Will the project specifically recruit individuals who may be involved in illegal or criminal activity?
No

R17) Will the project involve engaging individuals who may be involved in terrorism, radicalisation, extremism or violent activity and other activity that falls within the Counter-Terrorism and Security Act (2015)?
No

Applicant & research team

T1) Principal Applicant

Name
Linda Berube

T2) Co-Applicant(s) at City

T3) External Co-Applicant(s)

Name
Ian Cooke

Title of post
Head of Contemporary British Publications

Affiliation
The British Library

Provide details of the researcher's insurance cover.

-the history of publishing communication and production cycles from print to digital, including value chains, communication circuits, business models and workflows etc, as well as all the participants who add value

-Production of print and digital comics, especially as it applies to the transition from one to the other and then beyond digital to other media forms, and including AI

-UX research, especially including observational studies, fan studies, and user/reader recreation of comics ideas and concepts (through paratexts, social media, fan fiction etc).

Because relatively little research has been done on creation to consumption patterns or cycles in print comics, attention will also be given to literature where at least segments of these have been analysed, in an effort to connect print and digital patterns. In addition, print comics materiality and mediality scholarship will be considered, especially where print and digital are to be viewed as complementary through production, business, and consumption activities. This would include how print and digital comics are defined in relation to one another, and how they evolve in relationship to each other.

Work Package 2 UK Digital Comics Scoping, Mapping, Defining: The primary objective of this PhD research is to gauge and analyse whether or not the creation to consumption cycle of digital comics conforms to any cohesive and general patterns. In order to achieve this aim, it is necessary to identify and analyse a representative number of 'gatekeepers' or mediators (publishers, aggregators etc) and publication types, and then to synthesize this data into possible draft model (s). The purpose of this work package is to identify, in the first instance, as many forms of digital comics and types of gatekeepers as possible, including any emerging technologies, such as AI etc. The number of categories defined in WP 2 will form the basis from which to identify gatekeeper-mediators etc for WP 3.

Scope: In order to be as inclusive as possible during the initial stages of the research, I have started with a very broad definition of digital comics (born digital, born print and converted to digital). Type of gatekeeper (trad publisher, small press etc) is identified and then further described against this definition and various sub-categories of publication types (graphic novels, British Manga, webcomics etc). Categorizing gatekeepers and types of digital comics in this way will ensure a representative field study cohort of sufficient depth from which to identify creation, production, consumption patterns.

Research methods: The various categories of digital comics will primarily be identified through literature review, i.e. how such publications have been or are defined in the research. In addition, I will consult with City, BL colleagues, other experts in the field, as well as publicly available datasets of publishers and publications (UK Web Archive Webcomics Archive and ComicHaus database, for example). These resources will help identify especially new forms of digital comics, for example those produced by AI.

Work Package 3: Gatekeeper Map and Field Study (Interviews and Process Demonstrations):

The purpose of this work package is to gather empirical data in order to identify patterns of creation, production, and consumption in UK digital comics. This data will be gathered in the first instance from what I am calling the 'gatekeepers' or mediators: the organizations, companies, platforms etc which publish, aggregate or distribute UK digital comics. These gatekeepers, publishers as well as aggregator and distribution platforms, predominantly provide the digital environments within which most or all the other participants in a supply chain or communication circuit interact. They are in the best position during the early phases of the research to identify elements within a production pattern.

various channels of creation, production, and consumption. [1] The description of these patterns has undergone a significant transformation when considered in the context of the digital environment [2].

Do ideas as expressed through digital comics follow similar cohesive patterns? To date, there have been few attempts at viewing the creation to consumption process of print comics in its entirety, and no complete studies of the production and communication models of digital comics. While Bennatti [3] analyzed the changes to the roles of authors, readers, and publishers prompted by the creation of webcomics, she admits that "the uncertain future of the comics print communications circuit makes the establishment of a parallel digital circuit…more necessary than ever for the development of the comics medium". (p316)

This research, a scoping study in its first phase incorporating a field study, seeks to address the gap in the understanding of the creation to consumption process for digital comics. It will be the first such research to construct cohesive patterns and production models through interdisciplinary empirical research for (UK) digital comics: analyzing how an idea and digital comic object is formed, communicated, discussed and transformed by all the participants involved, from authors to gatekeeper-mediators to readers.

The study has been designed to answer the following questions:

RQ 1 Are there cohesive patterns across the production of different types of (UK) digital comics that can be synthesized into a representative model of communication and production?

RQ 2 What kind of communication takes place, what kind of relationships are developed between those who create, produce, distribute, and consume UK digital comics? What kind of value does each add to the idea and digital object?

RQ 3 How do technology, social media, industry forces, for instance, influence these relationships?

RQ 4 To what extent can UK digital comics be regarded as digital objects, or as social or economic constructs shaped by this interaction (reader with object, author with reader via object, author with object etc)?

[1] Darnton, R. (1982) "What Is the History of Books?" Daedalus,111(3), 65-83. Retrieved January 27, 2020, from www.jstor.org/stable/20024803

[2] Murray, P.R. and Squires, C. (2013) "Digital Publishing Communications Circuit". Book 2.0 3:1 1 June, pp3-23. DOI: https://doi.org/10.1386/btwo.3.1.3_1. See also: Sterling University, Book Unbound https://www.bookunbound.stir.ac.uk/research/

[3] See Bennatti, F. (2019) "Superhero comics and the digital communications circuit: a case study of Strong Female Protagonist". Journal of Graphic Novels and Comics, 10:3, 306-319, DOI: 10.1080/21504857.2018.1485720.

P4) Provide a summary and brief explanation of the research design, method, and data analysis.

The objective of this PhD research is to gauge and analyse whether or not the creation to consumption cycle of digital comics conform to any cohesive and general patterns. The first phase of this research includes the following work packages:

Work Package 1 Literature Review: The literature review is primarily focused in three areas:

To ensure proper management, protection, security, and anonymity, the following protocol will be adopted:

-All data gathered from the audio-screensharing interviews will be kept confidential and secure, firstly on password-protected, encrypted local hardware devices and then uploaded onto City-approved and supplied secure cloud storage (OneDrive and/or FigShare).

- No personal names or organization names will be used in any publication, unless otherwise specified through the consent form.

-No audio or video screensharing interaction recordings will be used in academic presentations or be made available publicly. Audio portions of the interviews will be transcribed, and screenshots of relevant screensharing interaction (with appropriate consent) will be taken. Participants will be given the option to have their video turned off during the interviews and participate in screensharing recording based on their consent.

-The collected data will undergo a de-indentification process.

-Once the de-identification process has been completed, the key to identities will be kept in a password-protected and encrypted file and saved to City-approved secure research storage (OneDrive and/or FigShare).

- Only the main researcher and supervisors will be able to review audio recordings, transcripts, and video recordings of screensharing during the analysis phase.

- Both audio and video screensharing data will be encrypted and stored in files and a folder protected by a password on a password-protected encrypted external hard drive and will be managed by the main researcher. The main researcher will then upload this data on City-approved secure research storage, eg. One Drive and/or FigShare.

All these points will be covered in the Participant Information Sheet and Informed Consent and I will give these two documents to the participants in advance to make sure they have time to read it, ask questions, and understand the study.

An additional ethical consideration relates to content. Some digital comics content can be considered objectionable or distressing. In order to ensure that neither researcher nor participant will be exposed to such material, a careful review and selection process of content and providers will be undertaken to exclude such material.

P6) Project start date
The start date will be the date of approval.

P7) Anticipated project end date
02 Oct 2023

P8) Where will the research take place?
At City and the British Library. Interviews will be conducted remotely.

P10) Is this application or any part of this research project being submitted to another ethics committee, or has it previously been submitted to an ethics committee?
No

Scope: Starting from the scope, map, and categories of digital comics as identified in Work Package 2, this work package will focus on UK publications: UK organizations and corporate entities will be identified according to category, then engaged and recruited for field study interview and online demonstrations of process of production (how a document is uploaded, how it is tagged or how metadata is applied, how apps work etc). Individual UK gatekeepers will be identified according to the categories mapped in Work Package 2. This will ensure a representative field study cohort of sufficient breadth from which to identify creation, production, consumption patterns.

Research methods and methodology: This research will include semi-structured interviews that are based on a core set of questions that will gather data on the following: various stages of production; participants; responsibilities in the creation to consumption model, including creation processes and motivation; formatting; distribution and platforms; reading tools; interaction with readers (paratexts etc); technology tools etc.These interviews will also include, where relevant, online interactive demonstrations (given by the interview subject) of processes and process tools: for example, apps for formatting and uploading digital files, online design tools, metadata and tagging tools etc. These demonstrations will not only serve to provide a richer understanding of the production processes, but also of the value added to the digital comic by gatekeeper-mediators as it moves through that production process. In this way, the interview objective is not simply to match the individual production patterns to those chains, circuits, or cycles that already exist, but to discover possible new or variant patterns.

Interviews will be conducted remotely using GDPR-compliant and City-endorsed web-based tools that will allow for synchronous audio and interactive screensharing: tools such as Zoom and Microsoft Teams are under consideration. In addition to the required consent to use and publish data, information sheets and consent forms will request signed consent for audio and video recording of screensharing. During the development phase of the research, gatekeeper interview questions will be tested with British Library and City supervisors prior to actual interviews, in order to fine-tune the questions themselves to ensure they are designed to elicit a rich dataset. In other words, no data will be collected during this phase; rather feedback on the questions themselves will be collected. In addition, I will research and test audio-interactive software to be used for the interviews in order select the software application most suited for these sessions. Audio interviews and screenshares will be transcribed and coded using qualitative analysis software, such as Nvivo.

The research will take an inductive thematic analysis approach that provides for an initial coding based directly on themes and patterns in the interviews during the first scoping phase, but also allows for flexibility in the following stages of data gathering. This approach is based on Braun, V. and Clarke, V. (2006) Using thematic analysis in psychology. Qualitative Research in Psychology 3 (2): 93.

P4.1) If relevant, please upload your research protocol.

P5) What do you consider are the ethical issues associated with conducting this research and how do you propose to address them?
The primary ethical issue is confidentiality of date. This includes protection of personal details, anonymity, and secure data storage. The field study will involve conducting remote audio and interactive screen-sharing interviews (via City-approved software, for example, Zoom) which will require informed consent. During the process participant data will be collected.

As the research is focused on UK digital comics, the field study will include those organizations, companies, and individuals involved in their creation and production so as to give an overall view of workflows, production cycles etc. Exclusions would include those organizations and companies outside the UK; underaged individuals; those not involved in the production of digital comics; and those whose comics focus on obscene or distressing topics, texts, and art.

H6) What are the potential risks and burdens for research participants and how will you minimise them?

Because of the firm protocols in place to protect data confidentiality and security, this research study does not anticipate considerable risks and burdens. The following issues have been analyzed for risk, and methods for minimization of risk have been identified and will be adopted.

1. Exposure to Distressing Material

A critical risk to address is the potential in comics for exposure to content that is obscene and distressing. Both researcher and participant are potentially subject to this risk. As the focus of the research is not on obscene or distressing content, the identification and profiling of participants will not include those who publish, aggregate or provide a platform for such content, thereby minimising the risk.

2. Confidentiality, GDPR, and Data Management

In addition, as with any research including human subjects, there is a risk in the handling and storage of data, and especially personal data. As the field study described within this application will consist of engaging interview participants as well as recording and transcribing the interviews, considerable data will need to be managed securely. This risk will be minimised in the following manner:

-All data will be kept confidential and secure, including consent forms, transcripts, audio-video recordings, research management plan, firstly using City-approved GDPR-compliant recording, screensharing and transcription software (for instance, Zoom). Participants can choose to turn off their video and only participate in audio and screensharing.

-Interviews will firstly be recorded and saved onto password-protected, encrypted local hardware devices (laptop and external hard drive) and then uploaded onto City-approved and supplied secure cloud storage (OneDrive and/or FigShare). I will be using my own devices which I acknowledge is at variance with current University policy. However, because the Department of Computer Science IT policy changed in 2019, I was not provided with a City laptop, despite requests, and so only have recourse to my own laptop which is password-protected and encrypted.

No video recording (including videos of screensharing interaction) will be used at conferences, workshops, or in publications. Sections of transcriptions and screenshots of screensharing interaction will be made available, with consent, at conferences, workshops, and publications.

All data (transcripts, recordings, de-identifying keys, consent forms etc) will be uploaded to City-approved, GDPR-compliant secure cloud storage (OneDrive and/or FigShare). De-identifying keys will be saved in separate password-protected, encrypted files from the relevant data.

Finally, data will be properly disposed of upon PhD completion plus 10 years, in accordance with City RDM guidelines. In the instance of email addresses, these may be disposed of at such a time as it has been deemed that it is no longer necessary to retain them. In addition, audio, interactive screensharing and transcription tools that are web-based will be assessed according to GDPR-compliance

Funding

F1) Funder

Arts and Humanities Research Council

F2) Does the funder require external membership on the approving REC?

No

F3) Has the funding been approved?

Yes

F4) Value of grant

£ 79000

External organisations

E1) Provide details of the external organisation/institution involved with this project.

British Library

E2) If applicable, has permission to conduct research in, at or through another institution or organisation been obtained?

No

Human participants: information and participation

The options for the following question are one or more of:
'Under 18'; 'Adults at risk'; 'Individuals aged 16 and over potentially without the capacity to consent'; 'None of the above'.

H1) Will persons from any of the following groups be participating in the project?

None of the above

H2) How many participants will be recruited?

30

H3) Explain how the sample size has been determined.

As stated in P4, Work Package 2 of this research will scope as many categories of digital comics as possible. This will support the work of WP 3 which will begin with a canvassing of UK digital comcis gatekeepers-mediators (publishers, aggregators, platforms etc) in order to have a breadth of representation in all categories. It is anticipated that a selection of participants from each organization or company will be interviewed as part of the field study.

H4) What is the age group of the participants?

Lower	Upper
18	

H5) Please specify inclusion and exclusion criteria.

H13) Are there any pressures that may make it difficult for participants to refuse to take part in the project?
No

H14) Is any part of the research being conducted with participants outside the UK?
No

Human participants: method

The options for the following question are one or more of:
'Invasive procedures (for example medical or surgical)'; 'Intrusive procedures (for example psychological or social)'; 'Potentially harmful procedures of any kind'; 'Drugs, placebos, or other substances administered to participants'; 'None of the above'.

M1) Will any of the following methods be involved in the project:
None of the above

M2) Does the project involve any deceptive research practices?
No

M3) Is there a possibility for over-research of participants?
No

M4) Please upload copies of any questionnaires, topic guides for interviews or focus groups, or equivalent research materials.
M5) Will participants be provided with the findings or outcomes of the project?
No

M6) If the research is intended to benefit the participants, third parties or the local community, please give details.
This research will inform collection procedures and policies at the British Library.

M7) Are you offering any incentives for participating?
No

M8) Does the research involve clinical trial or clinical intervention testing that does not require Health Research Authority or MHRA approval?
No

M9) Will the project involve the collection of human tissue or other biological samples that does not fall under the Human Tissue Act (2004) that does not require Health Research Authority Research Ethics Service approval?
No

M10) Will the project involve potentially sensitive topics, such as participants' sexual behaviour, their legal or political behaviour, their experience of violence?

H7) Will you specifically recruit pregnant women, women in labour, or women who have had a recent stillbirth or miscarriage (within the last 12 months)?
No

H8) Will you directly recruit any staff and/or students at City?
None of the above

H8.1) If you intend to contact staff/students directly for recruitment purpose, please upload a letter of approval from the respective School(s)/Department(s).

H9) How are participants to be identified, approached and recruited, and by whom?
Selection and engagement with gatekeeper-mediators will be conducted in the following ways: through consultation and facilitation with City/HCID and BL contacts, as well as other experts in the field; through exhibitor and speaker lists from Comics Forum/ThoughtBubble 2019; from the UK Scholars List; through existing datasets from the UK Web Archive Webcomics Archive and ComicHaus; and through such social media as Twitter.

A maximum of 30 participants will be selected according to their representation of the digital comics categories as identified in WP 2. The remote semi-structured interviews will be scheduled in Spring/Summer, and will consist of 1.5-2 hours sessions, depending upon participant availability. I will put together the list of likely participants in consultation with my supervisors.

The research has adopted the principles of not sending spam or cold emails. This means that I will work with my contacts at City and the BL to cultivate customized, direct contacts through introductions. Upon these introductions, I will contact all participants, and schedule and conduct the interviews.

H10) Please upload your participant information sheets and consent form, or if they are online (e.g. on Qualtrics) paste the link below.
H11) If appropriate, please upload a copy of the advertisement, including recruitment emails, flyers or letter.
H12) Describe the procedure that will be used when seeking and obtaining consent, including when consent will be obtained.
I will adopt the following process for engaging participants and procuring consent: 1)through introduction and initial email contact, I will procure a tentative agreement and appointment for interview 2)this exchange will be followed up with a an informed consent form and project information sheet which they can peruse and sign before the interview. They will be invited to ask questions about the form and research 3) at the interview, we will review a copy of the form and sheet together, and a signature will be obtained before proceeding with the interview. Participants will be encouraged to retain their own copy of both documents.

All participants will have at least a week to review the documents; in practice there will probably be a much longer lead time of anywhere from two weeks to a month.

Signed informed consent forms will be retained in secure research storage in electronic form. Paper copies will be destroyed.

D11) How long will personal data be stored or accessed after the study has ended?
De-identification keys (saved in an password-protected, encrypted excel file) will be saved separately from anonymized transcripts and recordings in secure research storage. No personal data will be stored post-PhD completion. Personal details within the de-identification spreadsheet may be deleted at the point of which they are no longer required for the research, but at the most will only be retained until PhD completion.

D12) How are you intending to destroy the personal data after this period?
To ensure destruction of City-stored

electronic data, I will log a request via IT

Service Desk to confirm deletion and to assist with deletion from password-protected and encrypted laptop.

All digital data will be permanently deleted and paper data will be shredded and disposed of.

Health & safety

HS1) Are there any health and safety risks to the researchers over and above that of their normal working life?
No

HS3) Are there hazards associated with undertaking this project where a formal risk assessment would be required?
No

Attached files

UK Digital Comics Informed Consent Form.docx

UK Digital Comics_participant information sheet.docx

UK Digital Comics Sample email invitation.docx

UK Digital Comics Work Package 3_Interview Specification.docx

No

M11) Will the project involve activities that may lead to 'labelling' either by the researcher (e.g. categorisation) or by the participant (e.g. 'I'm stupid', 'I'm not normal')?
No

Data

D1) Indicate which of the following you will be using to collect your data.
Interviews
Audio/digital recording interviewees or events
Computer-based tasks, screen recording or software instrumentation

D2) How will the the privacy of the participants be protected?
De-identified samples or data

D3) Will the research involve use of direct quotes?
Yes

D5) Where/how do you intend to store your data?
Password protected computer files
Storage on encrypted device (e.g. laptop, hard drive, USB
Storage at City

D6) Will personal data collected be shared with other organisations?
No

D7) Will the data be accessed by people other than the named researcher, supervisors or examiners?
Yes

D7.1) Explain by whom and for what purposes.
Research data, specifically sections of transcription and screenshots of screensharing (with consent) will be used by the researcher in publications and presentations during academic events and conferences. In such cases, I will ensure that data will be de-identified in accordance with consent form agreement and City data management and confidentiality practices.

D8) Is the data intended or required (e.g. by funding body) to be published for reuse or to be shared as part of longitudinal research or a different/wider research project now or in the future?
No

D10) How long are you intending to keep the research data generated by the study?
In accordance with City's Lifespan of Data and Retention guidelines, data will be retained in secure research storage at City for 10 years after the completion of the PhD.

3. I understand that no information that could lead to the identification of any individual will be shared with any other party other than the researcher and those involved in marking and supervising the dissertation I produce based on the findings. ☐
4. I understand that data from this study will be stored securely in password-protected, encrypted research storage, and data will be properly disposed of upon PhD completion plus 10 years, in accordance with City RDM guidelines. ☐
5. I understand that my participation is voluntary and that I am free to withdraw at any time, without giving a reason. ☐
6. I understand that if I do withdraw, any data already collected will continue to be used in the study. ☐
7. I give permission for quotes from the transcript to be included in the study, and these will be attributed as "Interviewee [number]" and will be anonymised as much as possible. ☐
8. I give my permission for the use of screenshots related to screensharing interaction, and these will be attributed as "Interviewee [number]" and will be anonymised as much as possible. ☐
9. I understand that in a situation where a comment is only comprehensible if associated with the name of a given person or department, the interviewee will be contacted and asked permission for his/her name to be used and will be given an opportunity to check the accuracy of the quotation. Interviewees may also request that certain information should remain confidential and is not for publication. ☐
10. I understand that the resulting outputs will be made open access through the University Publications Repository and other research outputs. ☐
11. I agree to City recording and processing this information about me. I understand that this information will be used only for the purpose(s) set out in this statement and my consent is conditional on City complying with its duties and obligations under the General Data Protection Regulation (GDPR). ☐

Berube Ethics Application ETH1920-1049 Appendix Two

Title of Project: UK Digital Comics: from Creation to Consumption

Name of Researcher(s): Linda Berube

Participant anonymised initials:

Name of Supervisors:

Ernesto Priego and Stephann Makri, HCID, City, University of London
Ian Cooke and Stella Wisdom, the British Library

CONSENT FORM

Please initial box

1. I confirm that I have read and understood the Participant Information Sheet provided to me and which I can retain for my own record. I have had the opportunity to ask questions. I understand this research will involved ☐

   1.1. responding to a series of interview questions ☐

   1.2 allowing the interview to be audio-recorded and screensharing of relevant publications, websites etc to be captured. ☐

2. I understand that this information will be held by City as data controller and processed for the following purpose: *Public Task*: The legal basis for processing your personal data will be that this research is a task in the public interest, that is City, University of London considers the lawful basis for processing personal data to fall under Article 6(1)(e) of GDPR (public task) as the processing of research participant data is necessary for learning and teaching purposes and all research with human participants by staff and students has to be scrutinised and approved by one of City's Research Ethics Committees. ☐

DRAFT

Berube Ethics Application ETH1920-1049 Appendix One



UK Digital Comics:

a research study into creation to consumption patterns

participant information sheet

Dear participant,

I would like to invite you to take part in a field study consisting of a semi-structured interview as part of my research of UK digital comics.

Before you decide whether you would like to take part it is important that you understand why the research is being done and what it would involve for you. Please take time to read the following information carefully and discuss it with others if you wish. Ask us if there is anything that is not clear or if you would like more information.

What is the purpose of the study?
Book historians have discovered cohesive patterns in the development of ideas, as embodied in print books. These patterns, most often described as cycles, chains, or circuits, follow the book through various channels of creation, production, and consumption.

Do ideas as expressed by digital comics follow similar cohesive patterns? To date, there have been few attempts at understanding the creation to consumption process of print comics, not to mention UK print comics and the situation is much the same for UK digital comics.

This research project, in its first phase a scoping study including a significant empirical field study component, seeks to address the gap in the description and understanding of the creation to consumption path for UK digital comics. This research has been funded through the Arts and Humanities Research Council's Collaborative Doctoral Programme, in collaboration with the Human-Computer Interaction Design Centre at City, University of London, and the British Library.

Berube Ethics Application ETH1920-1049 Appendix Two

I agree to take part in this study ☐

_____ _____ _____

Name of Participant Date Signature

_____ _____ _____

Name of Researcher Date Signature

When completed, 1 copy for participant; 1 copy for researcher file

DRAFT

-Once the de-identification process has been completed, the key to identities will be kept in a password-protected and encrypted file and saved to City-approved secure research storage (OneDrive).

- Only the main researcher and supervisors will be able to review audio recordings, transcripts, and video recordings of screensharing during the analysis phase.

- Both audio and video screensharing data will be encrypted and stored in files and a folder protected by a password on a password-protected encrypted external hard drive and will be managed by the main researcher. The main researcher will then upload this data on City-approved secure research storage, eg. One Drive.

What are the possible benefits of taking part?
While there are no specific benefits of taking part, we hope you enjoy the experience of participating in the research.

What will happen when the research study stops?
The data and findings from the observation will be anonymised and used in my dissertation. In accordance with **City's Lifespan of Data and Retention guidelines,** data will be retained in secure research storage at City for 10 years after the completion of the PhD at which time it will be destroyed.

Will my taking part in the study be kept confidential?
The data gathered in this study will be kept confidential. We will de-identify it whenever possible and store it electronically in a password protected location.

What should I do if I want to take part?

Read, initial and sign the participant 'informed consent' form. You can then submit it to me via email.

What will happen to the results of the research study?
The results of the interviews will be used primarily for the completion of my dissertation, and for dissemination through academic journals and conference papers.

What will happen if I do not want to carry on with the study?
You are free to withdraw from the study at any time without any explanation or penalty. However, the data obtained up to the point of withdrawal will be included in the research.

Who has reviewed the study?
Before any research is allowed to happen, it has to be checked by a Research Ethics Committee. This study has been approved by City, University of London – Computer Science Research Ethics Committee.

Berube Ethics Application ETH1920-1049 Appendix One

Why have I been invited?
You have been invited because you and/or your organisation/company are involved in the publishing and/or distribution of UK digital comics. I would seek to learn about your processes of production through conducting a semi-structured recorded interview. You're also an adult (aged 18+) and don't fall into the category of a 'vulnerable' adult (because of your social, psychological or medical circumstances, including cognitive, learning or physical disabilities).

Do I have to take part?
Participation is voluntary; it is up to you to decide whether or not to take part. You can choose not to participate in part or all of the study. You can withdraw at any stage of the study without being penalised or disadvantaged in any way. If you do decide to take part you will be asked to sign a consent form. You are still free to withdraw at any time and without giving a reason.

What will happen if I take part?
I will schedule a remote meeting with you at an agreed time which would ensure privacy in order to conduct a semi-structured audio-recorded interview which may also include screensharing activities (viewing publications, websites etc).

What do I have to do?
You will be asked to respond to a series of questions regarding the creation, production, and consumption of digital comics as supplied by you or your enterprise. If relevant, you may illustrate your responses with an online demonstration of apps, products etc.

What are the possible disadvantages and risks of taking part?

There are no foreseeable risks or harms or possible side effects for participating in this study. Your personal data, comments, and any other information you provide us will be de-identified or anonymised. We will keep all data confidential and secure, firstly on password-protected, encrypted local hardware devices and then uploaded onto City-approved and supplied secure cloud storage (OneDrive), and the following protocols will be observed:

- No personal names or organization names will be used in any publication, unless otherwise specified through the consent form.

-No audio or video screensharing interaction recordings will be used in academic presentations or be made available publicly. Audio portions of the interviews will be transcribed, and screenshots of relevant screensharing interaction (with appropriate consent) will be taken. With the appropriate consent, sections of transcription and screenshots may be used at conferences, workshops, and publications.

-The collected data will undergo a de-indentification process, and video recording of screensharing interaction may contain identifiable information only if participants have given consent. If not, these screenshots of this part of the video will also be appropriately anonymized.

DRAFT

What if I have concerns about how my personal data will be used after I have participated in the research?

In the first instance you should raise any concerns with the research team, but if you are dissatisfied with the response, you may contact the Information Compliance Team at dataprotection@city.ac.uk or phone 0207 040 4000, who will liaise with City's Data Protection Officer, Dr William Jordan, to answer your query. If you are dissatisfied with City's response you may also complain to the Information Commissioner's Office at www.ico.org.uk

What if there is a problem?
If the research is undertaken in the UK if you have any problems, concerns or questions about this study, you should ask to speak to a member of the research team. If you remain unhappy and wish to complain formally, you can do this through City's complaints procedure, which we will inform you of.

You could also write to the Secretary at:

Anna Ramberg
Research Integrity Manager – Research & Enterprise
City, University of London
Northampton Square, London, EC1V 0HB
Email: Anna.Ramberg.1@city.ac.uk

City holds insurance policies which apply to this study. If you feel you have been harmed or injured by taking part in this study you may be eligible to claim compensation. This does not affect your legal rights to seek compensation. If you are harmed due to someone's negligence, then you may have grounds for legal action.

Thank you for taking the time to read this information sheet and for taking part.

Berube Ethics Application ETH1920-1049 Appendix One

For further information about the research, or if you have any queries or concerns, please contact:

Linda Berube

Linda.berube@city.ac.uk

City, University of London

Northampton Square

London EC1V 0HB

Data Protection Privacy Notice: What are my rights under the data protection legislation?
City, University of London is the data controller for the personal data collected for this research project. Your personal data will be processed for the purposes outlined in this notice. The legal basis for processing your personal data will be that this research is a task in the public interest, that is City, University of London considers the lawful basis for processing personal data to fall under Article 6(1)(e) of GDPR (public task) as the processing of research participant data is necessary for learning and teaching purposes and all research with human participants by staff and students has to be scrutinised and approved by one of City's Research Ethics Committees.

The rights you have under the data protection legislation are listed below, but not all of the rights will be apply to the personal data collected in each research project.

- right to be informed
- right of access
- right to rectification
- right to erasure
- right to restrict processing
- right to object to data processing
- right to data portability
- right to object
- rights in relation to automated decision making and profiling

For more information, please visit www.city.ac.uk/about/city-information/legal

DRAFT

Berube Ethics Application ETH1920-1049 Appendix Three

To: Participant

Subject: Invitation to participate in UK Digital Comics research

Dear [participant's name],

I would like to invite you to take part in a field study consisting of a semi-structured interview as part of my research of UK digital comics.

In brief, a summary of the purpose of the research is as follows:

Book historians have discovered cohesive patterns in the development of ideas, as embodied in print books. These patterns, most often described as cycles, chains, or circuits, follow the book through various channels of creation, production, and consumption. The description of these patterns has undergone a significant transformation when transferred to the digital environment.

Do ideas as expressed by digital comics follow similar cohesive patterns? To date, there have been few attempts at understanding the creation to consumption process of print comics, not to mention UK print comics and the situation is much the same for UK digital comics.

This research, a scoping study in its first phase incorporating a field study, seeks to address the gap in the understanding of the creation to consumption process for digital comics. It will be the first such research to construct cohesive patterns and production models through interdisciplinary empirical research for (UK) digital comics: analyzing how an idea and digital comic object is formed, communicated, discussed and transformed by all the participants involved, from authors to gatekeeper-mediators to readers.

The research has been funded through the Arts and Humanities Research Council's Collaborative Doctoral Programme, in collaboration with the Human-Computer Interaction Design Centre at City, University of London (Ernesto Priego and Stephann Makri, supervisors), and the British Library (Ian Cooke and Stella Wisdom, supervisors).

Before you decide whether you would like to take part it is important that you take time to read the attached information sheet and carefully and discuss it with others if you wish. Please do not hesitate to address any questions to me if there is anything that is not clear or if you would like more information.

Many thanks for your time and consideration

Linda Berube

DRAFT

SA5) Please upload all relevant documentation with highlighted changes

Project amendments

P1) Project title

UK Digital Comics: from creation to consumption

P2) Principal Applicant

Name

Ms Linda Berube

P3) Co-Applicant(s) at City

Name

Dr Ernesto Priego

P4) External Co-Applicant(s)

Name

Ian Cooke

Affiliation

British Library

P5) Supervisor(s)

Dr Ernesto Priego

Dr Stephann Makri

Attached files

UK Digital Comics Informed Consent Form_CCs.docx

UK Digital Comics Participant Information_CCs.docx

UK Digital Comics Sample Invitation_CCs.docx

Creatives Interview Specification.docx

Ethics ETH2021-1005: Ms Linda Berube (Low risk)

Date Created	15 Jan 2021
Academic Staff	Ms Linda Berube
Student ID	190046307
Category	Doctoral Researcher
Supervisor	Dr Ernesto Priego
Project	UK Digital Comics: from creation to consumption
School	School of Mathematics, Computer Science & Engineering
Department	Computer Science
Current status	Waiting for submission

This is a draft version

Ethics application

Amendments

SA1) Types of modification/s

Change or add a new category of participants

SA2) Details of modification

Change or add a new category of participants: In the original ethics application, semi-structured interviews with Comics Gatekeepers-Mediators (CGMs) were specified in order to understand patterns of production in the UK digital comics landscape. This amendment adds a further group for interview (a sample of 10-15), that of Comics Creators (CCs). These would be semi-structured interviews in keeping with the specification for interview questions proposed in the original application (see Interview Questions Specification Appendix). In addition, other supplementary documentation remains the same: for example, see Appendices for Consent Form; Participant Information Sheet; and Sample Email Invitation.

SA3) Justify why the amendment is needed

The amendment is necessary to ensure that this additional group is covered under ethics approval. There is likely to be significant overlap between the categories, CGMs and CCs: Comics self-publishers were included as a CGM subcategory, and a significant number of CC interviews will include comics creators/self-publishers. Interviews with comics creators, especially self-publishers, follow on from those with comics publishers (CGMs) in that they will be asked the same types of questions (see Interview Specification Appendix), for example questions for Self-Published Gatekeepers; Type and Technology of Publication; Submission/Publishing/Delivery Process; Engaging Readers.

SA4) Other information

3. I understand that no information that could lead to the identification of any individual will be shared with any other party other than the researcher and those involved in marking and supervising the dissertation produced based on the findings. ☐
4. I understand that data from this study will be stored securely in password-protected, encrypted research storage, and data will be properly disposed of upon PhD completion plus 10 years, in accordance with City Research Data Management guidelines. ☐
5. I understand that my participation is voluntary, and that I am free to withdraw at any time, without giving a reason. ☐
6. I understand that if I do withdraw, any data already collected will continue to be used in the study. ☐
7. I give permission for quotes from the transcript to be included in the study, and these will be attributed as "Interviewee [number]" and will be anonymised as much as possible. ☐
8. I give my permission for the use of screen captures related to screensharing interaction, and where appropriate anonymized. ☐
9. I understand that in a situation where a comment is only comprehensible if associated with the name of a given person, department, organization, or company, the interviewee will be contacted and asked permission for his/her name to be used. The interviewee will be given an opportunity to check the accuracy of the quotation. Interviewees may also request that certain information should remain confidential and is not for publication. ☐
10. I understand that the resulting outputs will be made open access through the University Publications Repository and other research outputs. ☐
11. I agree to City recording and processing this information about me. I understand that this information will be used only for the purpose(s) set out in this statement and my consent is conditional on City complying with its duties and obligations under the General Data Protection Regulation (GDPR). ☐

Berube UK Digital Comics Informed Consent

Title of Project: UK Digital Comics: from Creation to Consumption

Name of Researcher(s): Linda Berube

Participant anonymised initials:

Name of Supervisors:

Ernesto Priego and Stephann Makri, HCID, City, University of London; Ian Cooke and Stella Wisdom, the British Library

CONSENT FORM

Please initial box

1. I confirm that I have read and understood the Participant Information Sheet provided to me and which I can retain for my own record. I have had the opportunity to ask questions. I understand this research will involve ☐

   1.1. responding to a series of interview questions ☐

   1.2 allowing the interview to include audio-recording and screensharing of relevant publications, websites etc to be captured. ☐

2. I understand that this information will be held by City as data controller and processed for the following purpose: *Public Task*: The legal basis for processing your personal data will be that this research is a task in the public interest, that is City, University of London considers the lawful basis for processing personal data to fall under Article 6(1)(e) of GDPR (public task) as the processing of research participant data is necessary for learning and teaching purposes and all research with human participants by staff and students has to be scrutinised and approved by one of City's Research Ethics Committees. ☐

UK Digital Comics:

a research study into creation to consumption patterns

Participant information sheet

Dear participant,

I would like to invite you to take part in a field study consisting of a recorded semi-structured interview as part of my research of UK digital comics.

Before you decide whether you would like to take part, it is important that you understand why the research is being done and what it would involve for you. Please take time to read the following information carefully and discuss it with others if you wish. Ask me if there is anything that is not clear or if you would like more information.

What is the purpose of the study?
Historians have discovered cohesive patterns in the development of ideas, as embodied in print books. These patterns, most often described as cycles, chains, or circuits, follow the book through various channels of creation, production, and consumption.

Do ideas as expressed by digital comics follow similar cohesive patterns? To date, there have been few attempts at understanding the creation to consumption process of print comics, not to mention UK print comics and the situation is much the same for UK digital comics.

This research project, including a significant empirical field study component with comics creators, producers, and consumers, seeks to address the gap in the description and understanding of the creation to consumption path for UK digital comics. The research has been funded through the Arts and Humanities Research Council's Collaborative Doctoral Programme, in collaboration with the Human-Computer Interaction Design Centre (HCID) at City, University of London, and the British Library.

Berube UK Digital Comics **Informed Consent**

I agree to take part in this study ☐

_____ _____ _____

Name of Participant Date Signature

_____ _____ _____

Name of Researcher Date Signature

When completed, 1 copy for participant; 1 copy for researcher file

-Once the de-identification process has been completed, the key to identities will be kept in a password-protected and encrypted file and saved to City-approved secure research storage (OneDrive or Fig Share).

- Only the main researcher and supervisors will be able to review audio recordings, transcripts, and video recordings of screensharing during the analysis phase.

- Both audio and video screensharing data will be encrypted and stored in files and a folder protected by a password on a password-protected encrypted external hard drive and will be managed by the main researcher. The main researcher will then upload this data on City-approved secure research storage, eg. One Drive or Fig Share.

What are the possible benefits of taking part?
While there are no specific benefits of taking part, we hope you enjoy the experience of participating in the research and contributing to a better understanding of the UK digital comics landscape.

What will happen when the research study stops?
The data and findings from the observation will be anonymised and used in my dissertation. In accordance with **City's Lifespan of Data and Retention guidelines,** data will be retained in secure research storage at City for 10 years after the completion of the PhD at which time it will be destroyed.

Will my taking part in the study be kept confidential?
The data gathered in this study will be kept confidential, as per consent form. We will de-identify it whenever possible and store it electronically in a password protected location.

What should I do if I want to take part?
Read, initial, and sign the participant 'informed consent' form. You can then submit it to me via email. (Electronic signature acceptable)

What will happen to the results of the research study?
The results of the interviews will be used primarily for the completion of my dissertation, and for dissemination through academic journals and conference papers.

What will happen if I do not want to carry on with the study?
You are free to withdraw from the study at any time without any explanation or penalty. However, the data obtained up to the point of withdrawal will be included in the research.

Who has reviewed the study?
Before any research commences, it must be approved by a Research Ethics Committee. This study has been approved by City, University of London – Computer Science Research Ethics Committee.

Why have I been invited?
You have been invited because you and/or your creative team have been involved in the creation of UK digital comics. I would seek to learn about your creative process, and if relevant publishing and distribution processes through a semi-structured recorded interview. You also are an adult (aged 18+) and do not fall into the category of a 'vulnerable' adult (because of your social, psychological or medical circumstances, including cognitive, learning or physical disabilities).

Do I have to take part?
Participation is voluntary; it is up to you to decide whether or not to take part. You can choose not to participate in part or all of the study. You can withdraw at any stage of the study without being penalised or disadvantaged in any way. If you do decide to take part, you will be asked to sign a consent form. You are still free to withdraw at any time and without giving a reason.

What will happen if I take part?
I will schedule a remote meeting with you at an agreed time which would ensure privacy in order to conduct a semi-structured audio-recorded interview which may also include video-recorded screensharing activities (viewing creative software tools, websites etc). You will make the decision whether or not you yourself would be part of the video recording (for example, by muting video).

What do I have to do?
You will be asked to respond to a series of questions regarding the creation, production, and consumption of digital comics as supplied by you or your creative team. If relevant, you may illustrate your responses with an online demonstration of apps, creative tools etc.

What are the possible disadvantages and risks of taking part?
There are no foreseeable risks or harm or possible side effects for participating in this study. Your personal data, comments, and any other information you provide us will be de-identified or anonymised. We will keep all data confidential and secure, firstly on password-protected, encrypted local hardware devices and then uploaded onto City-approved and supplied secure cloud storage (OneDrive or Fig Share), and the following protocols will be observed:

- No personal names or organization names will be used in any publication, unless otherwise specified through the consent form.

-No audio or video screensharing interaction recordings will be used in academic presentations or be made available publicly. Audio portions of the interviews will be transcribed, and screen captures of relevant screensharing interaction, for example of websites or apps, (with appropriate consent) will be taken. With the appropriate consent, sections of transcription and screen captures may be used at conferences, workshops, and publications.

-The collected data will undergo a de-indentification process, and video recording of screensharing interaction may contain identifiable information only if participants have given consent. If not, these screenshots of this part of the video will also be appropriately anonymized.

Protection Officer, Dr William Jordan, to answer your query. If you are dissatisfied with City's response you may also complain to the Information Commissioner's Office at www.ico.org.uk

What if there is a problem?
If the research is undertaken in the UK if you have any problems, concerns, or questions about this study, you should ask to speak to a member of the research team. If you remain unhappy and wish to complain formally, you can do this through City's complaints procedure, which we will inform you of.

You could also write to the Secretary at:

Anna Ramberg
Research Integrity Manager – Research & Enterprise
City, University of London
Northampton Square, London, EC1V 0HB
Email: Anna.Ramberg.1@city.ac.uk

City holds insurance policies which apply to this study. If you feel you have been harmed or injured by taking part in this study you may be eligible to claim compensation. This does not affect your legal rights to seek compensation. If you are harmed due to someone's negligence, then you may have grounds for legal action.

Thank you for taking the time to read this information sheet and for taking part.

For further information about the research, or if you have any queries or concerns, please contact:

Linda Berube

Linda.berube@city.ac.uk

City, University of London

Northampton Square

London EC1V 0HB

Data Protection Privacy Notice: What are my rights under the data protection legislation?
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The rights you have under the data protection legislation are listed below, but not all of the rights will be apply to the personal data collected in each research project.

- right to be informed
- right of access
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- right to erasure
- right to restrict processing
- right to object to data processing
- right to data portability
- right to object
- rights in relation to automated decision making and profiling

For more information, please visit www.city.ac.uk/about/city-information/legal

What if I have concerns about how my personal data will be used after I have participated in the research?

In the first instance you should raise any concerns with the research team, but if you are dissatisfied with the response, you may contact the Information Compliance Team at dataprotection@city.ac.uk or phone 0207 040 4000, who will liaise with City's Data

Berube Ethics Application

To: Participant

Subject: Invitation to participate in UK Digital Comics research

Dear [participant's name],

I would like to invite you to take part in a field study consisting of a semi-structured interview as part of my research of UK digital comics.

In brief, a summary of the purpose of the research is as follows:

Book historians have discovered cohesive patterns in the development of ideas, as embodied in print books. These patterns, most often described as cycles, chains, or circuits, follow the book through various channels of creation, production, and consumption. The description of these patterns has undergone a significant transformation when transferred to the digital environment.

Do ideas as expressed by digital comics follow similar cohesive patterns? To date, there have been few attempts at understanding the creation to consumption process of print comics, not to mention UK print comics and the situation is much the same for UK digital comics.

This research, a scoping study in its first phase incorporating a field study, seeks to address the gap in the understanding of the creation to consumption process for digital comics. It will be the first such research to construct cohesive patterns and production models through interdisciplinary empirical research for (UK) digital comics: analyzing how an idea and digital comic object is formed, communicated, discussed and transformed by all the participants involved, from authors to gatekeeper-mediators to readers.

The research has been funded through the Arts and Humanities Research Council's Collaborative Doctoral Programme, in collaboration with the Human-Computer Interaction Design Centre at City, University of London (Ernesto Priego and Stephann Makri, supervisors), and the British Library (Ian Cooke and Stella Wisdom, supervisors).

Before you decide whether you would like to take part it is important that you take time to read the attached information sheet and carefully and discuss it with others if you wish. Please do not hesitate to address any questions to me if there is anything that is not clear or if you would like more information.

Many thanks for your time and consideration

Linda Berube

DRAFT

R9) Does the project involve access to confidential business data (e.g. commercially sensitive data, trade secrets, minutes of internal meetings)?
No

R10) Does the project involve access to personal data (e.g. personnel or student records) not in the public domain?
No

R11) Does the project involve deviation from standard or routine clinical practice, outside of current guidelines?
No

R12) Will the project involve the potential for adverse impact on employment, social or financial standing?
No

R13) Will the project involve the potential for psychological distress, anxiety, humiliation or pain greater than that of normal life for the participant?
No

R15) Will the project involve research into illegal or criminal activity where there is a risk that the researcher will be placed in physical danger or in legal jeopardy?
No

R16) Will the project specifically recruit individuals who may be involved in illegal or criminal activity?
No

R17) Will the project involve engaging individuals who may be involved in terrorism, radicalisation, extremism or violent activity and other activity that falls within the Counter-Terrorism and Security Act (2015)?
No

Applicant & research team

T1) Principal Applicant

Name
Ms Linda Berube

T2) Co-Applicant(s) at City

T3) External Co-Applicant(s)

Name
Ian Cooke

Ethics ETH2223-1105: Ms Linda Berube (Low risk)

Date Created	30 Nov 2022
Date Submitted	25 Jan 2023
Academic Staff	Ms Linda Berube
Student ID	190046307
Category	Doctoral Researcher
Supervisor	Dr Ernesto Priego
Project	UK Digital Comics: from creation to consumption
School	School of Science & Technology
Department	Department of Computer Science
Current status	Awaiting Supervisor decision

Ethics application

Risks

R1) Does the project have funding?
Yes

R2) Does the project involve human participants?
Yes

R3) Will the researcher be located outside of the UK during the conduct of the research?
No

R4) Will any part of the project be carried out under the auspices of an external organisation, involve collaboration between institutions, or involve data collection at an external organisation?
Yes

R5) Does your project involve access to, or use of, terrorist or extremist material that could be classified as security sensitive?
No

R6) Does the project involve the use of live animals?
No

R7) Does the project involve the use of animal tissue?
No

R8) Does the project involve accessing obscene materials?
No

In Phases I and II of this research the roles of UK publishers and creators were analyzed through semi-structured interview. In Phase III, the subject of this application, UK-based digital comics readers will be consulted through semi-structured interview and reading observation and think aloud sessions. Emphasis will be placed on determining not just how readers find and consume comics, but what their response is, how it can be defined, from passive to transactional to performative.

Aims and objectives include:

• To understand the reader role in the publishing and communication process of UK digital comics, their response to digital comics, and how that response contributes to digital comics narratives.

• To learn about how readers discover new comics and share the reading preferences and experiences with others.

• To understand how comics portals, devices etc contribute to the reader's experience of and response to the text.

• To use HCI/HII methods and understand the value of these approaches in collecting data about readers of digital comics.

It is important to note that the research is not about assessing the useability of digital comics platforms (although readers will not be discouraged from talking about them), but how readers read digital comics which can include the devices they use, the platforms they use to read from, and their transactional behaviour with the texts themselves.

Research questions address the following:

• How do readers find new digital comics-through other readers, social media, recommended reading of comics portals etc?

• Do readers participate in the creation and production/publishing processes of UK digital comics? If so, what manner of communication occurs between readers and other participants in that process, e.g. creators, publishers etc. readers communicate with creators, publishers?

• How do readers read digital comics, using what portals, devices?

• How do readers respond to digital comics text during the reading process? Does the particular portal or device factor into that response? How do they contribute to the comics narrative or do they?

• Do readers share their reading or their response to their reading with others? If so, how do they communicate their preferences and responses and to whom?

P4) Provide a summary and brief explanation of the research design, method, and data analysis.

This research will be qualitative, using HCI/UX/HII methods that include the following: Remote semi-structured interviews; lab-based semi-structured interview and observation at the City/HCID Interaction Lab.

The research will take an inductive thematic analysis approach that provides for an initial coding based directly on themes and patterns: how participants accessed digital comics, how they interacted with interfaces and text, what their reading preferences are etc. This approach is based on Braun, V.and Clarke, V. (2006) Using thematic analysis in psychology. Qualitative Research in Psychology 3(2): 93.

Data will be coded using both transcripts and screen captures from audio/video recording.

For other research protocol info please see uploaded protocol document.

Title of post

Head of Contemporary British Publications

Affiliation

The British Library

Provide details of the researcher's insurance cover.

T4) Supervisor(s)

Dr Ernesto Priego

Mr Ian Cooke

Dr Stephann Makri

Miss Stella Wisdom

T5) Do any of the investigators have direct personal involvement in the organisations sponsoring or funding the research that may give rise to a possible conflict of interest?

No

T6) Will any of the investigators receive any personal benefits or incentives, including payment above normal salary, from undertaking the research or from the results of the research above those normally associated with scholarly activity?

No

T7) List anyone else involved in the project.

HCID Interaction Lab

City, University of London

Project details

P1) Project title

UK Digital Comics: from creation to consumption

P1.1) Short project title

UK Digital Comics

P2) Provide a lay summary of the background and aims of the research, including the research questions (max 400 words).

This PhD research focuses on publishers, creators and readers, and how perceptions are shaped and communicated through the making, producing, and consuming digital comics in the UK on digital comics. Essentially, the research seeks to understand not only the processes of creation to consumption, but more importantly the type of communication that drives those processes, and in addition to the cultural artefact, what cultures and communities are created from that communication.

No

Human participants: information and participation

The options for the following question are one or more of:
'Under 18'; 'Adults at risk'; 'Individuals aged 16 and over potentially without the capacity to consent'; 'None of the above'.

H1) Will persons from any of the following groups be participating in the project?
None of the above

H2) How many participants will be recruited?
20

H3) Explain how the sample size has been determined.
The sample size has been determined to be commensurate with the types of digital comics (graphic novels, webcomics, comic book apps etc) and a representative number of readers for each.

H4) What is the age group of the participants?

Lower	Upper
18	

H5) Please specify inclusion and exclusion criteria.
As the research is focused on UK digital comics readers, the field study will be restricted to UK-based digital comics readers. Exclusions would include those outside the UK; underaged individuals; those who read only print comics and not digital; and those who read comics focused on obscene or distressing topics, texts, and art.

H6) What are the potential risks and burdens for research participants and how will you minimise them?
Because of the firm protocols in place to protect data confidentiality and security, this research study does not anticipate considerable risks and burdens. The following issues have been analyzed for risk, and methods for minimization of risk have been identified and will be adopted.

1. Exposure to Distressing Material

A critical risk to address is the potential in comics for exposure to content that is obscene and distressing. Both researcher and participant are potentially subject to this risk. As the focus of the research is not on obscene or distressing content, the identification and profiling of participants will not include those who publish, aggregate or provide a platform for such content, thereby minimising the risk.

2. Confidentiality, GDPR, and Data Management

In addition, as with any research including human subjects, there is a risk in the handling and storage of data, and especially personal data. As the field study described within this application will consist of engaging interview participants as well as recording and transcribing the interviews, considerable data will need to be managed securely. This risk will be minimised by keeping all data (transcripts,

P4.1) If relevant, please upload your research protocol.
P5) What do you consider are the ethical issues associated with conducting this research and how do you propose to address them?
The field study will involve conducting remote audio and interactive screen-sharing interviews, as well as lab-based interview and observation sessions with audio/video recording, which will require informed consent. To ensure proper management and protection, secure research storage and password protection will be procured by the researcher, and a de-identification process will be put into place, ensuring data protection, confidentiality, and anonymity.

Some digital comics content can be considered objectionable or distressing. In order to ensure that neither researcher nor participant will be exposed to such material, a careful review and selection process of content and providers will be undertaken to exclude such material.

P6) Project start date
The start date will be the date of approval.

P7) Anticipated project end date
30 Jun 2023

P8) Where will the research take place?
Remotely and at City HCID Interaction Lab

P10) Is this application or any part of this research project being submitted to another ethics committee, or has it previously been submitted to an ethics committee?
No

Funding

F1) Funder
Arts and Humanities Research Council

F2) Does the funder require external membership on the approving REC?
No

F3) Has the funding been approved?
Yes

F4) Value of grant
£ 79000

External organisations

E1) Provide details of the external organisation/institution involved with this project.
The British Library

E2) If applicable, has permission to conduct research in, at or through another institution or organisation been obtained?

about the form and research 3) at the interview, we will review a copy of the form and sheet together, and a signature will be obtained before proceeding with the interview. Participants will be encouraged to retain their own copy of both documents.
All participants will have at least a week to review the documents; in practice there will probably be a much longer lead time of anywhere from two weeks to a month.
Signed informed consent forms will be retained in secure research storage in electronic form. Paper copies will be destroyed.

H13) Are there any pressures that may make it difficult for participants to refuse to take part in the project?
No

H14) Is any part of the research being conducted with participants outside the UK?
No

Human participants: method

The options for the following question are one or more of:
'Invasive procedures (for example medical or surgical)'; 'Intrusive procedures (for example psychological or social)'; 'Potentially harmful procedures of any kind'; 'Drugs, placebos, or other substances administered to participants'; 'None of the above'.

M1) Will any of the following methods be involved in the project:
None of the above

M2) Does the project involve any deceptive research practices?
No

M3) Is there a possibility for over-research of participants?
No

M4) Please upload copies of any questionnaires, topic guides for interviews or focus groups, or equivalent research materials.

M5) Will participants be provided with the findings or outcomes of the project?
No

M6) If the research is intended to benefit the participants, third parties or the local community, please give details.
This research will inform collection procedures and policies at the British Library.

M7) Are you offering any incentives for participating?
No

recordings, de-identifying keys) in secure research storage at City which is password-protected and encrypted, and the use of devices so protected. In addition, upon transcription, de-identifying keys will be assigned to each subject, and stored in an excel spreadsheet. Finally, data will be properly disposed of upon PhD completion plus 10 years, in accordance with City RDM guidelines. In the instance of email addresses, these may be disposed of at such a time as it has been deemed that it is no longer necessary to retain them.

In addition, audio, interactive screensharing and transcription tools that are web-based will be assessed according to GDPR-compliance.

H7) Will you specifically recruit pregnant women, women in labour, or women who have had a recent stillbirth or miscarriage (within the last 12 months)?
No

H8) Will you directly recruit any staff and/or students at City?
None of the above

H8.1) If you intend to contact staff/students directly for recruitment purpose, please upload a letter of approval from the respective School(s)/Department(s).

H9) How are participants to be identified, approached and recruited, and by whom?
15-20 participants will be selected according to the categories of digital comics read (webcomics, graphic novels etc). They will self-identify through response to invitations on blogs, social media etc., as well as through a brief screener survey during follow-up.

Selection and engagement with digital comics readers will be conducted in the following ways: through consultation and facilitation with City/HCID and BL contacts, as well as other experts in the field; through social media, institutional blogs, flyers etc. BL and City supervisors as well as student will use the above methods for recruitment.

Responses will be sent to participants including a consent form and an information sheet. Also, they will ask to complete a brief screening survey asking them about reading interests.

H10) Please upload your participant information sheets and consent form, or if they are online (e.g. on Qualtrics) paste the link below.
Yes (please note example invitation can be found in uploaded protocol)

H11) If appropriate, please upload a copy of the advertisement, including recruitment emails, flyers or letter.

H12) Describe the procedure that will be used when seeking and obtaining consent, including when consent will be obtained.
I will adopt the following process for engaging participants and procuring consent: 1)through introduction and initial email contact, I will procure a tentative agreement and appointment for interview 2)this exchange will be followed up with a an informed consent form and project information sheet which they can peruse and sign before the interview. They will be invited to ask questions

D8) Is the data intended or required (e.g. by funding body) to be published for reuse or to be shared as part of longitudinal research or a different/wider research project now or in the future?
No

D10) How long are you intending to keep the research data generated by the study?
In accordance with City's Lifespan of Data and Retention guidelines, data will be retained in secure research storage at City for 10 years after the completion of the PhD.

D11) How long will personal data be stored or accessed after the study has ended?
De-identification keys (saved in an password-protected, encrypted excel file) will be saved separately from anonymized transcripts and recordings in secure research storage. No personal data will be stored post-PhD completion. Personal details within the de-identification spreadsheet may be deleted at the point of which they are no longer required for the research, but at the most will only be retained until PhD completion.

D12) How are you intending to destroy the personal data after this period?
To ensure destruction of City-stored
electronic data, I will log a request via IT
Service Desk to confirm deletion and to assist with deletion from password-protected and encrypted laptop.
All digital data will be permanently deleted and paper data will be shredded and disposed of.

Health & safety

HS1) Are there any health and safety risks to the researchers over and above that of their normal working life?
No

HS3) Are there hazards associated with undertaking this project where a formal risk assessment would be required?
No

Attached files

Phase III DIgital COmics Reader Research Protocol.docx

Phase III Readers Information SHeet.docx

Phase III Readers Consent Form.docx

M8) Does the research involve clinical trial or clinical intervention testing that does not require Health Research Authority or MHRA approval?
No

M9) Will the project involve the collection of human tissue or other biological samples that does not fall under the Human Tissue Act (2004) that does not require Health Research Authority Research Ethics Service approval?
No

M10) Will the project involve potentially sensitive topics, such as participants' sexual behaviour, their legal or political behaviour, their experience of violence?
No

M11) Will the project involve activities that may lead to 'labelling' either by the researcher (e.g. categorisation) or by the participant (e.g. 'I'm stupid', 'I'm not normal')?
No

Data

D1) Indicate which of the following you will be using to collect your data.
Interviews
Participant observation
Audio/digital recording interviewees or events
Video recording
Computer-based tasks, screen recording or software instrumentation

D2) How will the the privacy of the participants be protected?
De-identified samples or data

D3) Will the research involve use of direct quotes?
Yes

D5) Where/how do you intend to store your data?
Password protected computer files
Storage on encrypted device (e.g. laptop, hard drive, USB
Storage at City

D6) Will personal data collected be shared with other organisations?
No

D7) Will the data be accessed by people other than the named researcher, supervisors or examiners?
No

Research Questions and Objectives

Objectives

- To understand the reader role in the publishing and communication process of [UK] digital comics, their response to digital comics, and how that response contributes to digital comics narratives.
- To learn about how readers discover new comics and share the reading preferences and experiences with others.
- To understand how comics portals, devices etc contribute to the reader's experience of and response to the text.
- To use how HCI/HII methods and understand the value of these approaches in collecting data about readers of digital comics.

It is important to note that the research is not about assessing the useability of digital comics platforms (although readers will not be discouraged from talking about them), but how readers read digital comics which can include the devices they use, the platforms they use to read from, and their transactional behaviour with the texts themselves.

Research Questions

- How do readers find new digital comics-through other readers, social media, recommended reading of comics portals etc?
- Do readers participate in the creation and production/publishing processes of UK digital comics? If so, what manner of communication occurs between readers and other participants in that process, e.g. creators, publishers etc. readers communicate with creators, publishers?
- How do readers read digital comics, using what portals, devices?
- How do readers respond to digital comics text during the reading process? Does the particular portal or device factor into that response? How do they contribute to the comics narrative or do they?
- Do readers share their reading or their response to their reading with others? If so, how do they communicate their preferences and responses and to whom?

Research design and planning period: December 2022-January 2023

Research to begin once ethics approval has been received.

UK Digital Comics, from creation to consumption

Research Protocol for Phase III Data Collection: UK-Based Digital Comics Readers

Submitted by Linda Berube

Timescales:

Research planning and design: December 2022-January 2023
Ethics approval submission: January 2023
Recruitment, data collection, analysis (contingent upon ethics approval):
February-30 June 2023

Background Information

The human organism… is ultimately the mediator in any perception of the world or any sense of "reality." (Rosenblatt, the Transactional Theory of Reading and Writing, p452)

This PhD research focuses on the mediator and how perceptions are shaped and communicated through the making, producing, and consuming digital comics in the UK on digital comics. The digital comics under consideration includes any type of comic from comic strips, comic books to webcomics and graphic novels published in electronic form and on the Web. The data and findings in the research over three phases of data collection will address the gap perceived by scholars (Benatti, 2019; Murray, 2015) in the area of creation to consumption processes for UK digital comics: how the digital comic, as cultural object, is formed and then transformed by all the participants in the comics community, from creators to comics producers and publishers to readers. Essentially, the research seeks to understand not only the processes of creation to consumption, but more importantly the type of communication that drives those processes, and in addition to the cultural artefact, what cultures and communities are created from that communication.

In Phases I and II of this research the roles of UK publishers and creators were analyzed through semi-structured interview. In Phase III, the subject of this protocol, UK-based digital comics readers will be consulted through semi-structured interview and reading observation and think aloud sessions. In the Phase III focus on UK readers of digital comics, emphasis will be placed on determining not just how readers find and consume comics, but what their response is, how it can be defined, from passive to transactional to performative, and whether they truly are involved in a participatory digital comics culture (Hatfield (2022).

References

Benatti, F. (2018) Superhero comics and the digital communications circuit: a case study of Strong Female Protagonist. *Journal of Graphic Novels and Comics,* 10(3), pp. 306-319. Available at: *DOI: 10.1080/21504857.2018.1485720.*

Hatfield, C. (2022). 'The Empowered and Disempowered Reader: Understanding Comics against Itself'. *Inks: The Journal of the Comics Studies Society*, 6(3), pp.267-278. Available at: https://journals.scholarsportal.info/details?uri=/24735191/v06i0003/267_teadrucai.xml.

Murray, C. (2015) 'Comics Studies Has Been Undervalued For Too Long: We're Fighting to Change This'. *The Guardian*. 18 February. Available from: https://www.theguardian.com/higher-education-network/2015/feb/18/comics-studies-has-been-undervalued-for-too-long-were-fighting-to-change-this

Data Collection

Remote sessions will be conducted using Zoom software to record audio and video and to provide draft transcriptions.

On-site sessions will make use of the user testing facilities at the City Interaction Lab, including audio and video recording.

Sample size and justification of numbers.

The sample size has been determined to be commensurate with the types of digital comics (graphic novels, webcomics, comic book apps etc) and a representative number of readers for each.

15-20 participants will be selected according to the categories of digital comics read (webcomics, graphic novels etc). They will self-identify through initial screening survey (see recruitment above).

Research methods

Naturalistic observations and interviews of digital comics reading practice in a remote environment. The naturalistic observation gave readers free reign to demonstrate and talk-through their reading practices with little intervention from the researcher, allowing for disparate experiences to be expressed. The sessions will include:

- Reader Screening Survey: questions including some demographic, type of comics, frequency of reading etc. to be completed before reading session
- Semi-structured interview (researcher-led) where participants are asked: reading background or habits, preferences, practices; types of comics, devices, platforms; learning about and discovering new comics; interaction with creators and publishers, and sharing comics reading and experiences with others.
- Contextual observation (reader-led) where participants take the researcher through their reading practices (on apps, social media, digitised comics etc.), how they would begin reading, what they would select, and then talking through the reading of a comic and the functionality of the app.

For remote/virtual sessions, readers will be offered extra time for guidance in how to use mobile software with Zoom. For on-site sessions, extra time will be allotted for guidance in the use of the software and technology required.

Every effort was made to minimize bias: for example, the researcher's input into the contextual observation and directed search activities was limited to clarification and confirmation-type questions.

Annex B Interview and Reader Observation Interview and Reading Observation Script and Response Sheet

Analysis method

The research will take an inductive thematic analysis approach, that is based on an initial coding of data paying particular attention to potential themes and patterns: how participants accessed digital comics, how they interacted with interfaces and text, what their reading preferences are etc. Data will be coded using both transcripts and screen captures from video recording.

Timescale: Ongoing through data collection and to be completed by June 2023

Participant Recruitment

Selection and engagement with digital comics readers will be conducted in the following ways: through consultation and facilitation with City/HCID and BL contacts, as well as other experts in the field; through social media, institutional blogs, flyers etc. BL and City supervisors as well as student will use the above methods for recruitment.

Participants then will be approached by the researcher who will prove a project information sheet and a consent form.

Options for recruitment:

1. Supervisor and PhD network (postdocs, docs, faculty, staff etc)
2. Relevant online communities (such as LDC community, UK Comics Scholars, Comics Forum discussion lists, City and City HCID mailing lists and social media, BL internal forums or discussions etc)
3. Social Media-Supervisors (City, BL) Twitter, Mastodon; City, BL Twitter accounts
4. Blogs: BL blog

Annex A Recruitment Invitation Draft-This invitation can be adapted depending upon the venue.

Follow-Up to Invitation: Once a participant responds positively to the invitation via email, they will be asked to fill in a brief Qualtrics survey, requesting some demographic info, and also questions about what they read (including what UK digital comics they read), frequency and whether they create comics or not. The screening survey has two purposes: firstly, to ensure that there is a spread across types of comics read (comic books or strips, graphic novels, manga, webcomics etc); secondly, to collect background data outside of the interview before the reading sessions to save time and to allow for more in-depth interaction during the interviews.

Also, readers will be supplied with a consent form and research information sheet. They will also be asked about scheduling and location preferences.

Recruitment period: Late February-early March 2023

Research location and timescales

Remote/Virtual interview and reading sessions**:** Interview and observational studies will predominantly take place in the virtual environment, via Zoom, where convenient for participants

On-site interview and reading sessions**:** selected sessions [based on participant proximity to City, University of London] will take place at the City HCID Interaction Lab in order to take advantage of advanced technology and software for conducting and recording observation sessions..

Timescales: to take place from March to May 2023

Study Plan: Methods and Procedures

Research population including any inclusion or * exclusion criteria

As the research is focused on UK digital comics readers, the field study will be restricted to UK-based digital comics readers. Exclusions would include those outside the UK; underaged individuals; those who read only print comics and not digital; and those who read comics focused on obscene or distressing topics, texts, and art.

Annex A:

Hello
I am a doctoral student at the Human-Computer Interaction Design Centre at City, University of London. My research focus is on how readers interact with comics in a digital environment.

If you are a UK-based digital comics reader and have: shared a comic or cartoon online, on Facebook, Instagram or Twitter for example, or read comics via apps on your phone or laptop (any 2000AD or Webtoon readers out there?), or read them using web platforms such as Webtoon or Comixology, or even through PDF downloads, then you could make a great contribution to this research. If you have engaged in any (or all!) of these activities, I would be most interested in hearing about your experiences.

In this first instance, I am looking for expressions of interest. If you would like to participate in this research and would like to know more, please contact me at the email address below.

Many thanks
Linda Berube

Data Protection and Management

Because of the firm protocols in place to protect data confidentiality and security, this research study does not anticipate considerable risks and burdens. The following issues have been analyzed for risk, and methods for minimization of risk have been identified and will be adopted.

Exposure to Distressing Material
A critical risk to address is the potential in comics for exposure to content that is obscene and distressing. Both researcher and participant are potentially subject to this risk. As the focus of the research is not on obscene or distressing content, the identification and profiling of participants will not include those who publish, aggregate or provide a platform for such content, thereby minimising the risk.

Confidentiality, GDPR, and Data Management
In addition, as with any research including human subjects, there is a risk in the handling and storage of data, and especially personal data. As the field study described within this application will consist of engaging interview participants as well as recording and transcribing the interviews, considerable data will need to be managed securely. This risk will be minimised by keeping all data (transcripts, recordings, de-identifying keys) in secure research storage at City which is password-protected and encrypted, and the use of devices so protected. In addition, upon transcription, de-identifying keys will be assigned to each subject, and stored in an excel spreadsheet. Finally, data will be properly disposed of upon PhD completion plus 10 years, in accordance with City RDM guidelines. In the instance of email addresses, these may be disposed of at such a time as it has been deemed that it is no longer necessary to retain them.

In addition, audio, interactive screensharing and transcription tools that are web-based will be assessed according to GDPR-compliance.

Ethical Approval

Ethics approval will be sought through the City Ethics Committee. Examples of the Consent Form and Information Sheet are provided under separate cover.

What do I have to do?

This initial meeting or session will be conducted over Zoom. Once we have agreed a date, I will send you a confirmation which will include a link that will connect you to Zoom on that day. This link should work whether you are using a PC, laptop, tablet, or smartphone.

If required, we can meet in advance of the session or at another time to introduce you to some of the technology necessary for the reading session, for instance how to view mobile screens over Zoom.

Why have I been invited?

You have been invited because you are UK-based reader of comics online. I would seek to learn about your reading process and preferences online. You also are an adult (aged 18+) and do not fall into the category of a 'vulnerable' adult (because of your social, psychological or medical circumstances, including cognitive, learning or physical disabilities).

Do I have to take part?

Participation is voluntary; it is up to you to decide whether or not to take part. You can choose not to participate in part or all of the study. You can withdraw at any stage of the study without being penalised or disadvantaged in any way. If you do decide to take part, you will be asked to sign a consent form. You are still free to withdraw at any time and without giving a reason.

What are the possible disadvantages and risks of taking part?

There are no foreseeable risks or harms or possible side effects for participating in this study. Your personal data, comments, and any other information you provide us will be de-identified or anonymised. We will keep all data confidential and secure, firstly on password-protected, encrypted local hardware devices and then uploaded onto a City-approved and supplied secure cloud storage (OneDrive or Fig Share).

What are the possible benefits of taking part?
While there are no specific benefits of taking part, we hope you enjoy the experience of participating in the research and contributing to a better understanding of reading comics online.

Will my taking part in the study be kept confidential?
The data gathered in this study will be kept confidential, as per consent form. We will de-identify it whenever possible and store it electronically in a password protected location.

What should I do if I want to take part?
Read, initial, and sign the participant 'informed consent' form. You can then submit it to me via email. (Electronic signature acceptable)

What will happen if I do not want to carry on with the study?

You are free to withdraw from the study at any time without any explanation or penalty. However, the data obtained up to the point of withdrawal will be included in the research.

Who has reviewed the study?

Before any research commences, it must be approved by a Research Ethics Committee. This study has been approved by City, University of London – Computer Science Research Ethics Committee.

UK Digital Comics, Creation to Consumption

Phase III Digital Comics Readers Study

participant information sheet

Many thanks for agreeing to take part in this UK Digital Comics Readers study. Before you decide whether you would like to take part, it is important that you understand why the research is being done and what it would involve for you. Please take time to read the following information carefully and discuss it with others if you wish. Ask me if there is anything that is not clear or if you would like more information.

What is the purpose of the study?

The main focus of my PhD research seeks to address the gap in the understanding of the creation to consumption process for digital comics. During the first two years of research, I have been speaking with publishers and creators. In this, my third year, I am turning my focus to users, or readers, of digital comics, and all types of readers, from comic book fans and graphic novel readers to those who read and share comics they see over social media, such as Facebook, Twitter, or Instagram.

This Digital Comics Readers study, and the subject of my invitation to you, involves conducting a usability and exploratory reading study, to identify what kind of readers look at comics online, how they find, read, and share them. The research has been funded through the Arts and Humanities Research Council's Collaborative Doctoral Programme, in collaboration with the Human-Computer Interaction Design Centre (HCID) at City, University of London, and the British Library.

What will happen if I take part?

There are two options for participation: through a remote/virtual session, or an on-site session at the City HCID Interaction Lab.

Once we have determined whether a remote or on-site meeting is convenient, I will schedule a meeting with you at an agreed time which would ensure privacy in order to conduct a semi-structured audio-recorded interview which will involve video-recorded screensharing activities (viewing social media,using apps etc). The sessions will be from 60-90 minutes long.

During the session, you will be asked to respond to a series of questions regarding searching and reading online, specifically as these activities relate to webcomics (and other types of online reading if pertinent).

During this session, you will be asked to talk the research through the access and reading of an online comic of your choice, for example using an app, or accessing web portals, or social media.

You could also write to the Secretary at:

Anna Ramberg
Research Integrity Manager – Research & Enterprise
City, University of London
Northampton Square, London, EC1V 0HB
Email: Anna.Ramberg.1@city.ac.uk

City holds insurance policies which apply to this study. If you feel you have been harmed or injured by taking part in this study you may be eligible to claim compensation. This does not affect your legal rights to seek compensation. If you are harmed due to someone's negligence, then you may have grounds for legal action.

Thank you for taking the time to read this information sheet and for taking part.

For further information about the research, or if you have any queries or concerns, please contact:

Linda Berube

Linda.berube@city.ac.uk

City, University of London

Northampton Square

London EC1V 0HB

Data Protection Privacy Notice: What are my rights under the data protection legislation?
City, University of London is the data controller for the personal data collected for this research project. Your personal data will be processed for the purposes outlined in this notice. The legal basis for processing your personal data will be that this research is a task in the public interest, that is City, University of London considers the lawful basis for processing personal data to fall under Article 6(1)(e) of GDPR (public task) as the processing of research participant data is necessary for learning and teaching purposes and all research with human participants by staff and students has to be scrutinised and approved by one of City's Research Ethics Committees.

The rights you have under the data protection legislation are listed below, but not all of the rights will be apply to the personal data collected in each research project.

- right to be informed
- right of access
- right to rectification
- right to erasure
- right to restrict processing
- right to object to data processing
- right to data portability
- right to object
- rights in relation to automated decision making and profiling

For more information, please visit www.city.ac.uk/about/city-information/legal

What if I have concerns about how my personal data will be used after I have participated in the research?

In the first instance you should raise any concerns with the research team, but if you are dissatisfied with the response, you may contact the Information Compliance Team at dataprotection@city.ac.uk or phone 0207 040 4000, who will liaise with City's Data Protection Officer, Dr William Jordan, to answer your query. If you are dissatisfied with City's response you may also complain to the Information Commissioner's Office at www.ico.org.uk

What if there is a problem?

If the research is undertaken in the UK if you have any problems, concerns, or questions about this study, you should ask to speak to a member of the research team. If you remain unhappy and wish to complain formally, you can do this through City's complaints procedure, which we will inform you of.

3. I understand that data from this study will be stored securely in password-protected, encrypted research storage. ☐
4. I understand that my participation is voluntary and that I am free to withdraw at any time, without giving a reason. ☐
5. I understand that if I do withdraw, any data already collected will continue to be used in the study. ☐
6. I give permission for quotes from the transcript to be included in the study, and these will be attributed as "Interviewee [number]" and will be anonymised as much as possible. ☐
7. I give my permission for the use of screen captures related to screensharing interaction, and where appropriate anonymized. ☐

I agree to take part in this study ☐

_____ _____ _____

Name of Participant Date Signature

_____ _____ _____

Name of Researcher Date Signature

When completed, 1 copy for participant; 1 copy for researcher file







Title of Project: UK Digital Comics: Creation to Consumption

Name of Researcher(s): Linda Berube

Participant anonymised initials:

Name of Supervisors: Dr.Ernesto Priego and Dr. Stephann Makri, HCID, City, University of London; Ian Cooke and Stella Wisdom, the British Library.

CONSENT FORM

Please initial box

1. I confirm that I have read and understood the Participant Information Sheet provided to me and which I can retain for my own record. I have had the opportunity to ask questions. I understand this research will involve ☐

   1.1. responding to a series of interview questions ☐
   1.2. think aloud reading activities ☐

   1.3 allowing the interview to be audio and video recorded and screensharing of relevant publications, websites etc to be captured. ☐

2. I understand that no information that could lead to the identification of any individual will be shared with any other party other than the researcher and those involved in marking and supervising the dissertation produced based on the findings. ☐

Appendix IV: Interview Specifications

UK Digital Comics, from creation to consumption: Phase III UK Digital Comics Readers

Time: 90 minutes (allowing for screensharing/tech set-up)

Pre-Interview (15-30 min)	Response Notes (feelings, preferences etc)	Activity	Observations/key concepts
State name? Can we talk a bit about your reading background or habits, for example read for work/leisure; online print? Do you regularly read online? Any particular time of day? Any particular place		Interview-start with review of some pre-session screening questions, and then delve deeper into using interview responses.	Reading Environment, Motivation for Reading
What comics/kind of comics do you read (UK comics?)	Do you have a preference for a type of comic? Why?		References to how define or differentiate: "digital comics" "digitized comics" webcomics" PDF downloads
What device do you use?			Devices: does have an impact on how and what reads? Different devices for different reading
And where do you read comics? App? Social media? Web platform/archives?			Platforms, Apps, tools: Again, is there an impact on how/what? Are different types of comics read on different platforms?
How do you discover new comics? (where would you look for them if you were trying to find something to read?)			Approaches to discovery? Through portals, searching, social media, or through other readers?
Do you ever interact with creator/artist/publisher? Are you a creator?			Interaction over comics? What kind (feedback? contribution to future stories etc)
Do you share what you read with others? How?			Interaction with other readers, lead to creation or community-building (forums, collaboration, discussion lists etc)

The transition

When finished with the introduction and interview, make an explicit and clear transition into the contextual reading portion of the meeting. Stop and explain what will happen during the rest of the session and what you need: For the next part of the session, I will ask you to create/recreate your customary way of reading comics online. While doing so, I ask that you "talk me" through it, not only telling me what you are doing, but why you do it in this way

Exploratory (35-40) Activity/Observation	**Participant comments (feelings expressed, preferences etc)**	**Activity**	**Researcher Observation**
Can you take me through the last digital comics you read, or a digital comic you are in the middle of reading? Walk me through what you would log into to read, step by step? Would you do anything before getting into reading, or would just get right into the comic? I just want to know what an everyday reading session looks like for you.		Either share screen to do on laptop, or have them hold up tablet or smartphone. (what about screen shots from these?) Or, if they can share smartphone screen. Ask them what they use, and what they prefer to use here. Researcher: Flag items for further discussion post-session.	See above-what devices, platforms have an effect on what is read? How do they ordinarily access comics? (via app on phone etc? Reading thru their feeds?) What portals, media, functions used, what draws their attention on a site-graphics?Titles?Subject Matter?
Additional notes on this activity:			

Post-Session (Wrap-up) questions (5-10)	**Response notes**		**Researcher Observations**
Go back to anything in the observation session you flagged to follow up on,			
Is there anything else you would like to say about webcomics? Reading webcomics in a library setting (have you done this?)			
Do you have any questions?			
Thank you again for participating			

CGM Interview Specification

Interview Specification:	The purpose of this document is to identify the main components of the gatekeeper interview and to identify some potential questions or types of questions that might be included. The different components are roughly organized according to the creation-production-publication-consumption pattern.
Topic	**Sample Questions**
Interview Introduction	Researcher will review consent form and information sheet with interview subject. The researcher will introduce herself, her background, her objective in learning as much about the production processes and participants as possible.
Gatekeeper Type	Ask for participant name and title, description of individual's work What type of organization is it (traditional publisher? Small press? Aggregator? Distributor? Web Platform?) Explain. What is the business model, or mission/motivation for the organization? Rationale for types of publication, production, and distribution? How long has it been in business? Are the publications freely available or for purchase? Open access?
Type of Publication (content)	How are the publications defined? For example, as a web comic, graphic novel, magazine, or 'comic book'? Examples? Are the publications produced in print and/or digital? Rationale for producing either or both? If both, are production processes complementary, or are they handled separately? Are there separate business models?
Format of Publication	In what file format is the material submitted by the author? Published or distributed? Does the publisher anticipate any change to the format? What kind of tools do authors use, for the art, for the text? How are these compatible or made compatible with the organization's distribution platform? Would the publication be packaged with DRM/rights protection? How and by whom are metadata or tags applied? What devices can the publications be read on/downloaded to/accessed?
Method of Delivery/Submission	Who are the authors/creators (any sense or profile of who submits for publication)? Are creators usually one person, or more common for there to be a division of labour between art and text? Is publication contacted by author or a representative (agent etc)? What is the nature of the relationship between author and organization? Does the author have to sign a terms of agreement, for instance? What kind of agreement is there regarding copyright? Remuneration or royalties? How do authors submit their works (through upload, ftp, email etc)? Examples or please demonstrate?
Processing Publication	What are the steps from author submission to publishing (editors, copyeditors, retailers, distributors, aggregators, e-commerce platforms, IT/graphics specialists, sales, marketing, designers, conversion agencies, media content producers etc)? (List) Are these performed in-house or by third parties? Examples or please demonstrate (for instance, the use of apps or tools for upload, formatting, design etc)?
Publishing/Distributing	Where are the publications distributed? From which channels (website, aggregator, device-kindle, etc)?
Engaging Readers	How are readers engaged and through what platforms (social media, marketing, etc)? How do readers add value to the content? For example, are readers encouraged to make comments or suggestions on the gatekeeper web site? Do readers engage directly with authors? Do readers recreate, co-create, write fan fiction? Have readers in turn become
	authors? Examples or please demonstrate, for example on social media sites, blogs, reviews?
Contact with other participants	Others, such as authors, readers, marketing, that can be contacted for year 2 data gathering
Questions from interview subject?	

DRAFT

Creators Interview Specification

Interview Specification:	The purpose of this document is to identify the main components of the comics creator semi-structured interview and to establish baseline questions or types of questions that might be included. The interview may be personalized according to the individual creator (some questions selected, others deselected etc). The different components are roughly organized according to the creation-production-publication-consumption pattern.
Topic	**Sample Questions**
Interview Introduction	**Objective: To provide interviewee with as much information about the project, background, interview process as possible**. Researcher will review consent form and information sheet with interview subject. The researcher will introduce herself, her background, her objective in learning as much about the creation and production processes and participants as possible.
Comics Creator Type	**Objective: To collect as much information about the context of creation.** Ask for participant name and title, description of individual's work. Length of time creating comics? Indie, self-publisher, or published with traditional CGMs? How would you describe how you create and produce comics? For example, webcomic self-publisher? Indie Press? Part of a collaborative team, a collective? Do you publish just your own? Or do you publish others? Explain. What is the business model, or mission/motivation? For example, are your comics ad-subsidised? Free at point of access with merchandise and convention support? Supported through a Collaborative or Collective? Funded through a government grant? Ecommerce suite, crowdfunding (Kickstarter and/or Patreon pages)? Does the site offer merchandise? How important is this to the business model? Rationale for types of publication, production, and distribution? For example, what has attracted you to publishing graphic novels/webcomics etc?
If Self-Published	The questions below can be asked or modified: Which types of publications do you offer on your site-webcomics, graphic novels, comic books, trade paperbacks/digital editions of, etc? Are the publications print and/or digital (digital-first, digital-exclusive or print first)? Rationale for publishing/delivering either or both? If both, are production processes complementary, or are they handled separately? Do you used third-parties for editing or production? If you produce titles in different media (serialized monthly, trade, digital edition for example), do you provide bonus material for each, in order for the reader to get a different reading experience or to encourage them to read various versions? What delivery platforms/self-publishing services do you use? Is this in addition to your own website/FB/Tw/Insta/Tumb/TicToc etc In what file format is the material submitted to a CGM, pdf for example? Published or delivered (by CGM or as a self-publisher)? Does the comic creator anticipate any change to the format, either in the creative or publishing process? What kind of tools do you use, for the art, for the text? Do you hand-draw or use computer tools? How are these approached compatible or made compatible with one or several distribution platforms? Also, see other related questions below.

Type of Publication (media, format, content)	**Objective: To collect publication type information, and what format-digital and/or print-and how these relate to each other. These questions are to ascertain whether there is a business/creative strategy in which digital and print are seen as complementary and/or equal reading experiences. These can be addressed to self-publishers (see previous section) and those who publish through more traditional channels.** Which types of publications do you offer on your site-webcomics, graphic novels, comic books, trade paperbacks/digital editions of, etc? Are the publications print and/or digital (digital-first, digital-exclusive or print first)? Rationale for publishing/delivering either or both? If both, are production processes complementary, or are they handled separately? Do you used third-parties for editing or production? If you produce titles in different media (serialized monthly, trade, digital edition for example), do you provide bonus material for each, in order for the reader to get a different reading experience or to encourage them to read various versions?
Publication Technology	**Objective: To collect information on technical requirements for publication** In what file format is the material you upload and/or publish your comic? What kind of tools do you use, for the art, for the text? Do you hand-draw or use computer tools? How are these approached compatible or made compatible with one or several distribution platforms? Would the publication be packaged with DRM/rights protection? How and by whom are metadata or tags applied? What devices can the publications be read on/downloaded to/accessed?
Submission Process	**Objective: To collect data on the relationship between the creator and the gatekeeper-mediator: how publications are created and then submitted, what are the terms of agreement etc** How do you submit or upload your work (through upload, ftp, email etc)? Examples or please demonstrate? Of your digital publications, would you say they are mostly/all • created digitally, published digitally? • hand-drawn, then scanned/digitized, to be published in digital format? • created print, published in print (by your site or another), then published digitally? • created print, digitized by creator/gatekeeper, then published digitally? If you also publish in print, do you • hand-drawn, scanned, then digitized by CGM • create /submit in print then digitize (by CGM) then published in print? • create/submit digitally then published in print? • other type of format submission/publishing process? Would you say you digital comics mostly have digital-specific features or are digital natives that cannot be reflowed or remediated to print? In other words, are your print and/or digital publications 'fixed' to their medium, making it difficult to change publishing formats? Or are they more flexible? Do you think there is an awareness of these options when you create them? Who are the CGMs you work with? Who are the other creators you work with (Illustrators, Colourists etc)? Are you represented by an agent, or do you negotiate contracts and send submissions yourself? Do you use any resources, like the Society of Authors, for negotiations and contracts? What is the nature of the relationship between creator and CGMs? Does the creator have to sign a terms of agreement, for instance? What kind of agreement is there

	regarding copyright? Remuneration or royalties?
Publishing Process	**Objective: To determine the publishing/delivering patterns or cycles undertaken by creators, as a sole self-publisher, as part of a team, or working with a CGM.** Once you have submitted a comic, what happens? What are the steps and who are the participants once a work has been submitted for publication/delivery? (editors, copyeditors, retailers, distributors, aggregators, e-commerce platforms, IT/graphics specialists, sales, marketing, designers, conversion agencies, media content producers, artists, inks, colourists, etc)? (List and explain) Are these performed in-house or by third parties? Examples or please demonstrate (for instance, the use of apps or tools for upload, formatting, design etc)? What file format is the comic published in?
Delivery/Distribution Process	Where are the publications distributed or delivered? From which channels (website, aggregator, device-kindle, etc)?
Engaging Readers	**Objective: To understand what the relationship between the comic creator and the reader is, and how active is the reader in engaging and/or co-creating** Who is your intended audience/customer/reader? Do you have target groups (gamers etc)? How are readers engaged and through what platforms (social media, marketing, etc)? How do readers add value to the content? For example, are readers encouraged to make comments or suggestions on the creator's website/social media accounts or that of the CGM he/she works with? Do readers engage directly with creators? Do readers recreate, co-create, write fan fiction? Have readers in turn become authors? Examples or please demonstrate, for example on social media sites, blogs, reviews? For those creator/self-publishers of interactive or experimental comics, additional questions include: -Why did you decide to add this interactive element? What did you think it added to the comic? Did the comic end up going in a direction you were not prepared for? -Did you consider it a success, and on what basis? (level of participation, feedback) -If you received feedback, was it positive, negative? Did you solicit the feedback, or was it spontaneous? -Was this the only comic you have tried this with? Would you try it again, do things differently?
Contact with other participants	Others you can recommend, such as creators, readers, CGMs, who can be contacted for year 2 data gathering?
Questions from interview subject?	Do you have any questions regarding the research as a result of the interview?

Appendix V: Publisher Pathways (Mapping by Category), Including Participant Codes

CGM Category	Description	
Traditional (CGMT)	Big Five Houses (Penguin Random House etc + imprints) and Other Traditional (similar business model and production processes to Big Five, including other large houses not considered Big 5, smaller houses, university presses etc). Description: Takes all the financial risk; usually pay out advances (upon signature, against royalties etc); generally Print First and/or Simultaneous digital, but do run some Digital First titles; most if not all publishing processes including printing inhouse; hold onto publishing rights according to Copyright regulation. ns (70 years)Digital Distribution: Their website, imprint channels, some use ComiXology, now Amazon, Apple Store etc **Research Participants Interviewed: CGMT2**	Interviewed: CGMT2, one of big Five publishers, produces print and digital graphic novels. It also sponsors a graphic novel prize
Independent[1] and Small Press (CGMI)	Smaller publishing houses with diverse risk assumption, production processes etc. Difficult to define (one interviewee maintained that Independents had a larger print run than small presses); other than that they generally do not pay out advances and take less financial risk than CGMTs. In some respects, resemble CGMTs in that publishing processes -other than printing-done inhouse. Take on some marketing and distribution (often less widely distributed than CGMTs). Generally, they are Print First, sell from their websites, some retail/storefront sites especially for digital PDF versions, maybe including Amazon; more relaxed approach to copyright (5+years). Digital Distribution: either from website or from storefronts like Gumroad, Big Cartel, maybe Amazon/ComiXology, Apple. *Note that CGMI1 is an outlier: while business model and relationship with creators resemble the description above, CGMI1 is digital exclusive, publishes from its own dedicated site, and retains no rights to the comics. **Research Participants Interviewed: CGMI1, CGMI2, CGMI6, CGMI7**	Interviewed: CGMI1 produces digital exclusive serial comics on a weekly basis. CGMI2 produces print and digital graphic novels. CGMI8 produces print and digital graphic novels.
Multi-Platform or Entertainment (CGMM) **Traditional) Comics Publishing (CGMCom)**	Companies with products across publishing, TV, games, film. Often, transmedial/intermedial, for example, comics characters/storylines will be turned into TV shows, or games will become comics. CGMMS will assume all the financial risks, business and production decisions. Often, creators are commissioned to create characters/storylines (work for hire) and all rights are retained by the CGMMs. Provide licenses for third parties for merchandising or other media. Digital Distribution: Distribute through own or subsidiary websites and apps; maybe Amazon/ComiXology. **Research Participants Interviewed: CGMM2, CGMM4** Companies whose products have traditionally been comics, some now branching into other media, including platforms. CGMs publishing comics in this category can be subsidiaries of larger media companies (Beano Studios/DC Thompson for example). Creators are for the most part on work-for-hire contracts, and the companies retain all the rights. Companies were identified during the mapping process but could not be confirmed for interview.	Interviewed: CGMM2: game producer and publisher of a list of legacy comics (purchased ips from now defunct publishers). Produces print and digital comics, some digital first, distribution through app CGMM4: technology company produces interactive digital-exclusive graphic novels featuring branching narratives, through app
Indie/Self-Publishing (CGMI/S)	which can be further subdivided as follows:	
Indie/Self-Publishing: Hybrid (CGMH)	CGM requires creator to pay to publish or raise funds to do so. Similar to assisted services publishers (or even vanity presses). Can include curated (selective) companies (developing titles relevant to particular topics). **Research Participants Interviewed: CGMD1**	CGMH1 is a Crowdfunding Publisher: creator must be accepted to crowdfund on site. These funds pay for publication. Could not be reached for interview
Indie/Self-Publishing: DIY (CGMD)	CGMs in this category provide digital distribution and retail platforms for self-publishing creators who perform all the production and marketing and control all business decisions and rights. CGMDs provide the web-based platforms from which to launch publications and will usually take a percentage of sales. CGMDs usually distribute print and digital comics. Some CGMDs will provide apps, and distribute to other channels, such as Apple Store etc. Generally, though, creators must explore these other distribution options themselves, especially with Amazon.	Interviewed: CGMD1 is a distribution platform and marketplace for print and digital comics. Creators upload digital comics to an app for consumption.
Indie/Self-Publishing: Collaboratives/Collectives (CGMC)	CGMCs supply distribution and some publishing assistance and services; run by self-publishing creators for self-publishing creators who usually produce webcomics and other types of mostly digital first or digital exclusive comics. Financial risks are generally taken by the individual members and earnings are similar to those of creators working with CGMDs. CGMCs are supported	Interviewed: CGMC1, webcomic collective providing website, creative, and promotional support

[1] 'Independent' is not to be confused in this context with 'Indie'. Independent publishers publish works by multiple authors, and indie publishers publish works by one author who may work with other creators or collaborators.

	through membership subscriptions, merchandise sales, convention sales, grants etc. The collectives may supply support tools, technical advice etc. Some selectivity in terms of membership. CGMC websites are used as one channel of distribution, among others. **Research Participants Interviewed: CGMC1**	
Indie/Self-Publishing: Social: serial Self-Published, otherwise known as Webcomics (CGMW)	Found on Instagram, Tumblr, Twitter, individual dedicated websites, or aggregator/distributor platforms such as WEBTOON, CGMs in this category are creator/self-publishers. CGMW websites (or social media accounts) are regularly updated as new instalments of the comics are created. By definition, they are digital exclusive, but depending upon readership they may be digital first, eventually publishing print editions. CGMWs, whose content is usually freely available, are often supported through merchandising, advertising, crowdfunding, donations. They manage all production and marketing and have control over rights and business decisions. Note that this category crossed over to creator/self-publishing in interview **Research Participants Interviewed: CGMW1**	Interviewed: CGMW1/CGMO3, webcomics creator and academic
Indie/Self-Publishing: Other (CGMO)	Comics, including applied comics (for educational, instructional purposes etc), are produced and/or distributed and promoted as part of project funding, academic research, or in a work or workshop environment. Funding is often through government grants, donations, sales etc. While some CGMOS manage creation, production, distribution and marketing, with project partners retaining all rights, some operate as a creation and promotion support network. Objectives are print and digital-first comics. Distribution: via social media, organisation, academic etc websites, conferences, maybe some retail platforms. **Research Participants Interviewed: CGMO1, CGMO4**	Interviewed: CGMO1, project-funded network for print and digital applied comics CGMO4, government-funded cooperative supporting creators of print and digital comics

Appendix VI: Creator Participant Background Data

CCC1 Webcomics creators with own site and part of a collective

CCD1 Comics creator and blogger who has sold digital comics books through CGMD1 and funded creation through Kickstarter

CCI1 Comics illustrator and together with creative partner has produced comics for online weekly comics magazine, among others. Began as a children's illustrator

CCI2 Graphics novel creator for small press publisher, has published online exclusively through travel blogs etc

CCI8 Comics creator, academic, publisher

CCT2 Graphics novel creator with traditional book publisher

CCW1 Webcomics creator, comics degree, and works for a comics publishing house

CCW2 Webcomics creator, early creator for WEBTOON English Language, has published webcomics in print, sells merchandise via Twitter

Appendix VII: Reader Participant Background Data

A Snapshot of Digital Comic Reader Participants, including Type of Reader

DCR1 Comics Studies Graphic Medicine PhD student (30s-40s?), committed reader of print comics, maybe even a fan (a reader from childhood), casual to regular reader of digital comics. Uses file-sharing platform to read PDFs.

DCR2 Digital comics blogger and reviewer/previewer of digital comics on Substack (40s?), (fulltime job in construction), reader of print from childhood, but now really into digital comics, backs comics on Kickstarter and shares via blog, Tw, Insta. Committed Reader

DCR3 Digital Humanities academic (30s-40s), reader of print comics from childhood, a regular/committed reader especially of webcomics on WEBTOON, also graphic novels and superhero comics on ComiXology/Amazon, as well as on Hive Mind. They and their son got Neil Gaiman's autograph

DCR4 Software engineer (29), regular/committed reader of digital comics (not so much print) since a teenager, considers themselves a "passive reader". They would rather get lost in the world of webcomics, reading back catalogues to catch up with present day, than discuss them. First and only person I have interviewed who spontaneously referred to the "artistic quality" of digital comics, over that of print comics. Reads webcomics daily that have been published online for 10-20 years

DCR5 HCI/Archives PhD student (20s), at first doubted they could be considered a comics reader, then identified as a casual reader of comics, but once through the interview part of the session thought they were in between a casual and regular reader. Reads webcomics through online news (Guardian) and social media

DCR7 HCI/data labelling PhD student (20s), reads comics online through Guardian and through platforms like WhatsApp, likes and shares political comics: they help to inform and shape their opinions. Casual reader (although supports some creators through Patreon)

DCR8 PhD History student (20s), avid manga and webcomic reader: reads 13+ comics a day mostly through Comics Fury and RSS feeds. Between regular and committed comics reader

DCR9 Software engineer (20s), regular reader of webcomics and other types of comics through apps, PDFs, and file-sharing. Reads webcomics on Mastodon.

DCR10 Customer services for an LIS company (50s), read print comics sporadically growing up, just what was shared with brother. Encounters digital comics via FB and *Guardian Online* (especially Australia). Casual to regular digital comics reader (as does read at least one title regularly)

DCR11 HCI/Feminist theory PhD student (40s/50s). Read print comics as a child, transferred to comic PDFs for mostly financial reasons. Was taking a break from social media at time of interview.

Appendix VIII Enlarged Process Diagrams from Chapter Four

Figure 15

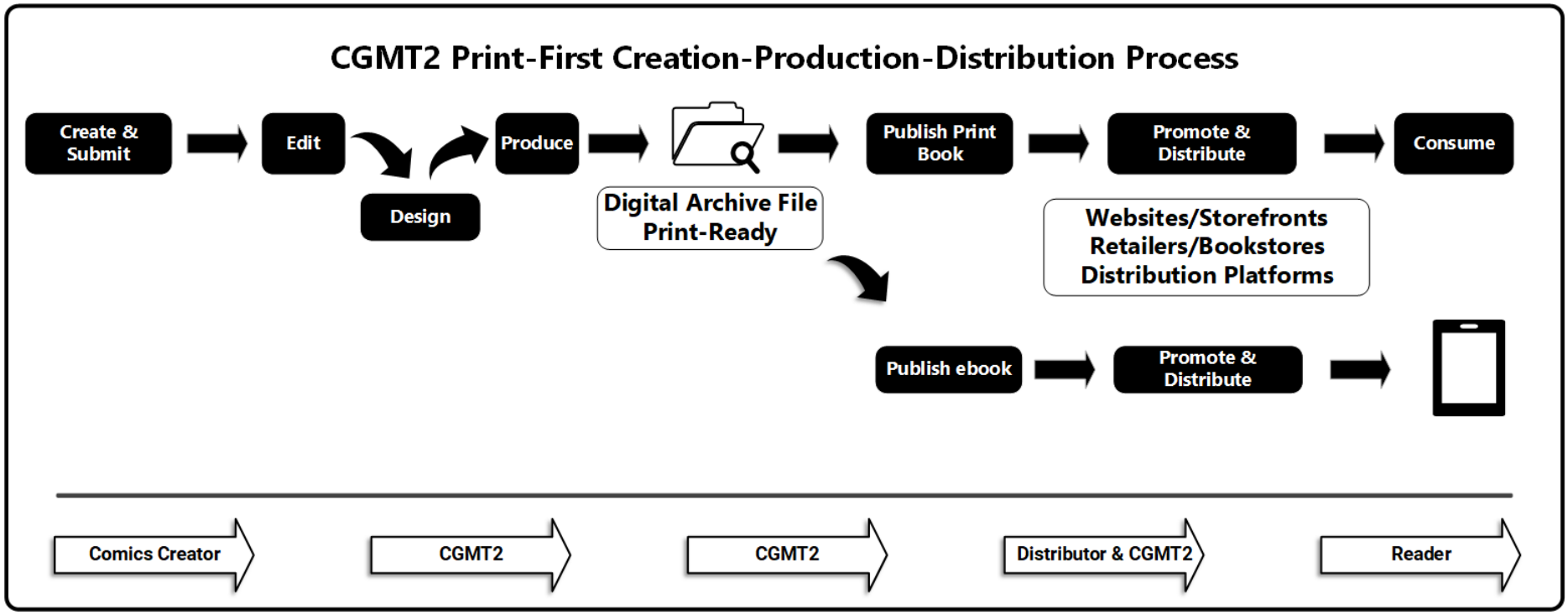


Figure 15 - CGMT2 is a traditional book publisher producing graphic novels. The process is mostly linear, with the most transactive communication happening between the editor and the creator. The CGM is mainly responsible for the promotion. The production of an ebook is a separate workflow within the company which disrupts the total linearity of the process. There was not much direct, substantive communication with the reader.

Figure 16

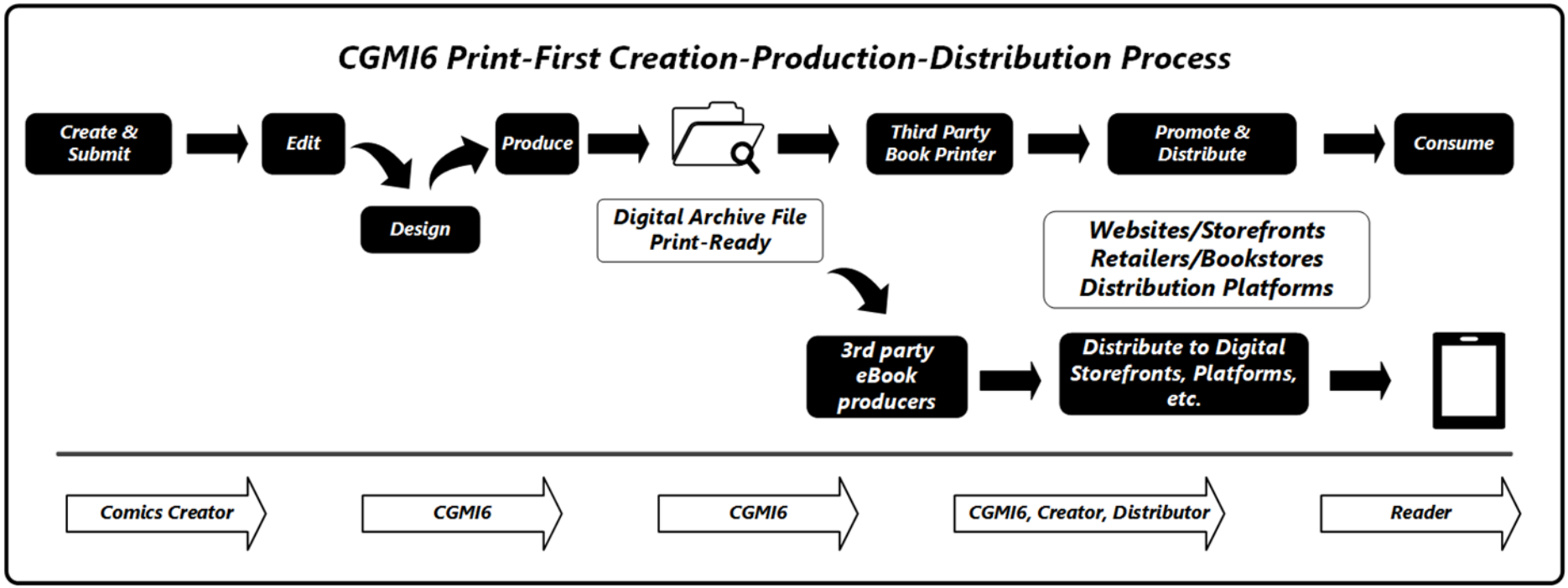


Figure 16 - CGMI6 is a small -press publisher producing graphic novels where the most transactive communication happens between creator and editor. The CGM promotes but a certain amount is expected from the creator. All printing, ebook production, and distribution take place through third-party providers. As with CGMT2, the added process for digital versions makes this less than a purely linear process. There is little direct, substantive communication with readers.

Figure 17

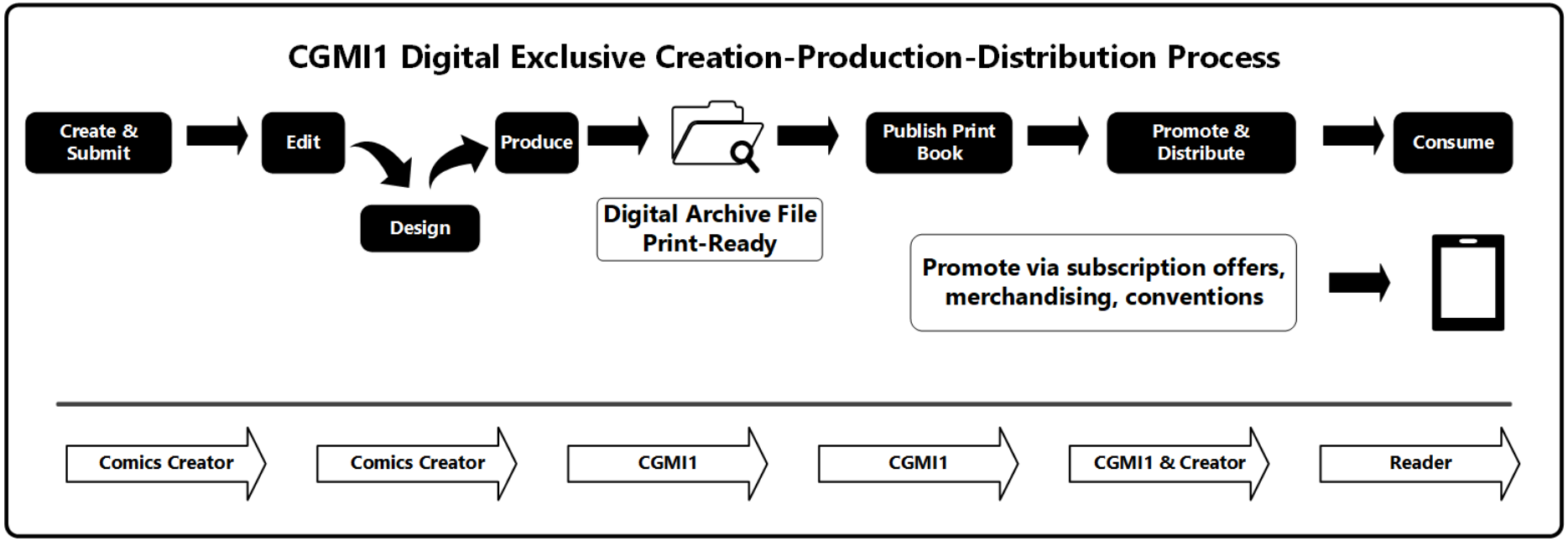


Figure 17 - CGMI1 publishes comic strips online exclusively on their dedicated site. They will do some editing and production, but the creator is expected to do most of it, as well as a good deal of promotion. The CGM engages in some promotional offers. The CGM had little substantive interaction with readers, with conventions being the most direct.

Figure 18

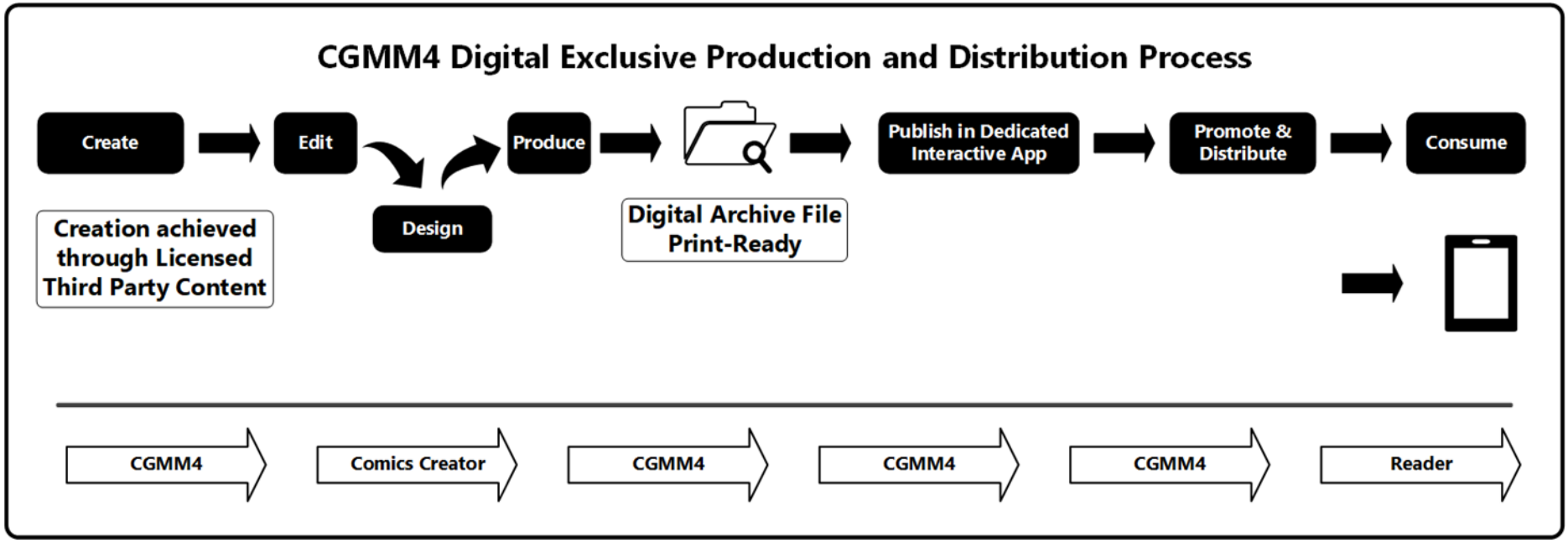
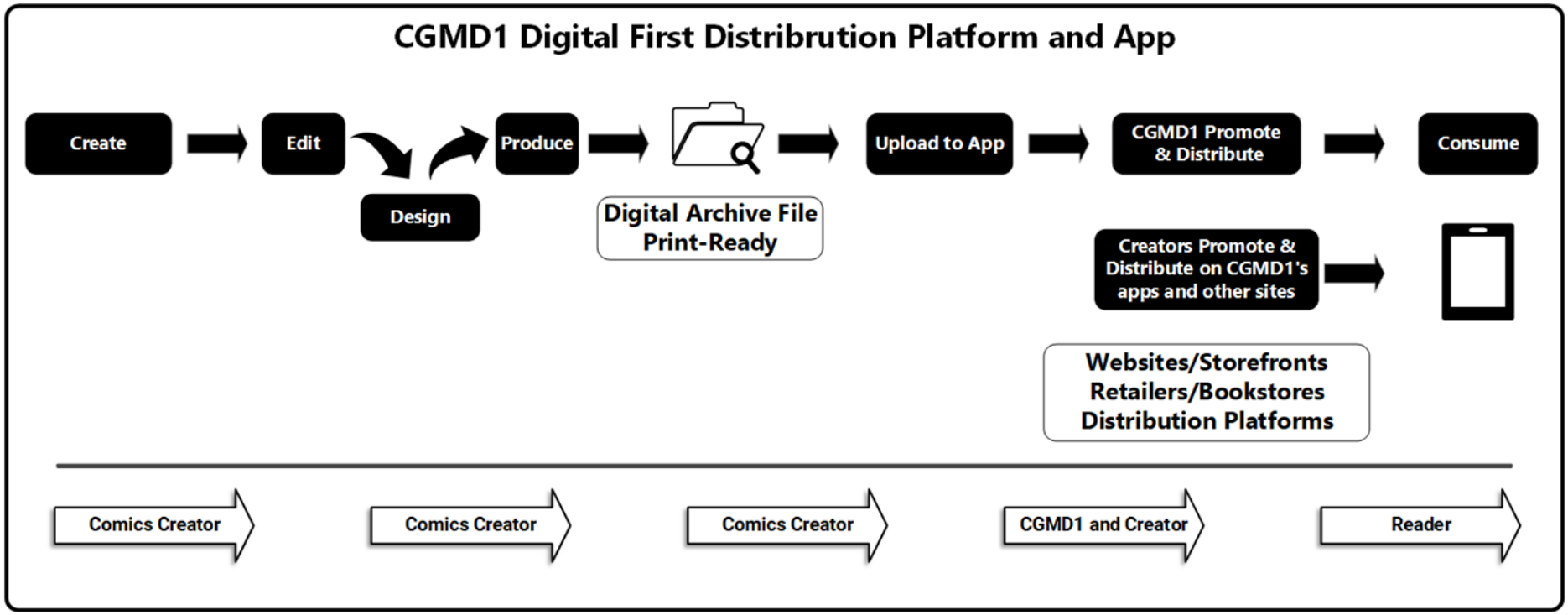


Figure 18 - Whereas the traditional large and small press CGMs publish the creative output of others, CGMM4 commissioned creators to produce digital versions of graphic novels whose licensing they purchased for their interactive app. The creators used CGMM4's dashboard to produce an interactive version. CGMM4 does all the promotion. There was little substantive interaction with readers.

Figure 19



CGMD1 Comic Publishing Process (Digital First) CGMD1 provides a platform for digital comics and a marketplace for print comics. The creators are self-publishers who do all the production and uploading themselves. CGMD1 had recently provided the option of producing a print version to sell in their marketplace. CGMD1 does minimal promotion onsite, as creators are expected to assume this responsibility and can publish on other sites. CGMD1 had little substantive interaction with readers. See Appendix VIII for enlarged version.

Figure 22

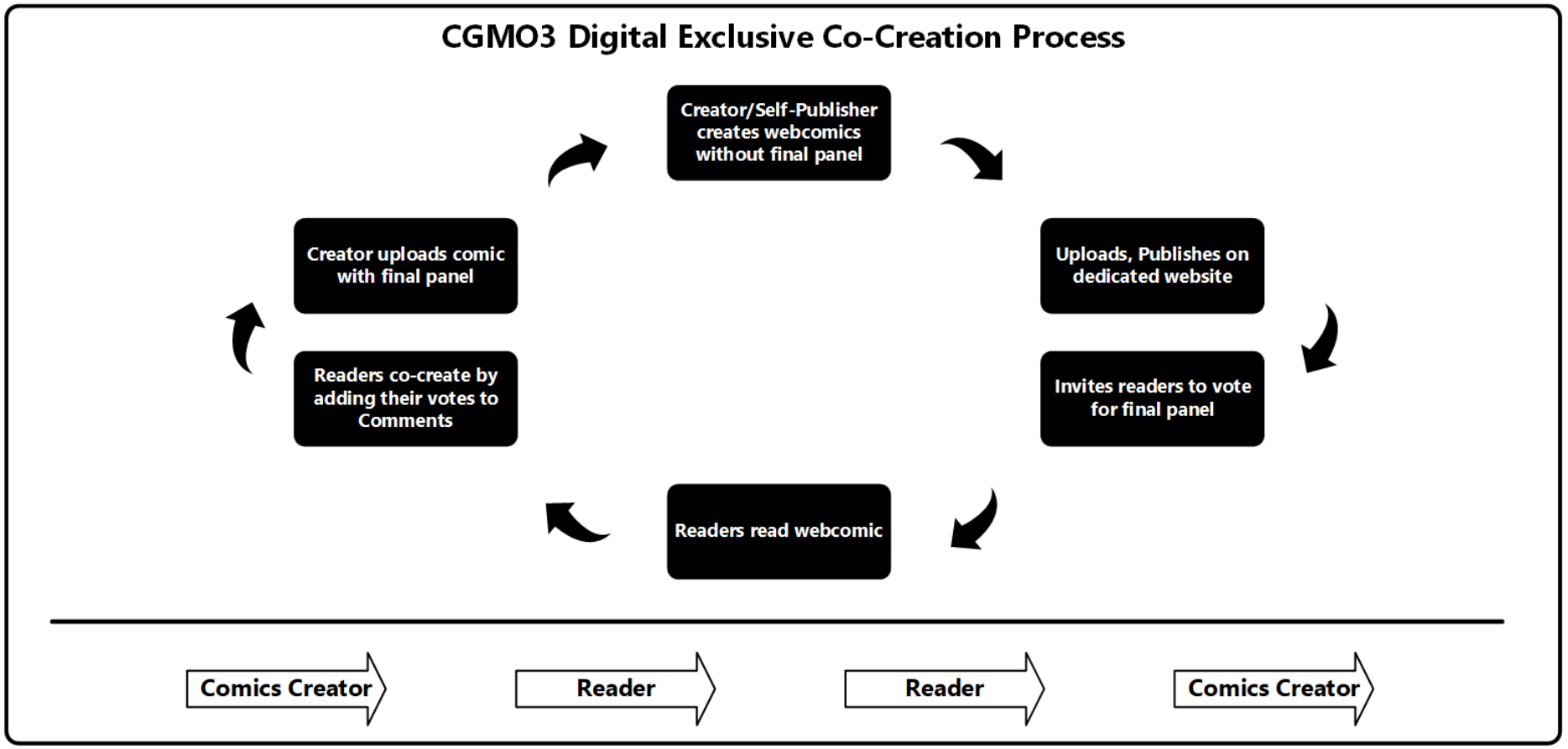


Figure 22 – CGMO3 invited readers to co-create by deciding the final panel of a specific webcomic. This process describes a circuit of continuous, repeated activity. Although it involves co-creation, the creator is still in control of the process by only allowing certain options for the final panel.

Figure 23

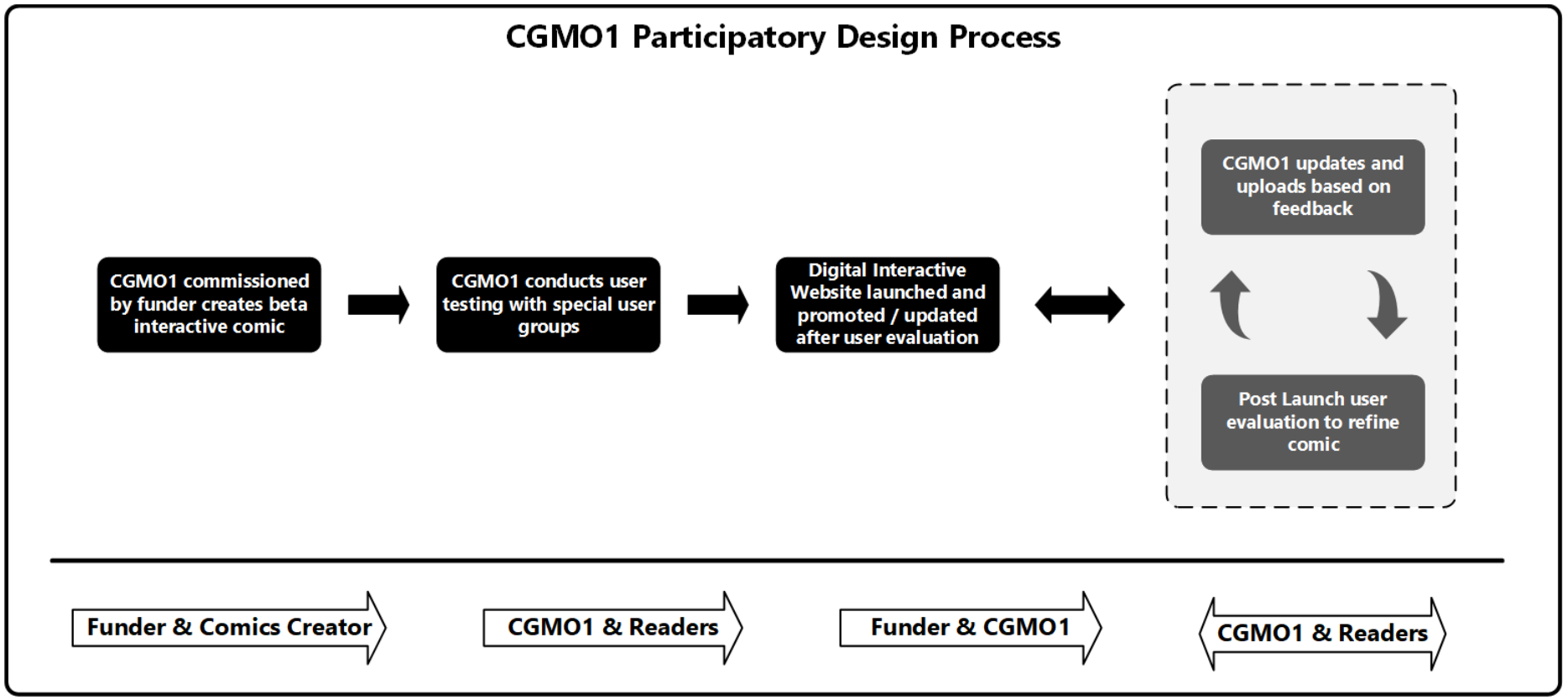


Figure 23 - CGMO1 is a collaborative comics projects organization, creating applied comics for cultural, academic, and other institutions. The collaboration is demonstrated in this process model, beginning with the project funder and involving the readers through participatory design in repeat circuit at the end.

Figure 27

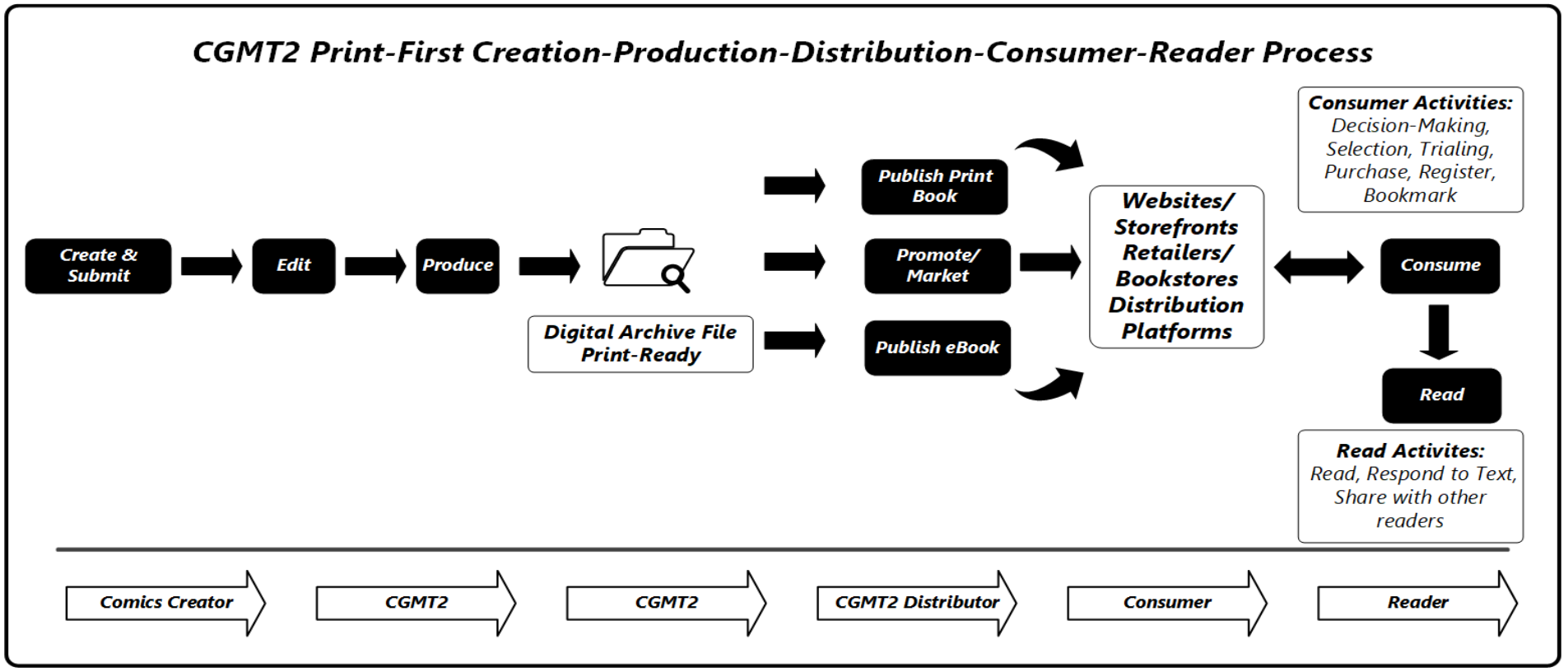
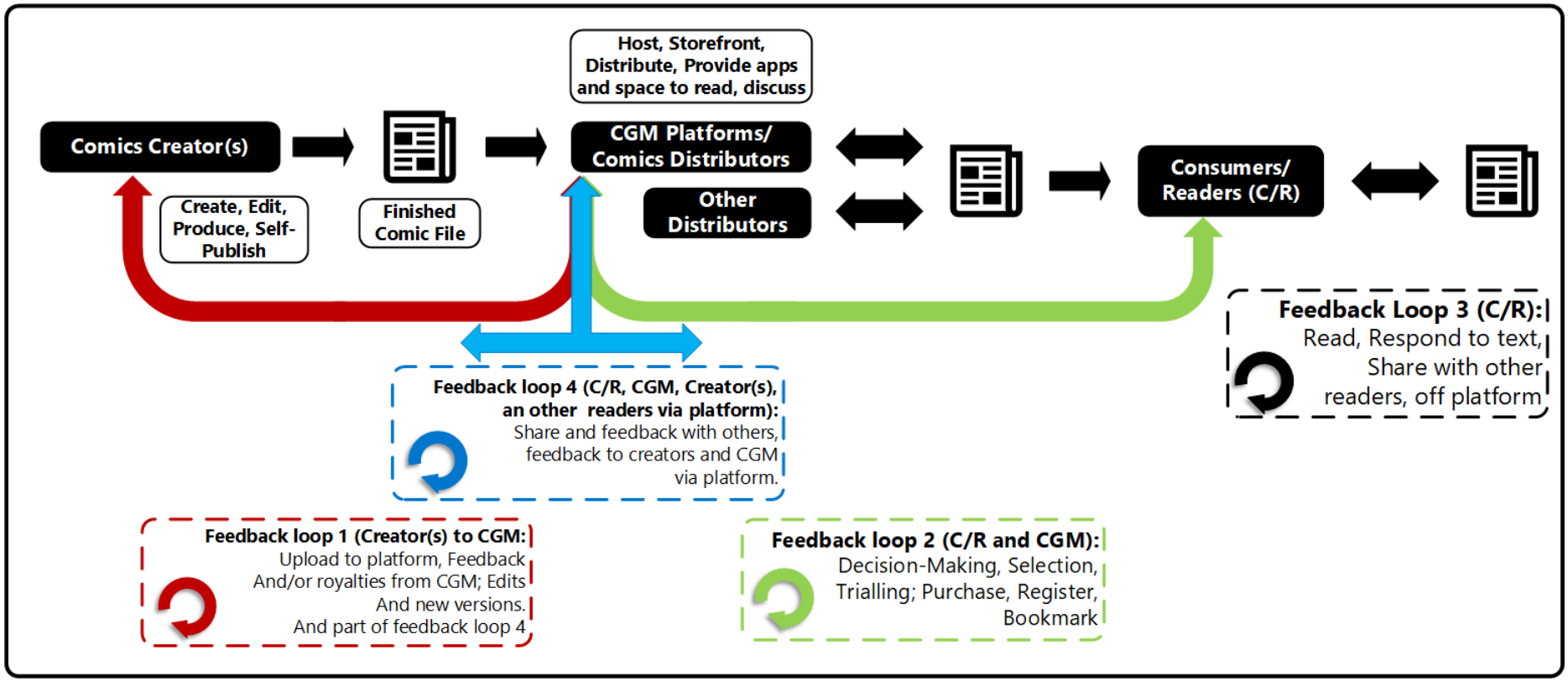


Figure 27-CGMT2's linear publishing (with branching distribution) revised to include consumer and reader activities. Note that the arrow between consume and read can go in both directions as reading leads to more consuming. See Appendix VIII for enlarged version.

Figures 28 and 32



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