School of Media, Creative Arts and Social Inquiry

Performing Both Sides of the Glass: Videogame Affordances and Live Streaming on Twitch

Lachlan Mark Howells 0000-0002-7699-3534

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Declaration

To the best of my knowledge and belief this thesis contains no material previously published by any other person except where due acknowledgment has been made. This thesis contains no material which has been accepted for the award of any other degree or diploma in any university.

The research presented and reported in this thesis was conducted in accordance with the National Health and Medical Research Council National Statement on Ethical Conduct in Human Research (2007) – updated March 2014. The proposed research study received human research ethics approval from the Curtin University Human Research Ethics Committee (EC00262), Approval Number #HRE2020-0009

Signature: L. Mouelly

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Acknowledgment of Country

I acknowledge that Curtin University works across hundreds of traditional lands and custodial groups in Australia, and with First Nations people around the globe. I wish to pay my deepest respects to their ancestors and members of their communities, past, present, and to their emerging leaders.

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Introduction

Since at least the 1980s, a well-documented history of sociality has accompanied the act of playing videogames, from the communities that formed around playing arcade machines to those formed online, participating in multi-user dungeons (MUDs) and laying the groundwork for what would later be referred to as 'massive multiplayer online role-playing games' (MMORPGs) (Newman 2008; Wolf 2012, 5). Videogames, and the activities that surround them, have continued to evolve, responding to shifting social and economic conditions, and new technological developments and trends. Today, it is easier than ever to record and capture gameplay online, with platforms such as Twitch (launched in 2011) providing players a relatively cheap and simple means to share their live, in-game experiences with others. This had led to the growth of 'live videogame streaming' - the act of broadcasting gameplay to a live, online audience. Alongside this growth, the act of *spectating* live videogame streams has risen in popularity and, with this rise, influenced how individuals value and draw meaning from videogames today.

Notably, the act of 'playing' is becoming less of a requirement for individuals wanting to experience videogames and participate in videogame culture. Recent studies have brought to light the range of streaming practices and forms of spectatorship that have evolved alongside the growing popularity of platforms such as Twitch. Orme's (2021) research highlights the existence of videogame spectatorship from 'non-players', i.e. individuals whose primary, or sole, form of engagement with videogames is through watching others play. Orme's (2021) insights are indicative of a larger trend, in which videogames are being "de-centred" or removed from their central position in game studies analysis (Consalvo 2017). This brings to light questions regarding the role videogames can play within different contexts, and the different activities they are capable of supporting. This leads this thesis to investigate the role videogames and, more specifically, their affordances, take on within a live streaming environment, examining the performative dimensions of videogame play on platforms such as Twitch.

The Twitch platform's interface combines live gameplay footage with an Internet Relay Chat (IRC), affording spectators the ability to communicate live with one another and the host of

the stream, i.e. the streamer. Over the course of a stream, the streamer's attention frequently shifts between the videogame and their live audience, with conversation, similarly, emerging out of both the streamer's gameplay as well as topics specific to the live chat. The gameplay feed visible via the Twitch interface is commonly accompanied by a 'face-cam', visually capturing the streamers' physical reactions to both their gameplay and messages from the live audience. It is within this environment that this thesis investigates how streamers leverage and exploit videogame affordances, producing '*meaningful moments*' as part of engaging and entertaining a live audience.

My investigation is heavily based on in depth semi-structured online interviews conducted with five Australian based videogame streamers, exploring their relationships with videogames, their streaming practice, and their audience. These interviews examine the different ways streamers configure their gameplay, in terms of a potential audience and the social dimensions of the Twitch platform. Building on this, I investigate how affordances culminate, not only as part of constructing a videogame's challenge and narrative but, within the context of Twitch, to facilitate meaningful moments. I use the term 'meaningful moments' to refer to instances during live streams that illicit a larger, or stronger than usual, reaction from the streamer and/or the live chat. This typically involves events that are exciting, frustrating, and/or humorous in nature, which can become part of the lore, or shared history, that binds a streamer's online community.

Although the online interviews form the basis for my analysis, they are paired with transcriptions recorded from the interviewed streamers' respective Twitch channels. These transcriptions provide a window into Twitch's online communicative environment, documenting interactions that unfold between streamers and their live audience during a live stream. Drawing on this additional data allows me to investigate the influence different videogames and streamer types have over the interactions that emerge during, and around, gameplay on Twitch. Guiding this analysis is the notion that both videogames and streamers have a mediating effect over the other, with both participating in the construction of meaningful moments during live streams. While streamers will approach videogames with certain goals in line with their playstyle, videogames will often produce scenarios outside the streamer's control, regularly influencing the streamer's moment-to-moment performance and emotional state. During these moments, whether streamers express excitement, happiness or disappointment, their emotional reactions to gameplay serve as opportunities to engage their

audience and showcase their online persona. It is through these different and competing influences, between the gameplay, the streamer and the live audience, that meaningful moments emerge.

Outlining this thesis' structure, I begin with a chapter reviewing both internet and games studies literature, exploring the history of online videogame content and the trends that have influenced the various forms it has taken – from text-based walkthroughs to image and videobased Let's Plays (LPs), and then, live videogame streams on Twitch. My focus then shifts to the Twitch platform, drawing on studies that have developed categories and frameworks for interpreting the online behaviour of its users. This leads into a discussion of affordances, exploring the concept's origin and more recent use within game studies analysis. To apply these existing concepts to streamers on Twitch, I then outline a framework for analysing the 'player-videogame relationship' within live streaming environments. Finally, this chapter culminates in a discussion that explores user behaviour and moderation on the platform, examining the norms, standards and expectations placed on users, particularly streamers, and the influence this may have over how they play, act, and communicate on Twitch.

Following chapter 1's literature review, chapter 2 describes this thesis' methodology, outlining the interview process and the forms of analysis used in later chapters. Chapter 3 documents and describes the data captured in the interviews and Twitch transcriptions. Chapter 4 contains a detailed textual analysis of recorded portions of each respondent's Twitch channel, examining how affordances culminate as part of facilitating and constructing meaningful moments. Chapter 5 proceeds to build on the analysis of the previous chapter, drawing connections with broader online trends – in particular, influencer culture and platform politics. Finally, Chapter 6 concludes the thesis, highlighting the significance of my research, and noting how it might inform further studies in this field.

Guiding this thesis is the question of how the 'player-videogame relationship' is maintained, fractured or altered within a live-streaming environment. Building on this point, I argue that as videogame streaming and spectatorship continues to grow in popularity, the meanings and value associated with videogames will continue to shift. It is in this context that I examine the influences, positive and negative, the Twitch platform has over how users value and experience gameplay. This approach considers the underlying assumptions that measure success on Twitch, and the relationships streamers form with the platform as part of valuing

and interpreting their live streaming practice. The play practices live streaming platforms facilitate and encourage are understood to broadly influence the personal experiences that emerge from videogame play – both for streamers and the individuals who spectate them. It is here that the concept 'meaningful moments' comes into focus, with the context of live-streaming influencing the meaning both streamers and spectators derive from videogames, placing greater emphasis on in-game moments that extend the social dimensions of the Twitch platform and showcase the streamer's online persona.

Chapter 1: Literature Review

The Path to Twitch.tv: Camgirls and JustinTV

The ability to broadcast video and audio live online has become a key feature across several of the most popular websites and applications used today, including Facebook, Instagram, YouTube and Twitch. Consequently, it is difficult to reduce the term 'live-streaming' to a definition that encompasses the many uses and practices associated with it. Put simply, it is an online tool for communication that allows users to simultaneously record and broadcast text, audio, and/or video in real time. However, beyond being a tool for personal communication, live-streaming has become deeply embedded in popular online media consumption. Across several popular online platforms, live-streaming has afforded users the ability to spectate live sporting events, follow and interact with celebrities, conduct online training and courses, watch television (including more traditional 'broadcast television') and to broadcast themselves, and watch others, playing videogames. The latter will serve as the focus for this thesis which will explore the relationships that form between streamers, the videogames they play and their audience of *spectators*. To begin, I will trace a brief history of the media form, starting with the emergence of 'camgirls' before discussing live-streaming's evolving relationship with videogames.

Several of the practices and norms that govern how people engage with live streaming content today can be traced back to 1990s 'camgirl' culture, which drove the first notable rise in live-streaming's popularity. Camgirls, as defined by Senft (2005), are women who use "web cams and journals for autobiographical purposes" (1). A pioneer of this form of online content was Jennifer Ringley, who first set up a webcam under the moniker 'JenniCam' in 1996 and began live-streaming herself in her college dorm room, documenting her life and, on occasion, her sex life (Senft 2005). By 1998 JenniCam was one of the most popular personal webcam sites, claiming 100 million hits per week and inspiring the rise of several other camgirls (Senft 2005, 2). To distinguish the techniques employed by camgirls from other telepresence practices, Senft (2005) identified the term "homecamming", referring to the process through which camgirls broadcast images live from the domestic sphere,

consented to and controlled in accordance with each camgirl's online persona, i.e. their 'brand' (Senft 2005, 13). This practice marked the emergence of the live-streaming media form, blending elements of online social interaction and 'reality-as-entertainment' through a publicly accessible online platform (Senft 2005).

The 'reality-as-entertainment' type of online content popularised by Camgirls is argued to have its roots in a Victorian genre of theatre known as sensation drama (Senft 2005; Voskuil 2002). Plays of this genre typically involved elaborate technological effects demonstrations, with basic plots culminating in on-stage depictions of climactic scenes such as train crashes, shipwrecks and collapsing bridges – also known as the 'sensation scene' (Watt-Smith 2010). Audience members themselves were an important aspect of the 'sensation play', driving the experience in ways comparable to modern day live streaming platforms:

Not only were spectators of sensation able to see one another (before the introduction of electric lighting into theatres in the early 1880s, the auditorium was as brightly lit as the stage); the spectacle in the auditorium was also interesting to watch. Craning to see, peering out through their fingers, flinching, cringing and fixed in wide-eyed terror, the gestures of visible 'interest', were as much a focus for discussion as the spectacle itself.

(Watt-Smith 2010, 109)

The spectacle of the audience's reaction was a key part of sensation theatre: the term sensation itself being understood by Victorians as a "feeling produced in a community" (Michael Diamond cited in Watt-Smith 2010, 109). While audience members would experience terror and awe at these performances, they were not gullible or naïve, nor were they always impressed. An important distinction is made by Voskuil (2002, 245), who suggests that while audience members applauded the sensation of feeling "*really* there" made possible by the technological features of the theatre genre, they were also knowing consumers capable of critiquing depictions of "so real" phenomena (Senft 2005, 12; Watt-Smith 2010, 109). Sensation theatre, therefore, offers some useful parallels when describing the 'theatrical authenticity' of homecamming, both for camgirls and, later, Twitch streams, and the audience's role in influencing, critiquing and participating in live performances of the *real*.

At the height of her popularity, Jennifer Ringley told ABC news that she hoped to "show people that what we see on TV – people with perfect hair, perfect friends, perfect lives – is not reality. I'm reality" (Senft 2008, 16). In this interview, Ringley draws a connection between her credibility and appeal as a creator and entertainer, and the 'realness' of the content she creates. While defining what is *real* is a contentious topic, it less contentious to claim that the unedited, live nature of camgirl content offers a closer view of reality than you might find in a sitcom on broadcast television (Senft 2008). With the addition of various forms of "social software", including bulletin boards, blogs, interactive journals and chat rooms, spectators were provided opportunities to interact with camgirls directly or converse with each other (Senft 2008). These other modes of engagement provided an added layer of authenticity, with camgirls publishing live, textual accounts of their experiences day-to-day, as well as participating in live conversations with their audience.

This fascination with live authenticity and the 'real' distinguished camgirl content from that of film and television, as illustrated in the remarks made by Simon Firth in a 1988 *Salon* article:

Some of these camera sites are immensely boring, and some are really just out to make a buck. Some aspire to performance art without ever really achieving it, and others are just very sad to visit. What they all share is a fidelity to the moment: Every two minutes or so you get a new picture of the owner not just at work or lounging around, but dressing and undressing, snoozing and showering, eating and talking, flirting and, yes, fucking.

(Firth 1988, as cited in Senft 2008, 95)

Senft (2005) draws attention to Firth's notion of the "fidelity of the moment", identifying one of the key factors, not only distinguishing camgirl content from other televisual media, but also in attracting viewers in the first place: live, unedited footage. This observation provides a degree of historical context when discussing the success and appeal of present-day live-streaming platforms and the online practices that have since evolved alongside the media form.

While my project departs from Senft's (2008, 3) enquiry into what it means for "feminists to speak of the personal as political in network society?", her analysis of the conventions and form by which camgirl sites operate remains relevant when discussing current trends in live videogame streaming. Clear parallels may be drawn between the conventions and modes of interaction first popularised by camgirls and those employed by videogame streamers today. This includes affordances now common amongst numerous streaming platforms, such as the live message 'chat' (i.e. Internet Relay Chat) that facilitates text-based conversation alongside live-video content, that have their origin in the more rudimentary forms pioneered by camgirls. While only touched on here, present-day live video streaming owes much of its development to the camgirls of the 1990s and early 2000s and tracing this influence remains an area deserving of further research.

Towards the end of the 2000s, 'general interest' live streaming platforms began to emerge online (Montano, 2015). This emergence coincided with new advancements in audio-visual communications, making it simpler and cheaper for mainstream consumers to broadcast and share their activities online (Montano, 2015). 'JustinTV' was one such platform, created in 2006 and designed with the intention of developing an interface that "anyone" could use (Montano, 2015, 2). Alongside other online platforms such as Ustream TV and Yahoo live, JustinTV borrowed much of its form and interface from the conventions first established by camgirls, but with a focus on streamlining the procedures and equipment required for the operation and constitution of the medium (Montano, 2015). Initially, the live streams that could be found on JustinTV were rather broad and random, ranging from carpentry demonstrations to animal births (Montano, 2015). Around 2010, e-sports (i.e. professional competitive gaming) grew increasingly popular, and demand began growing for live coverage of e-sports related events. JustinTV's user-friendly interface and fast adoption of e-sports related content would go on to be defining characteristics that contributed to the future success of the platform (Rice, 2012).

Although this thesis does not focus on the broadcasting of e-sports events on Twitch, it is impossible to discuss videogame streaming's emergence as a mainstream form of online entertainment without discussing the influential role e-sports has played. In 2011, JustinTV began recruiting additional developers for an exclusive, electronic sports streaming platform, leading to the launch of Twitch later that year (Lynley, 2011). Amazon then acquired the

company in 2014, and the JustinTV platform was shut down to focus on the further development of Twitch (Kumparak, 2014; Kim, 2014). This marked a shift away from the 'real life' content that once typified JustinTV and a prioritisation of the videogame related live media content now synonymous with Twitch. Over the course of the next four years Twitch continued to grow, attracting a total of 185 million viewers for the year 2016, and an average of 15 million unique daily visitors over the course of 2017 (Valens, 2017; Twitch TV, 2017). In 2016, Twitch began pivoting back to more general-interest content and introduced a new IRL (In Real Life) category for vloggers and non-videogame related livestreams (Carpenter 2016). The popularity of IRL content led to Twitch replacing the IRL content label in 2018 with a series of different categories for streamers to assign their content, including: Art, Sports and Fitness, Just Chatting, Talk Shows and Podcasts, Makers and Crafting, Beauty and Body Art, ASMR, Music and Performing Arts, Travel and Outdoors, Tabletop RPG, and Science and Technology. While Twitch remains the so-called "King of Live Game Streaming", the continued success and growth of general-interest content on the platform points to Twitch's appeal beyond a vehicle for videogame content (Khan 2019).

The circular journey of Twitch's development (from a general-interest platform as JustinTV, to videogame exclusive as Twitch, before pivoting back to general-interest) reveals: firstly, the financial success of pairing videogames with easy-to-use, live-streaming functionality; and secondly, the prevailing allure of live content independent of videogames. Senft's (2005) research on camgirls offers a valuable starting point when discussing live online content, drawing parallels with sensation theatre, and identifying the appeal found in immediacy, authenticity and performances of 'the real'. Having discussed the history of the live streaming media form, I will now centre on the social and technological factors that have influenced how people discuss, create, and connect around videogames. Tracing this history alongside the live streaming media form reveals the emergence of social practices pre-Twitch that would go on to influence how individuals produce and consume live-videogame content today.

Let's play: experts, storytellers, and online communities

Videogames have often been portrayed as individual activities that are inherently alienating, with studies and mainstream news outlets highlighting concerns surrounding anti-social and addictive behaviours amongst 'gamers' (Griffiths and Wood 2000; Browne and Hamilton-Giachritsis 2005; Hellström et al. 2012; Dodgson 2018). However, even before the popularisation of online multiplayer gaming, videogames have a well-documented and researched history of sociality not only in terms of 'playing together' but in the form of gaming magazines, fanzines, online guides and reviews, and even word-of-mouth (Newman 2008). The act of playing does not occur in a vacuum but rather, in the words of Newman (2008), is "informed by and situated within the context of other players and their analyses and playing" (Newman 2008, 12). Newman (2008) identifies an important point here, one I will return to later in this thesis, arguing that players, even when participating in a single player game, are

... located within a community-authored set of meanings, readings and interpretations and the collective knowledge of players, commentators, critics and fans alike who have contributed to a very public understanding and valuation of the game through public performances, readings of previews and reviews, for example.

(13)

While the public performances that shape players' understandings of videogames may currently take different forms than they did a decade ago, Newman (2008) sheds light on the highly social and productive activity that surrounds videogames and players, and the creativity inherent within works that modify, transform, adapt and make sense of videogames.

Fans have long been both a creative and social force within gaming, as evidenced by the website *gameFAQs* which, since 1995, has published videogame cheat codes, walkthroughs and reviews online from over 100,000 contributors (Hughes 2017). Walkthroughs, in particular, (i.e. a written step-by-step guide for completing a specific videogame) are

representative of the amount of labour and passion often put into creating these cultural artefacts, with Alex Eagleson's Star Ocean 3 walkthrough, for example, comprising nineteen chapters totalling 383 pages, or approximately 94,400 words (Hughes 2017). As part of their research into what motivates the authors of such texts, Hughes (2017) interviewed six gameFAQs contributors and identified five themes attributable to each participant. These five themes included altruism, community belonging, self-expression and recognition, constituting "a shifting mix of motivations" driving fan labour (Hughes 2017). Although top contributors would often receive some degree of financial compensation from the website, Hughes' (2017) interview participants revealed that money, while a motivator, was never at the core of why people created and shared on gameFAQs. Rather, money was often a cause of friction, with one respondent describing, with distaste, the thought of contributors motivated entirely "by how much money they can get" and another recounting their decision to stop writing for gameFAQs as their motivation to contribute shifted from sociability and challenge to money (Hughes 2017). For the latter respondent, the gift economy that once described gameFAQs was undermined, with labour no longer freely gifted, but rather, profited from. These responses reveal an inherent tension between fan labour and financial compensation, while also highlighting the different community-centred motivations driving gameFAQs contributors.

In 2005, on the forum-based website somethingawful, an early example of what would later be popularly known as 'Let's Plays' (LPs) appeared, published by Mich "Slowbeef' Sawyer (Kapriyelov 2016). This early form of Let's Play (entitled *Let's Play Snatcher*) was similar to the walkthroughs posted on gameFAQs but with a greater emphasis on storytelling and visuals, offering in-depth descriptions of both the game and the author's experience playing it (Kaprivelov 2016). After the LPs positive reception online, Sawyer went on to create a *video* playthrough, which included commentary in the form of subtitles. Sawyer drew comparisons between this form of content and the commentary found on DVD extras (i.e. director's commentary), calling it "player's commentary" (Kaprivelov 2016). While this comparison may have been made arbitrarily, it alludes to a phenomenon at the centre of this research: how both players and games construct the videogame experience. The comparison to director's commentary is interesting because it reveals the player's role in both interpreting and participating in gameplay, and the creative tension that forms between the player's agency and a videogame's affordances. Sawyer's Let's Play format proved successful, contributing to the popularity and growth of LPs and bringing closer to the forefront the stories not only of videogame characters, but of the players themselves.

The same year (2005) that Sawyer's "Let's Play Snatcher" was posted on somethingawful, the video sharing platform Youtube was emerging online and growing in popularity (Fagersten 2017). The success of Sawyer's LP format encouraged several other similar content creators, establishing codes and conventions for the media form and a variety of subgenres or different types of LP across different online platforms. This included *blind* let's plays, which captured the player's first experience of a game, *walkthroughs*, which offered hints and tips for viewers trying to complete a game, and *Scare Cam*, which captured the player's facial reactions via a face cam as they played a horror game (Kapriyelov 2016). Over the course of the next ten years, LPs became one of the most popular subgenres on YouTube, with Let's Play content creators comprising four of the twenty most-subscribed channels on the platform as of 2016 (Kaprivelov 2016). This growth in popularity coincided with the meteoric rise of the YouTuber (i.e. YouTube content creator) *PewDiePie*, who remains a key figure when discussing the culture and practices of videogame content creators today.

PewDiePie, or Felix Arvid Ulf Kjellberg, was credited by the Guinness World Records with having the all-time most subscribed YouTube channel in 2016, totalling over 38.7 million subscribers (Fagersten 2017). This number was soon surpassed, with PewDiePie's subscription numbers rising to over 54 million by April 2017 and now, as of November 2022, over 111 million. (Fagersten 2017; PewDiePie 2022). Beyond subscription numbers, Kjellberg experienced unprecedented financial success for a videogame content creator, drawing the interest and curiosity of press media, with headlines highlighting a perceived disconnect between the content of his videos and the enormous income he generated (Fagersten 2017): "This Guy Makes Millions Playing Video Games on YouTube" (Zoia 2014); "YouTube's Biggest Draw Plays Games, Earns \$4 Million a Year (Grundberg 2014). In the main, PewDiePie's content was not live, but rather recorded in real-time and then edited, he nonetheless proved, undeniably, the mainstream appeal of combining videogames with player commentary. In the present day (2020), it is no longer unusual for videogame content creators to generate enormous wealth and attract the attention of millions online (Gilbert 2020; Maher 2020).

Kjellberg's success as PewDiePie began with the Let's Play sub-genre "Scare Cam" which captured his experiences playing the horror videogame *Amnesia: The Dark Descent* (developed by Frictional Games). The videogame's first-person perspective and dark foreboding environment worked in combination with a particular gameplay mechanic in which exposure to monsters or danger would cause the audio and visual information on display to mimic the effects of 'insanity'. The resulting effect would damage the player and cause their perspective to become blurry while the sound of the character's heartrate and breathing would increase, attempting to further immerse the player in the game's hostile world. The spontaneous commentary performed by Kjellberg (at this stage, audio-only), alongside video footage of Amnesia's gameplay, included him joking, singing, criticising and emotionally reacting to moments of gameplay, as they happened (Fagersten 2017). Kjellberg's focus on the horror videogame genre was an important part of his rise to popularity, and, as Fagersten (2017) argues, may have played a crucial role in the development of the PewDiePie persona.

In particular, when performing commentary as PewDiePie, Kjellberg became known for his swearing, which was often in response to tense in-game situations or borne of the general stress induced by playing a horror videogame (Fagersten 2017). Fagersten (2017) investigated the function swearing served in these streams, broadly categorising the act as either "annoyance swearing" or "social swearing". While annoyance swearing accounted for swearing triggered by stressful situations, social swearing described instances wherein swearing fostered solidarity and interlocutor bonding (Fagersten 2017; Stapleton, 2010). Fagersten (2017, 8) argued that Kjellberg, when performing as PewDiePie, engaged in both, and even in those moments where annoyance swearing was triggered from moments of gameplay, the fact he was talking at all was to connect socially with his viewers. An important distinction is made by Fagersten (2017), claiming "PewDiePie does not swear at his viewers, but *for* them" (8). Following this logic, the act of swearing may be understood to proactively construct a relaxed and comfortable setting for viewers, with language in this instance not merely reflecting the environment, but actively defining it (Fagersten 2017).

PewDiePie offers a valuable case study for interpreting expressive acts like swearing as linguistic tools, capable of forging intimate bonds and friendships between online content creators and their viewers (Fagersten 2017). While his use of male-centric and hetero-normative expletives and language (e.g. the term 'bros' he uses to refer to his viewers or the

mock homosexuality present in much of his humour) would, without doubt, alienate many potential viewers of his content, PewDiePie's ability to cultivate a sense of intimacy and informality has nevertheless been a key part of his success (Fagersten, 2017). From the personal anecdotes and reflections present in walkthroughs on gameFAQs, to the first appearance of a Let's Play on somethingawful, through to the enormous success of LPs on YouTube, a trend may be observed unfolding in which players find novel and creative ways online to express and communicate their experiences in and around videogames. With each platform, new trends evolve alongside the LP format, bringing with them new codes and conventions with which to define the media genre.

While Twitch has continued to dominate the videogame streaming media landscape, this landscape is ever changing with new platforms rising and falling, and high-profile streamers shifting their content and brand as part of platform-exclusive deals. A notable example of this was Ninja's (Tyler Blevins) move from Twitch to Mixer in August 2019. Ninja, the most popular Twitch streamer at the time, left behind over 14 million followers on Twitch as part of an exclusive deal with Mixer – a Microsoft owned streaming platform that was a direct competitor to Twitch (Webb 2019). While Ninja's move from Twitch did see a rise in other streamers broadcasting their content on Mixer, this did not translate to higher viewership on the platform (Webb 2019). Rather, Mixer had a decrease in total viewers in the month following Ninja's move (Webb 2019). This revealed that, although streamers were crucial to a platform's success, it was not simple nor easy to shift audiences from one platform to another. Twitch was, for the vast majority, the home for live videogame content. In this sense, it was preferable, or at least more convenient, for viewers to find another streamer rather than move to another platform. It can be inferred then that Twitch's online community, and the network of social ties the platform is home to, form a key part of its appeal, presenting a challenge for rival platforms competing for users.

Mixer shut down on July 22, 2020, merging its remaining streamers with that of Facebook Gaming (Warren 2020). In the time since, YouTube, Twitch and Facebook Gaming have continued to compete for viewership, with Twitch maintaining its position as the most popular platform for live videogame content (as of January 2022). Although Twitch continues to draw heavily from videogame culture, in terms of both its branding and online user experience, the platform has expanded the scope of its content, broadening its appeal to include live music events, podcasts, sports, cooking and more. While YouTube remains a

main competitor for Twitch, it is regularly used by Twitch streamers as a space for archiving streams, providing interested viewers a way to easily watch them after their initial broadcast. This speaks to Twitch's focus on live content, with YouTube's browsing interface and userbase better facilitating the archiving and viewing of streams. As it stands, Twitch is the predominant platform for live videogame content, with YouTube operating as a space for preservation and archiving, as well as more carefully edited and produced video content. It is important to note that this is likely to change in the future, and that this applies specifically to the videogame-related content on the respective platforms.

As Twitch has become home to an ever-expanding range of content creators, the platform's terms of service (TOS) have become a frequent source of controversy, with many highprofile bans being contested due to inconsistent communication and policing by the Twitch moderating team (Torres 2020; Grayson 2021; Irwin 2021). Although this is not a focus of this thesis, it is worth noting that Twitch's lack of transparency regarding its user guidelines has incited conflict between different groups of content creators on the platform, particularly as it relates to the recent 'hot tub' streamers trend. Hot tub streamers, as the name suggests, are people (usually women) who stream themselves in hot tubs wearing revealing clothing (swimwear), often while playing videogames. Twitch's strict but vague content guidelines, particularly in terms of nudity and attire, and uneven decisions to ban some individuals have contributed to the hostility surrounding this emerging group of streamers. On both sides of this debate, users have highlighted the need for Twitch to both set clearer guidelines and do more to remove harassers from the platform (Grayson 2021). This is just one in a string of controversies that have plagued the Twitch platform and its moderation team. As new streaming practices emerge online, Twitch's TOS and guidelines will likely continue to spark conflict between different categories of user. These events often bring to light the racial and gendered dimensions of harassment and abuse on the platform, which is an issue I will I return in later chapters.

This section highlights the practices that have evolved alongside the live streaming media form, and the efforts of players historically to communicate and express their in-game experiences to others online. Since its launch in 2011, the Twitch platform has been able to effectively appeal to the interests of individuals wishing to broadcast their gameplay to a live audience and establish itself as the main social hub for live videogame content online. However, Twitch's development is the product of both its developers as well its users, with the platform's TOS, content moderation, and interface changing over the years in response to shifting trends, behaviours and criticisms on behalf of its userbase. This process is not without friction between, and amongst, the platform's users and developers, with new and emerging forms of streaming influencing which content is permitted, how it is categorised, and the communities that subsequently form on Twitch.

Live Videogame Streaming and Twitch Content

As already explained, the Twitch platform currently comprises a wide variety of content, encompassing both videogaming and IRL ('in real life') streams. Setting aside IRL streams, that involve cooking, painting, chatting, etc, videogame streams themselves can be classified in a number of ways. Alongside the different videogame genres represented within the platform, a variety of different types of streamer content also exist. This includes let's plays [LPs], speedruns, challenge runs and competitive streams (to name a few). These different content types arise from the particular approach the streamer has to playing a videogame, and their overarching goals and objectives. For example, challenge runs involve the streamer playing a videogame in way that is more difficult than the average or typical playthrough (e.g. using the weakest weapon to pass the videogame, or not 'levelling up'), while Let's Plays typically involve the streamer progressing through the videogame in a more conventional sense while discussing their experience with the live chat. These stream types are highlighted using 'Tags' within the Twitch browse section visible below the title of the stream when spectating. Additionally, tags are also used to describe the genre of the videogame being played, e.g. survival, first-person shooter, etc., placing the two forms of categorisation under the same 'tags' heading. While this allows a degree of freedom for streamers marketing their content, it presents some questions when attempting to describe content structure on the Twitch platform. In particular, how might the relationship between streamer content type and videogame genre be understood? And how useful are these respective categorisations when describing Twitch streams?

In their study on Twitch content structure, Sjoblom et al. (2017) surveyed individuals who regularly watched videogame streams, investigating the relationship user gratification had with individual 'game genres' and 'stream types'. They identified 11 game genres commonly

used to describe videogames by players and gaming journalists, including action, fighting, first-person shooter (FPS), real time strategy (RTS) and massive online battle arena (MOBA) (Sjoblom et al 2017). Different modes of play across these game genres were divided across seven stream types: Competitive, Let's Play, Casual, Speedruns, Talkshows, How to Plays and Reviews. Based on their interview respondents, Sjoblom et al. (2017) claimed that stream type was more important for obtaining affective gratifications than individual game genre. The only exception to this was the RTS (real-time strategy) game genre. RTS streams showed a negative association with affective motivations, attributed to the game genre's information-heavy gameplay and isometric third-person camera perspective. These aspects, Sjoblom et al (2017) argued, potentially restricted the spectator experience, indicating that a minimum level of cinematic feel was required for a videogame to be suitable for live spectating. Overall, the results nevertheless highlighted the importance of structure over content (i.e. stream type over game genre), with Sjoblom et al. (2017) echoing the phrase famously coined by Mcluhan (1964): "the medium is the message".

While Sjoblom et al.'s (2017, 163) research provides a useful benchmark for investigating the role game genre and stream type have in influencing user gratification on Twitch, this thesis will question some of their underlying assumptions, most importantly the idea that:

...as an individual game can be featured in virtually any stream type, it follows that it is the stream type which is the most significant factor that affords the individual user's needs to be gratified.

This thesis will be less quick to dismiss the influence gaming genres, and their affordances, have over the content streamers produce and, by extension, spectators experience. Comparing 'stream type' and 'game genre' to (spectator's) user gratification separately risks diminishing the role videogames and their affordances have in constructing particular experiences for both streamers and their audiences. To examine how gameplay shifts and adapts to a live streaming environment, along with its appeal as a form of spectatorship, it is useful to consider the relationship between stream type and game genre not as independent forms of categorisation, but as two interconnected components.

Sjoblom et al. (2017) allude to the phenomenon by which streamers engage with a videogame's genre as part of creating content, arguing that:

[w]hile game genre could easily be considered important in the sense that spectators might be fans of one or more genre and stick to them, it seems that genres merely serve as a framework upon which the streamer builds their content.

In contrast with Sjoblom et al. (2017), I consider videogames as more than "merely ... a framework", but rather, as having an influential role over how streamers structure their broadcasts, interact with their live audience, and ultimately, develop their online persona. Individual game genres also lend themselves to specific stream types, for example, the 'firstperson shooter' Apex Legends (developed by Respawn) being commonly associated with the 'competitive' tag on Twitch, or the 'action role-playing game' The Witcher 3 with the 'Lets Plays' tag. Additionally, videogames will often become associated with different fan demographics and online communities, informing which videogame streamers decide to play (and not to play). Building on these observations, this thesis posits that streamers and videogames have a mediating effect on each other. Streaming on Twitch involves engaging with a game's genre and affordances via some content template, e.g. Speedruns, Let's Play's, etc, which, alongside the streamer's personality, culminates in producing content on Twitch. This draws into question the process by which streamers decide which game(s) to stream, and the influence different videogames, and their affordances, have over streamers' moment-tomoment performance and, subsequently, the interactions that emerge between them and their audience of live spectators.

Affordances and Videogames

Before continuing my discussion of Twitch and videogame streaming, I will provide an overview of the term affordance, its relationship to game studies and its use within this thesis. The term 'affordance' was first coined within the field of ecological psychology by Gibson (1979) to describe "the set of ways an actor can relate to an object" (Cardona-Rivera and Young 2013, 2). The concept of affordances has since become popular in fields outside of ecological psychology, including anthropology, human-computer interaction (HCI), artificial intelligence (AI) and robotics, and found its way into more general and mainstream uses

(Rambusch & Susi, 2008). As its use has spread, the term's meaning has become a point of contention, encompassing several definitions across different disciplines (Cardona-Rivera and Young 2013). It is therefore important to touch on the history of the term affordance, before outlining the ways in which it will be useful to this thesis.

Gibson's (1979) original theory of affordances argued that people "perceive the environment in terms of its potential for action without significant intermediate stages involving memory or inferences" (Gaver 1991, 1). Affordances referred to the reciprocal relationship between an agent and their environment, describing the "properties of the world that make possible some action to an organism equipped to act in certain ways" (Gaver 1991). Affordances encompassed both the properties of an object as well as the physical, bodily capabilities of the agent or observer. A bench that is knee high for an adult, and thus available as a seat, is more likely to be used as a table by a child (Gibson 1979). Affordances are therefore understood to be as dependent on the physical characteristics of the agent as those of the object (Rambusch & Susi, 2008). Affordances were also considered invariant, with Gibson arguing that

[a]n affordance is not bestowed upon an object by a need of an observer and his act of perceiving it. The object offers what it does because it is what it is.

(cited in Rambusch & Susi 2008, 87)

This marks an important limitation in Gibson's original concept of affordances: the lack of consideration for the influence cognition or sociocultural conventions have on our understandings of objects and by extension their affordances (Rambusch & Susi, 2008). While Gibson (1979, 260) recognised the influence "second-hand knowledge" had on how people use objects, sociocultural aspects were largely left unexplored (Rambusch & Susi, 2008). 2008).

Gaver (1991) expanded on Gibson's (1979) original concept of affordances, considering its application to technology and UI design, and introduced the notion of "exploration" to describe the process in which acting on a perceptible affordance led to information indicating new affordances. Gaver (1991) also considered other senses through which affordances may be perceived (as Gibson focused almost exclusively on what could be seen) (Gaver 1991).

Tactile information was recognised as a rich source of affordances, with Gaver (1991) considering how "force-feedback" joysticks allowed users to physically feel simulations, along with the influence sound had in communicating the results of activating an object within a virtual interface. While Gaver (1991) expanded on Gibson's concept (1979) without much deviation from its underlying principals, other theorists have shifted the term affordance away from Gibson's original understanding, the most notable being Norman's (1988) book *The Design of Everyday Things* (DOET) (1988).

Norman (1988) focused his analysis on the cognitive processes through which people engaged with objects, exploring how the *perceived* and actual properties of a "thing" lead to either success or failure with regards to its use or operation. Since publishing DOET, Norman (1999) has attempted to clarify the use of the term affordance after taking issue with the conflation and misuse of, what he refers to as, *real* affordances and *perceived* affordances (Hartson 2003). While Norman (1999) emphasised the difference between the two terms, other theorists argued the significance and usefulness of the term "perceived affordance" remained unclear, with Hartson (2003, 316) noting that:

...the importance of perceived affordances became somewhat lost, leaving researchers and practitioners in a quandary about how we can legitimately refer to this important usability concept.

Despite his criticisms, Hartson (2003) still defended the usefulness of the affordance concept and provided a rigorous analytical account of its application to HCI. His study, however, culminated with the concept's use as a means for diagnosing usability problems, with the central objective being to improve design in order to "help the user determine correctly how to do something and to avoid errors" (Hartson 2003, 335). While this approach remains relevant to videogames, it does not consider the function affordances have in constructing more complex experiences regarding communicating a narrative and providing a challenge. Rather, Hartson's (2003) approach assumes a favourable action and follows by describing design's role in correctly constructing and communicating affordances to the user so that this favourable action is performed with minimal deviation or error. While this may align with how some developers approach game design, videogames often do not have one, single favourable action, and intentionally impede the user's progress to prompt problem-solving. Although players are typically given a 'tutorial' or base level understanding of a game's mechanics before encountering a challenge, it is their role to adapt their understanding of the rules to the environment through methods of problem solving or trial-and-error. This complicates the user's relationship with the affordances and objectives of a videogame, bringing into question the role cognition plays in negotiating how users engage with videogame affordances and participate in videogame play.

In order to form a theory of affordances applicable to videogames, Cardona-Rivera and Young (2013, 4) approached the concept from a cognitivist standpoint. Drawing on the work of Norman (1999), their theory comprised of three manipulable entities: (1) *real* affordances, referring to player actions that were technically possible in an interactive virtual environment (2) *perceived* affordances, referring to actions the player perceived as possible, and (3) *feedback* encompassing information used within a game to convey *real* affordances to the player so as to elicit an accurate *perceived* affordance (Cardona-Rivera and Young 2013, 4). Cardona-Rivera and Young's (2013) framework is general enough to align with several related theories but precise enough to provide an effective lens for viewing videogames. Given the complexity of videogame design and player experience, as well as this project's aim to consider videogame affordances within the context of the Twitch live streaming platform, this broader framework offers a necessary degree of flexibility to this analysis.

In response to the affordance concept's roots in ecological psychology, Cardona-River and Young (2013, 3) argue that cognition requires consideration when analysing affordances in videogames. Given that some degree of learning must take place within a videogame (i.e. "learning to understand the rules, mechanics and (if applicable) story context of the game in order to traverse it"), players are required to tap into cognitive processes including comprehension, understanding and memory (Cardona-River and Young 2013). While recognising the contribution of ecological psychology to affordance theory, Cardona-Rivera and Young (2013) reject the notion that the environment (digital or not) provides a complete account of agent/player behaviour. Instead, they argue that

exploratory actions seek to clarify perceived affordances, and performatory actions capitalize on a successful mapping between a real and a perceived affordance.

(Cardona-Rivera and Young 2013, 5)

This framework considers, importantly, the possibility of breakdown that may occur when poor feedback results in a real affordance failing to be perceived by a player (Cardona-Rivera and Young 2013). This is an important consideration as a player's ability to perceive and react to real affordances live on stream is part of this thesis' focus. The role of the streamer may be understood in some cases to be that of a videogame guide, whose 'expert' understanding of a particular game and ability to navigate its affordances correctly provides an entry point for those intimidated by its difficulty or vague in-game instructions. On the other hand, there is entertainment to be found in watching a streamer navigate the affordances of a particular game for the first time, often failing and revising their strategy and understanding of the game's affordances to achieve success. These two examples point to the relationship Twitch videogame content shares with a given game's affordances, and the role streamers have in shaping spectator experience on the platform.

Based on Cardona-Rivera and Young's (2013) analysis, affordances within the context of videogames may be understood broadly as the opportunities for action afforded by the videogame to the player, and the player's relationship to those actions. These actions are borne of the design and limitations of a particular videogame and its respective hardware and are deeply connected to other existing videogame concepts such as *emergence*, *challenge*, *narrative* and *gameplay* more generally (Brandse 2017; Linderoth 2011). Importantly, the affordance concept should not be understood as deterministic or binary, but rather as an approach for understanding *"how* objects shape action for socially situated subjects" (Davis 2020, 7). This approach extends to analysing platforms as well as videogames, with the former becoming a greater focus in chapters 4 and 5. In the case of both videogame and platform analysis, Davis' (2020) understanding and underlying approach to affordance theory will serve as this thesis' foundation. This approach, i.e. the mechanism and conditions framework, considers *how* technologies afford (mechanism) and the context in which they are situated (conditions). The 'mechanism' side of this approach appreciates the tensions between human-technology relations, examining the way

...technologies request, demand, encourage, discourage, refuse, and allow particular lines of action and social dynamics.

(Davis 2020, 11)

This is paired with the second component, conditions, which examines the "relational nature of human-technology encounters" and situates technologies within a specific context. Together, these components offer a valuable lens for investigating *how* technologies, such videogames, afford certain actions, and how these actions and their meanings shift within the context of Twitch and live streaming more generally.

Both Davis (2020) and Cardona-Rivera and Young (2013) offer a valuable foundation through which to apply the affordance concept to a videogame context. The usefulness of the affordance concept lies in its emphasis on the relationship between both the player and the videogame; users and technology. This framework is helpful when considering the different player experiences videogames produce, and how these experiences then feed into the creation of content on Twitch. However, to consider more closely the relationships between streamers and the videogames they play on Twitch, it is useful to consider streamers, first, as players, drawing on studies that investigate the player-videogame relationship that emerges during private play sessions.

The Construction of the Player, the Performance of the Streamer

While a range of studies exist that explore the player-videogame relationship, little work has been done to connect this research to the emerging field that surrounds live videogame streaming. Studies exploring live videogame streaming on Twitch tend to centre around the motivations behind why individuals watch and participate in live streams, the growth of 'e-sports', and the viewing and communicative practices of the platform's users (Cheung and Huang 2011; Recktenwald 2017; Sjoblom et al. 2017). To examine the influence videogames have over the live performances of Twitch streamers, this thesis will consider the streamer initially through the lens of being a player. Starting with the construction of the player in a more traditional sense (i.e. private play sessions), this thesis will then move to examine how the player-videogame relationship changes when shifting to a live streaming environment. The goal of this approach is to further understand the relationship that exists between videogames and streamers, while examining streamers' dual role of both player and performer.

In *A Play of Bodies: How We Perceive Videogames* Keogh (2018) pairs post-structuralist and feminist theory to explore the dynamic and socially embedded nature of embodied experience in videogames, arguing that:

...the player cannot be considered before or distinct from the videogame but instead reflexively as producing the videogame experience that in turn produces the player. Images, sounds input devices, the affordances and restrictions of the playable character's body, the social context of play, cultivated tastes, and the player's competency with the videogame influence and alter the incorporation of the videogame into the player's embodied experience no less than the player's embodied experience alters the videogame with each moment of play (27-28).

Keogh (2018) distances himself from traditional conceptions of the 'self' as stable and persistent and forms a conceptual framework that considers the relationship between the player and videogame as that of a *cybernetic circuit*. Rather than begin with the experience of the player's body, Keogh (2018, 28) focuses instead on the "experience through which the player's amalgam embodiment in and as part of the videogame emerges". The phrase "a play of bodies" is used to describe the double world in which the player exists, where enacting and interpreting operate as a singular function across actual and virtual spaces (Keogh 2018, 48). Keogh's (2018) discussion of videogame play as a circuit offers a useful entry point for exploring the 'streamer-videogame' relationship. The term 'cybernetic circuit' describes videogame play as a "feedback loop of information and agency that flows between the machine and the player", accounting for the effect both the videogame and player have in mediating the other (Keogh 2018, 40). While this framework is immediately complicated with the inclusion of a live audience and chat participants (who in some instances may even directly influence elements of gameplay), it appreciates the tensions and complexities of videogame play in which both player and videogame intersect (Keogh 2018).

Vahlo (2017), similarly to Keogh (2018), avoids centring his analysis primarily on either the player or the game, employing an enactivist approach that conceptualises gameplay as a form of social participation. While Vahlo (2017) notes that videogames remain heteronomous systems, unable to produce meanings in and of themselves, they are nevertheless

"approachable in ways that echo the dynamic patterns of social interaction with an autonomous other". Building on this concept, Vahlo (2017) applies the process of coordination and exploration (as understood in participatory sense-making) to describe how the player regulates their coupling with a given videogame:

Through coordination, the player regulates her coupling with the game through processes such as synchronization, anticipation, mirroring, or imitation (see Semin and Cacioppo, 2009, p. 114) in order to achieve the accord needed for producing an effect. Exploration, however, can be interpreted as the counterpart for the rules of the game: Rules of the game restrict and enable gameplay, but exploration is the element of the player's creativity to traverse and test, bend, and even break the rules.

Vahlo's (2017) application of the terms coordination and exploration are tied, in varying degrees, to a videogame's challenge and narrative. Coordination is more immediately connected to a game's challenge, involving spatial and logical problem solving, coordinating fine motor skills, strategic decision making and adjusting oneself to the rhythm of gameplay (Vahlo 2017). Exploration involves an element of randomness and is less connected to explicit game objectives. This includes elements within videogames that include character customisation, role-playing, an extensive gameworld or a complex/esoteric story (Vahlo 2017). While neither coordination nor exploration fit neatly within these categories, Vahlo's (2017) use of these concepts are helpful for analysing the relationship that unfolds between a given game and streamer, considering not only the properties of the game that influence player experience, but the role the player has in reflexively producing, participating in and performing gameplay.

Vahlo (2017) considers playing a single-player videogame as a profoundly social act, with videogames responding to the player's communicative acts, evaluating and praising them, and providing consistent, reliable and clear information. Building on this notion, Vahlo (2017) argues that:

Playing a videogame is a practice of re-encountering the other "participant", i.e., the game system. The person must also metaregulate herself and her own sense-

making as she encounters in-game situations that require self-reflection (e.g., strategic planning or decisive dialogues).

Vahlo (2017) highlights a key aspect of gameplay, the process by which the player continuously regulates themselves in response to in-game situations, which then prompt moments of self-reflection. This dynamic is a key aspect of live-videogame streaming, with spectators observing a relationship unfold between the streamer, i.e. the player, and the game via the live visual feed and voice-over commentary. The performative elements of role-playing, storytelling and spatial and logical problem solving typical of gameplay are emphasised, enhanced and/or dramatized within a live streaming context. Streamers' often speak aloud their thought process when problem-solving, describe their moment-to-moment opinions on the videogame being played, and react emotionally to their successes and failures. The inclusion of an audience and live message chat allows the streamer to then incorporate the thoughts, opinions and suggestions of others into this process, as well as orchestrate situations in-game that are likely to generate a heightened response from their audience (Hamilton, Garretson and Kerne 2014).

Challenge and difficulty are key aspects both to the enjoyment of playing videogames, as well as spectating them. Within game studies, both terms are closely linked to Csikszentmihalyi's (1991) work on flow theory and the concept's later application to game studies by Sweetser and Wyeth (2005). Flow is defined as an experience "so gratifying that people are willing to do it for its own sake" emphasising two key elements when applied to videogaming: firstly, that a game must be self-rewarding (i.e. no external reward) and secondly, that the player must enjoy the "level" of challenge (Sweetser and Wyeth 2005, 3). Building on this notion, Sweetser and Wyeth (2005) argue that the level of challenge in games should be designed so that they aren't too challenging for the player, resulting in anxiety, nor too easy so that they become boring. While flow theory does not accurately apply to a live-streaming setting (as it inherently carries some reward external to playing a videogame), the concept is useful in revealing some clear differences between the act of playing privately and streaming to an audience.

Firstly, for an individual to decide to stream themselves playing a videogame there must be some additional motivation for doing so beyond playing the game, e.g. a financial and/or social incentive. Although this contradicts the first element of a flow state, streamers are

regularly observed entering moments in which they appear immersed by a videogame's challenge, with their attention concentrated on the game. Secondly, while a streamer may be observed entering a state of flow on stream, in which the streamer is immersed, challenged, and enjoying a game with little distraction, this state is routinely disrupted. This disruption is a key aspect of live-videogame streams and takes the form of certain conventions typical of media form, e.g. alert notifications for new subscribers, bit donations and the live message chat. Thirdly, although spectating a streamer playing a videogame in a state of flow may be entertaining, disruption of this may be equally, if not more, entertaining for audience members. Examples of this may include a streamer pausing to discuss a game's design or story, encountering a glitch or game-breaking bug, responding to a personal question in chat or experiencing anger or frustration at a game's difficulty. It also common for streamers to use time in which they are playing a 'boring' segment of a game to interact with their audience, prompt discussion or reflect. In this sense, the 'flow state' may be understood as but one of several aspects of a streamer's performance. In terms of a videogame's challenge and/or difficulty, on either side of the flow state (boredom and anxiety) streamers find opportunities to engage their audience, revealing that player enjoyment does not necessarily equate to an entertaining stream.

As already noted, E-sports are a large part of both the videogame culture that surrounds Twitch and the platform's success. While this thesis is not concerned with e-sports events as such, the live-streaming of competitive multiplayer games remains a key factor, specifically the performance of 'challenge'. Many of the biggest streamers on Twitch (e.g. XQC; Dr. Disrespect; Ninja) are known and celebrated for their videogame skills and abilities, alongside their achievements in the competitive videogame scene. Spectating streamers of this level is akin to watching a virtuosic piano performance in so much as the precision and skill on display holds a high degree of entertainment value in and of itself. While it is typical for high-profile streamers to 'play up' their personality or perform a character (e.g. Dr. Disrespect's 80s action-hero inspired, mullet-wig wearing persona), these videogame streams are typically designed and orientated around high-level competitive play moments, which focus on the abilities of the streamer and the challenges posed by the game and other competitors. Alongside the skills on display via the live gameplay feed, the streamer's emotional state will often share centre stage. Through the combined acts of both participating in the live chat and viewing via the live gameplay feed, spectators may then share in the emotional highs and lows of the streamer (Hamilton, Garretson and Kerne 2014).

While competitive multiplayer videogames typically centre around the skill of the player, others offer elaborate stories, worlds and virtual environments in which to role-play, socialise, explore and problem-solve. Vahlo's concept of exploration segues neatly into the notion of 'exploratory play', a term used within game studies to denote a form of play most synonymous with the simulation and sandbox genre of videogames. In their review of the literature surrounding the term exploratory play, Tornqvist (2014, 80) summarises the concept by describing it as:

an activity that is intrinsically motivated, driven by curiosity and competence, is enjoyable, voluntary, and involves attending to the informational feedback produced by impulsively manipulating the subject/s of interest in a systematic but non-routine, non-repeating sequence of new and different manipulations, in the absence of any well-defined ultimate goal for the activity (though immediate and intermediate goals may be present).

This definition highlights the feedback loop of gameplay, wherein the player performs an ingame action eliciting information from the videogame regarding its impact, modifying the player's understanding of the game and, in turn, influencing their future actions (Tornqvist 2014). This is a process present within all videogames, to varying extents, however simulation and sandbox games are predicated on the notion that players inhabit a complex, responsive world of interconnected systems, whereby curiosity is rewarded with valuable knowledge regarding how said systems respond to the player and interact with one another. Given the enormous success of this genre of games on Twitch, exploratory play is a useful concept for describing the types of gameplay present in titles such as *Minecraft* (developed by Mojang), The Sims (developed by Maxis), Dreams (developed by Media Molecule) and *Rimworld* (developed by Ludeon Studios). Furthermore, the notion of exploratory play can be applied a videogame's narrative, particularly for titles where the story is intentionally esoteric and/or disjointed. This form of videogame story-telling can encourage groups of players online to collaborate and compare findings as part of understanding and interpreting a videogame's story and broader lore. Additionally, streamers often tailor their content to these types of videogames, using their curiosity and exploration of a videogame's narrative and/or systems to drive their Twitch streams.

Finally, a term that is useful in bridging the gap between the field of game studies and that of internet and media studies, is the concept of 'tandem play', a term used to describe two or more players engaged with a 'single-player' game, "moving through the game with a variety of potential motives" (Consalvo 2017, 84). While tandem play isn't a new phenomenon, Twitch provides a different environment in which to theorise and apply the concept (Consalvo 2017). Given that Twitch videogame streams typically involve a group of spectators observing a single player engage in gameplay, tandem play provides a useful framework for exploring the appeal of Twitch streams and the social dynamics that emerge around them. While investigating how videogame streamers handled failure, Consalvo (2017) identified a number of different strategies regarding how they reacted towards the game and the live chat participants. The performance of 'failure' was observed to be highly contextualised, depending largely on the type of stream (speedrun, let's play, etc), the personality of the streamer and the game being played (Consalvo 2017). In particular, the physical and vocal performance of the streamer in reaction to failure within a videogame was examined, with Consalvo (2017, 86-87) identifying that:

...all games offer and all players experience failure, at least some of the time. How streamers manage that failure – by making it entertaining, gritting their teeth, and dealing with it, using it to boost their brand; or overcoming it; and how their various communities respond to those failure are a few of the questions being studied.

Consalvo's (2017) line of inquiry follows a similar path to that of this thesis, questioning the relationship streamers share with in-game factors such as failure, and the influence this may have over streamer performances and interactions with the live chat. However, this thesis intends to observe more closely the role streamers have in mediating gameplay for spectators through their engagement with a particular game's affordances. As such, this thesis will extend its analysis beyond failure as a shared experience among streamers, investigating instead how *different* forms of failure (as well as other player experiences) occur within different *types* of streams, and via different game affordances.

Returning to Gandolfi (2016), if videogame affordances are understood as parameters that spectators take into account and streamers exploit as part of their content, how might they

influence or structure the relationships between streamer and videogame, spectator and videogame, streamer and spectator? Keogh (2018) provides an effective theoretical grounding for investigating these interconnected relationships, however, his analysis centres primarily around single-player videogames and the relationships that emerge between the player's body, and a videogame's hardware and software. Nevertheless, we can begin with Keogh's (2018) conceptualisation of the player-videogame relationship and expand upon it, developing a framework for examining streamer performances 'both sides of the glass', i.e. both in and outside the gameworld. This begins with Keogh's (2018) position that to participate in gameplay is "both to perform and consume, both to act and spectate, both to experience and interpret". This description of gameplay effectively outlines the streamer's dual role, wherein they participate in and enact gameplay while simultaneously reacting, interpreting and conveying their thoughts to a live audience. Additionally, this understanding helps when examining spectatorship on the Twitch platform, with users simultaneously spectating and acting, consuming and performing, through their engagement with the live message chat. While what spectators experience is not gameplay in the same bodily sense as the streamer, they may become cybernetically bound to the streamer's videogame experience through their engagement with the Twitch interface.

Twitch Users: Spectators and Streamers

As live streaming content has grown and expanded over the past decade, studies have investigated the different types of spectatorship present across Twitch and other live streaming platforms, along with the different motivations that guide users' viewing habits (Sjoblom and Hamari 2017; Taylor 2018; Holin, Chuen-Tsai and Ming-Chung 2019). Hamilton, Garretson and Kerne's 2014 study highlighted the social component of Twitch spectatorship, referring to Twitch streams as "participatory communities", arguing that sociability was the primary activity of Twitch users. Drawing on the work of Oldenburg (1997), the concept of *third places* was used to describe the social environment provided by Twitch streams (Hamilton, Garretson and Kerne 2014, 1316). Third places, as originally defined by Oldenburg (1997, 19), refer to "public places that host the regular, voluntary, informal and happily anticipated gatherings of individuals beyond the realms of home and work". The third spaces observed by Oldenburg, i.e. cafes, coffee shops and bars, and their

inherent social dynamics provided the framework for Hamilton, Garretson and Kerne (2014) to analyse the social environment afforded in Twitch streams.

The importance of a shared history was observed in the interview responses gathered by Hamilton, Garretson and Kerne (2014), with respondents reflecting on ephemeral in-game events. The function of videogames in creating these events was examined, drawing on McLuhan's (1964) concept of 'hot' and 'cool' media to describe the hybrid form of media that is live streaming. The terms hot and cool each refer to a medium's fidelity: cool media exhibiting lower fidelity and affording greater participation (active) and hot media exhibiting higher fidelity and affording viewership (passive) (Hamilton, Garretson and Kerne 2014). Participation in live streams is most directly afforded by the cool medium of the internet relay chat (IRC), i.e. the live chat (Hamilton, Garretson and Kerne 2014). Simultaneously, the hot medium of live gameplay footage facilitates the viewership of "rich experiences of play" (Hamilton, Garretson and Kerne 2014, 1318). When asked about their favourite moments on stream, respondents described events within the game being played that were unusual or unexpected, with the experience being twofold: firstly, the moment of witnessing something surprising; and secondly, the moment in which the "chat goes crazy" (Hamilton, Garretson and Kerne 2014, 1321). Videogames within this context played an interesting role, with Hamilton, Garretson and Kerne (2014, 1321) observing that "unique ephemeral events happen relatively frequently, and can be specifically created by a streamer". This combination of both hot and cool media allows viewers to both spectate and participate in a shared history of intense game experiences, leading members to form an emotional connection with the streamer and their community (Hamilton, Garretson and Kerne 2014).

Later studies have focused on the viewing practices of Twitch audience members, revealing habits that have emerged around viewing and engaging with the platform (Spilker, Ask and Hansen 2018). Through a series of in-depth interviews, Spilker, Ask and Hansen (2018) observed that Twitch users regularly engage in "switching", identifying two forms, spatial and affective. *Spatial* switching refers to Twitch users' tendency to move between small and large channels and audiences, whereas *affective* switching refers to their tendency to move between passive and active states of attention and engagement (Spilker, Ask and Hansen 2018, 13). In the case of spatial switching, informants were observed to run several streams at the same time, with different streams catering to different user motivations:

The possibility of switching spaces, from streaming with friends to watching eSport world tournaments, which was made possible by the huge assortment of streaming channels, formed an important part of the platform's attraction. This means that while it is both linear and live, it is never singular or homogeneous – and is consequently flexible in what kind of viewing experiences it supports. (Spilker, Ask and Hansen 2018, 8).

Spilker, Ask and Hansen's (2018) research reveals the dynamic nature of Twitch use, with respondents frequently switching between streams, of different audiences and sizes, to match the interests, needs and/or mood they desire. This coincides with the second form of switching, affective, which describes how users change (often frequently) between active and passive user roles.

When shifting their attention to and away from the Twitch platform, informants developed practices for recognising moments of potential interest (Spilker, Ask and Hansen 2018). An understanding of in-game elements such as score, players-left, or the sound of gunfire or conversation would help users recognise such moments, inviting their attention with the possibility of entertainment (Spilker, Ask and Hansen 2018). Twitch viewership, therefore, consisted not only of switching between different channels, of different sizes and content forms, but switching between different states of attention and engagement, with Twitch fluctuating between "a background medium" and "the main text" (Spilker, Ask and Hansen 2018, 10). A central point made by Spilker, Ask and Hansen (2018, 12) was that "Twitch is not a passive, push, eat-what-you-get liveness, but an active pull, what's-on-the-menu liveness" that catered to users' often unstable engagement and attention.

The terms spatial and affective switching address the dynamic range of viewing experiences supported by Twitch while also capturing audience members' agency in terms of when and where they chose to focus their attention. Additionally, it also identifies the pull of videogames, acting as possibilities for excitement and entertainment for spectators, informing how and when they focus their attention during a given stream. While the term "stream" carries with it a sense of linear and live entertainment akin to traditional television broadcasts, Spilker, Ask and Hansen (2018) reveal the competing influences that circulate the act of spectating a Twitch stream, with individuals deciding moment-to-moment what and when to spectate, with factors such as audience size, videogame genre, other spectators'

involvement, and the streamers personality informing their decision. Meaningful moments, small and large, can develop on the basis of all of these things, accommodating the flexible, "what's-on-the-menu liveness" that categorises spectatorship on the Twitch platform.

Moving now to the types of spectators present on the platform, Holin, Chuen-Tsai and Ming-Chung (2017) argue that researchers tend to perceive the identity of Twitch audience members as that of a gamer, or videogame player, and as a result, describe all viewer motivations as game-related. This led Holin, Chuen-Tsai and Ming-Chung (2017, 12) to conclude:

While a specific game might be important in terms of streaming consumption, its meaning is not limited to its content or the implications of playing experiences for other gamers. It can also provide material for casual interactions with online strangers or real-life friends. Streamer roles are equally diverse: at different times they serve as providers of game information, as exhibitors of special techniques, as entertainers, as micro-celebrities, or as product testers.

Holin, Chuen-Tsai and Ming-Chung (2017) examine the role both streamers and games have in producing experiences that aren't immediately tied to the activity of playing a videogame. While the 'gamer' identity is prevalent within Twitch and live videogame streaming, acknowledging the presence of other identities allows new observations around media consumption and viewership to emerge.

Holin, Chuen-Tsai and Ming-Chung (2017) identified four types of viewers based on the functions provided by stream spectatorship. The first was *play-centred*, referring to viewers who regarded videogame streaming as an extension of gameplay and used live streams in a similar way to online walkthroughs and strategy guides (Holin, Chuen-Tsai and Ming-Chung 2017). In this instance the main motivation for spectating was to learn more about a videogame, and/or become a more competent player. The second viewer type, *fan-based*, referred to viewers for whom the main draw of videogame streams wasn't the gameplay, but rather the storyline (particularly in instances where the videogame is a multi-medium franchise) or the admiration or adulation of the streamer (Holin, Chuen-Tsai and Ming-Chung 2017). The third viewer type, *as vicarious audience play* referred to viewers who use videogame streams as an alternative to playing videogames themselves due to financial or

time constraints, being intimidated by a game or a lack of motivation or perceived skill level (Holin, Chuen-Tsai and Ming-Chung 2017). Vicarious audience play also included instances of "crowd sourced play" where the steamer's in-game decisions were heavily influenced by the live message chat, effectively making chat members participants in gameplay (Scully-Blaker et al 2017; Holin, Chuen-Tsai and Ming-Chung 2017). The final viewer type, *as background media usage*, referred to viewers who spectated streams regularly in multitasking contexts, with streams "playing in the background and receiving sporadic attention from viewers" (Holin, Chuen-Tsai and Ming-Chung 2017, 7). Holin, Chuen-Tsai and Ming-Chung 2017, 7) noted that although each viewer type had its own distinct characteristics, they were not mutually exclusive or fixed.

Holin, Chuen-Tsai and Ming-Chung's (27) four viewer-types reveal the different forms of engagement Twitch appeals to and supports, and highlights live videogame content's role beyond that of supplementing private videogame play-sessions. Fan-based viewership described instances in which streams were watched and enjoyed for the game's storyline over the gameplay itself. This brings into question how streamers might engage with the narrative elements of a videogame as part of their live performance and interactions with their audience. Additionally, this type encompassed viewers who were drawn by the personality of the streamer, with both fan types sharing an interest in videogame streams for reasons outside playing, or enjoying, a particular videogame title.

Vicarious audience play, on the other hand, described instances in which gameplay was the central draw, with spectators participating in a form of vicarious play (the degree to which this simulates a player experience however, as opposed to providing an entirely different spectator one, is difficult to determine). Finally, the viewers observed using streams 'as background media usage' align with Spilker, Ask and Hansen's (2018) concept of affective switching, again bringing attention to the movement between passive and active user roles among Twitch users. Collectively, these different 'viewer types' highlight the range of user experiences on the platform and the videogame text's shifting role within live streams in relation to both the streamer and their audience members. Later in thesis, as I begin drawing on the streamer interviews, these categories of spectator help to elucidate the approaches different streamers have to engaging their audience, and the different spectator motivations they accommodate and appeal to as part of their live streaming practice.

Having considered the different forms of viewership and spectators present across live videogame streams, I will now examine more closely the different types of streamer. In their study on Twitch gaming culture, Gandolfi (2016) traced out three streamer orientations across the platform. The first of these was 'the challenge", or "the professional", which referred to streamers of competitive games who relied on their ability to master the traits of a game to capture an audience's attention. For these streamers, the videogame "was the core reference in determining the effectiveness of the spectacle" (Gandolfi 2016, 77), with streams planned and organised around specific game situations (e.g. high-level competitive play). The second streamer orientation was "the exhibition", or "the hedonist", whose content was largely dependent on the personal abilities of the streamer to entertain rather than the game itself (Gandolfi 2016). These streamers would rely more on improvisation over planning and exhibit a larger degree of interaction with the live chat than the above mentioned professional. In this case, challenging games along with the skill of the streamer were not typically the focus. The third and final orientation was "the exchange", or "the companion", where the social dimension of streaming is highlighted and drives the streamer's content (Gandolfi 2016). In these streams, the streamer is particularly reactive to their spectators, building a bond beyond the game on screen and engaging in discussions that, while often inspired by the live gameplay on display, covered a range of topics beyond that of videogames (Gandolfi 2016).

Gandolfi's (2016) research brings to focus how affordances within videogames, in conjunction with streamer agency, may be understood to influence Twitch content, arguing that

...affordances in digital games are parameters that twitchers [Twitch streamers] ponder and exploit in their shows and spectators take into account when watching and participating (Gandolfi 2016, 5).

A line of influence can be traced between a game's affordances and the experience of spectating that game via a Twitch live stream. However, the streamer plays an influential role in mediating the spectator's experience. The gameplay that spectators observe is not their own, and therefore their experience with the game's mechanics and narrative is mediated through another player, i.e. the streamer. When discussing this process Gandolfi (2016, 68) describes live videogame streaming as a "reverse remediation in which video games return to

be "only video" for spectators" with the streamer (or "performer") extending the "show and social dimensions of the original product beyond private game sessions". While this thesis does not entirely disagree with Gandolfi's (2016) interpretation, the phrase "only video for spectators" risks equating the experience of spectating live videogame streams to that of spectating any other form of video. While, technically, the videogame product assumes the form of video, its relationship with other forms of media (e.g. gaming software and devices, the IRC chat and other social media platforms) reveals a wide range of practices that do not always align with more traditional concepts of viewership. This is an area I return to in subsequent chapters when conceptualising the relationship between spectators and Twitch content, in particular, the participatory role spectators have in influencing the content of a given live stream.

Another important aspect to streaming is the affective labour involved in being responsive to a live audience and building an online community. In their study exploring the affective dimensions of videogame streaming labour, Woodcock and Johnson (2019) examined whether streamers performed as a "character" or as "themselves" while broadcasting on Twitch. They began by drawing on Hochschild's (2012) notion of emotional labour, describing the requirement to "induce or suppress feeling in order to sustain the outward countenance that produces the proper state of mind in others" (7). In the context of live videogame streaming this is taken a step further, with affective labour describing "efforts designed to generate emotional responses" (Woodcock and Johnson 2019, 4). Twitch provides three main ways for streamers to engage their audience during a live stream: the live gameplay feed, the streamer's face-cam and/or voice narration, and the live message chat. Through these facets of interaction, the streamer decides how to perform in order to draw an audience (Woodcock and Johnson 2019). Through interviewing streamers, Woodcock and Johnson (2019) found that some streamers considered humour to be their main way of attracting viewers while others relied on broader concepts when describing their appeal, with one respondent describing their personality, commentary and reaction to things as central to attracting their audience. There was no single approach to success on Twitch, with streamers changing the way they acted "according to game context, viewers, and time of day" and modulating "their performance for both current and potential viewers" (Woodcock and Johnson 2019, 5). This lead Woodcock and Johnson (2019) to explore the notion of streaming in *character*, revealing a spectrum of performances from streamers acting out a more

animated version of themselves to streamers constructing separate characters, for example, a pirate persona.

Woodcock and Johnson's (2019) respondents revealed that streaming required either "turning on your personality or turning on a character". In order to keep viewers engaged, streamers were extremely active, minimising "down time" that might disinterest viewers and constantly giving their audience something to "look at, respond to, or comment on" (Woodcock and Johnson 2019, 7). While for some this meant playing a more extroverted, animated version of themselves, others extended this to include an element of theatricality by performing the role of a character while streaming (Woodcock and Johnson 2019). Woodcock and Johnson (2019) posit that streaming in character may be a helpful means to separating off-stream and on-stream life, allowing streamers a degree of control as to when and where they perform their emotional labour. The primary goal of such efforts, however, is to evoke emotion or feeling amongst their audience members. Importantly, this article addresses the amount of affective labour that goes into creating streams that, to the average viewer, may appear simply as casual game sessions (Woodcock and Johnson 2019). While Woodcock and Johnson's (2019) investigation of affective labour within videogame streams reveals the importance of the streamer's personality and their interactions with the live chat, this thesis investigates the performance of gameplay more closely, and the videogame's role alongside the streamer in drawing an audience's attention. This approach understands gameplay not only as a measure of skill and knowledge, but as a form of live performance through which streamers find creative expression and form relationships with their audience.

Engaging and Managing Twitch Audiences

Twitch streamers will often "wear multiple hats", and "are responsible for conceptualising, writing, producing, directing, editing, and performing their content" while cultivating audience engagement across several online platforms (Wohn and Freeman 2020, 106). This typically involves regularly updating and maintaining various social media profiles, e.g. Twitter and reddit, and uploading edited and curated forms of their Twitch content to YouTube. However, the primary form of their audience engagement will usually occur during a Twitch stream, where streamers must balance their attention across their performance of gameplay, their commentary and the interactions that emerge via the live message chat.

Wohn and Freeman's (2020) research revealed a range of methods streamer would employ to manage interactions with different audience members while live on Twitch which depended on the streamer and, in particular, the size of their channel. While larger streamers tended to speak more generally to avoid engaging with any specific individual spectator, smaller streamers would employ a "brute force method to engage with all", going as far as to take breaks from streaming content to instead read and respond to all messages in the live chat (Wohn and Freeman 2020, 113).

While live, streamers regularly balance competing expectations across individuals in their general audience while maintaining varying standards for what is considered acceptable within the streaming environment they promote and uphold (Wohn and Freeman 2020). This involves moderating the topics of discussion, kinds of humour and jokes permitted within the live chat, which can draw the attention of Twitch admin and staff capable of enforcing the platform's community guidelines (Johnson 2022). While this thesis focuses on smaller streamers on the platform, less likely to attract the attention of Twitch's moderators, navigating and managing offensive or uncomfortable topics in the live chat is something experienced broadly by streamers of all sizes. As noted above, humour is often a key part of maintaining an engaging stream on Twitch and fostering meaningful connections between streamers and their audience (Woodcock and Johnson 2019). However, humour is subjective, and can often be offensive and exclusionary, and therefore presents a further challenge for streamers attempting to broaden their community without causing conflict or misunderstanding between themselves and their audience members and infringing on Twitch's terms of service (TOS).

Johnson's (2022) account of humour on Twitch considers its nature and role on the platform, along with its relationship to play. A common expression of humour on the platform takes the form of *emotes*, small images posted by spectators in the live chat that typically reference a particular emotion, disposition or commonly understood event, either specific to a particular streaming community, or by Twitch users more broadly. While these emotes will be discussed in more detail later in this thesis, it is important to note that they often convey feelings difficult to interpret through text alone, and aid viewers attempting to follow especially active live chats, where the speed in which messages are sent can make them difficult to read and follow (Lybrand 2019, 6). They are also key to the formation of in-jokes

and community-shared references and are crucial to the appeal of spectating on Twitch, often evoking reactions from the streamer and influencing the mood and tone of a stream.

While some emotes, such as the *Kappa* emote used to denote sarcasm/trolling or the *LUL* emote used to communicate hearty laughter, maintain a rather stable and ubiquitous meaning across channels on the platform, others can be more controversial and carry different and competing interpretations. An example of this is highlighted by Grayson (2019) in which the *TriHard* emote, which depicts a popular black streamer, was used to openly mock and stereotype black people, leading many streamers to ban its use on their channels (Johnson 2022). As Johnson (2022, 6) posits, this reveals that emotes

not only move beyond their intended uses as a result of how users deploy them, but can also be entangled with offline or 'real-world' issues, personalities and controversies, all of which complicate their use as sources of amusement.

While humour remains a key element to engaging and connecting with audiences, Johnson's (2022) point highlights its relationship to 'real-world' issues, including racism and sexism, and the forms of online toxicity that can manifest on social media platforms such as Twitch.

It is also important to address the gendered dimensions harassment takes on Twitch, and the issues and 'controversies' that often surround the presence of women on the platform. Ruberg (2020) brings to light how cultural logics give rise to double standards in how nudity and ways of presenting the body are understood in Twitch's community guidelines and TOS. What counts as sexual content on Twitch is not clearly defined and open to interpretation depending on the platform's goals, with the platform's community guidelines including a list of factors used to determine whether something qualifies as 'sexual content'. As Ruberg (2020, 9-10) argues:

How a streamer frames a shot, what kinds of metadata they use, and even what emotes they make available to their viewers can all influence whether their content is deemed sexually suggestive...These guidelines for assessing sexually suggestive content reveal the (by nature hidden) labor that is demanded of streamers who must work to distance themselves and their streams from associations with sexual content. Regardless of their performance or appearance, a woman streamer is likely to receive sexual comments from viewers...If she does not have the resources to quickly remove these comments... she herself could be reprimanded by Twitch's higher level moderators.

Here, Ruberg (2020) illustrates how discrimination operates at a systemic level, while also highlighting the forms of gender-based harassment common among Twitch's userbase, including frequent comments that undermine women's legitimacy on the platform as well sexually charged messages about their bodies. This is an area I return to in chapter 5, revisiting Ruberg (2019; 2020; 2021) while analysing and discussing this thesis' interview responses.

The points outlined in this section are important to understanding the broader social and cultural context within which live streaming is situated today. Regardless of channel size, streaming on Twitch requires engaging with Twitch's community guidelines and its broader userbase, and it is important to note the identities and behaviours that are normalised, as well as those that are challenged, censored, or punished. From here, I will examine more closely Twitch's TOS and the user qualities the platform encourages and promotes, considering the language used in its community guidelines and the types of content normalised on the platform.

Platform Politics and The Twitch Script

Although Twitch is home to a dynamic range of videogame and non-videogame related livestreams, the platform is by no means a neutral, apolitical vehicle for content (Ask, Spilker and Hansen 2019). Ask, Spilker and Hansen (2019) define the relationship between the Twitch platform and its users as "one of push and pull, where both technical features and community practices are the subject of change". As already explained, Twitch shifted from a once general interest, 'life-casting' online platform (JustinTV) to a videogame-only platform (Twitch) following its acquisition by Amazon, before returning to accommodate, once again, general interest content (Ask, Spilker and Hansen 2019). This messy development trajectory consisted of many incremental changes, in which emergent practices amongst users were integrated into the platform, with both "creative and unruly users" influencing the addition of new features and content (Ask, Spilker and Hansen 2019). To explore this phenomenon, Ask, Spilker and Hansen (2019) drew on the concept of script analysis as understood by Akrich (1992) to elucidate how technology positions itself in relation to potential and actual users. According to Akrich (1992), all technologies hold a script, directing the way in which users engage with said technology. Building on this notion, Ask, Spilker and Hansen (2019) coined the term 'co-script' to describe new forms of dependency between producers and users, and the intertwined nature in which Twitch users influence the platform's designers, and vice versa. This understanding is useful for examining the various factors streamers consider and negotiate as part of their streaming practice, and how the platform itself conditions certain ways of playing and interacting on the platform.

In their analysis of how Twitch 'scripted' their users, Ask, Spilker and Hansen (2019) identified five scripted user qualities: "sociability, gamer interest, paying customer (patrons), ethical behaviour and potential professional broadcaster". Of these, sociability was the most prominent, with the platform envisioning community interaction as central to the Twitch user experience (Ask, Spilker and Hansen 2019). However, based on their interview respondents, Ask, Spilker and Hansen (2019) observed that the default mode of viewing Twitch streams was detached and non-engaged, with respondents switching to a more active form of involvement during "key moments". This ties back to an earlier study described above, where the concepts of spatial and affective switching were used to describe user viewing habits on Twitch (Spilker, Ask and Hansen 2018). Together, these studies highlight that experiencing interaction is not a necessity for Twitch spectators but rather one aspect of engaging with Twitch streams, i.e. "a feature to switch on during key moments" (Spilker, Ask and Hansen 2018). The relationship between videogames and these key moments, and the degree to which streamers can anticipate or orchestrate them, are areas this thesis will explore in further detail moving forward.

Despite pivoting recently to more general interest content, Twitch's core audience remains 'gamers', with the platform's high profile celebrity-streamers typically known for creating video-game related content on Twitch (although many have incorporated other forms of content to their channel in recent years) (Twitchmetrics 2023). Additionally, instead of framing audience members as 'customers', Twitch refers to them as 'patrons', i.e. people who support broadcasters and communities (Ask, Spilker and Hansen 2019). This distinction is important, as the impetus to pay for Twitch content is motivated by social recognition and

allegiance to a streamer or streaming community rather than simply accessing content. While watching and chatting on Twitch is typically free (subscriber-only chat and streams exist but are uncommon), the platform's design directs users towards payments by requiring non-subscribers to watch intermittent advertisements and encouraging the purchase of 'subs' and 'bits' through prominently displayed icons (Ask, Spilker and Hansen 2019). Ask, Spilker and Hansen (2019) identified that the success of these features, however, required streamers to integrate the exchange of money into their content, adding plug-in software (extensions) to, for instance, trigger music or audio clips to announce new subscriptions. The giving and receiving of funds have become an integral part of content on Twitch and, in turn, shaped the format of live-streams and the performances of streamers at a macro level (Spilker, Ask and Hansen 2018).

At a micro level, however, the relationship between streamers and their audience members, and the degree to which the exchange of money influences streamers' performances is more dynamic and varied. Not all streamers approach subscriptions and donations the same, and often, in order to be successful, streamers will find novel ways to celebrate contributors that reflect the interests of their community members, e.g. a pop-up animation referencing a community-specific videogame or a personal shout-out from the streamer. The scripted quality of the 'patron' may be observed to work in tandem with the previous scripted 'gamer' quality. Spectators are not only rewarded for their donations/subs with emotes that reference popular videogames but, additionally, may be rewarded in the form of social inclusion/acceptance by the streaming communities that celebrate said popular videogames. The degree to which different streamers' draw on their common interest in videogames as means to interact with their viewers and maintain audience numbers is another area this thesis will return to when analysing interview respondents. Additionally, this thesis will examine the influence Twitch's emphasis on monetisation has on how streamers develop, measure and relate to their streaming practice, with attention given to the growth metrics the platform tends to emphasise as indicators of success.

Another scripted user quality identified by Spilker, Ask and Hansen (2018) is the "ethical Twitcher". The Twitch community has been known for its bigoted discourse and general toxicity, along with the disproportionate harassment of women and minority streamers by its users (Spilker, Ask and Hansen 2018; 'Twitch Streamers call for a blackout...' 2020). Alongside this, several streamers have used Twitch to promote sexual content on other

platforms, leading to several controversial bans as well as allegations of favouritism and inconsistency regarding Twitch's terms of service (Meers 2019). Consequently, the terms of service have been updated several times over the past few years, with Twitch referring to it as "a living document that we regularly update based on the evolution of the Twitch community and service" (Twitch.tv—Terms of Service 2020). This document describes what attire is permitted, what content is considered sexually explicit or suggestive, nudity and sexual content permitted in games as well as punishments for activities ranging from acts of racism and sexism to cheating in online games. The guidelines even describe how to navigate nudity within videogames, stating that:

[o]ccurrences of in-game nudity are permitted, so long as you do not make them a primary focus of your content and only spend as much time as needed in the area to make progress.

(Twitch community Guidelines 2020)

This points instances where a streamer's behaviour *within* a videogame carries with it consequences in the form of suspensions or bans. Furthermore, how streamers and their audiences react to sexually suggestive or nude content will influence the reviewing process. While Twitch does not define exactly what constitutes 'sexually suggestive' content, they do provide a list of factors to be considered when reviewing their users, including:

- Behavior and commentary
- Reaction to content, such as chat messages from the broadcaster, moderators, and what chat messages they permit in their community
- Attire and environment, such as location and background music, props, etc.
- Camera framing, angle, and focus
- Stream attributes, such as title, intros/outros, custom thumbnail, and other metadata
- Profile and channel content, such as banners, profile image, emotes, and panels

(Twitch community Guidelines 2020)

Based on the factors listed above, Twitch's moderators claim to provide a necessary degree of nuance assessing misconduct on platform. This opinion, however, is not shared by large

portion of the Twitch community, arguing that Twitch's TOS is inconsistent and often unfairly favours certain, higher profile, streamers. The depiction of female bodies, in terms of what is and isn't sexual, became a key point of controversy, particularly with the previously noted popularisation of 'hot tub streams' (Grayson 2021). In an example of the 'co-scripting' Spilker, Ask and Hansen (2018) identify, the once controversial hot tub streams have now been given their own category and legitimacy within the platform – along with conditions that dictate when and where is appropriate to wear swimwear ('Let's Talk About Hot Tub Streams' Twitch 2021). These guidelines reveal the extent to which factors such as chat moderators, camera positioning and streamer commentary influence the construction of meaning in live-streams, and the measures by which Twitch monitors and polices their users.

The final scripted user quality outlined by Ask, Spilker and Hansen's (2019) is "the potential Twitch streamer". Twitch offers its users a simplified and streamlined way to broadcast themselves live online, as well watch other users' streams (Ask, Spilker and Hansen's 2019). Building on this further, Twitch positions its users as both potential streamers (i.e. producers/creators) and viewers of content (i.e. consumers/patrons). The platform only requires its users to click the 'set up a server' icon and choose a name for their channel in order to stream (assuming they have PC capable of streaming, which is typical of most basic setups) (Ask, Spilker and Hansen's 2019). While the potential for enhancing streams with more advanced forms of functionality exists (e.g. adding third-party software), Twitch does not require its users to have any specialised knowledge, making the process simple to follow and relatively easy to troubleshoot (Ask, Spilker and Hansen's 2019). This is coupled with the affiliate and partner programs which provide users a step-by-step, achievement-based system to help promote channel growth and monetise their content, i.e. 'Path to Partner' (Ask, Spilker and Hansen's 2019). The user-generated nature of Twitch content facilitates the platform's patron economy, inviting users to create, share, participate and financially contribute to other's channels. By financially contributing, users are not paying for access, but rather actively supporting other streamers, participating in a patron economy that may, however unlikely, reward them in future.

Ask, Spilker and Hansen's (2019) five scripted user qualities (sociability, gamer interest, paying customer [patrons], ethical behaviour and potential professional broadcaster) reveal the measures of control Twitch employs to influence the behaviours of its users, moderate the

forms of content available and, at a general level, impact the way people view and interpret content on the platform. Additionally, their understanding of the term "co-scription" is important in identifying the norms, standards and expectations Twitch users must negotiate as part of developing their streaming practice, while also highlighting the influence users have over the platform's development (Ask, Spilker and Hansen's 2019). This negotiation will become an area of focus during the analysis portion of this thesis, as I examine Twitch's design and scripted user qualities and their influence on the relationships streamers form with videogames, their audience and their streaming practice.

Summary

This chapter brought together several concepts from different fields to form the theoretical foundation for this thesis. Beginning with a discussion of content structure on the Twitch platform, the relationship between game genre and stream type was examined. This was followed by a discussion of the platform's users, broadly divided into streamers and spectators. This discussion revealed the different forms of viewership on the Twitch platform, as well as the different types of streamers and content. Here, the relationship between streamer performance and game affordances was identified, shifting the discussion to the affordance concept, its strengths and limitations, and how it will be used as part of this thesis. To understand how streamers both act, and respond to, gameplay, this chapter then examined the 'construction' of the player in videogames, before analysing the manner by which streamers extend the performative and social dimensions of gameplay as part of performing a live stream on Twitch. The chapter concluded with a discussion of the Twitch platform, and the concept of 'script analysis'. This revealed the moderation tools Twitch employs to influence both how users behave and perceive the platform. Additionally, Ask, Spilker and Hansen's (2019) term 'co-scription' elucidated the process through which both designers and users influence and shape the features and design of a platform over time. Drawing on these concepts and studies, this thesis examines how the player-videogame relationship adapts to a live streaming environment, and the influence videogames affordances have in constructing particular spectator experiences.

Chapter 2: Methodology

Overview

This thesis' methods involve two components: online interviews and Twitch transcriptions. The online interviews draw on the lived experiences of streamers, with questions centred broadly around the relationship they have with the games they play live on stream (which games they choose to play, which games 'work' for their audience, how their enjoyment is either enhanced or diminished through their engagement with the live chat) and the manner by which they perform a game's challenge and/or narrative so as to appeal to an audience of live spectators. While a list of questions was prepared beforehand, the interviews are semi-structured, with the prepared questions serving as a guide for the interview, prompting discussion and encouraging participants to elaborate on their lived experiences performing gameplay on Twitch. The second component of this project's methods, the Twitch transcriptions, provide a window into the online environment discussed in the interviews. These transcriptions, captured from interviewed streamers' respective Twitch channels, help to contextualise the experiences discussed in the interviews, while also providing additional data for analysing the platform's communicative environment.

The methods outlined in this chapter contains elements of digital ethnography or more specifically, what has been referred to as 'netnography' - a term coined by Kozinets (1998, 336) to refer to a "qualitative method devised specifically to investigate the consumer behavior of cultures and communities present on the Internet". However, this thesis would be considered less 'active', and more 'passive' in its approach, as the researcher does not actively participate in these online communities or generate field notes as part of gathering data (Costello et al., 2017). Additionally, this thesis does not limit its data collection to the platform that is its focus, i.e., Twitch, conducting online interviews via the application 'Discord' – a voice over internet protocol (VoIP), instant messaging and file sharing software. While netnography tends to focus on the 'virtual community', this thesis centres its analysis around the role of the streamer, and their experiences performing gameplay to a live audience (Costello et al., 2017). Although I do examine the development of communities on Twitch, this analysis places a greater emphasis on streamers' relationship with their

streaming practice and, specifically, the Twitch platform, considering spectators' role in influencing and motivating their live content rather than exploring the community as a whole.

The Online Interviews

A total of five interviews with Twitch streamers were conducted as part of this thesis, with interview participants conforming to the following requirements:

- Streams typically centre around videogames and gameplay.
- Average concurrent viewers less than 500.
- Can take part in, and consent to, an interview (via voice-to-voice communication).
- Twitch is not a primary source of income.
- Based in Australia.

To cover a range of videogame related Twitch content, the sample of streamers interviewed includes different streamer *types*, comprising three 'variety streamers', one 'speedrunner', and one streamer who primarily played competitive FPS games. While this thesis does not focus on gender, or the identities of its interview participants, an immediate weakness in this project's methods can be found in the number streamers interviewed, and the lack of participants outside the heterosexual male stereotype typically associated with videogame streaming, and gaming culture more broadly. While this thesis only has a single female interviewee, their responses were illuminating, significantly informing later analysis and discussion chapters. Nevertheless, the aims of this research are not to examine broad patterns across large numbers of streamers, but rather, to examine closely the relationship that unfolds between the streamer, the videogames they play, and the audience they cultivate on Twitch. Nevertheless, this remains an area deserving of further research, particularly as new issues and events arise online, affecting users differently based on their identity (Andrew 2021; Fisher 2012; Tang 2020).

To trace a line of influence between the decisions of streamers and the types of live videogame content they produce on Twitch, it was important that I designed interview questions participants would understand, and could translate to their lived experiences

streaming on Twitch. While the concept of affordances is useful for examining the interaction that occurs between streamers and videogames on a more granular and theoretical level, it is less effective within the context of an interview. This is mainly due to the term's broad usage outside of game studies, as well as its complicated and contested meaning across different fields and disciplines. In contrast, Vahlo's (2017) use of the terms coordination and exploration, and their pairing with challenge and narrative respectively, proved useful in designing questions that would prompt streamers to consider which aspects of gameplay they tended to focus on. Before conducting the portion of the interview that dealt explicitly with these terms, I briefly clarified them for interview participants before asking if they had any questions. This was prepared prior to the interview, as detailed below:

This research focuses on the live performance of narrative and challenge in videogames, specifically looking at the role streamers have in mediating videogame experiences for an audience of spectators. By challenge I refer to problem solving, coordinating fine motor skills and adjusting to the rhythm of gameplay, and by narrative I refer to role-playing, character customisation, and the overall story and world building that guides the player's actions within a game.

While the links to enactivism were never discussed during the interviews, participants all exhibited a clear understanding of 'challenge' and 'narrative' in relation to gameplay, and would use these terms when describing their relationship with videogames broadly. This provided a useful means of categorising the different 'types' of gameplay streamers would use to drive their content, while also illustrating the different relationships streamers would form with videogames on Twitch.

While qualitative interviews can allow researchers to uncover valuable perspectives on social settings that would otherwise be unreachable, the interview method has undergone a considerable degree of scrutiny drawing attention to the positivist assumption that interview data may be considered pure and/or factual (Mikene, Gaizauskaite and Valaviciene 2013; Pinsky 2015). There has since been a shift toward "examining the construction of interviews as part of a process between interviewer and interviewee" (Pinsky 2015, 284). This perspective defines the role of the interviewer as one deeply implicated in the production of participants' answers (Holstein and Gubrium 1995; Pinksy 2015). Holstein and Gubrium

(1995, 75) use the term 'active interview' to refer to an interview format that considers the process by which meaning is actively assembled, by both the interviewer and participant, in the interview encounter. This format considers 'the interview' as a form of narrative construction and encourages contextual shifts and reflections within the interview in order to effectively engage with the narrative complexity of participants' answers. Accounting for narrative complexity in an interview requires what is referred to as an "interview schedule" which operates as a guide rather than a script, providing enough flexibility that it may be substantially altered over the course of an interview (Holstein and Gubrium 1995, 75). This thesis invited participants to discuss their experiences streaming on Twitch while I, as an interviewer, both guided and participated in the conversation.

A key part of the meaning and significance of videogames lies in the moment of play: the relationships and communication between player, videogame, and other players (Cote and Raz 2015). To examine these relationships in a live-streaming context, this thesis used an 'in-depth' form of online interview. Rather than focusing on generalisable results, an in-depth interview can help explain more specific phenomena, in this case drawing close attention to *how* streamers perform gameplay, and their relationship with the game text and their audience (Cote and Raz 2015). Cote and Raz (2015, 95) address one of the weaknesses of in-depth interviews, arguing:

...they are limited insofar as they require participants to have thought through and be able to verbalize an answer to any question.

While this can make them less effective for exploring new topics, in-depth interviews are a good way to explore established areas in more detail (Cate and Raz, 95). Twitch and live-videogame streaming remains a relatively new field, but research on the topic has been growing and evolving over the past several years. While quantitative methods, such as surveys, have revealed broadly the motivations and behaviours of the platform's users, there remains space for qualitative inquiries that investigate more closely live-streaming as a practice and performance alongside the relationships between streamer, spectators, videogames, and the Twitch platfrom.

The online nature of this thesis' interviews required the researcher to approach and engage potential participants on the internet before arranging a time and preferred software through

which to meet and correspond. When discussing online communication, James and Busher (2011) refer to the internet as a "virtual social arena", encompassing co-temporal and cospatial relationships between people from different time-zones and locations. Within this social arena, communication can take the form of both synchronous and asynchronous communication, with conversational turn-taking across seconds (synchronous) or days (asynchronous) (James and Busher 2011, 10). Across these two forms of online communication exist different applications/software that harbour particular social norms and technological features, influencing the mode and format of communication. In the case of email exchanges, participants can reflect on their responses and respond at their convenience, locating email communication within more traditional forms of writing (James and Busher 2011). Before emails are sent to a recipient, they may be "spell-checked, edited, rearranged and sometimes inflected with emotions" (James and Busher 2011). This is contrasted with online face-to-face encounters between researchers and participants, in which the social characteristics of the other are interpreted either "verbally or non-verbally through gesture, tone of voice and facial expressions" (James and Busher 2011, 12). This thesis interviews streamers through synchronous forms of communication (i.e. audio-only voice communication via the application Discord), to allow both the researcher and interviewee to participate in a discussion that, although guided, aims to uncover perspectives that may not have been immediately identifiable to the researcher. The online interviews were recorded using the free open-source software OBS (Open Broadcaster Software) and later transcribed by the researcher to text.

During the transcription process, a transcript coding system was developed based on several of the themes identified across the interview responses. Five main topics/themes were identified and divided into several subcategories: "Twitch: the platform" (Terms of Service, income, tools and affordances, relationship to other platforms); "the streamer" (type/brand, motivations, emotions, statistics, audience/chat interactions, play style); "community" (type, authenticity, audience expectations, audience conflict, audience excitement, social media, growth); "videogames" (preference, decision making process, spectator reactions, game-specific communities, challenge, narrative, mods, multiplayer); "labour" (financial expectations, sponsorship, audience incentives, charity, good/bad practice, networking, mental health, relationship with audience/chat). When conducting an analysis of the interview responses, connections were drawn according to these themes, informing the structure chapter 4's analysis.

The Twitch Transcriptions

The second component of this project's methods, the Twitch transcriptions, provide a window into the online environment discussed in the interviews. The subsequent analysis borne of these transcripts focuses on the streamer's performance challenge and/or narrative both outside and within the 'gameworld' (i.e. streamer actions captured via face-cam and voice-over-narration, as well as those captured within the gameplay feed). The live chat, included within the transcription, draws attention to which aspects of gameplay and streamer performance generate heightened attention and participation from spectators, along with any influence audience interaction may have over moment-to-moment gameplay.

The transcriptive methods used in this thesis draw from those outlined by Recktenwald (2017), with the transcription layout illustrating a sequence of interactions between the chat and the streamer in relation to some 'game event'. Specific attention will be given to 'meaningful' gameplay moments: the term meaningful in this context broadly referring to moments within a live Twitch stream that generate a heightened degree of chat interaction or an emotive or thought-provoking response from the streamer. As Recktenwald (2017) argues, transcriptions are selective, highlighting particular information and details whilst omitting others. Specifically, while Twitch transcriptions are an effective means of illustrating the communicative patterns of both streamers and live chat participants, they lack fidelity when describing the visual information occurring within the live gameplay feed. While this can be remedied to an extent with the inclusion of screen shots and written descriptions of game events, given the dynamic and often fast-paced nature of gameplay this thesis will need to be selective in what details it chooses to include and to omit from the gameplay feed.

Another limitation of the Twitch transcripts is their short length relative to the usual duration of live streams on Twitch. Given the long-form nature of videogame live streams, which typically last several hours, it is not possible to entirely reduce a given stream to the 10-20 minutes captured within the Twitch transcripts. To avoid mischaracterising streamers, the researcher spent several hours watching different streams from each streamer's respective Twitch channel to gain a broader understanding of their streaming approach and relationship with their audience. Importantly, the interviews also help to frame the transcripts, providing

further insight into the different approaches streamers may have for different videogames, and the types of videogame experiences they tend to centre their content around.

Twitch transcriptions are included for all participants, with the exception of Sixfourtythree. This is due to Sixfourtythree's smaller audience, and the limited number of chat interactions that unfolded as a result between him and his live chat. The data contained in the transcription of Sixfourtythree's channel was limited and did not accurately capture his experiences on the platform, nor did it lend itself well to this thesis' analysis. Lastly, Sixfourtythree appears to have stopped live streaming on Twitch since the interview was conducted in June 2020 (at least, from the channel observed as part of this thesis). As noted above, a majority of streaming channels have viewership similar Sixfourtythree's but are not often discussed or researched. Sixfourtythree's interview responses, therefore, provide a valuable perspective on what is like the be a smaller streamer on the platform and, additionally, what it is like the resist the trends and user qualities that are likely to draw a larger audience.

Textual Analysis

The final chapters of this thesis will draw on the literature outlined in chapter 1 to conduct a textual analysis of live videogame streams on Twitch. This will involve comparisons between the streamers interviewed to delineate their different approaches, and relationships to, streaming. Drawing on Keogh's (2018) conceptualisation of gameplay as a cybernetic circuit and Vahlo's (2017) framing of gameplay as a form of social participation, this analysis will examine the performative dimensions videogame affordances assume within a live streaming environment. Building on this, I explore the influence different videogames have over the interactions that emerge between streamers and their audience, and the effect this has in the construction of streamers' online personas. How the player-videogame relationship is maintained, altered, or fractured within the context of Twitch is a question that will guide this analysis, particularly as it relates to the scripted qualities the platform attempts to endow its users. This prompts a line of questioning that investigates how streamers configure their gameplay, not only in terms of their enjoyment, but in terms of a potential audience,

facilitating and actively constructing meaningful moments during live streams that engage spectators and extend the social dimensions of the Twitch platform.

Finding Participants and Navigating Online Streaming Networks

When approaching and contacting interview participants within the Australian streaming community, I decided to look beyond Twitch. To communicate directly with streamers during a live stream on Twitch was to enter the social dynamic of streamer and spectators, and risk disrupting their broadcast for the purposes of the researcher. Given the pseudonymity afforded by Twitch's usernames, I was also conscious of being perceived as disingenuous and, with no one to vouch for my credibility, did not want to be seen as a 'troll' or someone acting in bad faith. Given that I wanted to contact interview participants directly (one-to-one) and without disrupting their live streams, I turned to Discord. I was fortunate enough to have a friend who could invite me to a Perth Streamer Discord group which operated as a space for streamers to plan events with one another and, broadly, discuss streaming. It was from this Discord group that I was able to find four of the five interview participants included in this thesis.

Participating in this form of online networking revealed a close relationship between the two platforms, Twitch and Discord, and Discord's role, one, as space for streamers to offer each other advice, network and collaborate, and, second, as a space for individual streamers to develop their own communities and engage with spectators/members of their respective Twitch channels. Given the nature of the discord group, I was able to position myself as a researcher online, and not a fan or spectator. I was permitted to post a request for interview participants within the "Special Announcements" tab, which received written endorsement from a high level admin (the interview participant 'Captain Perth'). This also allowed streamers to encounter my project privately on their own terms before communicating with me. This helped to make the interviews more collaborative, with streamers making an active decision to participate, bringing with them a genuine interest and curiosity in the topic.

Ethics

This thesis required informed and explicit consent from interview participants and, given the public nature of streamers' online presences, offered pseudonyms to participants should they require them, with the provision that complete pseudonymity could not be guaranteed. Given Twitch content is publicly accessible, it is difficult (or impossible) to pseudonymise participants from readers familiar with their Twitch channel. It is important to note, however, that the focus of this thesis is on performing gameplay on Twitch: something participants already publicly participate in online. It was therefore highly unlikely that the content of the interview could result in any adverse consequences for participants. Regardless, the data provided in the interview was reviewed in line with the Association of Internet Research's (AoIR) ethical guidelines for online research to ensure no psychological, economic or physical harm would befall participants as a consequence of this thesis (Markham and Buchanan 2012).

The live transcriptions required additional consent from participants (i.e. the streamers who took part in the live interview), with the researcher asking permission to include past broadcasts in the form of live transcriptions within this thesis. Permission, however, was not requested from Twitch viewers and chat participants since the transcriptions were recorded from a publicly accessible online platform (Twitch). Nevertheless, this thesis recognises the blurring of public and private spaces online and the ethical challenges posed when including online conversations as part of data collection. It for this reason that this thesis considers "the perceived privacy that members of online communities attach to their communications", making sure to avoid any personal or explicit subject matter shared by chat users (James and Busher 2019, 63). Given this thesis focuses primarily on game affordances and streamer performance, the chat responses of interest to this thesis stemmed from reactions to meaningful gameplay events. These responses were generally light-hearted in nature and expressed with a public audience in mind.

Chapter 3: Streamer Interviews and Twitch Transcriptions

Introduction

This chapter will document the results of this thesis' methods, detailing the interview responses gathered from streamer participants, alongside transcriptions recorded from their respective Twitch channels. However, before moving forward, I will briefly touch on the guiding focus of this thesis: the relationship between the streamer and a videogame's affordances, and the role this relationship has in the performance of gameplay on Twitch. In their book *Playing With Videogames*, Newman (2008) describes the different positions from which players engage with videogames and the different player-videogame relationships that may form as a result.

...the videogame is capable of supporting a range of relationships with users and may be encountered on a number of different levels. Some of these may even stand in stark contrast to one another by privileging different aspects of the game. Different groups may derive pleasure from the mutability of the game system's simulation model, rules and the performative potential or conversely from the narrative potential of the setting, characters, and plot, for instance. Indeed, individuals may move between these different positions and relationships as they variously play and play with the videogame.

(Newman 2008, 17)

Newman (2008) identifies the dynamic, and often contrasting, range of experiences and relationships players may form with a given game. Additionally, while videogames are designed to condition particular ways of playing in order to guide and educate the player so that they may successfully complete them, players have historically experimented, pushed and broken the mechanics of videogames, often beyond the intentions of their designers (Newman 2008). In some cases, this has led to debate between developers and the videogaming community (in particular, speedrunners) as to whether exploiting unintentional glitches within videogames compromises the original creator's intent, and the degree to which such glitches should be removed in later patches. While this is an area I will touch on

later in this thesis, this creative tension, between the design of a videogame (i.e. affordances) and the player's agency, is at the heart of this research. Borne of this tension, different subgenres of playing, or *playstyles*, emerge, and with them different online communities. This is especially evident on Twitch, with streamers often acting as pillars within these communities, providing spaces to harbour discussion, analysis and, more broadly, a social outlet for those who share a common interest within videogame culture. Importantly, this extends beyond videogame 'genres' (e.g. FPS, RPGs, MOBAs, etc.), with the streamer's play style and approach to streaming defining their content on the platform, e.g. variety, or speedrun, streamers.

As discussed in chapter 1, live streaming is part of a history of sociality that has, arguably, always accompanied videogames and gaming culture. While in the past, sharing videogame experiences online required screenshots, written annotations or brief video clips, we now live in an age where a digital library (of sorts) exists online, storing and cataloguing gaming experiences between individuals and community members – a library so large that no individual could engage with its entirety. While, in some respects, the sheer amount of streamed videogame content online may be daunting to engage with as a researcher, it nevertheless offers a valuable insight into the lives, experiences and behaviours of videogame players today. It is for this reason that I have chosen to focus my analysis on qualitative data gathered from long form interviews, with particular attention given to the smaller sized channels that comprise majority of the Twitch platform.

Reflecting on Newman (2008) once more, videogames can support a range of relationships and "may be encountered on a number of different levels". These "different levels" refer to the aspects of a videogame from which players derive pleasure and wish to emphasise and place at the centre of their play experience. Importantly, games are rarely, if ever, entirely reducible to a singular experience, even in cases where the game's affordances are more limiting for the player. While there are videogames that offer large sandbox or procedurally generated environments that can produce a wider array of dynamic experiences between separate playthroughs, even in games wherein the goals are fixed and the player's possible actions far more controlled, a wealth of different player experiences may emerge. 'Singleplayer' videogames, experiences once confined to the television and those around it, have now found broader appeal in the form of live-streamed online content. The social activity that surrounds the act of playing videogames no longer sits on the periphery of mainstream discourse, but rather is engrained, both at the level of development and how individuals consume and experience videogames today. At the level of consumption, the act of playing is becoming less important to experience a videogame, with studies revealing a growing number of videogame spectators who privilege the act of watching someone play over playing themselves (Orme 2021). While videogame spectatorship is by no means a new phenomenon, Orme's (2021) study reveals a growing trend of online spectatorship from 'non-players', i.e. players whose "primary connection to gaming as leisure is through someone else's game play" (2). This trend highlights the growing influence streamers have on how individuals engage with videogames today, providing even 'non-players' an entry point for understanding and finding value in videogame play.

Bringing together five Australian based streamers, the remainder of the chapter will document the interview participants' thoughts and perspectives as they relate to videogames, streaming and developing an online community on Twitch. The chapter will be sectioned according to each streamer, beginning with a discussion of their interview responses before documenting and describing the transcriptions recorded from their respective Twitch channels. This is with the exception of Sixfourtythree, whose section does not include a Twitch transcription for reasons outlined in the Chapter 2. Although comparisons will be made, this chapter will not conduct any deep analysis, which will be saved for subsequent chapters that draw from the theories and concepts outline in chapter 1.

SpamBrah (variety streamer)

SpamBrah is a variety streamer from Western Australia who has been streaming on Twitch for approximately two years. She generally focuses on playing videogames that emphasise roleplay and/or narrative elements, with recently streamed titles including the open world RPG *The Witcher 3* (developed by CD Projekt Red), the Greek mythology themed, randomised dungeon crawler *Hades* (developed by Supergiant Games) and the card-based roguelike *Slay the Spire* (developed by Mega Crit Games). When describing factors that influenced her decision to stream a particular game, SpamBrah identified two main factors: what is 'trending' (popular) on Twitch, and her personal enjoyment. Of the two, personal enjoyment weighed heavier in her decision making, with SpamBrah claiming it influenced not only her mood during stream, but the success and appeal of her content:

...I would say I'm a person who wears their feelings on their sleeve essentially, so if I'm not enjoying something, it's very very apparent and for me, I think people get entertainment from my streams based on the enjoyment I'm having with the game itself and my comments that I say about the game and things that happen within the game itself. Because I'm not one of those gamers who likes FPS, some I'm not in [it] for competitions, I have to consider what things people will be into watching, what things they'd like to watch... YouTube reaction videos got really popular, a similar kind of thing is like live reactions of a videogame, like blind playthroughs and the big "Oh my gosh! This scene just happened, it was crazy", these big story moments happen and people [get] to see I guess, a perspective of what my emotions would be towards those sort of scenes and gameplay.

Here, SpamBrah reflects on her content and its appeal, distinguishing it from other popular forms of streamed content (i.e. FPS competitive-multiplayer streams) and drawing a connection to videogame 'reaction' videos popularised on YouTube. These reaction videos follow a similar format to PewDiePie's 'Let's Plays' discussed in chapter 1, with an emphasis on moment-to-moment reactions that highlight the emotional responses of the player.

When describing the appeal of certain videogames for streaming, Spambrah made note of *The Witcher 3*'s dialogue options, drawing attention to 'decision-making' moments in games that would generate conversation in the live chat:

...Witcher 3 was great because obviously there's dialogue options where you get to choose... and it's great to see where other people's thoughts are in terms of what options they would choose, but in my opinion I don't let chat dictate the gameplay itself. I still play the game as I would, but yeah it's just nice to talk about [the] different thoughts and perspectives people have depending on the situation.

While SpamBrah emphasises that she doesn't let chat "dictate the gameplay itself", she nevertheless values the conversations these in-game moments generate. Notably, SpamBrah

is to some extent protective when it comes to playing the game in a way that is true to her approach and personality. As later interview responses confirm, SpamBrah takes seriously her genuine reactions to gameplay, and considers her decisions while playing to be a key part of her role and performance as a streamer.

When asked to define a 'successful' stream, SpamBrah highlighted the importance of chat engagement, along with the negative effect pursuing Twitch metrics, such as viewer and follower count, had on her mental health:

... in my mind a successful stream is how much chat engagement I'm actually having at a time. I don't focus on numbers because there was a period of time when I did focus on like how many viewers I had... and it would get me down to a point that I did actually stop streaming for about a month and a half. So, when I was valuing that as successful streaming it actually negatively impacted my future streams and my perspective on what streaming should be. So now I value it on community engagement essentially, so people actively in chat talking, and it doesn't need to be about the game itself, it's just how much activity is going on in chat. It gives me an idea of whether or not something's engaging for someone, that they are actually going to take the time from whatever there doing at the time to actually jump into my stream and chuck a few sentences in about whatever topic we're talking about at the time. That's what I value, that for me is a successful stream, just how much chat engagement is actually occurring in a stream.

The interview with SpamBrah also drew out some other factors relating to audience needs and potential forms of engagement.

...eight months ago, yes I would of used to think about scheduling things that could allow for users to play with me, like you know schedule some *Among Us* [developed by InnerSloth LLC] games or some other community based games... But, I've moved away from that, because in my mind I want to be a little bit of entertainment, you know at the end of the day they're tired, they just want to chuck something on their computer and have it in the background as entertainment value that they don't have to think about or have any input into, they just have for the sake of hearing something a little bit funny or hearing something a little bit different you know. So I'm not looking for people actually to put any input into what game I'm playing at all, I think I should be making those decisions as a streamer and I think chat should just be there along for the ride for a fun time, so they can relax and not have to worry about anything.

Spambrah's above response notes a recent shift in her content, as she aims to appeal less to those who want to participate in playing a game, and more to those who enjoy a more passive form of spectatorship.

On the topic of her 'playstyle' and how it changed within a live-streaming setting, SpamBrah noted that she not only *plays* differently when streaming, but also plays different games than she would alone.

I actually don't play many role-playing games alone, I prefer playing those with a friend or through streaming. Although I'm not playing with friend when I play a role playing game with streaming, I get some sort of emotional reaction out of people through chat and that actually eggs me on to keep playing a role playing game. So quite often, in my own time, I'll play city builder games that I can literally just numb out to and not have to worry *laughter* myself about too many consequences of you know, what actions or dialogue options you're going to choose. But when I do play role-playing games on stream... if there are evil options or there are tough guy / bad guy options, I will try to go for those dialogue options in story driven moments in a streamed game because in my mind I think everyone always plays the hero and not many people like playing the villain or being the bad guy, so I kind of think it's fun to be the bad guy on stream.

In SpamBrah's comparison of 'city-builder' games and *The Witcher 3* there is an appreciation for the performative qualities videogames can afford, with the former being a form of gameplay she uses to 'numb out' and, the latter, a vehicle for roleplaying the 'bad guy' and entertaining her live audience.

In response to the question "when streaming a game, how important is a videogame's narrative", SpamBrah noted that it was "very important", however, to preserve her first

impressions for a live setting, she would try learn as little as possible about a videogame's story before streaming it.

Like I said before, I'll focus on games that are trending now and are more strongly narrative based as well. Hence, why I'm playing *Hades* at the moment because when it came out it was quite up there with views... I've never gone into a game thinking "I know the story line of this game, I'm going to stream it because like, I know what's going to happen", I usually will stream games blind – so I don't know what the stories going to be or what it entails. Because for me, it's important for people to see that emotional response to what happens in the story itself and also for people to see my reaction and then for me to then talk about it and say "okay, well what would you guys do in this situation?", this terrible or really good situation, that sort of thing. The storyline, I won't actually look at a game and read up about it before I start streaming, I'll just stream it.

As previously noted, SpamBrah takes seriously the genuine nature of her reactions to gameplay, preferring to know less about a game's story for the sake of preserving her first, or 'blind', playthrough for her audience to experience. For this reason, SpamBrah focuses on the popularity of a game, *and* whether it has a strong narrative element along with its fictional setting.

I definitely lean more into medieval, or not really medieval, but fantasy-based games. And I'm not too much interested in the science, sci-fi games. And I think it's definitely a reflection of my personality, because I got this massive bookshelf of fantasy genre games that are medieval based, or like the *Harry Potters*, the dragons, *The Lord of the Rings* – that's my genre and I know that and I love that genre. And I'll read it death and I'll play it to death as well.

Here, SpamBrah reflects on her personal connection and history with the medieval-fantasy genre, a connection that strongly influences the types of games she streams. A videogame's setting will reveal certain superficial gameplay elements (e.g. world, environment, characters, imagery) without compromising SpamBrah's first impressions and reactions to the game while streaming. Given SpamBrah "wears her emotions on her sleeve", for her to be engaged and animated during streams, it is important that the videogame to appeal to these interests.

Around the time of interviewing, one of the videogames SpamBrah streamed was *Hades* (developed by Supergiant Games), a *Rogue* inspired game that follows a formula (first pioneered by the game *Rogue* developed by Glenn Whichman and Ken Arnold) in which the player tries to progress through a series of environments (or 'dungeons') defeating enemies and bosses. Importantly, upon dying the player is sent to the beginning of the game – only, the environments are generated randomly after each death, changing the layout to make it more challenging and less stale for repeat attempts. As SpamBrah describes, *Hades* takes this formula a step further:

As you go through and defeat more bosses as well, it unlocks different types of monsters in the same areas you keep visiting, so that way, as you continue doing more runs, it shakes up the difficulty a little bit because there's always new monsters you keep encountering in areas you've been to before that you've never seen before... It's nice, it keeps it spicy.

In line with other *Rouge* inspired titles, the game randomises which weapon upgrades are found each time the player completes an enemy encounter, adding a degree of chance to whether the player can 'build' the character the way they prefer. This 'RNG' (i.e. random number generator), as it's commonly called, can translate to some thrilling moments on stream, with SpamBrah reflecting on moments in-game that generated excitement amongst herself and her chat:

As you go through the dungeon, because its Greek based, you meet these gods and they give you a power-up to your weapon, so who you might meet to give you more powerups to your weapons is completely random... I chose a weapon that I am not as good at using... and then, suddenly, I had a few runs where I was just smashing and breezing through, and I actually got to the very end boss. That elicited a lot of chat engagement because of the fact that, I'm not sure exactly what happened, but something just clicked, and people were cheering me on for the fact that [it was] something I was complaining about, "I'm always terrible using this" or whatever, suddenly I'm like "Oh, I can't believe what's happening right now, look how far we've come". The unpredictable nature of the weapon upgrades in *Hades* make it difficult for SpamBrah to anticipate the success or failure of a run, leading to moments of excitement on stream as these randomly generated upgrades align, or "click", to create a surprisingly effective character build.

Slay the Spire (developed by Mega Crit Games), another videogame streamed by SpamBrah, follows a similar *Rogue*-like format to *Hades*, wherein the player must attempt to complete the entire game within a single 'run', however, instead of fighting enemies in real-time, the combat takes the form of a turn-based card game. Each combat encounter rewards the player with a random new card, akin to the power-ups earned after each encounter in *Hades*, and the player progress through the game, encounter-to-encounter, until they reach the final boss of each level. The random rewards earned after each encounter make it difficult to plan for a specific build, requiring the player to shift and improvise their strategy constantly around the cards they are dealt. After each successful battle comes a moment of deliberation, as SpamBrah must decide which reward card to add her deck, as well as which route to take in the dungeon (typically two branching paths). Spambrah's Twitch Transcript 1 from May 2021 documents a stream of *Slay the Spire* where, with the hopes of running a poison build, she receives a particularly useful poison card called "Noxious Fumes".

Twitch Transcript 1.				
Timestamp	Gameplay Feed	Streamer	Chat	
1. 01:20:08 – 01:20:32	an enemy encounter.	ah he's almost dead – Yeah so I tried to	01:20:34 [RED]: I love freshly washed hair	
2. 01:20:33 – 01:20:40	Navigating the map screen, SpamBrah selects the next room she will enter – a room marked with '?', indicating a random chance of encountering a reward, a trap, or an enemy.	"You love freshly washed hair – so do I. Alright we're going to go this way, even though it's risky business."		
3. 01:20:41 –	She encounters an NPC gremlin who spins a	"Let's do this gremlin, spin the wheel! What did we get? What does that mean?		

01:21:02	chance wheel with different rewards/punishments around it. SpamBrah spins the wheel and lands on the remove a card from your deck option.	Choose a card to remove from your deck – I don't want to remove anything though! Nooo! Why you making me do this.	
4. 01:21:03 – 01:21:57	SpamBrah proceeds to the next encounter. She then begins to battle the enemies on screen.	recently changed shampoo and I'm so glad I have because I was using this other shampoo – same brand, but my hair would be so fluffy, like I would brush it and it would just seem to be very dry and brittal or something like that. Now this new shampoo has made it so it doesn't strip all the oil from my hair, which is great as someone who washes their hair all the fucking time and shouldn't. But I	1:21:57 [RED]: Yeah your hair likes a change sometimes.
5. 01:21:58 – 01:22:20	SpamBrah finishes off the last enemy on screen before encountering the rewards screen.	just can't help myself. "Yeah, it's perfect for me. Yeah and that too. Oh, at the start of your turn apply 2 Poi – Oh yees! Noxious fumes, I'm very happy with that." SpamBrah turns to a cat walking beside her in her facecam and pats them. "Hey Buddy! Hawhhawhhawh he's so sleepy."	
6. 01:22:27 – 01:22:35	Notification appears on screen indicating a new follower. SpamBrah is at the map screen deciding on an optimal route.		01:22:34 [BLUE]: love me some noxious fumes
7. 01:22:36 – 01:22:58	deliberate her next path,		[GREEN]: Blue!
8. 01:22:59 – 01:23:11	SpamBrah proceeds to the next combat encounter.	Love you some noxious fumes, hehehe! Oh welcome back Green, how's your internet going now? Hopefully its going okay.	01:23:05 [BLUE]: Green

At timestamp 6, spectator [BLUE] decides to 'follow' SpamBrah and post a message into the live chat. SpamBrah thanks them for the follow and later responds to their message at timestamp 8, laughing at the card's title. The unpredictable nature of these rewards, and their significant influence over the success of a run, often make these decision-making moments a regular source of interaction amongst the streamer and the live chat. Akin to the above

mentioned dialogue options in *The Witcher 3*, these decisions often have a strong bearing on what happens next in the game, adding weight to the streamer's decision and, potentially, anticipation on the side of the spectators as they wait to see it how it plays out.

Returning to the interview responses, when asked about the conversations live streaming would typically generate, SpamBrah reflected on streaming *Hades*, describing instances where the art and game mechanics became the object of discussion.

... one of the few things and top comments that people come in to talk about with Hades, for example, is just the art work alone, its pretty amazing, and people come in and say "this dungeon looks really really cool" and we go around, we look at the area, spend some time looking at the actual map itself, the layout of the things and how the art has been drawn. And even going to explore the border of your character and if it goes into lava has the developer drawn the hitbox, and that way people can understand when you randomly get hit by an enemy but it looked like it didn't connect – like, trying to understand hitboxes a bit better.

This response highlights the interconnected nature of a game's narrative and challenge elements, with SpamBrah reflecting on the game's art style before describing discussions with the live chat surrounding the player-character's hitbox (i.e. the border around a character that, if hit by an enemy attack, results in damage taken). From a game's artwork and world-building to its mechanics and strategy, there are myriad avenues for conversation that stem from live gameplay. A similar instance occurs in Transcript 1 at timestamp 10 (see below), where SpamBrah asks one of her spectators, BLUE, if they have previously played *Slay the Spire*.

Timestamp	Gameplay Feed	Streamer	Chat
9.01:23:12 –	SpamBrah proceeds to	Man, I'm really enjoying these songs. This	01:23:12
01:23:44	battle the enemy.	one is called mechanical heart. Ahhh,	[GREEN]:
		more damage from attacks, yes please. Oh fuck, he splits, I completely forgot about that. Ohh well. Doesn't matter.	Hey Red!
10. 01:23:45 –	SpamBrah continues battling the enemy.	Have you ever played this game before Blue?	01:23:51 [BLUE02]:
01:23:45 -	batting the enemy.		yup, huge fan

11. 01:24:01 – 01:24:23	SpamBrah continues battling the enemy.	Huge fan of it? Nice. I, myself, have only recently started playing it quite a fair amount in the last six months and have been enjoying it. Just bad – ah just keeps skipping so I just stop chatting, no worries! That's okay, it's all good.	01:24:06 [GREEN45]: I've been here the whole time, just bad internet. Keeps skipping so I stopped chatting Didn't want to miss anything.
12. 01:24:24 – 01:24:59	the enemy. SpamBrah proceeds to the rewards screen and deliberates which card to choose.	take no damage at all! I'm okay with that. You loved when they added the watcher? I for the life of me cannot actually get a handle on the watcher. Umm, but I'm just going through each of the guys and just trying to go for one win at the moment.	01:24:24 [BLUE02]: Loved when they added the watcher 01:24:44 [RED88]: my character on AC is in pjs tonight!
13. 01:25:00 – 01:25:20	camp area allowing her to rest. SpamBrah moves on to the next enemy encounter.		
14. 01:25:21 – 01:26:33	SpamBrah proceeds to battle enemies	Man, I guess its not the worst to get intangible on this particular turn, so that will only take one damage but meh. Am I a fan of card based games? Yes, and no. So, I'm not a fan of magic the gathering because my partner is amazingly good at it and fucking kicks my ass every time, thus I have a *laughter* I have BAD taste of magic the gathering in my mouth. However, I've liked um, was I playing a different card based game that's card game slash builder? I can't for the life of me remember, there's a game I've played and essentially you use cards to build things at the same time. It's like a side scroller as well, fuck. Hang on, let me check my steam list.	01:25:34 [BLUE02]: you a fan of the card- based games, spam? Keen to check out cult simulator and maybe dicey dungeons. 01:25:34 [PURPLE74]: I absolutely read AC as assassin's Creed and was super confused
15. 01:26:34 – 01:27:45	SpamBrah defeats enemies, and moves on to the rewards screen.	Yeah, I like these sorts of card games, I like playing against the PC, not so much I guess, what would you say, against people. Keen to check out cult simulator and dicey dungeons. I think I've seen advertisements for dicey dungeons, not cult simulator. You have my interest intrigued. *types on keyboard* Cult sim- u-la-tor. Oh! I like the artwork already. Like you play cards and you combine cards together? Crafting and card – oh wait I'm looking at cultist simulator.	01:26:54 [BLUE02]: yup, i'm with you there

I	16.	SpamBrah selects	You read AC as assassin's creed?	01:27:48
)1:27:46 –	"deadly poison" card	*laughter* I think we're going try and to	[BLUE02]: oh, that's
		from rewards selection,	go a poison run this time round. Alright,	the one. my bad
		and then moves to next	time to go shopping!	
		encounter, which is with		
		a merchant.		

BLUE responds to SpamBrah at timestamp 10, saying they're "huge fan" of the game, and later comments on one of the recently added classes, 'The Watcher', at timestamp 12. Spambrah then responds, claiming they cannot "get a handle" on how to play that particular class, and that they plan to move through each character one at a time (the watcher being the most recent addition to the game). After a moment of deliberation regarding which reward card to choose, the conversation shifts to a more general topic surrounding the genre of 'card-based games' prompted by BLUE's question at timestamp 14. Several different card games are brought up in conversation, with SpamBrah pausing her gameplay to quickly search one of BLUE's suggestions – *Cultist Simulator* (developed by Weather Factory). As previously noted, setting and art direction play an important role in determining SpamBrah's interest in a videogame, which is evidenced in her response to BLUE at timestamp 15, with her first comment on the game relating specifically to the art style. Across the interactions transcribed, the rhythm of gameplay regularly influences the conversation, with SpamBrah and her chat members participating in spontaneous, but recurring, observations and digressions.

Before concluding the interview, Spambrah was asked how she navigated difficult or uncomfortable conversations in the live chat while streaming, to which she replied

It depends on the topic. So, for example, if I have some person jump in and say some really derogatory things its just like "Nah mate, you don't do that around here" and then if it's really, really derogatory, like they're saying the n-word or making fun of certain races of people, that sort of thing, it's just a straight up ban. Zero tolerance for that situation, because I don't have time for that. I don't actually have any mods in my stream, and I don't think I need mods personally because I want to stay focused on the chat and if I had mods in my stream and expect mods to deal with those sorts of situations, I feel like I would forget chat and not realise why I'm streaming in the first place... If it's a thing I don't like, so for example, there was a topic that came up about whether or not I would let a viewer of mine who I have a pretty good relationship with come to my house, like physically come visit my house. So that was a bit of a weird situation because its breaking the line of who's a viewer and who becomes a friend, and I guess putting too much grey in the topic of where people stand with myself as a streamer and people as viewers... That was a really uncomfortable topic so I kind of answered it as best as I could and once people were still talking about it for maybe another 60-70 seconds later I just decided to go down the deep end and say something completely absurd that would just distract away from the topic of talking about where I live. So yeah, I was hoping by bedazzling them with something dumb and stupid that we would move away from that topic. It's not that it's a bad topic to talk about, it's not like putting down another person or it's not like talking about sensitive topics, like rape for example, it's not severe like that, because it's just talking about where I live, but at the same time, I don't want to talk about it. So I want to just try to completely distract people, or I wanted to distract chat specifically away from the topic.

In this response, SpamBrah identifies a line that, if crossed, will result in her banning chat members. While users who say derogatory things in chat may receive a warning first, explicit forms of discrimination (such as racial profanities) are met with an immediate ban. When discussing other subjects that were uncomfortable to navigate with the live chat, SpamBrah noted an instance where visiting her private address became the focus of conversation in the chat. SpamBrah went on to describe the difficulty in navigating these sorts of conversations, and the delicate line between protecting her privacy and maintaining a positive relationship with her chat. SpamBrah's decision to avoid conflict with her chat by not openly communicating her thoughts and emotional state reveals some of the tensions that can form between streamers and their live audience. While it is common for streamers to have moderators, i.e. people in the chat with the power to ban/censor other users, SpamBrah considers dealing with these moments part of streaming, preferring to deal with them herself. The different ways streamers navigate uncomfortable subjects while streaming is something I return to in subsequent interviews, and an area of analysis in later chapters.

Sixfourtythree (competitive shooters)

Sixfourtythree is a Perth-based streamer who primarily plays competitive first-person shooters and, at the time of interview, streams around once a week. Alongside his personal streaming channel, he also co-hosts another Twitch channel, Sifter (previously known as Pixelsift), which functions primarily as a podcast channel with the aim of highlighting upcoming indie games with an Australian focus. These podcasts often take the form of an interview, talking with developers while showcasing their game live on stream.

...we talk to game developers from around Australia in a kind of talk show format. But, also on that channel we run a more traditional twitch stream where we play games for an audience as well, and that's something I do on my personal channel as well... Pixelsift [Sifter] is associated with independent games, so we stream indie games on Twitch. In terms of the more regular stuff, we stream Stardew valley, apex legends, GTA, Overwatch and a couple of other games that I can't remember the name of now, dead space, we've been known to stream a lot, we're very much a variety channel. On my personal channel, its very much limited to *Apex Legends, Overwatch* and *Titanfall 2*.

Sixfortythree's response above delineates the type of content found on Sifter when compared to his personal streaming channel, with the latter being the focus of this analysis. When describing why he chooses to stream competitive shooters exclusively, Sixfourtythree responded

...the reason I play overwatch is because I'm good at it, *Apex legends* I do have a lot of other streamer friends who play it, but I do enjoy it quite a bit, and Titanfall I found that has a good audience behind it, also I like it a lot.

Sixfourtythree's Twitch channel acts as an extension of his private game sessions more so than a channel curated for the purposes of gaining an audience. In this sense, his decision to stream a game shares a lot in common with his decision to play it privately, as compared to streamers like SpamBrah, who prefer to play different types of games when streaming for an audience. This was an important aspect of Sixfourtythree's approach to streaming, and one which we returned to several times in the interview.

On the topic of how much the audience influenced his decision to stream particular titles, Sixfourtythree responded

They definitely need to fit into the venn diagram, they need to be fun and the audience has to like it for me to stream. But definitely fun over whether the audience likes it or not. That might be different for other streamers, there are definitely other streamers... they play everything that's popular, and I get that, not really the type of streamer I am. Might change in a couple of years, or it might change tomorrow, but at this present moment I only play things that are fun for me to play and if the audience likes it, then they're there.

While this response shares similarities to Spambrah's approach, it reveals a greater emphasis on his personal enjoyment over appealing to what is 'trending' i.e. popular games and/or content likely to attract a greater audience. While it was clear Sixfourtythree prioritised his personal enjoyment above all else while streaming, it wasn't immediately clear *why* he streamed. When asked this, Sixfourtythree responded:

Yeah, I'm not sure why I stream actually... when Covid19, all that nonsense started, I lost my job like a lot of people, and I thought I'd set myself the personal challenge of getting that personal account to affiliate and I thought if I can do that you know it's a little personal, life goal achieved, and I managed to do that relatively quickly.

Sixfourtythree brings up the effect COVID-19 and the lockdown had on his employment, and the role this played in motivating him to stream and become a Twitch *affiliate*: a status which grants streamers access to some additional Twitch features and the ability to monetise their channel (in the form of ads, subs and emotes) on their way to becoming a Twitch *partner*. Aside from the potential to earn some additional income, Sixfourtythree's above response does not reveal specifically why he finds streaming enjoyable or appealing.

When defining a successful stream, Sixfourtythree followed a pattern observed in the responses of previous streamers, identifying chat activity as the primary indicator of success.

I think a successful stream is definitely one that a lot of people are talking in. It doesn't necessarily have to be a stream with a lot of high viewers, in terms of streaming I'm actually very very small. Like, I'll be lucky to get a stream that's in double digits with viewers concurrently watching, that being said I prefer when people talk to me than just watch. And of course, followers, new followers is always an indicator of a successful stream. Seeing growth in any way is always good on both my channels.

After mentioning the small size of his channel, Sixfourtythree identified a second aspect he considered part of a 'successful' stream: growth. When compared to the other interviewed streamers, his personal stream was the smallest in terms of average concurrent viewers. While growth was a sign of a success in his streams, his responses over the course of interview did not point to it as a primary goal and, importantly, was not something he wished to pursue for its own sake.

After defining a successful stream, Sixfourtythree was asked if there were particular types of activity in the chat he encouraged or preferred, to which he responded

Mostly any activity in the chat is positive, but of course, within reason. There has been a lot of Twitch chats [that] have been known to get pretty toxic, not particularly in my case as I'm pretty heavy handed in terms of who I allow into my chat. I'm not lenient, if I see anything antisocial in anyway, whether its racism, sexism any of that, even passive aggressiveness toward me personally. I see streaming as my own personal environment that I create, so I have no room in that environment for things I even find remotely uncomfortable. Like if a comment makes me feel even a little bit uncomfortable, that person is automatically banned from my chat, I don't really give warnings in my chat, because it's my space and I feel like I don't have to. That's my approach to modding... But, bringing it back to the Twitch chat, and what I find engaging, I like comments on the game that I'm playing, you know people telling me about their day, that kind of stuff. Anything friendly is generally good. Sixfourtythree's response above sets him apart from previous streamers in some respects, namely his "heavy handed" approach to bans and secondly, his understanding of streaming as "my own personal environment that I create". While other interviewed streamers discussed techniques for navigating uncomfortable subjects, Sixfourtythree had a zero-tolerance approach, reflecting again his particular approach to streaming. This approach emphasises the personal nature of his channel, and his aim to enjoy videogames with others without having to expose himself to antisocial or bigoted behaviour, or more broadly, anything he finds uncomfortable.

When asked "how important is it that you enjoy playing a game in order to stream it?", Sixfourtythree responded

...I think it is very important you enjoy the game when streaming it, I think people who stream games that they don't enjoy - I honestly don't think that produces a good result, because you need to be having fun to be an engaging personality. There are definitely streamers who build their brand on playing difficult games and being very loud and negative, like they have a negative personality. So they kind of get angry a lot, but at their core I think they still enjoy the experience of being challenged and reacting to a game strongly... with the three games I stream on my personal channel, *Apex Legends, Titanfall* and *Overwatch*, I enjoy them very very much.

Here, Sixfourtythree identifies some trends in the content found on Twitch, i.e. what he refers to as streamers with a "negative personality". The performance of failure on Twitch was noted in chapter 1, with it being common way for streamers to engage their audience and channel their online persona (Gandolfi 2016). Sixfourtythree offers a perspective on this aspect of streaming, positing that those who emphasise this side of their personality while streaming still enjoy the games that make them react this way, alluding to the idea that this is, at least in part, performative and an aspect of building a 'brand' on Twitch.

Continuing this topic, Sixfourtythree discussed their own experience trying to stream a game they found to be unenjoyable

... I used to stream a lot of *Fortnite* on the Pixelsift [Sifter] channel, and I really didn't enjoy that game, and I didn't like doing it. The reason why we did it was because it was the 'in game' at the time, and this might be a little bit contrary to what I was saying before, but they were popular I think, I can't really remember the numbers at this time, but they were popular at the time because people could get involved, because they could tell me where to drop, they could join us in the game... but I found myself not really being happy with streams afterwards from a personal perspective. When they ended I felt "I don't really wanna do that again", even though they were kind of successful...The interactions can definitely make playing game you don't necessarily like, or making the whole streaming experience as a whole better.

Sixfourtythree identifies a contradiction, of sorts, in his responses, noting that although he did not enjoy playing *Fortnite* (developed by Epic Games) it did in fact net him some higher numbers of viewership. His response earlier noted that playing games the streamer didn't enjoy would not produce "a good result", and he reflects on this momentarily, before concluding that live interactions while streaming can make an otherwise unenjoyable gaming experience tolerable, if not enjoyable. While the streams were "kind of successful", he did not personally enjoy them which, regardless of the audience response, could not motivate him to continue streaming *Fortnite*.

The interview then shifted to playstyle on and off stream, and whether streaming to an audience influenced how Sixfourtythree played.

I'm sure, if we directly compared my two gameplays directly, I'm sure there'd be a difference but I don't feel it. I just play normally, I don't feel like I do anything different. I'm not particularly known for my gaming technique or anything like that.

Pivoting on that question slightly, Sixfourtythree was then asked whether his playstyle had changed since he began streaming?

I think because I'm playing more, I might have got a bit better. But in terms of 'would I do anything different off stream vs on stream', if someone in the chat

requested like, "Hey, maybe you should use this weapon" and I'm like "Yeah alright, I'll give that a go, why not" and that kind of thing. But, not really, other than that no... I wouldn't say [my] gaming strategy or technique is really that different.

The above response distinguishes Sixfourtythree from the other interview participants, who all noted playing differently on stream when compared to private gaming sessions. Again, this can be tied back to Sixfourtythree's relationship with his streaming practice, as he maintains the same, if not similar, approach to gameplay both on and off stream.

In subsequent questions, discussion shifted to *Overwatch* (develop by Blizzard Entertainment), revealing the enjoyment Sixfourtythree found in discussing tactics and characters with the chat while streaming. When asked what discussions typically took place between him and the chat, Sixfourtythree responded

... [In] *Overwatch* people like to discuss in the chat their favourite heroes, that's a big thing, discuss how they're feeling about the game, discuss narrative stuff, relationships between characters, strategies that kind of thing – it's mostly localised to that game.

Following up on this point, Sixfourtythree was asked to describe the nature of *Overwatch's* challenge, and what players are required to do in order to win:

Overwatch is slightly different to every other first-person shooter in the sense that *Overwatch* is not a game about eliminating your opponent, it's about taking up more space than your opponent... *Overwatch* is one of the few first-person combat games where you can win without technically eliminating anybody.

Overwatch places a strong emphasis on teamwork as part of its competitive multiplayer, appealing to a variety of different playstyles that move beyond simply shooting and eliminating the opponent team. This prompted the researcher to ask if *Overwatch* had influenced Sixfourtythree's stream in a positive way, to which he replied

I think *Overwatch* has an interesting culture... people have a very strong connection to characters in that game. I think currently there is 29 of them, it is a massive roster, but people have a big connection to the characters, they really work for people. Like, there's a certain character for everyone in *Overwatch*. So when people come to my stream, they look at the character I'm playing – it's a really big part of *Overwatch*, when you find someone plays the game, you find out, "okay, who's they're favourite character - who do they main?". Who is their main character they like to play the most of and I think, if you both share that, it's a big interaction-interacting point. If two people play the same character and then you see that player playing them on stream, it's definitely a big push to watching then following that person.

The above response reveals the significance of *Overwatch's* characters within the fan community, and their role in generating regular conversations amongst Sixfourtythree and his live chat. This point prompted further discussion, with the researcher noting the ability of *Overwatch's* developers "to capture the philosophy of a character not only in their backstory but in the way you play them", with Sixfourtythree responding

Yes, because games are a very unique form of media, because there is a narrative in all games, even Pong for example, the designed narrative is Tennis essentially, but the player narrative is something you don't find in movies.

Sixfourtythree went on to clarify how he understood 'game narrative' as compared to 'player narrative', discussing how both factored into Twitch streaming.

...by game narrative I mean the constructed narrative... in a multiplayer game like *Overwatch*, the created narrative is - yes, there's the animated shorts but I'm not really talking about that – the created narrative is the colours, the voice acting, the attacks, the abilities, that kind of stuff that's the same for everybody. But, the player narrative, how they feel about it, how they feel about a certain character, why they choose to play them the way they do, what they think of the environments, their attitudes towards them, the friends they've made in that environment, I think that's the reason, that's what people tune into Twitch for. While Sixfourtythree does not the extend the performative dimensions of videogames to the same extent as other interviewed streamers, he identifies a key part of live-streaming's appeal – it's ability to connect players and allow them to share their 'player narrative'. Whether it is on the side of the streamer, or as a chat participant, Twitch enables players to converse and share in-game experiences, bringing to light the range of different relationships players form with videogames.

When discussing the audiences different videogames would attract, Sixfourtythree noted that he wasn't confident making any broad claims given the small size of his audience, but identified the *Titanfall 2* (developed by Respawn Entertainment) community as one that was particularly supportive:

I think there are certain games that people gravitate toward because of the culture of that game. For example, *Titanfall 2*, the culture surrounding that game, the people that are into *Titanfall 2* feel a bit hard done by, by the powers that be it EA or the marketing system and steam, so they feel that *Titanfall* needs to be supported, and so they will show up regardless of who's playing it. So they'll turn up regardless of who's playing it, they'll be like "oh someone's playing it, someone cares, someone likes it". It's a very underdog, tall poppy syndrome that *Titanfall* fans and streamers have, so they'll kind of back each other up, and they'll stick around, that kind of thing. But, I don't think that's to do with Twitch, that's the *Titanfall* community.

In the above response, Sixfourtythree distinguishes the behaviour of *Titanfall 2's* community members from those of Twitch more broadly. This raises some important questions regarding Twitch's user culture and the relationship smaller communities may have with the platform as a whole. This is an area I will return to in subsequent chapters, investigating Twitch's growth-as-success model of encouraging and educating streamers, alongside the existence of smaller communities on platform.

Cubeyy (variety streamer)

Cubeyy is a Perth-based variety streamer who has been streaming on Twitch for approximately two years. He tends to stream competitive multiplayer games, but is also involved in an online *Minecraft* community, streaming it regularly and running an online server for the game.

I would define myself as a variety streamer but based on personality and not any competitive level of gameplay. I stream a lot of different games, I'm not even very good at most the games that I do play. Like, I have [had] quite a large Minecraft community in the last eight to twelve months now but I'm terrible at Minecraft because, I don't take it seriously, to a competitive level. I don't have too much interest in learning the intricate details that Minecraft has to offer, because it's quite a complex game if you want to learn it properly but I just don't really care to be honest, I just like to interact with people, have fun, do whatever the hell I want to do on stream, and that's the sort of vibe I have with all the games that I play. So yeah, I'm a variety streamer but based on personality. So I can switch games, and I try not to stay on one game for too long so that nobody ever gets used to me on one game, they know that I probably won't be playing the same game when they come in next time.

Like other variety streamers interviewed, Cubeyy's content is not centred around his skill as a player, but rather his personality and relationship with his online community. Outside of *Minecraft* (developed by Mojang Studios), Cubeyy tends to stream first-person shooters (FPS), namely *Apex Legends* (developed by Respawn Entertainment), *PUBG* (developed by PUBG studios) and *Counterstrike* (developed by Valve). However, Cubey regularly mixes it up, playing games from a variety of other genres, including *Fall Guys* (developed by Mediatonic) and *Farming Simulator* (developed by GIANTS software).

When asked what factors influenced his decision to stream a particular videogame, Cubeyy responded:

I think there's two main things I consider. One, is how I'm feeling. In the end if I don't want to stream it, I'm not going to stream it. Two is, I actually have quite a

large *Minecraft* community, a separate discord and I got a website for it, I got merch for it, it's a whole separate thing. And we have a network server, which as three servers within it, so it's quite a large thing. So I do have to ensure that I do go back Minecraft constantly, just not for long periods of time, like I wouldn't do it two or three days in a row but I've got to do it at least every week at some point.

Cubeyy's response reveals an obligation he has to his community to regularly stream the videogame *Minecraft*, and to maintain support and interest for his private *Minecraft* server and associated website and Discord group. However, it is Cubeyy's personal feelings towards a videogame that ultimately influences his decision to stream it, a sentiment that is in line with the other interview participants.

On the topic of whether a game's story or narrative influenced his decision to play it, Cubeyy claimed it was "irrelevant", and preferred responsive, real-time action/FPS games:

I definitely push more toward muscle memory type games because I feel like I'm a lot better at them. Like, a lot of the people I play rocket league with it astounds them the reaction time I can have for some things. And the same thing for PUBG, like I'm not the best player at PUBG but if I see a person before they see me the reaction time is a lot faster. There's a lot of small situations where although I'm not good at the game overall my reaction times for some things are really good and I think a lot of that sort of thing is where I go, like FPS-type games and rocket league and so forth.

Here, Cubeyy describes his preference for challenge focused videogames, with his player skill, particularly during tense in-game moments, forming part of their appeal. In the response that followed, Cubeyy described the possibility of playing more story focused games, something he hasn't any experience in, but is considering for future streams:

I don't play story games, I never have. I do intend to, but I've never played any story games. So that's also very different from my community because nobody has ever gone "oh in the next town, you're going to want to do this" because I don't play those games, so I don't have that community. While only briefly, Cubeyy touches on the types of interactions different games generate between him and his audience, noting how that his live performance, and community interactions, would change as a consequence of playing more story and role-playing focused videogames.

When defining a 'successful' stream, Cubeyy revealed some additional aspects he took into consideration when curating his Twitch channel:

I'm a very big statistics person, like I'll go back and look at my stats - weekly, monthly, yearly everything – and I can see that I get a lot of the larger raids and a lot of the community mingling happens around *Rocket League* and *Minecraft*, so I do intentionally play them again to make sure that there's constant stream growth, but if don't feel like playing I just won't. But it's always put in there for those factors as well.

Here, Cubeyy identifies channel growth as an indicator of a successful stream, revealing the influence growth metrics have on the curation of his Twitch channel. Of these metrics, the most important for Cubeyy is average concurrent viewers.

...I don't really count the follower count as a main statistic... what I base it on is average viewers, I think that's the most important from where I'm at personally...usually at about the two hour mark is the peak. So like, after you start, you get a bunch at the start because of notifications, takes about 7-12 minutes for people to get all the notifications. Discord is fast, Twitch itself can take anywhere up to a few minutes, twitter depends when they open it, so around seven to twelve minutes is the statistics for people finding out that you're live. But about the two hour mark is usually the peak, no accounting for raids and so forth. So if I look back at all of my streams and the concurrent graph, pretty much one-for-one it's at the two hour mark, that's the peak. So I look at the average overall...

This response distinguishes Cubeyy from the other interview participants, revealing the influence viewer statistics have over how he manages his Twitch channel. Cubeyy employs a

statistics orientated approach as part of measuring the success of his streams, informing which videogames he plays or returns to, as well the duration of his streams.

Although Cubeyy does approach streaming on Twitch in ways that resemble a job, he doesn't consider it one:

...I make enough money elsewhere to never consider twitch a job, at this point. That helps me a lot. A lot of other people don't have that same situation which can be very troubling for streamers if they're trying to go full time, that stress is always looming over them which I don't have, which I'm very thankful for.

Channel growth is important to Cubeyy, however, he considers himself free from the stress associated with trying to form a career out of streaming on Twitch. Cubeyy is not financially dependent on streaming, and instead uses his Twitch channel's revenue to regularly raise funds for various charity organisations.

I do a lot of charity streams, I actually chair the meetings for WWF Australia's streamers. So I basically work with them and their paid staff to coordinate the campaigns that they do, the streamers they work with, the host streams and all that sort of shit. So I do weekly meetings with them and I chair those meetings which is a lot of fun.

While reminiscing on moments during his streams that generating a lot of excitement between him and his audience, Cubeyy described a particularly generous donation he received during a charity stream for the World Wide Fund for Nature (WWF):

...this one guy came in, an American guy, and I'd never seen him before, never been in my chat or followed or anything, he came in, he followed, he saw that I was streaming for WWF and someone donated ten dollars and I was explaining to them what the charity does and how awesome the ten dollar donation is and my goal was, like, four hundred dollars, and he came in and dropped four hundred dollars on his own....And I was like "what the hell, who the fuck are you? First of all, nice to meet you". And we were bonding over – unfortunately now with DMCs you can't really do it too much – but we were bonding over music and song requests, got to know him a bit better, found out that he was in some car accident in the past and he had this massive, massive insurance pay-out and he's just trying to spread some love and then he donated a little bit more... the charity and just being happy in general then triggered this massive snow ball effect and goal went from being about four hundred, and being about halfway, to being 600, to that night getting about two and half to three thousand dollars...And I actually ended up getting a tattoo for that, which, because it was for the Australian bush fires, and the WWF logo is a panda, I actually got one of my emote artists to make a panda fire-fighter and I got that tattooed on my wrist.

This instance, while not specifically videogame related, highlights the importance of charity work for Cubeyy and his streaming practice, motivating him to stream not only for his personal enjoyment, but as part of giving back to the community. Given the constant threat of burnout, and the pressure to succeed and grow on Twitch, this charity centred approach to streaming appears to help Cubeyy avoid the negative mental health consequences that can come from chasing viewership metrics as part of growing his channel and expanding his audience on the platform. Additionally, Cubeyy describes how the event inspired both an emote for this channel (i.e. a personalised emoticon that subscribers get access to via Twitch's live message chat) and tattoo for himself.

The remainder of this section will discuss Twitch Transcript 2, which documents approximately 3 minutes of Cubeyy's Twitch livestream of the videogame *Fall Guys* (developed by Mediatonic) from September 2020. *Fall Guys* aligns well with the videogame preferences Cubeyy described in their interview, and is rather simple in its concept: run, jump and grab your way through an obstacle course while racing up to 59 other players. The game has an obvious focus on coordination and correct execution over any role playing, or storycentred gameplay elements. The transcript begins with the gameplay feed displaying a pre match 'loading' screen as the videogame lobby fills up with other players. During this time, Cubeyy is observed getting the chat excited and responding to a recent 'raid', i.e. when a streamer, after finishing their stream, hosts the broadcast of another streamer, sending any of their remaining audience members to the recipient streamer's channel.

Twitch Transcript 2			
Timestamp	Gameplay Feed	Streamer	Chat
1 00:41:48-42:00	Pre-match loading screen.	"Oh what's up thanks for the raid Bal. Bal raid, bal raid, bal raid, bal raid, bal raid! That's how I imagine, it gets louder each time you know? Awesome."	00:41:48 Donut56: BAL RAID! i gtg btw 😒 00:41:55 BalthazarYT: Enjoy Cubeyy
2 00:42:01-14	Pre-match loading screen.	"What's up G- JamesMC1, and Zak- Zakymus. Donut56, how ya going, how ya goin? I gotta go by the way, no worries! Enjoy yourself, enjoy yourself, enjoy yourself" – waves towards camera. "Thanks for the follow before you leave, that's awesome."	00:42:01 StreamElements Thank you for following Donut56 O0:42:06 Cheese7fries: Sorry to hear that my dude @ItsResistant – hope you're feeling better soon 00:42:11 PizzaPotato32: Do you like me badge 00:42:13 SpicyKeb4b: do u like me
3 00:42:15-22	Match begins, a large view of the map fills the screen.	"Enjoy? No you enjoy! Well I guess that would be me enjoy, thankyou! I will."	00:42:20 I saw u dropped in viewers so though I might raid u
4 00:42:23-35	Timer starts (3-2-1) commencing the start of the race. Player- Character (PC) starts race alongside other competitors in PvP (player verses player).	"Do you like me? I love you. I love you already. *laughter* In a British accent – "do you like me badge? Yeah ya badge lookin fuckin mint"- returning to regular voice – "Aw we got a fucking cheater" *deep exhale*	00:42:30 StreamElements Thank you for following SpicyKeb4b 😲

Cubeyy utilises this videogame 'downtime' (i.e. waiting for the lobby to fill) by welcoming new viewers who recently joined from the raid and joking back and forth with the live chat. At timestamp 4 [00:42:23-35], the race commences and Cubeyy approaches his first obstacle, successfully clearing it and moving onto the next. Up until this time, Cubeyy has centred his attention on the live message chat, immediately

responding to participants. At the commencement of the race in-game, Cubeyy's attention becomes divided, privileging the gameplay feed.

In the moments that follow, between timestamps 4 and 13, Cubeyy struggles to successfully navigate several obstacles, making his frustrations known to the chat, and humorously reflecting on his supposed lack of skill: laughing, pretending to sob, and fluctuating from scathing self-criticism and to bravado.

F 00.42.25 44			00.43.30
5 00:42:35-41	PC runs up to the first	"Yo Zak thanks for	00:42:39
	obstacle, a large spinning		Toastjam33: he just has a good gaming
	cylinder they must vault	appreciate that.	chair
	over. They jump over it		00:42:40
	successfully. PC runs up		StreamElements
	to a second large		Thank you for following gjamesmc1 🙂
	spinning cylinder.		
6 00:42:42-52	PC misses the jump over	"Awww I got	
	the cylinder obstacle,	yeeted! That might	
	gets knocked by it, and is	have helped no it	
	launched into the air.	didn't. Jump! Jump!	
		Jump! Aww fuck, it	
		really didn't help.	
		Thanks James for	
		the follow, really	
		appreciate that,	
		welcome on in"	
7 00:42:53-43:00	PC attempts to make the	"He just has a good	
	-	gaming chair, yeah	
	misses again.	see mine obviously	
	C	, is terrible – which it	
		is actually, it's a	
		cheap one. I don't	
		know why I didn't	
		jump there I should	
		have jumped"	
8 00:43:01-8	PC attempts the jump a	"ohhh get up ya	
0 00110101 0	third time, successfully	idiot. Oh this game	
	makes it, and moves on	is, this is a" *deep	
	to the next obstacle – a	exhale*	
	small doorway with a	CANAL	
	large fan spinning in		
	front of it, leaving a		
	small window of time to		
	run through.		
9 00:43:09-15	PC attempts to run	"Get it" *sad	
9 00.45.09-15	-		
	through doorway, is	laughter* "I'm	
	caught by the arm of the		
	large fan and launched	sobbing*.	
	away.		

	Face-cam captures streamers anguish/frustration at missing the jump.		
10 00:43:16-25	PC attempts the obstacle	- ·	00:43:16
	again, and misses.		ApplesnOranges: frustration amirite 00:43:18
	PC quickly attempts the		Toastjam33: guys its fine im sure he is
	obstacle again and	on this map there	lagiing
	succeeds.	we go, alright got	
		this, don't worry	
		we'll win".	
11 00:43:26-33	PC successfully navigates	"Rascal, how's you	00:43:32
	past some triangular	night going so far?"	BalthazarYT: Cubey I had 10 viewers but I
	barriers.	"Yeah I'm lagging	raided someone else and found some
		guys, awahhhhh,	
	Streamer moves the	what this lag?"	lurkers in my chat so raided u man 🏙
	mouse around erratically		
	to simulate internet lag.		
12 00:43:34-38	Approaches next	"Oh what am I at	
	obstacle, another giant	the back now? I was	Pancakecherry98: 🜌
	fan defending the top of	just at the front,	
	a ramp. PC runs up	what the hell? Did	
	ramp, attempting to	you guys see that?	
	jump past the fan	That fan just	
	without getting hit. PC	lagged."	
	gets hit by the fan.		
13 00:43:39-43	PC attempts the obstacle	"That's not one of	
	again, this time	my fans thank	
	succeeding.	god."	

At timestamp 11, after failing a number of obstacles, someone in the live chat comments, ironically, that it is not due to Cubeyy's failings but rather due to lag (i.e. a bad online connection): a classic and tired gaming excuse. This prompts Cubeyy to erratically move his mouse in an attempt to jokingly emulate the effect of lag on the screen. This moment is reminiscent of a response Cubeyy gave in the interview, where they described instances of failure on stream, and how these events would often provide opportunities for chat participants and themselves to revel in the moment, giving rise to jokes and various other social interactions:

I don't play them [videogames] too seriously. I like to have fun and I do like to progress, but I often do play it up for chat, like if I know that I'm about to die in a situation, I'll let it happen, I don't really care, I'll start again, it creates a whole meme. Chat blows up for twenty, thirty minutes about how stupid I am sometimes, it's brilliant, I love it. The phrase "creates a whole meme" refers to the process by which some event, such as failure in a videogame, gives rise to a joke (in the form of a word, term, phrase, image, emote, etc.) that then translates to different contexts, carrying with it the original joke's meaning but finding new, novel forms of expression within different situations. These jokes, while often fleeting, help to engage audience members and are part of a collaborative process with the streamer, influencing the subject of conversations and extending them through the audience's participation in the live chat.

Similarly to playing up moments of failure on stream, Cubeyy also embellishes moments of success, shifting from comedic self-flagellation to the polar opposite – a caricature of gamer bravado. After a series of poor executions, Cubeyy does, in fact, end up qualifying, i.e. placing high enough in the race to move onto the next round.

14 00.42.44 54		() / a sub at sub	00.42.52
14 00:43:44-54	PC runs towards another	•	00:43:52
	ramp, again defended by		VanillaShake22: that's not a fan it's a
	a giant fan.	"Raided someone	
	He misses the jump, and		bean flicker!! 🗪
	collides with an arm of	some lurkers in my	
	the fan, and is launched	chat so raided you	
	away.	man - oh thanks	
		man! I appreciate	
		that, appreciate it."	
15 00:43:55-44:09	PC attempts obstacle	"Oh my god! I don't	00:44:00
	again, and misses, this	remember being	
	time falling off the edge		BeanBurrito44: 🏧 🏙 🖌
	of the map as a result.		00:44:01
		laughter "It's a	20
		beam mercer	BalthazarYT: hahaha 🌂
		raises eyebrows at	00:44:05
		the camera – "We	
		call that a cubeyy".	ApplesnOranges: 🌌
16 00:44:10-14	PC takes a different	"Imagine if I still	
	route, jumping across	qualify. Oh, we can	
	platforms and dodging	forget about that	
	spinning cylinders. After	now."	
	successfully jumping		
	across the first two		
	obstacles, PC trips over		
	but recovers just in time		
	to make it past the last		
	obstacle.		
17 00:44:15-29	Running towards the	"Wait act- is that? I	00:44:22
	finishing line, there are	might have had a	ApplesnOranges: trash
	only 5 spaces remaining,		00:44:24
	with three people in	actually! I do still. I	
			1

	front of the PC. PC passes the finish line and qualifies for the next round.	didn't think l'd actually qualify still."	toastjam33: OMG 🐨 🐨
18: 00:44:30-46	Victory (qualified) screen commences, and then the next round begins to load.	these guys are trash! If I still made it after all of that, these guys suck the fart out of my ass	00:44:40 Cheese7fries: I was 12th. Just sayin 00:44:41 BalthazarYT: alr i gtg cubeyy its 10:00 pm 00:44:43 BalthazarYT:later man 00:44:43 toastjam33: ez first place
19: 00:44:47-55	Loading screen for next round.	"Ayy no worries, have a good night dude. Easy first place, yeah I won that, I won that, I won that first place.	00:44:47 BalthazarYT: have agreat stream bro! 00:44:47 ApplesnOranges: !sr 3 nights dominic 00:44:48 StreamElements:@ApplesnOranges, added DominicFikeVEVO - "Dominic Fike - 3 Nights (Official Video)" to the queue at #1 (playing ~now) https://youtu.be/OWKzRngush4

Ecstatic with his win, at timestamp 18 Cubeyy begins gloating and, prompted by a member in chat, begins trash talking his unknown competitors:

Trash, these guys are trash! If I still made it after all of that, these guys suck the fart out of my ass AND they pay to do it. That's how bad they are.

This moment mirrored another response Cubeyy gave in their interview, where they described struggling to complete a level in the videogame *Wavey the Rocket* (UpperRoom Games Ltd.), and the conversation that ensued.

...there was one level that I was on where it was insanely hard and I think I spent 45 minutes or an hour on one level and we finally go to the end and did this massive speech, like "I want to thank my Dad and I want to thank eddy the moderator, licky for clipping – you're a fucking legend" and there was this whole thing.

In these moments, Cubeyy and the chat feed off one another, with an implicit irony present in both the messages of the chat members and the vocal and visual performance

of the streamer. Messages such as "ez firstplace" alongside frequent uses of the (LUL) emote feed into the Cubeyy's performance, and play into his ironic bravado. While individual streaming communities may interpret the emote differently, it is universally available to all Twitch users, making its use on the platform commonplace and it's meaning relatively stable, with it typically being used to communicate laughter – similar to the acronym 'LOL' (laugh out loud). As the transcribe reaches its end, Cubeyy's energy lowers and attention shifts to the live chat once again, as he prepares to enter the second round of *Fall Guys*, on his quest for first place.

Captain Perth (variety streamer)

Captain Perth is a Perth-based variety streamer who plays a broad range of different video games, with a select few he returns to frequently - primarily *Destiny 2* (developed by Bungie), a sci-fi, massive multiplayer online first-person shooter, and *Dark Souls* (developed by Fromsoftware), a medieval fantasy, third-person action game. Additionally, he shows his support for independent developers by regularly streaming a variety of indie games. Following the trend observed in previous interview responses, Captain Perth considers his enjoyment the "biggest" factor when deciding to stream a videogame, claiming it both improves the content of his streams and aids in combating 'burnout', i.e. streamer fatigue.

...I'm a big fan of supporting indie developers where I can... [The] biggest factor is going to be my own personal enjoyment, and the reason that is, is to combat things like burnout ... My biggest concern is that, when I am streaming, I want to ensure people are enjoying watching me play something, but that also relies on me actually enjoying what I'm playing.... [I mainly choose] things I know I will get a little bit of longevity out of and will enjoy playing. I tend to really like narrative based games, and I quite enjoy difficult games as well.

Continuing his discussion of burnout and the importance of his own enjoyment while streaming, Captain Perth went on to discuss some of the challenges associated with building an audience on Twitch.

...I think some of the bigger streamers, they are able to turn that actor shit on, as they need to, but not everyone has that ability – I'm definitely not one of those people. If I'm not enjoying a game I think it shows quite obviously *laughter*. That's another thing, burnout is a very real thing in streaming. I know plenty of people that have either completely left their channels or I haven't heard from or seen them again because I think they just went too hard too fast on games that maybe they weren't particularly interested in... people become known for that game and then when they stop playing it they have the reverse vacuum, where their viewership drops and then those people take that very personally when, I mean, obviously you shouldn't take it that personally because those viewers were obviously there for the game. That's kind of why I like the variety because I'm capturing people from lots of different little pockets and they're more likely going to be there for me if they stick around than for the game. I think overall, it's a stronger way to build a community, because you're getting people from all different walks of interest and whatnot.

In his response, Captain Perth identifies a problem that streamers can encounter when building an audience around a specific videogame, and the consequences that can ensue when attempting to branch out or move away from that videogame. Variety streaming appears to be a solution to this problem, at least for Captain Perth, as it brings fans of multiple, different videogame genres to his stream, with his personality being the main draw for viewers, rather than the videogame itself.

When measuring the success of his streams, Captain Perth tends to focus on the types of interactions he has with the live chat, his mental state during and immediately after a stream, alongside any additional subscriptions or donations:

... if a little money is involved that's also great, but I do think the more successful streams for me are when I walk out of my room and go "that was great!" because I lost track of time, and I was really in depth with what I was doing.

Captain Perth's approach resembles SpamBrah's, with him preferring to ignore his Twitch statistics to avoid placing undue pressure on himself and the possibility of burnout. In his interview, he also noted the often damaging effect "viewer counts" can have over streamers' content and their general disposition while streaming. Viewer counts refer to the number of concurrent viewers in a stream at any given time, a number that can be made visible, or not, to the streamer via the Twitch interface while they are streaming.

... if you are streaming and you can see your viewer count you might, in your mind, be like "aw I don't need to be as *on*, because I don't have as many people here", whereas viewers will be coming in and out of your stream and they might be there because you are *on* in those moments where there only are a few people in that stream. So that's why I have my metrics turned off because I don't want it to affect me as a streamer and I just want it to be more of a natural experience so people will know what they are getting all the time. So, I never really know how many people I have in my chat, its purely based off the interaction I see coming through the chat.

Captain Perth identifies the potentially inhibiting effect the viewer count can have over his ability to be "on", i.e. actively engaging viewers, minimising down time, conversing with chat and regularly narrating gameplay. Rather than let the viewer count influence Captain Perth's performance, he chooses to ignore it entirely, focusing instead on live chat engagement to guide his performance and interactions with the chat.

When going into further detail regarding which videogames worked well in a live streaming environment, Captain Perth responded

I think *Dark Souls* works well because (a) I enjoy the game so I know that I'm going to get enjoyment playing it on stream, but I think dark souls works well community wise because there is a lot of investment in your character... [t]he game itself it has an inherent risk with your character potentially always dying and it can be quite hilarious when you do put everything on the line and it, you know, goes to crap essentially. So I think that translates well in a streaming environment. Another good thing about *Dark Souls* is there is so many ways you can play that game, so I think people are inherently interested in the way that you approach the game. You can have a good amount conversation about the game, its fairly open ended in terms of the story, the story of the game is very littered throughout it – it's not given to you on a silver platter so you can kind of make

your own interpretation of the story and discuss that with your viewers. Or, you can discuss how you're approaching the game in terms of what builds you're doing. I suppose a lot of games have that, but I think Dark Souls is kind of unique because it does have a community behind it, and that's probably another thing that's worth mentioning, is that drawing on the communities that follow a particular game is also quite a useful thing.

Dark Souls (developed by Fromsoftware) is a hugely popular videogame franchise with a large online community of fans and content creators, and Captain Perth's response highlights the number of ways it appeals to both streamers and spectators within live streaming environments such as Twitch. Importantly, Captain Perth notes its appeal in both mechanical and narrative terms, praising the multiple ways it can be played, as well as the multiple ways its story may be interpreted and understood. Both translate into opportunities for Captain Perth to engage his viewers, while also providing him with enjoyment.

Although Captain Perth considers himself a variety streamer, he occasionally participates in speedruns, specifically of the videogame *Dark Souls*. When describing his experiences speedrunning on Twitch, Captain Perth noted

... the speedrunning community is like, even a further subset of that game's community... they tend to be more hardcore people so it tends to be more indepth, meta knowledge that is getting response[s] from these people, if that makes sense... it's just a whole new ballpark essentially when it comes to streaming those types of things on Twitch because of the kind of calibre that you're going for in terms of the understanding of the game and what you're trying to get out of it.

Inquiring further, the researcher asked how speedrunning influenced interactions with his live chat, to which he responded

It definitely comes down to more strategy, or, you know, there are still generally people who want to know what you're doing that maybe aren't speedrunners... But yeah, for the most part I'd say there's definitely a lot more, sort of, talking about strategy... Following this response, Captain Perth went on to discuss some difficulties that come with speedrunning on Twitch, and its effect on how he interacts with his audience.

...one thing we do is every time we get a subscription to the channel, I chuck, like, a butterfly clip in my beard, it's kind of like a recognition of that person supporting the channel. Obviously, when speedrunning it's kind of hard to put the controller down and put that in the beard, whereas in a variety stream you could probably pause or take five seconds to do that, so I'm kind of bridging these two walks of streaming I guess... I mean some speedrunners will just not even look at chat or recognise any donations or anything like that, so obviously that's quite different from my stream currently - not that I think I'd ever become like that because I obviously want to recognise those people supporting the stream in that way, but I do think my role is quite unique. I suppose because of that fact I have been streaming variety for so long and my stream has been built up around these sort of aspects and now trying to ensure those aspects are still maintained through my streaming, even whilst doing things like challenge runs which obviously require a fair bit of focus, and it can be difficult, but I enjoy it.

Captain Perth's response reveals a tension in how he directs his attention moment to moment while speedrunning. Given the demanding nature of speedrunning, it can potentially limit Captain Perth's responsiveness to his audience, making it harder to for him pause, thank, and celebrate spectators for their support and contributions to the channel. Additionally, Captain Perth's celebratory ritual, of placing a butterfly clip in his beard to represent each subscriber, highlights the different approaches streamers have for expressing appreciation, and the methods through which streamers communicate, to subscribers and donators, their importance and inclusion within the community.

When asked how important a videogame's *challenge* was when deciding which game to stream, Captain Perth responded

...I tend to like games that have difficulty behind them... [I]f I go to play something that has difficulty settings, I'll choose either the hardest or second hardest rather than the normal run through... I think that comes down to me thinking well I'm going to struggle at it more, in that way, it does become more of a challenge for myself and I think that translates well to a streaming environment because people become invested in that playthrough.

Captain Perth followed this response by providing an example of when a videogame's challenge had a positive effect on his stream

...Destiny 2 has these dungeons that are intended to be done with three players but you can challenge yourself to do them solo. So I was trying to do a solo flawless run, which means no dying, of this particular dungeon called 'pit of heresy' and I did on two out of three of the characters and fell of the destiny 2 bandwagon for while, hence why I didn't finish it off entirely. But I think the positive response for me was [that] people recognised, because I did complete it, that I could do it. And then I got a lot questions regarding builds and all that kind of stuff. So to me that was positive because it, kind of, further built that community and people came to me as a place to sort of understand to the game better I suppose.

Here, Captain Perth identifies a degree of legitimacy and expertise afforded to streamers who can take advantage of a videogame's high skill ceiling. Being able to play videogames at high level can attract community support, and potentially establish the streamer as a pillar within that gaming community, with players of various skill levels joining the stream to learn and improve their ability to play a particular game. This an area I will explore further this chapter when discussing the interview responses of the speedrunner streamer Raikou.

The topic then shifted to *narrative* in videogames, and how important a videogame's world, setting and story were when deciding which videogames to stream.

I'm just such a narrative-buff. For example dark souls is just in my opinion the, I don't know, it's like the perfect videogame and just the way it introduces the story is just so unique. I really enjoy discussing lore and trying to understand other people's theories on certain things based on what they've read and seen within the game, and how certain things like level design and item placement and descriptions and, you know, dialogue all come together to create, like, these

different people's theories on certain aspects of the game. So for me, narrative is insanely important... I think challenge is also very important but I treat videogame media very much like I do novels and stuff like that. I like to be able to immerse myself... I don't mind how I interact with a videogame if the story is genuinely impressive.

Captain Perth's view here contrasts with Cubeyy's interview responses above, with him identifying himself as a "narrative buff" and noting that it is the biggest draw when it comes to deciding which videogame to stream. Like SpamBrah, Captain Perth has a strong personal connection with other forms of storytelling, including novels and cinema, which videogames often draw from as part as their world-building, character development and narrative structure. This connection feeds into his appreciation of videogames, along with the types interactions he wishes to cultivate on his Twitch channel.

When discussing the influence a videogame's narrative had over his interactions with the live chat, and his moment to moment performance as a streamer, the conversation turned to Captain Perth's use of 'voices'.

Generally, if I do voices, it tends to be in jest or just a sort of stupid voice but I'll always read through things, and evaluate the story... [Y]ou know sort of discuss how good I think it is or how bad I think it is depending on whether it's a newer game. But obviously I like to get into the nitty gritty of a story and discuss its finer elements and maybe theorise... [j]ust throwing in random voices here and there, is positive regardless, I mean you tend to get a lot of people that think it's quite funny, people will be like "oh you should try voice acting" or whatever else and that's obviously a positive thing in itself. I think generally, the reaction of people when you do a voice is – it humanises you in a little way, rather than just being a person on a screen because you're having a bit of fun with it.

Although Captain Perth regularly adopts different voices while streaming, this is not out of a conscious effort to perform every line of dialogue on behalf of the videogame, but rather something he appears to do intuitively as part of having fun as a streamer. As Captain Perth notes, his voices are largely "in jest" and, outside of entertaining his audience, help to humanise him. In this sense, Captain Perth's voices provide a creative outlet for him while

streaming, one that helps him express different sides of his personality while playing and performing, while also keeping the stream light-hearted and jovial.

The remainder of this section will focus on Captain Perth's Twitch Transcript, which documents approximately five minutes (with a short break at timestamp 17) of Captain Perth's Twitch livestream of the videogame *Mortal Shell* (developed by Cold Symmetry) from August 2020. Mortal Shell is a third-person action game, pairing an abstruse, dark medieval-fantasy narrative with challenging, timing and reaction based combat system. The transcript begins with Captain Perth reading text from the gameplay feed in a dramatic, old man's voice.

Twitch Transcript 3.	witch Transcript 3.			
Timestamp	Gameplay Feed	Streamer	Chat	
1 [00:34:14-25]	White text appears on	Reading the text on screen,	00:34:22	
	screen with nothing but a	in an old wise voice –	Hous3cat87: I shall lurk	
	black background.	"Fallgrim, a tower hums,	00:34:24	
		where a muted dweller,	Friendlypanda2: You have	
		ruminates his fate"	the mightier bead hahaha	
			and them sexy sytles 🐨	
			can't compete hhahaha	
2 [00:34:25-40]	Player Character (PC)	"Ahhh!" – in a dramatic,		
	spawns in new location	scared voice.		
	after the game's tutorial.	Returning to his usual		
	PC begins lying on the	voice - "Where am I? What		
	ground in a swamp-like	is all this shit around me,		
	area, before standing up.	are they bones?		
		Are these Boo-ans?		
		Where am I?"		
		Again, this time in an old,		
		wise sounding voice –		
		"Where am I?".		

At timestamp 2, Captain Perth adopts another voice ("Ahhh!") assumably on behalf of his player character in response to the foreboding message read during timestamp 1. Captain Perth than begins to reflect on the in-game environment in his usual voice, confused as to how the player-character arrived there and ponders the bones littered around the area. From these first two timestamps, the transcript highlights Captain Perth's frequent use of voices which, whether intentional or not, help to delineate his personal observations and thoughts from those borne of role-playing, and reading from, the videogame.

3 [00:34:41-45]		Looking towards the	
	climbs inside and begins to		
	crawl through it.	worries! Ay	
		[Friendlypanda2], don't	
		even! Ya sexy beast"	
4 [00:34:46-56]	PC continues crawling	"You might have the	
	through tunnel.	prettier beard umm them	
		sexy hairstyles, can't	
		compete – hey! Mate,	
		mate it's not about	
		competing it's about just	
		being you. Like I said, gotta	
		get out there, fuckin enjoy	
		life". *Laughter*	
5 [00:34:57-35:01]	PC continues crawling		00:34:58
5 [00.54.57 55.01]	through tunnel.	bloody good Sunday	1stMateBot: Want to help
		though, you bloody leg-	support the Captain?
		ands"	Consider subscribing! Each
		anus	subscription or donation
			>\$5 during a stream will
			add a bauble to his beard!
6 [00:35:02-6]	PC continues crawling	"It's kind of weird, the	
	through tunnel.	texture of this guy kind of	
		disappears, you noticing	
		that?"	
7 [00:35:07-13]	PC continues crawling	"This is a very long -also	00:35:12
	through tunnel.	what's going on with the,	Tiger45: It's take away day
		like, it seems like gravity is	team. What cheat meal do
		moving."	l commit to
8 [00:35:14-21]	PC continues crawling	"So did that big fish take us	00:35:19
	through tunnel.	to" – changes voice to wise	Friendlypanda2: well will
		old man – <mark>"the mortal</mark>	you loan that sexy bread
		realm?"	for a night out 🐨 will give
			it back in somewhat same
			condition 🐨
9 [00:35:22-29]	PC continues crawling	"What cheat meal do I	00:35:23
	through tunnel.		XElephantx7:
			Mega HSP @Pandyliciou
		[Friendlypanda2]?	00:35:27
			88Goat88: big realm
			changing (loading)
			moment
10 [00:35:30-6]	PC continues crawling	*laugher*	00:35:35
	through tunnel.	"[Dingo45], thankyou for	Puppy35: I love Capt
		the follow welcome on in	dearly, but I think my
	Notification pops up,	fam, how ya doin?"	haircut is better hehe
	indicating a new follower		
11 [00:35:37-52]	PC continues crawling	"Wow, okay gravity, yeah	
	through tunnel. The turns	wow." Turns to the camera	
	within the tunnel	– "A big realm changing	
	becoming more erratic and		
	surreal.	think you're right there	
		[88Goat88], they're doing	
		some serious fucking	
		loading stream, screm,	
L		iouung su cam, su cm,	

scream, screen. *long
exhale* "My brain ain't
working today".

At Timestamp 3, the player-character enters a long, winding tunnel, slowly moving through it. This provides Captain Perth some videogame downtime in which to direct the audience's attention to the live chat. This involves some playful teasing between him and some chat members over "sexy beard styles". While Captain Perth is still playing during this time, he appears to be prioritising the live chat, trading compliments, and responding to questions. At timestamp 6, Captain Perth returns his attention to the videogame, perplexed by the long and winding tunnel. This prompts Captain Perth to begin drawing connections between the long tunnel and the videogame's lore, again employing the old man's voice for dramatic effect:

So did that big fish take us to - changes voice to wise old man - the mortal realm?

At timestamp 11, Captain Perth responds to a message in chat, this time pondering the tunnel's significance, not in terms of the videogame's lore, but it's more technical aspects, i.e. hiding a 'loading screen' by having the player character slowly crawl through a tunnel for an extended period of time.

12 [00:35:53-36:01]	PC exits the tunnel, standing up, sword in hand.	"Wow look at my health bar, its tiny what the fuck. Okay, so my health bars gone from something to nothing, so something's changed right?".	
13 [00:36:02-11]	PC begins to explore immediate area, with the camera (under the streamer's control) centring on a large rib cage.	"I'm in a different area. Mmm ahh, what is that ribcage, is that the fish we came here in? Is that what's left of the fish or something?	
14 [00:36:12-18]	PC walks back to the tunnel entrance, testing to see if they can re-enter. They cannot.	"This is interesting, why did we come out of there? Can I go back in?" – voice switch to dramatically sad – "take me back".	
15 [00:36:19-29]	PC continues down path away from tunnel when a face/mask is seen attached to a wall, surrounded a	"What is that on the wall? Can l jump? no. What is that?"	

	large symbol. PC swings their blade at the face.		
16 [00:36:30-36-	PC continues to swing blade at the face on the wall, before moving on.	"What a heck is that!?"	
17 [00:36:37-44]	Player enters a menu system and begins to search around.	"I love capt dearly but I think my haircut is better – your not wrong, your haircut is most certainly better." *laughter* "Hmm, compendium."	

Upon eventually exiting the tunnel, between timestamp 12 and 17 (see above), Captain Perth pieces together both gameplay and narrative elements (e.g. the size of his health bar and the littered fish corpses that surround the player character), attempting to better understand the game. For this portion of the stream, Captain Perth's attention is primarily directed at the videogame, with responses in the live chat slowing down. At timestamp 18 (see below), Captain Perth is again observed using his signature old man voice, this time to comedic effect, while a chat member makes a joke in reference to the player character being absorbed into a lifeless suit of armour: "So this is a hermit crab simulator". This prompts Captain Perth to respond at timestamp 19, amused by the chat member's joke. He then returns to narrating on behalf of the game, before momentarily returning to his usual voice to segue into another joke.

		Time Break	
18 [00:37:47 - 59]	PC approaches a suit of	*In a creepy old-man	37:52
	armour sitting lifeless	voice* "Hello friend,	Tiger45: So this is a hermit crab
	on the ground. The PC than is absorbed into	Touch you on the face."	simulator
	the armour, now	*Normal voice* "Okay	37:59
	wearing it as their	so we've inhabited this	Organic_ant2: You're gonna
	own.	shell, what's going on?	crawl up his ass and control him
		We've become the	
		man?"	
19 [00:38:00 - 29]	Player brings up the in-	"This is literally hermit	38:11
	game menu.	crab simulator – good	Twitch Prime Subscription
		point, that's literally	notification for Mad_Donkey55.
		what this is"	
		*Reading item	
		description on screen*	
		"Unknown shell, a shell	
		of a man *In an old man	

		voice* is more than just a sleeve". God, tell that to my wife *fake laughter* Not really, don't say that to her."	
20 [00:38:30 - 51]	CAPTAIN PERTH raises his arms in celebration	months! [Puppy35] I owe you a beard bouble as well mate. Thank you	38:37 Puppy35: Pink please 38:47 Mad_Donkey55: BLUE

At timestamp 20, Captain Perth begins thanking and celebrating users who have renewed their subscriptions to the channel, performing his customary ritual of placing a coloured butterfly clip to his beard. Importantly, spectators are given the opportunity to decide on their choice of colour, giving them a small reminder of their personal contribution to the channel. For the remainder of the Twitch transcript, timestamps 21 – 23, Captain Perth regularly switches his attention between conversational banter with his live chat and engaging with the videogame. Regarding the latter, Captain Perth's approach while playing centres around understanding the deeper intricacies of the videogame: both how to play it *and* how to interpret and understand the videogame's lore and broader themes. This can observed at timestamp 21, where Captain Perth's gameplay mechanics, and his 'narrator' voice, communicating on behalf of the videogame.

ontinues navigating nenus on-game, eading description of ne 'shell' recently btained. layer then exist the nenus, and begins to roceed through the nvironment.	A man is more than just a sleeve! *normal voice* You want blue, you got it! Muchas gracious indeed, how is the new vee-hi-cal?" "Now what does resolve mean, nope didn't mean to do that. Oh man, the menu-ing takes so long to go through. Abilities *In a dramatic deep voice* Seek name. You must discover this shell's name to awaken its power! *Normal Voice* Okay, seems like we have the option to take tar, which is going on down the bottom. Now I might actually change my position so you guys	39:02 Puppy35: Nice choice, they go well together 39:05 Happy_Frog64: @Mad_Donkey55 u 39:07 Mad_Donkey55: It's amazing!!! I love it 39:12 Puppy35: And brings outr the
	can tell what's going	purchase of the year
	can tell what's going on.	
oesn't cover the ottom right corner which includes the layer health and tamina bar). APTAIN PERTH ontinues exploring the nvironment in-game	guys can see the health bar better now. How about here, nah I'll go here so I take up less screen real estate." *laughs in a raspy, dramatic tone* "[Happy_frog64], how are ya [Happy_Frog64]? Good to see you brother." "Okay, so it seems like it's the same shell *looking at the chat* "Brings out the colour in Capts eyes! You beautiful bastard, now Eg I hope you had a wonderful birthday yesterday man, seems	39:59 Happy_Frog64: yooo nice webcam fades that's lit
	"Yeah, you like it dude?	40:16 Mad_Donkey55: It's hella pog
Al or	PTAIN PERTH ntinues exploring the	dramatic tone* "[Happy_frog64], how are ya [Happy_Frog64]? Good to see you brother." "Okay, so it seems like it's the same shell *looking at the chat* "Brings out the colour in Capts eyes! You beautiful bastard, now Eg I hope you had a wonderful birthday yesterday man, seems like did." "Yeah, you like it dude? Little something I whipped up. Little something something. Oh! Where in *deep

Given this approach tends to produce fewer intense videogame experiences (at least, in terms of the highs and lows of victory and failure), Captain Perth regularly employs voices to entertain his audience and takes part in frequent moments of reflection, giving spectators access to his thought process and manner of problem solving. In this sense Captain Perth's stream is less concerned with riding the highs and lows of online multiplayer videogames, relying instead on an inherent curiosity that drives his progress within the game and inspires regular discussions with the chat.

Raikou (Speedrunner)

Raikou is Melbourne-based a speedrunner/streamer who has been streaming on Twitch since 2014, and is best known for playing the videogame *Digimon World* (developed Bandai and Flying Tiger Development) for which he currently claims the speedrun world record (at the time of writing). When deciding which games to stream, Raikou tends to choose older games he enjoyed as a child (particularly PlayStation One titles) with a focus on capturing his own, as well as viewers', nostalgia for these titles.

... it does catch a lot of people with nostalgia, depending on what game I'm playing. If I'm playing a more obscure classic PlayStation one title, people rock up and they'll be like "oh I remember this game from my childhood! I could never beat it" or something like that and they get hooked on watching because they get to see it finally beaten and get to see what the game was going to be like if they'd reach the end. And so, it's nice to be able to catch those people, and I do it multiple times in a stream so if someone is late rocking up, they still get to see the end of the game because I'm going to do it again anyway.

A key part of streaming as a speedrunner is chasing a new personal best (PB), which involves completing a videogame in a very short amount of time, inevitably leading to multiple runs within a single stream. As Raikou notes above, this means that viewers can "rock up" at different points and still get to see the playthrough in its entirety, albeit from different starting points. Additionally, Raikou's response alludes to a certain vicarious enjoyment amongst his

viewers that comes from watching him bend the game to his will, and seamlessly defeat bosses or areas that seemed difficult, even impossible, as a child.

Besides *Digimon World*, Raikou has a relatively small selection of other games he streams, namely 2D Sonic the Hedgehog games (originally developed by SEGA) and the PlayStation one title *Tomba* (developed by Whoopee Camp). This contrasts with the variety streamers interviewed, whose library of streaming titles were ever rotating and expanding. When asked whether he was known for streaming a particular videogame genre, Raikou replied "not really", with the common thread between his streamed games being his childhood nostalgia and his ability to speedrun them. As a side-note, Raikou mentioned how often the game *Tomba* attracted viewers who had played the game on a demo disc when they were children (an experience this author can also attest to).

... a bunch of people got that demo disc with their PlayStation or from a magazine or something and they only got up to a certain part of it. So the amount of times I hear in my stream that these people have only played up until this certain point is just – I hear it so much, it's ridiculous. It's crazy to think how many people have actually gone through that... When I play it, I get a certain audience that loves it, so it's hard to find something that relates to that and that's what I mean when I say it varies, it definitely varies, I'm not stuck to one genre basically.

Raikou's response highlights the fact that his streams are not bound to a specific genre of game, with his Twitch content instead focusing on a select group of titles for which he holds nostalgia and, importantly, and high amount of skill and knowledge.

When asked to define a successful stream, Raikou followed a trend observed in previous interview responses which emphasised chat engagement over the number of concurrent viewers.

Numbers are not really a big factor for me, a successful stream for me is really having people hooked on what I'm currently doing. So to have any kind of compliment or something that pops up in my chat, or someone who's said "hey, wow! I can't believe you're playing this game. I really like this game and I'm so glad I get to see it being run right now" or something along those lines – that to me hits different than seeing my viewer count go into a higher number. So, I want chat engagement basically. I think that's pretty important when it comes to the success of a stream.

Raikou's response here mirrors the responses of other interviewed streamers, highlighting again the importance streamers place on community interaction. In particular, Raikou's example of a positive message reveals the satisfaction he receives from sharing his nostalgia and love for certain videogames with members of his audience.

In response to the question "how important is it that you enjoy playing a game in order to stream it?" Raikou noted that it was a factor, but emphasised the importance of his audience, in terms of how people responded to a game, and the type of audience certain games attracted:

[My enjoyment] is pretty important. It does also kind of sit with me as well if it is a game that doesn't sit well with my audience. So I do tailor what I play to who enjoys it. For example, I run Sonic the Hedgehog games as well, specifically the classic era games, so Sonic the hedgehog 3, Sonic mania – which is like the most recent classic sonic game-style, and those games they have a different audience to what mine normally would get. And that audience is just different, I can tell they're different in my chat and stuff, they'll say different things, they'll act differently and it kind of doesn't resonate with me that well compared to the audience I get for my PlayStation one era titles.

The fact that Raikou distinguishes between spectators he does and does not "resonate with", highlights the extent to which different videogames can influence streamer viewership and, by extension, the types of conversations that may take place during a stream. Raikou elaborates on this further, commenting on the demographics and types of conversation different videogame titles attract:

...it is very community driven and you can tell when there's a different interest involved between the communities you're streaming to. Sometimes you get a younger audience because there are more younger viewers that are interested in *Sonic the Hedgehog* than there is for PlayStation one era titles that the younger audience have not played before because its pass their time you know. So yeah, you do notice that kind of stuff.

Raikou's response identifies a generational difference amongst different fan communities which, in turn, influences the audience he attracts when streaming different videogame titles. Notably, speedrunners are less able to tailor their content to trends on the platform compared to variety streamers, as the decision to *speedrun* a game requires some additional considerations. Most importantly, these streamers must choose titles they are *capable* of speedrunning: in terms of their skills and ability, as well as the mental fatigue that can comes with practising and completing a videogame, over and over again.

When asked whether he played differently streaming compared to privately, Raikou responded "absolutely", bringing to focus the time and labour involved in speedrunning a videogame on stream.

So because I'm a speedrunner right, I'm always playing to be the fastest. So when I'm streaming it and I have a route set in mind, a goal time to get. I'm absolutely playing it way differently than when I would just enjoying the game casually. And I find that, when I've done speedruns of game, it's really hard to play that game casually anymore. So, when picking a speedrun, I have to be ready for that to be the case. I need to have it set in mind that hey this game is never going to be the same again. It has to be the one I want to play multiple times through and not get tired of it, otherwise it basically doesn't become my favourite game anymore.

Speedrunning a game takes on a different form than casual play sessions and, as Raikou describes above, deeply affects a player's relationship with a particular title.

...it does kind of become a Catch 22, where you're like, do I want to throw this game in the bin or do I want to take the risk of that rather. Obviously there are times where you could speed run something and it could stick for a long time and then it's not a problem, but you could also could turn it around, where it gets to a point where I really don't want to look at this game ever again after doing it.

Raikou identifies a tragic irony when deciding to speedrun a particular title. There's a real threat that by speedrunning a game they enjoy, speedrunners will not only potentially grow tired and bored of it, but they may also never be able to enjoy it casually again.

Akin to traditional sports, competitive speedrunning bears with it several imposed rules and guidelines that determine both its type and legitimacy. In one of his interview responses, Raikou elaborated on what *was* and *wasn't* permitted in speedruns:

It's actually kind of a mix, it depends. We have a leaderboard on this site called speedrun dot com. Every, well not every, but a lot of games will have their leaderboard put on there. They'll have the game and they'll have a category. The category will set arbitrary rules and those rules will determine what you can and can't do in the run. So you've got the very 'base' run which is any per cent. Any per cent is beat the game as fast as possible, no limitations. Except for using proper cheats or game shark or anything like that to do just give yourself and advantage... And then you have categories like 100%, which is get the 100% confirmation and do that as fast as possible... there's also any per cent glitchless, any per cent no major glitches, there's all sorts of things and they're all defined in their rules what kind of requirements, what you can and can't do and stuff like that.

Raikou's above response highlights the many rules that comprise different speedrun categories, referencing the website speedrun.com as the main nexus point for accessing leaderboards and guidelines. Key to defining the type of run is, firstly, the required outcome for completion. For example, a '100% run' typically includes collecting every item and completing every quest/objective the game has to offer, as compared to 'any %' which just requires the player to reach the end of the game. Secondly, runs are categorised based on their allowance of glitches, sometimes fragmenting into additional runs based on which glitches are, and are not, permitted (e.g. major vs minor glitches). A third element that factors into the type and legitimacy of the run is the use and acceptance of emulators, which allow players to run videogames originally released for (and often exclusive to) videogame consoles on their personal computers. Although these are not the only factors that influence how speedruns are defined and categorised, they are illustrative of the methods through which speedrunning

communities attempt to maintain fairness and preserve the play practices associated with previous speedrunning records.

Upon being asked to recall an instance when they did something on stream that elicited a large reaction from the chat, Raikou identified glitches, i.e. in-game malfunctions, as source of excitement in the chat.

So these things happen within speedrunning where a random glitch will happen and it will just be out of nowhere... Because you play through a game so many times, you'll find a new thing that's never been done before in the game, where you'll just clip through a wall or something and then you're stuck and it's like "okay that not a usual thing that happens". And those kinds of things will drive a huge reaction in the chat and there is just like "what is happening?" and everyone's like typing capital letters, they're all popping off. So you can have situations with speedrunning any sort of game where that kind of stuff will happen.

... Digimon World is entirely RNG and what RNG is, is Random Number Generator - it basically determines every random element in the game. So you'll get to a random part on the game and your RNG will be a completely random number and actions that an AI or NPC will take will be unpredictable. And, it will be so unpredictable that something crazy will happen and it will just end your run... there's a specific example, there's a mini game in Digimon World where you play curling. And you basically just need to beat this penguin at curling... you slide the puck on the ice and you have to get into a certain ring... you get a puck that kind of sticks in the ground and stays in one spot, and can you use that to block the AI, and the AI will just constantly go for it. And that's the easiest way to win it. Sometimes though, the AI can just be god-tier smart, just out of nowhere, and it can do some crazy stuff and do some amazing shots that I couldn't even conceive, and when that stuff happens I'm just like dumbfounded looking at my screen and chat's like losing their mind and clips get made and all sorts of stuff happens with that. So yeah, there's a lot of situations like that that can happen.

Glitches and bugs encountered while playing are a common source of excitement (and disappointment) in Twitch streams. They can be incredibly rare, making their occurrence somewhat mysterious, attracting the curiosity of spectators and streamers alike. However, they are a regular threat to speedruns, breaking 'the run' by behaving outside the carefully considered strategies of the speedrunner. That is, of course, unless glitches/bugs are themselves part of the speedrun. Within the speedrunning community for any particular game, there exists different 'runs' that come with specific rules, e.g. 'Unrestricted' (glitches allowed) and 'Glitchless' (no glitches allowed). These rules establish different types of 'speedrun' for the same videogame title and carry with them respective world records. While glitches in some contexts can ruin a speedrun, in others they can be central to achieving the world record.

Another type of event that would elicit audience reactions during streams were difficult, 'frame-perfect' button executions. During a speedrun, precisely timed button presses can be the difference between restarting a run and achieving a new PB and, the more difficult they are, the more impressive they can be for spectators. In his interview, Raikou described a 'skip' he would use in speedruns of the videogame *Tomba* (developed by Whoopee Camp) to prevent a text prompt from appearing that would force the player to be idle for 5-6 seconds.

...with tomba a lot of the inputs in that game are frame perfect. So, you got some tricks that involve skipping – I'll explain a bit first. When you pick up an item or something like that, what pops on screen is some event text... [It] stays on screen for about five to six seconds before going away, and it freezes you in place so you can't do anything when that text comes up. However, there is a certain item you pick up out of a chest – it's a pig bag, and use that to capture the pigs which is the entire quest you're on, capturing evil pigs and trying to save the world... So what you do is, you can pick up the bag as your flying away from an area – like fast travelling - and the way you do that is you frame perfectly press your pause button and open your inventory just before you collect the bag. And that skips that five to six second event text from coming up because you're leaving to another area while that's still on screen...

Given the difficulty of executing this skip, Raikou noted regular members in his live chat who would not only notice it occurring, but notice how 'cleanly' he was able to execute it. ...when I'm playing Tomba, I'll have a select few people that are just the usuals that will be around for that and they will see it and they will pop off as soon as it happens, every time. Especially when I do it so clean, like there are methods that I can do... like, I normally buffer them, buffer the one frame. What that means, is I can pause a frame before and I can do a certain input that will buffer it one frame down and that way I can fix the problem if I miss it by just one frame or two frames. But, I could also do it really clean where I just hit the frame perfectly. And then people recognise that, and you know, pop off over that.

Importantly, Raikou's above response reveals a form of audience satisfaction associated with how clean, or smooth, his precise button inputs are, and additionally, the audience's ability to comprehend visually what Raikou is attempting without seeing his hands or controller. This points to a certain literacy speedrunning spectators can develop while watching these streams, informing how they understand and interpret Raikou's live gameplay.

When defining the type of speedrun his *Digimon World* record fell under, Raikou discussed the speedrunning community at large and their role in determining what is/is not considered a glitch or exploit in a videogame. He then went on to describe the technique of RNG manipulation in further detail:

A common opinion in the speedrun community is that RNG manipulation – what we call the method I'm using – we consider it not a glitch. So it is actually within the bounds of the game. It is not abusing an exploit in the game. It is just working with what the developer coded. The way that works is, your starting RNG value is always the same when you reboot the game, so when you reboot your console you have this same number every time. Then certain actions will push the RNG to a different number. What's meant to happen in a lot of games, is the RNG will advance every frame, so that way it is very hard to manipulate. So unless your frame perfect with every button input in a 60fps game you can't really do that.... [In the videogame *Beyblade*], it only does it is by certain actions. So what I was able to do was, restart my console, start fresh, new game, and then go into the tournament mode, and when it started the game I was able to hold a direction on the d-pad during the battle. And if I did that, the same thing was going to play out every single run I did...

Given that Raikou's RNG manipulation is borne of out of the game's design, i.e. within the bounds of the game as intended by its developers, this speedrunning technique is not considered a form of glitch. It remains, however, an impressive trick of sorts, allowing Raikou to anticipate events in-game before they happen. Elaborating on this point, Raikou described using an RNG manipulation technique while performing a speedrun of the videogame *Beyblade* (developed by Crave) at ASM 2019 (Australian Speedrun Marathon).

I actually ran this run at ASM 2019 at the avcon stage and because the RNG manipulation is so easy to do, I was able to get to the last fight in the tournament and I was able to get up from the stage, put my controller down and walk into the crowd and let the run finish itself, because the RNG manipulation had me press no buttons and the fight just won... I got to be in the crowd and as I cheered with everyone in the crowd at the run finishing the camera got panned over to me – it was a really, really funny moment, probably one of my favourite marathon runs I've ever done because people were just eating it up.

The above response describes how Raikou was able to leave his controller in the final moments of his run, leaving the 'RNG' to finish the fight in-game and joining the crowd of audience members to spectate his own speedrun. Given speedruns' usual emphasis on split-second precision and timing, Raikou's performance at ASM would have been a novelty for audience members and reveals the extent to which speedrunners and can tame and control videogames, finding creative ways to bend developer code to their will.

On the topic of his live chat and the types of conversations that would unfold during his streams, Raikou was asked how he navigated difficult and/or uncomfortable discussions:

Right so this is a tricky one. Whenever I see something in chat, a discussion that I kind of don't resonate with or I don't really want to talk about, a lot of time I'll just let chat go amongst themselves until it becomes abusive or insult[ing]. If I see two people just going at it over something like that I will step in and be like "Hey,

clam it down" you know. It's a difficult thing, I'm not a very confrontational person, I don't tend to get into arguments, or I try to avoid that as much as I can. It's not a very good feeling for me, it's not a very good feeling for my chat to see people butting heads, so I'll tend to put a stop to it as soon as possible. But, whenever there's a topic that I just generally don't enjoy, I'll just let the chat go amongst themselves and if they ask me about something directly I'll just say I don't really have an opinion on it, I just don't really care much for it, or something like that.

Raikou followed this response by discussing streamers who cultivate a more 'toxic' or antagonist relationships with their community, noting differences in his approach when compared to their channels.

...some people have that as their drive for the channel you know, people go there and are like "Oh I can be as toxic as I can here" and they're just like "Yeah! Bring it on brother", you know? They're just all for it. Like some people have that as their big schtick for their stream. I certainly don't though, that's not my thing.

Raikou's response here aligns with the comments previously made by Sixfourtythree, who noted the presence of, so called, 'negative' personalities on the Twitch platform, who celebrate, and participate in, hyperbolic and potentially offensive interactions with their live chat participants. Both streamers describe avoiding this side of streaming culture, opting instead to cultivate a more positive and accepting environment within their respective communities.

A key moment in speedruns, that elicits excitement and activity in the chat, is a new PB or personal best. Speedrunners spend an enormous amount of time planning and practicing runs of their chosen game, working on their personal best times, both for individual segments of the game as well as its entirety. The live moments that lead up to a new personal best often comprise the most exciting moments on their channel, with months or years of practice culminating in a new PB.

For the past 6 months I was going for a gold time of two hours and twenty-nine minutes to break the two hours and thirty minute barrier and I achieved it like a

month ago... it was huge, I couldn't even sit in my chair, I had to get up and walk around my room and just be like "I can't believe this has happened, finally". That is the drive right, that's the drive. That's what it's all about. You can't get over the feeling of finally achieving something like that after working hard for it. It's massive to me.

Raikou's response above reveals the triumphant, emotional state that drives his speedrunning as well as his streaming. Following the above response, Raikou was asked whether having the chat present for these moments was important.

Very much. If I did that offline, it wouldn't have been nearly as powerful, or as nice as it was, without having the chat being like "wow this is crazy, he got that barrier broken". Because, I actually said this last year, that by the end of 2020 I would get sub two thirty, and at the time I wasn't even sure I could do it, I wasn't even sure the route was able to pull it off, like I didn't think it was going to be fast enough to do it. And then I developed the speedrun, put some new strats into it and then it started looking more and more realistic. I started doing more runs and I was like "oh man, this is actually something possible to pull off, then I started going for it and it happened. Very, very cool stuff.

Streams in which personal best and world record times are broken are momentous occasions with historical weight within their respective communities. These events are recorded, stored and catalogued, becoming points of reference for months, years, even decades to come. This elevates the stream, making it a historical artefact to be used as a point of comparison for other speedrunners hoping to beat the current record. This also affects how chat members perceive their messages and participation in the message chat, with chat members often simply messaging "I WAS HERE" to record and communicate their involvement in the stream for future viewers.

The following Twitch transcription chronicles the moments shortly before Raikou beats his PB for the videogame *Digimon World*, achieving a new world record.

Timestamp	Gameplay Feed	Streamer	Chat
1. 2:25:30 – 2:25:38	PC talks to NPC before leaving area.	There's no words.	[2:25:34] CocoPuffs88: breathe rai, no heart attacks for today [2:25:34] HoneyDew7: the run [2:25:36] Toast9: curfew broken
2. 2:25:39 – 2:26:09	Game loads the next area. PC approaches an NPC and begins to talk to them, quickly navigating the dialogue menu.		[2:25:47] BananaMilk2: I aint saying nothing till its over. I aint jinxing shit [2:25:55] Yoghurt1: we did it FeelsAmazingMan [2:25:57] Weetbix5: Take a deep breathe
2. 2:26:10 – 2:26:44	Raikou continues to quickly navigate menus. Something goes wrong and a couple of seconds are lost. PC exits area; loading screen appears; PC enters another area.	What?! That was meant to be a first try feed.	man [2:26:43] Oatmeal7: y got this bruv
3. 2:26:45 – 2:27:04	PC character continues walking through different areas, avoiding any enemies along the way.	l couldn't have possibly There's no way it killed it. I don't know, I'm panicking for no reason now.	[2:26:48] Yoghurt1: imagine u forgot one
4. 2:27:05 – 2:27:25	PC continues progress from one area to the next. *streamer facepalms*	No, we're fine. My run has to still My PB still has to – what did I go there for?	[2:27:08] Toast9: don't panic its gameing time [2:27:17] Breakfasttime: dont look at tiem just focus [2:27:24] Fruitbowl4: whatever you do don't panic
5. 2:27:26 – 2:27:48	Raikou enters an area and proceeds to quickly navigate dialogue menus with a NPC.	My PB run still has to do freezeland and I've done that. I think it's it. Even with a failed feed, I still got this I'm pretty sure.	[2:27:33] Scrambledegg3: oh you still need Vademon?
6. 2:27:49 – 2:28:28	Raikou finishes dialogue and PC exits area. Raikou lets out a long, gentle exhale. Raikou continues navigating area, carefully avoiding enemies.		[2:27:57] Yoghurt1: DO NOT PANIC THIS IS THE BIGGEST MOMENT OF YOUR LIFE [2:28:11] Scrambledegg3: Starting to get nervous [2:28:27] Granola4: u got dis
7. 2:28:29 – 2:29:24	PC moves from area to area, avoiding enemies along the way.	l've got a minute to autopilot. It's 2.29, it's it. It's fucking it.	

While diminished in the form of a transcription, the pressure and excitement within these moments is palpable, with Raikou anxiously completing the final series of tasks that lie between him and a new world record. While Raikou is doing this, messages from the chat

include, what appear to be, genuine attempts to calm Raikou, as well as messages that seemingly serve to exacerbate his anxiety, e.g. "DO NOT PANIC THIS THE BIGGEST MOMENT OF YOUR LIFE". Raikou is relatively quiet during this time, aside from moments of tense concern as he worries whether he might have, accidentally, 'killed' the run. The transcription below follows on directly from the one above, capturing a moment where Raikou completes the game and successfully beats the world record.

Timestamp	Gameplay Feed	Streamer	Chat
8.	PC continues navigating	It's it. Oh my fucking	[2:29:26] Fruitsalad0: Congrats dude,
2:29:25 –	area, talks to an NPC.	god boys, we did it!	awesome run.
2:29:45		*laughter*	200
			[2:29:28] Appleslices97: 🐨
			[2:29:29] Muesli77: FINALLY GG
			[2:29:34] EggSpatula44: gg
			[2:29:34] BananaMilk2: FUCKING GG
			[2:29:35] CocoPuffs88: Л
			[2:29:35] Weetbix5: Hey man, you've
			worked so hard, you deserve it
			[2:29:39] CupaTea2: YO
			[2:29:43] OrangeJuice55: I WAS HERE
			[2:29:43] Baconandeggs11: I WAS HERE
			[2:29:43] CupaTea2: Let's GO, GG
9.	Raikou stares quietly		[2:29:47] CoffeeBiscuits34: GG
2:29:46 -	down at his hands and		[2:29:48] Burnt8Toast: I WAS HERE
2:30:10	controller, quickly		[2:29:48] FruitShake65: old record: 2h
	skipping through		30m 39s
	dialogue with a NPC.		[2:29:50] Baconandeggs11: HI YOUTUBE
			[2:29:51] Brekkysausage67: Pog
			[2:29:52] CornFlakeHero4: Yeah, WE did
			it. Well, lets be honest. It was mostly me
			[2:29:54] BananaMilk2: Im here
			[2:29:58] Avocadotoast89: GG
10.			[2:30:16] BreakfastBurrito99: LET'S
2:30:11 -			[2:30:17] BreakfastBurrito99: FUCKING
2:30:33			[2:30:19] BreakfastBurrito99:
			600000000000000000000000000000000000000
			000000000
			[2:30:21] Jamontoast3: I was here for
			another record
			[2:30:21] BreakfastBurrito99:
			MAMMA
			MAMA
			[2:30:24] Burnt8Toast: HI YOUTUBE 🖤
			НІ ҮОՍТИВЕ 💐 НІ ҮОИТИВЕ 💐 НІ

		YOUTUBE HI YOUTUBE [2:30:28] Tastyporridge54: [2:30:33] CocoPuffs88: [2:30:33] OrangeJuice55: GG
11.	Raikou gets up from his Fuck yes dude!	
2:30:34 –	chair and begins to walk *Claps hands twice*	[2:30:36] Appleslices97: 🐨!!!!
	around his room with his Let's go! Fuck yes!	[2:30:38] PBtoastslice: GG
	hands on the sides of	[2:30:38] ApplenMango: GG
	head.	[2:30:42] Bixbites: GG BRO
		[2:30:42] ButteredBread77: Fuck Yeah!
		[2:30:42] Softboiledegg5: I was here
		POG
		[2:30:44] CocoPuffs88: GG
		[2:30:45] BreakfastBurrito99: LOCAL
		MAN COMPLETES GAME

Celebrations in the live chat take the form of emotes gasping and dancing, alongside numerous "GG" messages, i.e. 'good game', congratulating Raikou on his victory. There are also messages identifying the moment as a historical one, expressing excitement and satisfaction for having been part of it. This collective celebration makes it clear that this victory is not just Raikou's, but rather encompasses his community and all the spectators who participate and spectate his streams, joining him on his journey to accomplishing another world record. This is evidenced in the moments just after Raikou finishes the run, at timestamp 8, where rather than celebrate the victory as his own, he instead includes the audience, exclaiming "…we did it!".

Conclusion

To conclude this section, I will first revisit some of the themes outlined in the transcript coding system discussed in chapter 2 and briefly discuss patterns that emerged across the interview responses. Firstly, streamers were observed to form different relationships with videogames prior to starting their Twitch channel, which would inform their streaming approach. Referring to the transcript coding system, themes related to "the streamer", "videogames" and "community" would frequently intersect, with streamers discussing how their personal interest and relationship with videogames would influence the content they

produced and the audience they would attract on Twitch. This would also segue into discussions of authenticity, with streamers describing their emotional reactions to gameplay as genuine, even in instances where they would exaggerate or 'play up' their reactions as part of entertaining and engaging their audience. While the presence of live spectators would often require streamers to be more active and emotive while streaming to remain engaging, these emotions would stem from a genuine sense of enjoyment while playing. This enjoyment was not something any of the interviewed streamers were willing to disregard or forgo as part of conforming to audience expectations or growing their channel. The interviews, however, did reveal differences in how streamers would negotiate their enjoyment alongside pressures to play particular games, e.g. Cubeyy's need to return his private Minecraft server.

Another theme that surfaced related to "community" was the audience's reaction, and the influence this would often have over streamers' enjoyment and live performance while streaming. Streamers described how videogames would produce moments that they could anticipate and leverage as part of engaging and entertaining spectators. This would take different forms, depending on the streamer's playstyle, the videogame, and their online persona. For streamers such as Captain Perth and SpamBrah, audience engagement more often centred around a videogame's *narrative*, and for more competitive based streamers (Cubeyy, Raikou and Sixfourtythree) interactions with their audience focused more on a videogame's *challenge*. This brought to light the manner by which *different* videogame affordances would culminate as part of producing meaningful moments during streams, and the different types of responses this would evoke from both streamers and their live audience.

The patterns identified above build upon key ideas outlined in the literature review, beginning with Gandolfi's (2017, p.5) notion that videogame affordances are parameters that Twitch streamers "ponder and exploit", and which spectators consider, when producing and watching live content. The interview responses illustrate the different forms this can take, with streamers finding novel ways to incorporate videogame play as part of engaging a live audience. Fagersten's (2017) and Johnson's (2022) research is also relevant here, as they consider the role linguistic acts such as swearing, and humour more generally, have in constructing and elevating moments that take on a greater meaning and significance during a stream. This relationship, between streamers, videogames and spectators, will be examined

more closely in the following chapter, considering the connections videogames, and their affordances, have with certain *types* of streaming, and the manner in which gameplay shifts within a live streaming context.

Chapter 4 – Analysis

From Player to Streamer: playing for an audience

This chapter will draw on the concepts introduced in chapter 1 and conduct an analysis of the interview responses and live Twitch transcripts documented in chapter 3. First, to examine the relationships between videogames, streamers, spectators, and the Twitch platform, it is helpful to return to Keogh's (2018) framing of videogame play as a 'cybernetic circuit'. Here, Keogh (2018) argues that to understand our embodiment both in the world and the virtual "is to understand our bodies not as stable and essential but as essentially unstable" (26). Furthering this point, Keogh argues

[t]o play a videogame is not simply to act in a virtual world but to incorporate technologies and audiovisual-haptic feedback that extend, restrict, and ultimately augment the player's embodied experience into complex assemblages of capacities and processes (Keogh 2018, 39).

This understanding configures gameplay in terms of a participative process, distributing agency "through the circuit of player-and-videogame" (Keogh 2018, 40). The value of this approach, relative to this thesis, lies in its appreciation of both the social and technological, accounting for the mediating effect both the player (in this case, the streamer) and videogame have over the other (Keogh 2018, 40). To analyse how gameplay shifts and adapts to a live streaming environment, the audience's role and relationship to the streamer must also be considered. Understanding gameplay as a cybernetic circuit helps to highlight the audience's moment-to-moment influence over the streamer through their participation in the live message chat. The dynamic nature of live-videogame content can be attributed to this "complex assemblage of capacities and processes" from which a range of streamer and spectator experiences emerge, with streamers, videogames, spectators, and the Twitch platform all being part of the livestream's cybernetic circuit of interaction.

When discussing repetition and failure in videogames, Keogh (2018, 175) argues:

[T]hrough repetition and failure multiple pasts and lost futures converge on the present play experience to intermediate each other through muscle memory, genre conventions, retries, "Game Overs," seriality, and wasted time. To play a videogame is to overwrite invalidated pasts and to peek at alternative futures. Just as the player does when completing the virtual world, they work to downplay the "inauthentic" timelines in their desire to experience videogame play as holistic and continuous.

While the above statement may hold true for private play sessions, across this thesis' interviews, streamers were observed placing greater emphasis on this so-called "inauthentic" timeline, leveraging moments of failure and repetition to great effect (Keogh 2018, 175). The interviews reveal how moments of failure can serve as opportunities for streamers to engage their audience and play up their online persona. Thus, the meanings and motivations that circulate failure and repetition in a videogame may be observed to change within a live streaming environment. This then prompts the question: what other gameplay elements do streamers leverage as part engaging their audience and constructing meaningful moments?

To broadly categorise different forms of videogame play, it is useful to build on the associations identified by Vahlo (2017), pairing coordination with challenge, and exploration with narrative. As noted in Chapter 2, this perspective was useful in formulating questions for the interviews that prompted streamers to consider, not simply their videogame preferences, but the different *types* of videogame play they centred their performances around. Additionally, Vahlo's (2017) understanding of these terms provided a useful lens for examining the dialogue that emerges between the player, videogame and live chat while streaming, with instances of roleplay and lore contemplation between streamers and their audience aligning more with exploration and narrative, and discussions of strategy and tactics with coordination and challenge. While these categories are not fixed binaries, with discussion often interweaving between the two, the interview responses revealed differences in how streamers would approach these two broad facets of gameplay. This offers a valuable starting point for examining the role videogame affordances have in constructing particular videogame experiences for streamers, which then feed into their live performances on Twitch.

Videogames are unstable, in so much as the player experience that emerges depends on interaction (Keogh 2018). A key aspect in constructing the videogame experience is the player's competency while playing, individualising the player's experience and destabilising how videogames express and communicate meaning (Keogh 2018). Beyond this, players may impose structures on the act of playing itself, creating meta-games independent of the intent of a videogame's developers. This can take the form of a speedrun or a challenge run, where players enforce limitations and chase times and scores that may or may not exist within videogame itself. Additionally, players can roleplay their own imagined stories within videogames using character creators, open world gameplay, and dialogue trees to creatively express their vision. These imagined stories or characters can influence the player's approach to playing the videogame, attaching new meaning to in-game decisions (for example, while role-playing as a 'vegetarian' in-game, the player character cannot eat meat to regenerate health). Therefore, there is a negotiation that takes place between the player and the videogame text, in which the meanings associated with the act of playing shift in response to player's externally imposed motivations.

The Twitch platform may be understood similarly, as an external structure superimposed on the act of playing, again reconfiguring how players engage with and derive meaning from a videogame. Twitch's affiliate and partner programs feed into the play experience for streamers, incentivising streamers to chase performance metrics (higher subscriptions, followers, average concurrent viewers, etc.) in order gain greater access to monetisation features and community tools such as emotes. While streamers may try to ignore these aspects while playing videogames live, they are fundamental to the Twitch interface, influencing how content is structured on the platform and the communicative environment it affords. Subscribed channels are ranked on the home page in terms of popularity (at the time of writing); paying for a subscription triggers a notification over the live feed, celebrating the spectator who subscribed and posting a message from them to the streamer; the longer a spectator subscribes to a certain channel, the more 'emotes' they are given access to in the live chat. These examples reveal how the scripted user qualities identified in chapter 1 (sociability, gamer interest, paying customers, ethical behaviour and potential professional broadcaster) coalesce around the activity of gameplay, and, more specifically, the features within the Twitch platform that structure how users interact, and streamers monetise their content (Ask, Spilker and Hansen's 2019).

The mechanism and conditions framework outlined in chapter 1, "assumes that technologies and people exist together in co-constitutive assemblages" (Davis 2020, 46). This understanding relates to both a player's relationship to a videogame, as well as a user's relationship to a given platform (e.g. Twitch). The start of this chapter will focus on videogame affordances, examining how streamers engage with, exploit and react to them as part of streaming on Twitch and engaging their live audience. However, a thorough analysis of this phenomenon will require a consideration of the platform itself, examining Twitch's communicative environment, and its relationship to live videogame content. This will involve analysing the platform's design, and its attempts to regulate, control and influence the behaviour of its users. However, both developers and users have a role in shaping the development trajectory of Twitch's technical design, interface and user culture (Ask, Spilker and Hansen 2019). Ask, Spilker and Hansen's (2019) use of the term "co-script" highlights this phenomenon, bringing attention to the "push and pull" that occurs between users and developers as part of platform development. This will become a focus later in this chapter, exploring Twitch's emphasis on growth and monetisation alongside the presence of smaller, but active, communities on the platform, with particular attention given to the mental health of streamers, and their relationships with their streaming practice.

Variety streamers and performing gameplay on Twitch

Variety streamers on Twitch tend to play several games of different genres as part of their Twitch channel. Of the three streamer orientations outlined by Gandolfi (2016) in chapter 1, variety streamers tend to be associated with either the 'hedonist' or the 'companion', with content typically centred around the streamer's personality rather than their playstyle or skill. It follows logically then that the variety streamer, SpamBrah, is conscious of her enjoyment while streaming, referring to herself as "...a person who wears their feelings on their sleeve". Given her live content centres around genuine, live reactions to gameplay, generating excitement towards a game requires, foremost, that SpamBrah finds some enjoyment in the act of playing it. This is not to imply, however, that SpamBrah noly plays games she would enjoy playing privately – in fact, the opposite is true. SpamBrah notes in her interview responses that she does not typically play role-playing games privately and, instead, would prefer to play them in the presence of a friend or while streaming to a live chat. Importantly, this indicates a division in the enjoyment she receives from private videogame play when compared to broadcasting her gameplay on Twitch. Certain features, or affordances, within role-playing videogames may then be understood to better align with the social dimensions afforded by the Twitch platform: in the case of the RPG *The Witcher 3*, the player is afforded the ability to choose between several pre-scripted dialogue responses, giving SpamBrah a degree of agency regarding how she wishes to role-play as the videogame's protagonist. This branching dialogue system highlights a key aspect of this thesis, that is, the phenomenon by which videogame affordances, in the context of Twitch, assume a performative quality, becoming vehicles for streamers to showcase their online persona and engage their live audience.

When discussing how her playstyle changes within a live-streaming setting, SpamBrah describes how roleplaying games differ from those she typically plays alone, specifically city builder gamers, i.e. games where you build, develop and manage a city/colony. Her responses highlight the need to incorporate certain gameplay elements into her Twitch streams, and the effectiveness of some over others. Notably, SpamBrah plays both narrative and challenge driven games, adjusting her streaming approach accordingly. In the case of the RPG The Witcher 3, the opportunity to roleplay as a 'bad guy' presents SpamBrah with a way to playfully engage both the game and her audience. SpamBrah's interview response, "...it's fun to be the bad guy on stream", highlights how the performative elements of gameplay may combine with social dimensions afforded by the Twitch platform. The presence of a live audience, to an extent, legitimises SpamBrah's performance of the 'bad guy'. Her enjoyment is twofold, emerging both out of the game itself, and from the communicative environment afforded by the Twitch platform. In the case of the latter, SpamBrah's interview responses reveal a degree of satisfaction found in offering others an outlet to experience gameplay vicariously - in this case, offering her spectators the experience of "playing the villain". When comparing SpamBrah with another interviewed variety streamer, Cubeyy, similarities may be observed in how they approach entertaining their audience through their performance of gameplay. Although Cubeyy's performance is more challenge-focused, a similar dynamic emerges between the streamer and videogame, where certain gameplay affordances are leveraged as part of performing an entertaining stream.

Cubeyy, when asked what sort of challenge he typically sought out in videogames, noted he preferred "muscle memory type games", referring to those that require fast reflexes and

precise controller inputs. In this same response, Cubeyy described how in "small situations" he could pull off impressive in-game feats, alluding to what is commonly referred to in gaming spaces as 'clutch' moments. This term typically refers to situations in-game that require precise timing and/or strategy to overcome and that often bear some larger than usual penalty for failure, e.g. being demoted when ranked with other players online, returning to a much earlier checkpoint, etc. (Sanderson, Browning and DeHay 2020; Beres, Klarkowski and Mandryk, 2018). These moments are tied to Twitch's brand and user interface, with the platform affording spectators the ability to easily record 'clips' of streams which are then stored and shared. The most popular clips on Twitch are often of these clutch moments in which the streamer either succeeds or fails in a high-pressure gaming situation. The popularity and success of the battle royal genre is emblematic of this, as it pits large numbers of players against one another with an ever-constricting map, producing countless clutch moments for streamers to experience and leverage as part of their live performances on Twitch.

The immediate popularity of the videogame Fall Guys (developed by Mediatonic) on Twitch is further proof of the battle royale formula's appeal relative to streaming, in this case reducing the genre down to a few button presses while maintaining the frenetic and largescale competitive energy it is known for. Chapter 3's description of Cubeyy's stream highlighted the fertile nature of battle royale games for producing moments on stream that would generate interactions between the live chat and streamer, giving rise to community jokes, memes and, over time, lore. This phenomenon reveals a collaborative process between the streamer and their community that sits at the heart of Twitch streams, where the audience shape and influence the live performances of streamers via the live message chat – a key vehicle of influence being humour. Cubeyy is aware of this, and considers it in his approach to streaming, playing up his failure and successes to the excitement of the chat, with members regularly participating in Cubeyy's ironic bravado by contributing to and extending the joke themselves. This is evidenced in transcript 2 (p.81) where a chat member, after watching Cubeyy fail to navigate several obstacles in-game, sarcastically defended the streamer's gaming abilities: "guys its fine im sure he is lagiing" (timestamp 10). Cubeyy then responded to this message by simulating lag with his computer mouse, extending the joke further. The match, and running joke, later culminate in Cubeyy successfully qualifying and moving on to

the next round (despite his poor playing), with the same chat member commenting "ez first place ?" alongside Cubeyy laughing and trash-talking his competitors.

Recktenwald (2017) examines a similar process to the one above, through which some game event elicits a response from both the streamer and the live chat, attributing meaning to said event. Drawing from the term's use in both conversation analysis and linguistic approaches to humour, Recktenwald uses the term 'pivot' to describe this phenomenon (see fig 4.1, below).

The pivot is a grammatical structure around which prior and following segments revolve and one of their key functions is to introduce a shift in perspective (Norén, 2013:52). In a similar sense, the term pivot is understood in linguistic approaches to humor. The pivot is the constitutive structure of a joke (Norrick, 1993). It has a semantic ambiguity that is initially buil[t] up and later resolved in the punchline for humorous effect...Game events are also ambiguous since they have different features and meanings for participants.

(Recktenwald 2017, 77)

Importantly, Recktenwald's (2017) analysis centres around "the roar of the crowd", focusing on Twitch streams that, due to the size of the audience, have lost their conversational nature. Regardless, the term pivot contains explanatory potential when examining the process through which jokes emerge within Twitch's communicative environment, even on relatively smaller channels such as Cubeyy's. While Cubeyy often engages in conversational forms of communication with his chat, during tense, or 'clutch', gaming moments the nature of the communication tends towards that described by Recktenwald (2017), "… in which participant communication with each other… is licensed by the activity and not specifically directed to someone" (79). The message "guy's its fine im sure he is lagiing" is less conversational, and more observational, attributing a local meaning to the event that is then extended via Cubeyy's reactions and consequent activity in the chat. As noted above, this collaborative process between streamers and their chat participants, is key to Twitch's user culture. By communicating, live, with the streamer, spectators become participants, instilling moments on stream with meaning, contributing to and extending the performances of the streamers themselves.

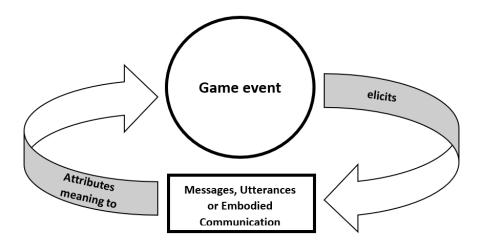


Fig. 4.1 Redrawn "Conceptual schema of pivoting" (Recktenwald 2017, 77)

Returning to SpamBrah, her interactions with the live chat (as documented in the Twitch Transcript) take on a more conversational tone than Cubeyy's. The term 'conversational' in this context involves longer and more varied messages, spectators interacting with both the streamer and each other, and a lower use of emotes in the live chat (Nematzadeh 2019). In SpamBrah's Slay the Spire Twitch transcript 1 (44), it begins with a conversation about hair care, before attention shifts back to the game, segueing into a broader discussion about card games. Early in the transcription, two spectators in the chat can be observed greeting one another. Towards the latter end of the transcription, SpamBrah interrupts playing the game to look up a videogame mentioned by a chat member, commenting on its art direction. These examples reveal that while gameplay is central to the spectating and streaming experience, its emphasis varies moment to moment. Although both streamers have similar sizes in viewership (usually between 5-30 viewers, with Cubeyys' being slightly larger), Spambrah has less activity in the chat moment-to-moment, and maintains multiple prolonged conversations with chat members on topics that relate to the live gameplay in varying degrees.

It's important to note that Cubeyy still engages in conversation with the chat during his streams, and when playing videogames such as Minecraft (where gameplay is less frenetic and intense than battle royale games) communication tends towards a conversational tone

more often. In his interview responses, Cubeyy noted that different videogames would attract difference spectators, influencing the messages he would receive in the live chat:

...I've never played any story games ...nobody has ever gone "oh in the next town, you're going to want to do this" because I don't play those games, so I don't have that community.

Cubeyy's observations reveal the influence videogames have over the interactions that emerge on Twitch, and the types of spectators certain games tend to attract. In the case of Cubeyy's Fall Guys stream, the highly paced, competitive, and challenge-orientated gameplay gave rise to messages that more closely resembled Recktenwald's (2017) notion of 'pivoting'. As noted above, these messages were less conversational, serving to instil meaning, often humorous in nature, to the events transpiring in the gameplay feed. Given that Cubeyy cannot pause when competing with other players, these humorous and image-laden messages are easier for Cubeyy to read and integrate into his live performance while playing. This contrasts with SpamBrah's stream of the card game Slay the Spire, which is turn-based, and therefore moves at a pace set by the player, allowing her to direct complete attention to the chat at any moment. Accordingly, emotes appear less often in SpamBrah's live chat, with communication more regularly taking the form of text. Despite the challenge-driven nature of both videogames, Fall Guys and Slay the Spire, they nevertheless appeal to different streaming approaches, influencing streamers' performances and, in turn, the social dynamics that surround their gameplay. In this sense, the streamer's choice of videogame may be understood to privilege certain types of communication, influencing the relationships that form between streamers and spectators.

Relating this analysis back to Gandolfi's (2016) three streamer types, Cubeyy appears to align best with the 'hedonist', centring his content around spontaneous and comedic reactions to gameplay. Additionally, Cubeyy exhibits some traits of 'the professional', focusing a significant portion of his content on competitive videogames and, occasionally, impressing spectators with his skill in clutch gaming moments. In contrast, SpamBrah best aligns with 'the companion', with her live chat typically moving at a slower pace than Cubeyy's, and her chat interactions taking a more conversational tone while more frequently diverging from the gameplay being broadcast. These different approaches build on the motivations that drive Cubeyy and SpamBrah to stream in the first place, influencing their respective playstyles when streaming, and the types of interactions they cultivate on their channels. I will now examine in closer detail the performative dimensions afforded by a videogame's narrative, drawing on the interview and accompanying Twitch transcript (67) of variety streamer Captain Perth. Although in this section I briefly touched on SpamBrah's streams of the narrative-driven videogame *The Witcher 3*, further analysis is needed to distinguish the different performances and social interactions challenge and narrative tend to encourage and facilitate on Twitch. Woodcock and Johnson's (2019) research, as outlined in chapter 1, will inform this analysis, considering how the virtual and physical performance of the streamer may be leveraged as part of extending the narrative elements of a videogame and forming connections with spectators on Twitch.

Hearing voices: performing and discussing narrative

Across the streamers interviewed, Captain Perth placed the greatest emphasis on narrative. As documented in chapter 3, he considers himself a "narrative buff" and while he plays a variety of games, and in different ways (speedrunning, blind playthroughs, etc.), he tends towards games that are "difficult" and "narrative-based". In his interview, Captain Perth made specific mention of the videogame *Dark Souls* (developed by Fromsoftware), describing it as "the perfect videogame" both in terms of its challenge and narrative. Focusing on its narrative component, the dense and often ambiguous storytelling present in *Dark Souls* regularly inspired conversations between Captain Perth and his audience, where they would compare theories and collaboratively interpret the videogame's setting, characters and plot:

...certain things like level design and item placement and descriptions and, you know, dialogue all come together to create, like, these different people's theories on certain aspects of the game.

Importantly, *Dark Souls*' approach to storytelling leaves many plot points without definitive answers. The game's approach to storytelling encourages players to read and compare ingame item descriptions, alongside environment clues and sporadic NPC dialogue, to piece together a version of the game's story that makes sense and appeals to them. This results in readings amongst players that, while often different, aren't necessarily incorrect or easy to

disprove. As noted in chapter 3, Captain Perth's streams of narrative-driven videogames rely on his inherent curiosity as he takes his time navigating in-game environments while carefully considering the significance of various objects, text, and dialogue. *Dark Souls* appeals to this approach and is in many ways designed to be encountered this way, rewarding careful attention with the possibility of some insight or revelation that may help explain the events and characters that circulate the player's actions.

In his interview responses, Captain Perth noted that he regularly reads aloud dialogue and text on behalf of the game. While doing so, Captain Perth adopts different voices, switching between different ways of speaking depending on the situation. This was illustrated in Twitch Transcript 3 (67) in which Captain Perth regularly assumed the voice of a wizened old man – a trope of the fantasy genre, with narrators/storytellers typically assuming the form of aged scholar or wizard. When speaking aloud his personal thoughts, whether pondering the story, problem solving, or simply conversing with the live chat, Captain Perth adopted his 'usual' voice, i.e. his normal speaking voice. While not contained in the Twitch transcript, Captain Perth does employ other voices, e.g. when performing lines on behalf of a non-player character (NPC), however Captain Perth's approach to using voices is more spontaneous than it is consistent. Rather than try to deliver a cohesive narrative experience akin to audiobook narrators, Captain Perth described his use of voices as "throwing random voices here and there" noting that its typically "in jest". In this sense, Captain Perth's use of voices, while a form of role-playing, is primarily a way for him to playfully engage his audience.

Woodcock and Johnson (2019), as cited in Chapter 1, offer a valuable starting point for examining the affective dimensions of videogame streamer labour, i.e. "efforts designed to generate emotional responses" (4), and the specific ways streamers mediate their performance via the Twitch interface (Woodcock and Johnson 2019). Twitch's "picture-in-a-picture" interface combines gameplay with live audio/webcam footage, visually embedding the streamer's reactions "within the virtual experiences generating those reactions—winning or losing, discovering something new in a game, and so forth." (Woodcock and Johnson 2019, 6). These live reactions to gameplay present opportunities to entertain, excite and amuse spectators, showcasing the streamer's personality and approach to playing (Woodcock and Johnson 2019, 8). At the same time, these reactions are an important means of self-branding, serving as a way for streamers to distinguish their content from that of other Twitch channels (Woodcock and Johnson 2019, 8). The primary goal, according to Woodcock and Johnson (2019), of these efforts is to "generate *feeling* in viewers, and an attendant sense of closeness or association" (9). Woodcock and Johnson's (2019) research relates to a broad range of live performances on Twitch. For this thesis, however, their insights are especially useful for examining the personas streamers construct and/or adopt on Twitch, and the relationship these personas have with the videogames they play.

In Captain Perth's case, his use of voices has less to do with performing a character separate from himself, and more to do with animating his personality and extending the narrative elements within the videogame being played. In this sense, Captain Perth's performance and use of voices while streaming may by understood as "turning on" his personality, performing a more animated version of himself to minimise lulls during streams and to maintain and encourage spectators' continued interest and participation (Woodcock and Johnson 2019, 7). Furthering this point, Captain Perth noted that putting on voices had a broadly positive effect on his interactions with spectators during stream:

I think generally, the reaction of people when you do a voice is – it humanises you in a little way, rather than just being a person on a screen, because you're having a bit of fun with it.

The humanising effect of voices that Captain Perth refers to bears similarities to the act of swearing employed by PewDiePie, a.k.a Kjellberg, in his gameplay-reaction YouTube videos. As discussed in Chapter 1, the act of swearing may be understood, in Kjellberg's case, to proactively construct a relaxed and comfortable setting for his viewers (Fagersten 2017). Much like swearing, employing voices while streaming may be understood as a linguistic tool, allowing streamers to forge intimate connections between themselves and their viewership. By "having a bit of fun with it", Captain Perth constructs an online environment that encourages the same from his spectators, promoting a playful, improvisational form of engagement with the live chat.

Understanding the use of different voices as a linguistic tool, akin to Pewdiepie's swearing, helps when considering its effect on the spectating experience and, specifically, the "attendant sense of closeness" it can help instil between streamers and their audience (Woodcock and Johnson 2019, 9). As Fagersten (2017) notes regarding Pewdiepie:

His swearing comprises or is embedded in genuine reactions to game-play (triggered, for example, by fear, surprise, shock, frustration, etc.), or it occurs as part of his banter and commentary, expressed for the sake of the viewers, and actively used as a linguistic tool to forge an intimate bond and "close friendship" them (9).

Captain Perth's use of voices is functionally similar, aiding him in his attempts to connect with spectators while also providing a creative, and often humorous, means of responding and reacting to gameplay. As part of finding an audience and developing a community on Twitch, streamers find ways to distinguish themselves from other creators on the platform, drawing on their gameplay skills, their personality and, to a varying degree, "the theatricality of character acting" (Woodcock and Johnson 2019, 12). While it is difficult to know the true extent to which Captain Perth, or PewDiePie, perform a 'character' separate from themselves, both Fagersten (2017) and Woodcock and Johnson (2019) highlight the role linguistic tools, e.g. different voices, swearing, etc., may play as part of streamers' affective labour and performance.

In the *Mortal Shell* stream documented in Twitch Transcript 3 (p. 96), at timestamp 3 Captain Perth can be observed adopting a creepy, old man's voice as his player-character approaches and touches an armoured corpse on the head, before returning to his normal voice to question, openly to his audience, what this all means.

In a creepy old-man voice "Hello friend, Touch you on the face." *Normal voice* "Okay so we've inhabited this shell, what's going on? We've become the man?"

These voices add a certain theatricality to the stream, while also helping to distinguish Captain Perth's different forms of streamer commentary. Across Twitch Transcript 3 he can be observed regularly shifting between different voices and personas as part of engaging with both the videogame and his audience. While this communicates the videogame's narrative, helping to immerse Captain Perth and his spectators within the videogame's fictional setting, it also aids in the construction of improvised jokes. In the example above, the creepy old-man voice Captain Perth adopts is intended to be humorous and, while only a fleeting moment on stream, moments like this occur frequently, helping to maintain spectator interest while limiting potential lulls in gameplay.

The voices that Captain Perth adopts, at times, respond to one another, often with comedic effect. Such an example can be observed at timestamp 19, with Captain Perth making an ironic jab at his wife in response to some videogame text:

"Unknown shell, a shell of a man -*adopts his narrator voice* - is more than just a sleeve". *returns to his regular voice* God, tell that to my wife *fake laughter* Not really, don't say that to her."

In the above quote, Captain Perth playfully engages with the videogame text, with his overly serious videogame 'narrator voice' juxtaposing with his more casual 'usual voice'. A key aspect of this joke, as was the case with Cubeyy, lies in the streamer's shifting performance of different personas. While Cubeyy would ironically adopt the persona of an over-confident gamer, here Captain Perth performs under the guise of someone who would find the joke funny, before laughing in an overtly artificial way and clarifying his intent. As with Cubeyy, the streamer's persona and performance in-game coalesce to produce meaningful moments on stream, with humour and jokes being a common catalyst for interaction between the streamer and the live chat. While Cubeyy and Captain Perth tend to centre their gameplay around different types of videogames, similarities can be observed in how they exploit videogame affordances as part of humorously engaging their audience. In this case, it was Captain Perth's use of voices, as part of communicating the videogame's narrative, alongside a personal anecdote, that lead to this joke's creation, as opposed to the competitive focus of Cubbey's streams, where his in-game failures were a more common source of comedic expression.

Therefore, when Captain Perth adopts his narrator voice to communicate to his audience various in-game text and dialogue, he is extending the narrative elements of the videogame, mediated by his own performance. Captain Perth's, so called, normal voice is then used to contemplate, or joke about, the videogame, this time operating from the perspective of a reflexive streamer, *reacting* to the videogame. In such moments, there is no attempt to sustain the games narrative, with Captain Perth switching from a roleplaying perspective to that of an

ironic, humorous, and slightly cynical Twitch streamer, often critically unpacking the game's technical and narrative details.

Oh man, the menu-ing takes so long to go through. Abilities..*In his narrator voice * Seek name: you must discover this shell's name to awaken its power! *Normal Voice* Okay, seems like we have the option to take tar, which is going on down the bottom.

The above quote (time stamp 21) highlights Captain Perth's use of voices as means of switching, often mid-sentence, between these two different approaches: that of the role-player, and that of the reflexive streamer. This occurs over the course of seconds, with Captain Perth's different voices providing audio cues for spectators listening in, delineating his personal thoughts and conversations with the chat from lines of text delivered on behalf of the videogame. While these voices may serve to better immerse spectators following on with the videogame's story, they also signal Captain Perth's intent, aiding and influencing the listening and viewing habits of his audience.

As discussed in chapter 1, Spilker, Ask & Hansen (2018) use the term "switching" to describe the dynamic nature by which spectators engage with Twitch content, moving regularly between streams of different sizes (spatial) while also shifting between passive and active forms of participation and engagement (affective). While typically influenced by factors external to Twitch (i.e. procrastination, waiting for something to cook, etc.),

...attention shifts were also prompted by Twitch-internal factors: high levels of action in the game being streamed, activity in the chat channel or the broadcaster doing something different or exciting. Though interested in different games, [spectators] had developed some common switching practices: recognizing sounds or conversation signalling incoming action, or understanding how score, time, players-left, items, levels, statistics, etc. entailed a promise of entertainment. For example, John would switch his attention if he heard gunshots, or noticed a streamer had reached more intense endgames.

(Spilker, Ask & Hansen 2018, 10)

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Spilker, Ask & Hansen's (2018) observations provide some additional context for interpreting Captain Perth's use of voices and their effect on the spectating experience. Their interview responses revealed that Twitch streams would often "simmer in the background" while spectators would attend to other tasks or activities (Spilker, Ask & Hansen 2018, 9). In instances where spectators passively engaged with a given Twitch stream, the audio component was often emphasised, revealing the utility of adopting different voices while streaming. Thus, voices can signal different forms of streamer commentary which, while entertaining, aid more passive forms of engagement on Twitch, helping spectators follow the flow and direction of streamers' often erratic live commentary without the need of visuals.

This section has mainly focused on the live performance of videogame narrative, however the concepts used as part this analysis may be applied to any form of videogame streamer. Affective labour, and spatial and affective switching, are useful concepts for examining the role and effect various linguistic tools, such as swearing or adopting difference voices, may have within the context of Twitch (Woodock and Johnson 2019; Spilker and Hansen 2018). Comparing Captain Perth with the more challenge focused Cubeyy, similarities can be observed in the way meaningful moments emerge on Twitch, wherein the streamer adopts a persona as part of playfully engaging both the videogame and their audience of spectators. The personas Captain Perth and Cubeyy adopt, however, are quite different, and draw on different gameplay elements as part of their performance. Notably, Cubeyy's Fall Guys stream places a clear emphasis on competition, which fuels several of the interactions documented in the corresponding Twitch transcript (Transcript 2, p. 81). Captain Perth, on the other hand, places an emphasis on understanding and dissecting the videogame, in terms of both its narrative and technical components. While Cubeyy's live persona typically reflected his immediate successes or failures while playing (shifting from bravado to ironic self-flagellation), Captain Perth was observed to adopt different voices, and shift persona, based on the narrative information communicated to him by the videogame, alongside his own internal thoughts and moment-to-moment problem solving.

Comparing Captain Perth now with SpamBrah, they both showed a strong interest in streaming narrative driven videogames, alongside an interest in contemplating their plot, characters and broader themes with their live chat. Although SpamBrah did participate in forms of roleplaying, e.g. intentionally playing the 'bad guy' while streaming The Witcher 3, she did not perform voices to the same extent as Captain Perth, preferring to let the

videogame speak for itself while she provided commentary and discussed it with her chat. While Captain Perth noted how he liked "to get into the nitty gritty of a story and discuss [a videogame's] finer elements and maybe theorise" with his chat during streams, SpamBrah highlighted conversations with her chat that centred around a videogame's broader themes as they related to the real world. SpamBrah regularly celebrates the videogames she streams, highlighting the artistic and creative efforts that go into them, but she also engages in critique, examining themes such as gender and sexual violence, bringing a critical light to these issues by unpacking and discussing them with her chat. These discussions, in response to gameplay, involved a degree of social commentary, with SpamBrah describing in her interview a "need" to engage her chat around certain topics. The social responsibility SpamBrah alludes to here distinguishes her from the other streamers interviewed as part of this thesis – all of whom identify as male. Before continuing this analysis, it is important to address some aspects of SpamBrah's approach to streaming as they relate to gender, the Twitch platform and videogame culture more broadly.

Gender, Twitch and Videogame Culture

The Twitch platform's history intersects with some pivotal and controversial events that have shaped gaming discourse, along with the relationships between gaming communities and politics more broadly. In August 2014, the same month that Amazon acquired the Twitch platform, a movement latterly named 'Gamergate' emerged online, resulting from rising tensions within the gaming community that partly stemmed from

...the pervasive belief that game companies had begun 'pandering' to minority groups (including women), rather than focusing on their 'core' demographic of heterosexual, white men. Largely, these perceived concessions were attributed to the influence of feminism and 'SJWs' (Social Justice Warriors)...

(O'Donnell 2020, 655)

At the centre of the controversy was the indie game developer Zoe Quinn who became "entwined with the (since discredited) suggestion that [she] had traded sexual favours in return for positive game reviews" (O'Donnell 2020, 656). Under the banner of "ethics in

games journalism", the Gamergate movement, alongside key actors such as Milo Yiannopoulos, facilitated several prolonged attacks on women working in the games industry, "including rape threats, death threats, mass-shooting threats and bomb threats" (O'Donnell 2020, 656; Nagle 2017). Since then, Gamergate has become a case study for analysing the online tactics and coordinated harassment employed by 'hate mobs' and the far right, tactics that continue to be used across popular online social-media platforms today (Grayson 2021). While Twitch was not at the centre of the controversy, the platform emerged during, and was shaped by, the events of Gamergate, finding enormous popularity and success in the proceeding years (Epstein 2021).

Although the harassment of women in gaming is nothing new nor specific to Gamergate, the movement highlighted that

...even as more girls and women were playing games, they were continually being insulted, trolled, harassed, threatened, bullied, and shamed for the simple act of playing.

(Consalvo 2018, 87)

Issues surrounding the 'legitimacy' of women in gaming (as well as other identities that do not conform to white, cis-gender, heterosexual men) persist today, with terms such as "titty streamer" and 'cam girl' used to deride and discriminate, so called, 'fake' gamers (Ruberg, Cullen and Brewster 2019). Women's bodies play a role in determining the legitimacy of the streamer on Twitch, with commentors regularly criticizing (and insulting) streamers on the basis of their gender, their 'focus' on videogames, and the presentation of their body (Ruberg, Cullen and Brewster 2019). The term 'cam girl' is typically used derogatorily on Twitch, which Ruberg, Cullen and Brewster (2019) posit is not coincidental, but rather reveals an inherent anxiety that underlies the links between Twitch (and live-streaming more broadly), 'camming' and cam girls.

Within our archive, we saw a subtext of anxiety about this connection: commenters deployed the rhetoric of gender-based harassment in part to disavow any potential association between streaming and camming. In this way, they attempted to distance both themselves and video game live streaming more generally, from the implication that live streaming itself, regardless of the identity or self-presentation of the streamer, shares much in common with sex work performed online.

(Ruberg, Cullen and Brewster 2019, 475).

In this context, women's bodies become associated with greed, framing 'cam girls' as opportunists taking money out of the hands of 'legitimate' (male) streamers (Ruberg, Cullen and Brewster 2019). Based on their analysis of the comments made on the subreddit r/Twitch, this often means that while men are celebrated for their financial success on Twitch, successful female streamers are instead criticised for prioritising money over videogames (Ruberg, Cullen and Brewster 2019, 468).

This broader cultural and social context feeds into streamers' relationship with the Twitch platform, influencing their content, community and the interactions that emerge while streaming (Olsson 2018; Consalvo 2018). This was evident when interview participants were asked how they navigated uncomfortable or unenjoyable topics in their live chat. While all streamers noted having to navigate offensive and 'trolling' behaviour within their chat, SpamBrah was the only interview participant to describe an instance related to her privacy. As Freeman and Wohn (2020) identified in their interviews with Twitch streamers, embracing both a 'gamer' identity as well as a female and/or LGBTQ identity simultaneously can by quite challenging. On the one hand, live streaming affords streamers agency and control in terms of how they moderate their channel, interact with the public and affirm themselves (Freeman and Wohn 2020). On the other, they expose themselves to a broader public online, revealing a great amount about themselves generally, as well as more intimate details surrounding their emotions and private lives (Freeman and Wohn 2020). SpamBrah's above response brings to light this tension, as she navigates the topic of letting a spectator visit her private home without giving away her personal details, and without offending or upsetting anyone in her live chat. While privacy is an issue all streamers must face and manage within their respective online communities, it is important to note that this issue takes gendered forms, with LGBTQ and women streamers experiencing a disproportionate amount of sexual harassment on the Twitch platform (Olsson 2018; Consalvo 2018; Ruberg, Cullen and Brewser 2019).

SpamBrah noted that the conversation around her home address was not as sensitive a topic for her as "rape", which highlights a term all too common to the Twitch platform and

videogame culture generally (Melnychuk, 2014). The term rape has, to varying degrees, become engrained in videogame culture, particularly in the male-dominated competitive gaming scene (Fox and Tang 2013). Videogames have historically played into this phenomenon, largely by presenting men in positions of power while sidelining women and presenting them as sexual objects (Bullock 2017). In another response SpamBrah noted instances wherein chat participants used derogatory terms based on gender and race during her streams. For these instances, SpamBrah had a zero-tolerance approach, with offenders being met with a "straight up ban". Although the other (male) streamers interviewed as part of this thesis noted dealing with harassing and offensive behaviour in their chat, SpamBrah was the only streamer to explicitly note 'rape' as a possible topic in her chat. Although this thesis' sample size is far too small to form any generalised conclusions, this does draw attention to gendered dimensions of streaming on Twitch, and the broader social and cultural context in which Twitch is situated.

Navigating and establishing boundaries around personal privacy is one of the difficulties of streaming online, particularly while trying to foster meaningful social connections with one's audience. SpamBrah's approach to streaming emphasised being in the 'background', operating less as the sole focus for her spectators and instead as a companion to their daily lives. There's an element of intimacy in this approach, as SpamBrah facilitates and encourages a form of passive spectatorship in which her voice commentary becomes the focal point, requiring less attention to be directed at the live gameplay feed. A sense of intimacy is further extended via the live camera pictured in her steams, which includes SpamBrah sitting in front of a shelving unit adorned with various pop culture and game-centric figurines and paraphernalia. Ruberg and Lark (2020) examined how intimacy was performed "through domestic space on Twitch", paying particular attention to streams that appeared to be shot in streamers' bedrooms.

Filling the visual space with items that represent themselves allows streamers to demonstrate their personalities and distinguish themselves from other streamers who may stream similar content. Importantly though, this is also a way to give viewers intimate access to the streamers' inner worlds; the visual array stands in for the constellation of things the streamers love. Streaming from a messy, shared domestic space like a family room with objects lying around can also signal a kind of access. Whereas the bedroom welcomes viewers into an intimately erotic space, streaming

against these backdrops of seemingly unorchestrated daily life welcomes viewers into intimately familial spaces.

(Ruberg and Lark 2020, 14)

While it isn't clear whether SpamBrah's streams take place precisely in her bedroom, her live camera footage nevertheless offers spectators a window into a familial space, one that includes several items of personal significance displayed on a shelf, along with the occasional visit of her pet cat. Ruberg and Lark (2020, 7) posit that these backdrops comprise a crafted mis-en-scene, communicating "a tone of emotional accessibility and personal connection- as if the viewer knows the streamer so well that she has invited the viewer over for a chat in her room". This is another aspect that distinguishes SpamBrah from the other streamers interviewed, with Cubeyy, Captain Perth and SixFourtyThree all including little to no view of their surroundings, either not using a face cam or obscuring everything other than their face and chair. This is in line with Ruberg and Lark's (2020) research, which found that streamers who wanted to prioritise gameplay would fill the available visual space with gameplay footage. Raikou is an exception, as he does include footage of his bedroom despite generally prioritising gameplay during his streams, however, his backdrop is largely empty besides his chair, wardrobe, and bed. While this does construct an intimate environment, there is little to no emphasis on his personal interests, with no figurines or fan paraphernalia visible (in the observed streams). Given how focused his content is on gameplay, this may be as much a technical limitation as it is a conscious choice.

SpamBrah's experiences streaming reveal a friction that can emerge between extending the intimate social dimensions of the Twitch platform and protecting the privacy of the streamer. While it's beyond the scope of this research, this friction is, to a large extent, influenced by the broader social and cultural context that surrounds videogame culture and online participation, particularly as it relates to the treatment and acceptance of women and minorities within these online spaces. It is in this context that streamers with identities outside the status quo often find themselves performing the role of "unintended educator" (Freeman and Wohn's 2020, 820). SpamBrah shares similarities with streamers interviewed in Freeman and Wohn's (2020) study, in which a female streamer "Heidi" understood streaming as "…a novel and meaningful way to reinforce and further advocate their understandings of themselves" (804). This self-driven approach to streaming "was essential

to both attract viewers and satisfy [streamers'] own social and emotional needs" (Guo and Yvette's 2020, 804). SpamBrah approached her streaming practice in a similar way, noting early in her interview that she wore her feelings on her sleeve, with her Twitch channel acting as an extension of her personal thoughts, opinions and approach to playing videogames. It's important to note that SpamBrah never identified as an advocate or activist, however, she nevertheless attaches a certain responsibility to her role as streamer, one that includes addressing controversial topics such as sexism and gender-based violence with the aim informing and educating her audience.

Making History: Performing speedruns on Twitch

I will now shift to discussing to Raikou - a speedrunner who streams on Twitch. In line with the other interview participants, Raikou identified chat engagement as the most important indicator when measuring the success of his streams. On the topic of how important his personal enjoyment of a videogame was in order to stream it, Raikou said it was "pretty important", but also described a need to balance it with his audience's preferences. Elaborating on who watched and enjoyed his content, Raikou noted a difference in the spectators he attracted and the conversations that would emerge depending on the game he streamed. This bears similarities to Cubeyy's interview response, where he noted having different community members present for different games, especially in the case of his Minecraft streams. Raikou went on to describe how different demographics engaged with his content, noting how he didn't "resonate" as well with the, usually younger, spectators of his Sonic the Hedgehog (originally developed by SEGA) streams. This contrasts with the fondness Raikou exhibits for the videogame Tombi (developed by Whoopee Camp) and its community, as he affectionately describes how spectators often mention playing, but never finishing, the game as a child, due to them only ever owning the Sony demo disc. Nostalgia plays an important role for Raikou when deciding which games to stream, and this extends to the types of interactions he aims to cultivate on his channel. As he describes in his interview responses, Raikou tends to resonate more with spectators that are old enough to feel a degree of nostalgia for the titles he streams and enjoys the types of conversations these feelings tend to generate in the live chat.

When deciding which game to stream, Raikou had some additional considerations when compared to the previously discussed variety streamers. Most notably, the decision to *speedrun* a game brought with it the possibility and likelihood that Raikou would never enjoy the game casually again. Speedrunning a game requires the player to spend an enormous amount of time planning and designing routes, calculating ideal times, and regularly practicing split-second precise button inputs. This is contrasted with playing 'casually', which in this context refers to playing a videogame without any player-imposed constraints or time requirements. Speedrunning often requires playing videogames in ways the designers never intended, exploiting various in-game mechanics to shave seconds, or even milliseconds, off personal best times (PBs). As Raikou notes above, this can negatively affect his enjoyment of a videogame and his ability to play it casually, placing a greater weight on his decision of what to stream.

When asked how important a videogame's challenge was when deciding whether or not to speedrun it, Raikou responded "Yeah, it means everything". He then went on to provide an example, describing his experience speedrunning the videogame *Beyblade* (developed by Crave) for the PlayStation One. Raikou discovered a consistent way to manipulate the game's RNG so that he could predict, and control, the outcome of in-game matches with relative ease. As previously noted, RNG refers to elements in videogames which are randomly determined, and that are, typically, beyond the control of the player. When describing his speedrun of *Beyblade*, Raikou outlined the method through which he could reliably manipulate the videogame's RNG:

So what I was able to do was, restart my console, start fresh, new game, and then go into the tournament mode, and when it started the game I was able to hold a direction on the d-pad during the battle. And if I did that, the same thing was going to play out every single run I did.

Raikou's response reveals some key differences in the relationship speedrunners have with a videogame's challenge when compared to both casual players and other types of streamers. It is important to emphasise that challenge is not simply reducible to a game's difficulty, but rather encompasses "the obstacles that players have to overcome and the tasks which they have to perform to make progress", which cumulatively contribute to a videogame's overall difficulty (Denisova, Guckelsberger and Zendle 2017, 2-3). While the success and appeal of a

videogame's challenge depends largely on the player's ability as well as their perception of the game's difficulty, speedrunners complicate this relationship further by placing formal player-imposed goals on to the game, testing, altering and, even, breaking a videogame's design in the process.

Using the methods described above, Raikou was able to leave his controller and join the audience while performing the run in-person at the Australian Speedrun Marathon (ASM) - looking on with them as his run effectively completed itself. There is a novelty to Raikou being able to leave his controller and watch on with the audience as his run plays out according to his predictions, as speedruns typically require a level of tense concentration and physical performance that wouldn't ordinarily allow such a thing to occur. Interestingly, the existence of any real challenge appears absent here. Raikou's mastery of the game system and his ability to manipulate the RNG in many ways betray the intent of the game, but it is because of this, and not despite it, that the act of viewing speedruns finds its appeal. In the case of Beyblade, this appeal is short lived however, with Raikou noting that, without a certain level of difficulty the run "becomes a bit of a meme, a bit of a joke you know". Therefore, in speedrunning, the longevity of a videogame is often tied to its skill ceiling – however, this skill ceiling relates to techniques and strategies borne of the speedrunning community at large, which often involve sidestepping (or even contradicting) the challenge and difficulty as it was designed by its developers.

While only tangential to this thesis' focus, it is relevant to note the way the speedrunning community has been framed in the past, with both mainstream media and academia characterising its relationship with videogame developers as one of opposition (Hay 2020). Franklin (2009,173) distinguished regular play from how speedrunners play games, by positing

The application of multiple opposing directions is the source of bugs and glitches in many videogames...but in speedrunning the exploitation of these glitches aids progression through the game in ways that are other than those intended at the design and programming stages.

Franklin's (2009) description is accurate, as it is not contentious to say the speedrunners regularly exploit game elements that are not considered part of a videogame's design by its

developers. However, as Hay (2020) highlights, it does risk presuming that "speedrunning is principally an attempt to play video games in a contrary manner to the way the developers intended" (Hay 2020, 9). This line of thought is not uncommon, with one game designer, Bennet Foddy (developer of *Getting Over It*), using the following analogy to describe his relationship with speedrunners:

A game designer painstakingly carves a beautiful sculpture out of wood. First, chiselling it out of a raw block. Then gradually rounding off any rough edges. Making sure it works when its viewed from any angle...The speedrunner takes that sculpture and they look it over, carefully, from top to bottom, from every angle, and deeply understand it. They appreciate all the work that went into the design. All of the strengths or weak points. And then, having understood it perfectly, they break it over their knee."

(Koning 2021)

Importantly, Foddy follows this by saying "that's why I love speedrunners". Additionally, there are numerous examples of positive online interactions between speedrunners and developers. One example is an *IGN* video series that asks developers to react live to speedruns of the videogames they helped create, which typically involve a large degree of admiration on the behalf of the developers for speedrunners (Devs React to Speedruns 2022). Regardless, there is a tension between the goals of developers, i.e. to create a balanced, working videogame, and the goal of speedrunners – to bend the game to their will and complete it as fast as humanly possible.

When describing forms of play that include speedruns as well as other player-imposed 'challenge runs' (e.g. 'no-hit' runs where the player must complete the game without taking any damage), Newman (2008) uses the term 'superplay'- a term that has faded in popularity since he published *Playing with Videogames*, but remains useful for distinguishing the motivations and goals of 'superplayers' from regular players.

The task of the superplayer may involve reaching a 'final' sequence in a game, though if the challenge is to move from 'start' to 'finish' as speedily as possible, the journey may involve devising and implementing strategies to allow the sidestepping of huge portions of the intervening narrative or a large number of levels along the way thereby making for a stripped down, and potentially incomprehensible narrative experience.

(Newman 2008, 124)

As Raikou's responses illustrate, this 'sidestepping' of large portions of a videogame's narrative is a common feature across speedruns. However, spectators of speedruns tend to have a degree of familiarity with the videogame title (and its narrative) prior to watching them, which Raikou touched on in his interview when discussing the nostalgia he and his audience often share for the titles he plays. While speedruns tend to produce a rather incomprehensible narrative experience for viewers, this is not the main draw. At the centre of a speedrun stream is the 'player narrative' – the journey of the player as they attempt to beat records, both personal and publicly ranked. Additionally, Raikou notes in his interview the appeal of watching a game, that may have seemed extremely difficult as a child, completed at a level of speed and execution once thought impossible. This emphasis on the speedrunners' skill bears comparisons to traditional sports (i.e. Football, Basketball, etc.), with experiences playing as child feeding into the vicarious satisfaction of watching a 'professional' play at an elite level.

Up until this point, this thesis has analysed videogame streams from a performance perspective that has its roots in theatre. Drawing on Senft's (2005) analysis of camgirls, chapter 1 drew comparisons between Twitch streams and the Victorian genre of theatre known as 'the sensation play'. This form of theatre was marked a precursor to Twitch's "reality-as-entertainment", with audience members playing a role in determining the authenticity of the production, as well as contributing to the overall performance through their physical and audible reactions, made visible to those in attendance (Senft 2005, 12). However, another way to interpret and understand live videogame streams is from a 'sports' theory perspective that considers the similarities and blurred distinctions between these two practices and forms of entertainment (Naubert 2012). This framework is typically applied to 'e-sports' which, today, follows a similar definition to traditional sports with videogame athletes competing individually or as part of a team with the aim of besting their competitors . Emerging out of informal grass-roots community-based competitions, e-sports has grown substantially in its popularity, with athletes earning multi-million dollar salaries alongside prize pools of up to 40 million USD (Naubert 2012; esportsearnings 2022). While these types of live streaming events on Twitch are not the focus of this thesis, the rise of e-sports has

influenced how researchers frame and examine competitive videogame streamers, which can inform this thesis' understanding of Raikou's streams, and speedrunners more broadly.

Videogames, when discussed in relation to traditional sports, are often framed as either artificial simulations of so called 'real' sports, or simply relegated to realm of 'game'.

Games, per se, can be thought of as less than the real thing in several other ways. For example, when the claim is made that, say, football is "more than a game," it is thought that the stakes are higher, as is the case when sport is considered a "big business," a "civic religion," or a collective expression of national identity. Alternatively, when the exhortation "it's only a game" is made during a sporting activity, it is often used as a form of consolation for someone who might be overly disappointed with a loss or as a reprimand to someone who is perhaps taking the game "too seriously."

(Hemphill 2005, 196)

This language often discredits those who take videogames 'seriously' (e.g. e-sports athletes and speedrunners), while also discounting the various identities and forms of collective expression that emerge around videogames, competitive or otherwise (Hemphill 2005). Hemphill (2005) notes an emphasis on physicality amongst theorists attempting to delineate 'sports' from 'games', however, as he identifies, "the mind boggles" when attempting to identify the degree of fine motor skills necessary for a game to become a sport (199). This is without considering the existence of speedrunning, with Hemphill's (2005) analysis centring around games that simulate traditional sports (i.e. *AFL Live: Premiership Edition* developed by IR Gurus). The fine motor skills and years of training required to compete with other speedrunners on an international level largely discredits this definition of traditional sports, highlighting the increasingly blurred distinctions that constitute sports and videogames today.

Organised speedrunning events can be distinguished from more conventional 'e-sports' competitions and tournaments, namely in their scale and their competitive nature. World records are typically broken during personal live streams as opposed to speedrunning events such as GDQ (Games Done Quick) or ASM (Australian Speedrun Marathon). This is largely due to the unpredictable or random elements typically present in videogames, with certain

game events and sequences required to align in order to produce the 'perfect' run – alongside, of course, the speedrunner's 'perfect' performance as the player. Instead, these larger speedrunning events serve to showcase different techniques across a broad variety of videogames and are typically tied to charity fundraising. In this sense, these events (which are usually streamed live on Twitch) celebrate the speedrunning community at large, rather than pit competitors against one another. For this reason, personal live streams can carry an added degree of suspense, excitement and competitiveness when compared to larger scale speedrunning events.

As noted in chapter 3, in the interest of maintaining fair competition between speedrunners, rules are established within the community and posted online (e.g. speedrun.com), with runs segmented into various categories often depending on their use of glitches (major glitches, minor glitches, glitchless, etc). However, what constitutes a glitch on speedrun.com is rarely simple or clear-cut, typically being the result of voting and open discussion within a particular speedrun community (Ricksand 2021). In the 'rules' tab on speedrun.com for the 'no major glitches' speedrun of the videogame *Digimon World* (developed by *BEC* and *Flying Tiger Development*) there are several requirements that outline what is permitted and required for a run to be considered legitimate.

Timing starts on confirming the first in-game textbox after the "File City" loading screen and ends when the Machinedramon in Mt. Infinity's health reaches zero. Saving and reloading (while the timer keeps running) is allowed within the game, but not through emulator-savestates.

Runs can be done on emulator, ePSXe 1.7 or 1.9 are to be used. Due to the reasons listed here (http://www.speedrun.com/Digimon_World/thread/ybz2w), runs performed on emulator MUST be single segment (no save and quit). Use of the "textbox storage" glitch, hardware manipulation and use of the debug menu is forbidden.

(Digimon World - Speedrun.com, accessed Nov. 2021)

The first sentence identifies the start and end point of the speedrun. The following two sentences specify guidelines for using emulators, with some restrictions in place to preserve fair competition. Emulators afford PC users the ability to play older videogame titles, such as *Digimon World* for the PlayStation, without having to search and pay exorbitant prices for the

physical versions and hardware (no longer in distribution) that would ordinarily be required to play them. However, this presents some clear challenges for maintaining equal and fair conditions for all speedrunners wishing to participate in the leaderboards.

A key issue in allowing speedrunners to use emulators is that the average computer, when running an old PlayStation title, can load data much faster, thereby providing an advantage over players who use the original version and hardware. In the interest of maintaining support for emulators within the speedrunning community, measures have been put in place to allow their use via specific guidelines, as illustrated in the following post – the link to which is posted in the rules detailed above.

By default, emulator saves and quits far faster than console does and was the primary reason why it was prohibited. However, the use of the "-slowboot" option for ePSXe ends up showing the PS1 boot screen, which reduces the time discrepancy down to roughly 5 seconds, meaning that they are more comparable... Another issue with emulator is that most emulators are not able to emulate lag correctly for the game, which can speed up certain fights by indeterminate amounts of time depending on what techniques are used...

(Digimon World - Speedrun.com, accessed Nov. 2021)

The above excerpt contains but a few of the considerations detailed in the post, justifying the specific emulator and version that must be used to maintain fairness. Notably, there is a feature within the ePSXe emulator that attempts to reconcile the discrepancies in load times between the emulated version of *Digimon World* and its original. Despite earlier descriptions of speedrunners 'breaking' games to complete them as fast as possible, this example highlights work performed on behalf the community to not only emulate the game, but also emulate the hardware that originally ran it. While this is important for maintaining fair time measurements for speedrunners, it also points to the speedrunning community's shared interest in preserving games in their original form (or as close to) and, in doing so, preserve the unique forms of play that exist *in relation* to the original version of the game, i.e. the PlayStation version of *Digimon World* (Scully-Blaker 2016). As illustrated in the above post on speedrun.com, something as simple as the time it takes to boot up the game can drastically alter which, and how, speedrunning techniques are used. Therefore, a key element within the speedrunning community is not only preserving games in the form of emulators, but also

preserving the play practices that are contingent on the types of hardware and emulator software used to run them.

In an interview response not documented in chapter 3, Raikou commented on the use of emulators in his interview, noting that often they were outright banned within speedrunning communities.

It is a very pure hobby. A lot of people try and avoid using third party versions of anything. For example, emulators are a pretty frowned upon thing in most communities because it's hard to tell how good an emulator is compared to the official hardware in terms of its accuracy and stuff like that, and how well it emulates a game. So you could have loading differences that give you an advantage on emulator and it could be so insignificant, so minor that you wouldn't be able to tell without frame-by-frame watching a video between the emulator and a console.

In addition to decreasing load times, emulators also make it quite easy for players to manipulate in-game elements, or use debugging tools in the background that allow players to see RNG values, in turn allowing them to predict game events and NPC actions before they happen. Raikou's reference to "proper cheats and game shark" in chapter 3 pertains to the use of cheating devices which can allow players to alter the internal data of a videogame, often making it easier for players to complete. The term 'proper' in this context reveals that, while speedrunners often participate in so called 'game-breaking' by exploiting glitches and bugs present in the videogame, there is distinction between what they consider cheating and fair play. While this distinction can seem quite arbitrary, Raikou's reference to speedrunning as a "very pure hobby" reveals a certain revery for playing games in, or as close to, their original form. While this helps to maintain fair competition, it also allows for a continuity within the community, with speedrunners refining existing techniques, and discovering new ones, over the course of years as part of a collaborative and community-driven process.

The importance placed on the rules that frame and structure how speedrunners 'play' videogames is key to understanding the sports-like discipline amongst speedrunners, and the inherent appeal of spectating them on Twitch. A brief look into the 'scandals'

that have surrounded 'cheaters' within the speedrunning community reveals the weight placed on fairly adhering to established community rules and guidelines (Hernandez 2020). In this sense, a live audience aids in further legitimising the run, providing another means through which rules are regulated and governed within the speedrunning community. Importantly, the process by which speedrunning records are broken is typically the product of numerous efforts by different members of the community, seeking out and developing new ways to optimise runs within different play constraints. Regarding the appeal of speedruns on Twitch, viewing and participating not only allows spectators to vicariously follow the speedrunners' personal, and often emotional, journey to achieving a new PB, but also (potentially) situates them in moment of history. The live nature of video content on Twitch appeals to speedruns on a number of levels, allowing spectators to educate themselves on speedrunning techniques through direct communication via the live chat, while also participating in a shared experience, allowing Twitch users to feel personally connected to both the success of a given streamer, and the speedrunning community as a whole.

I return now to the Twitch transcript 4 (p. 110) documented in chapter 3, detailing the sequence of interactions between Raikou and his chat, as he approaches a personal best and new world record for Digimon World. As discussed in chapter 3, achieving a new PB is one of the most exciting moments for both viewers and streamers of speedruns, even more so when it is a new world record. These moments typically come after months, if not years, of attempts, close-calls and failures. The minutes that transpire prior to achieving a new PB place an enormous amount of pressure on the streamer, with a typically tense, excited chat accompanying their every second of play. Raikou's Twitch Transcript begins 5 minutes before the end of the run, beginning with him quietly muttering: "There's no words". This marks a point of increasing tension, as Raikou begins to imagine his victory – something he cannot let distract him from performing the final crucial minutes of play. During this time Raikou's live chat communicates conflicting information, comprising messages trying to calm Raikou down ("breath rai, no heart attacks today") alongside premature celebrations of victory ("We did it"). Notably, the use of the word 'we' in the live chat implies a collective victory that is at stake, one that includes Raikou as well as his community of viewers.

The timestamps that shortly follow (Timestamp 3 - 6) capture a moment in which Raikou appears to mistime his button inputs, consuming valuable seconds as he fails to successfully 'feed' one of his Digimon, requiring him to repeat the process an extra time. While a more detailed explanation of *Digimon World's* gameplay mechanics is beyond the scope of this thesis, of particular interest are instances where certain in-game moments are instilled with greater significance due to their place and function within the 'route' of a speedrun. The failed "first try feed" causes a moment of panic for Raikou before he reassures himself, describing aloud the final tasks between him and finishing. The live chat can be observed, again, offering support alongside comments such as Yoghurt1's that jokingly prey on Raikou's anxiety – complete with Twitch's quintessential 'kappa' emote, broadly used to

imply sarcasm and irony: "imagine u forgot one ". This bears comparisons to the earlier analysis of Cubeyy's stream, and Rektenwald's (2017) notion of 'pivoting'. Interactions between Raikou and his audience appear to follow a similar pattern, where some ambiguity is built up (in this case, Raikou potentially ruining the run), eliciting responses from the streamer and messages from live chat participants that, in turn, attribute meaning to the event. As previously noted, communication between users in these circumstances tends to be licensed by the activity, i.e. speedrunning *Digimon World*, rather than specifically directed to an individual (Recktenwald 2017, 79).

Another instance illustrative of Recktenwald's (2017) 'pivoting' may be observed in another of Yoghurt1's comments at timestamp 6: "DO NOT PANIC THIS IS THE BIGGEST MOMENT OF YOUR LIFE". While they are addressing the streamer, it does not illicit a direct response from Raikou, and it was likely never designed to. The messages that precede and follow Yoghurt1's contain concerned sentiments attempting to calm Raikou as he approaches the pivotal last moments of play. In this context, we can better understand Yoghurt1's message and its implicit joke – intentionally countering the overall 'positive' sentiment in the chat, and playfully entertaining a 'worse-case scenario'. While it may appear, at first glance, that Yoghurt1 is attempting to throw Raikou off their game, the

context in which the message is sent, along with the previous use of the 'kappa' and emote, signal the playful intent of its author. In this sense, we can interpret the message as conveying the gravity of the situation, leveraging the intensity of the moment to comedic effect. Tense moments such as this are key feature across speedruns, where certain game mechanics, and the affordances that comprise them, act as hinge points that potentially make, or break, a run

– akin to the 'clutch' moments described earlier in reference to Cubeyy's streams. The carefully considered nature of a speedrun route means that certain moments of gameplay that would be considered mundane or routine in casual play sessions are, instead, elevated to new levels of importance and intensity. These moments then take on further significance within a live streaming environment, drawing audience attention, along with their participation in the live chat, and animating the streamer as they react emotionally to their successes and failures.

In his interview, Raikou used the term 'frame perfect' when referring to the perfect timing of button inputs during a speedrun. To briefly elaborate, 'frames' refer to the still images that operate in sequence to simulate motion and movement in a videogame. Beyond providing visual feedback to the player, the videogame operates in accordance with frame data that determines how objects interact with one another within the game environment. To achieve frame perfect input requires the player to time their button presses so that it they are registered precisely within a specific frame of gameplay. Playstation 1 titles tend to sit around 30 frames per second, meaning that frame perfect execution requires the player to time their inputs to approximately a thirtieth of a second. Raikou's description of the speedrunning techniques he uses in the videogame Tomba illustrates how in-game affordances can be manipulated to allow 'skips' to occur, i.e. moments where the player can interrupt and/or bypass a sequence of game events from occurring. Given the difficulty of executing this skip, Raikou noted members in his live chat who would not only notice it occurring but notice how 'cleanly' he was able to execute it. Raikou's response highlights the effect speedrunning has in influencing not only how the player/streamer plays the game, but how the audience understands and perceives gameplay. Moments that would have been logical points for celebration in a casual playthrough, e.g. defeating a boss, completing a level, often do not carry the same weight in speedruns. Instead, moments such as the 'skip' described above serve to showcase the streamer's skill, while also bearing a degree of risk and reward.

Notably, within the manipulation of the game affordances required to execute the *Tomba* skip are degrees of success (messy vs clean execution) recognisable to certain members of Raikou's audience, i.e. "the usuals". Again, this bears comparison to traditional sports, with fine motor skills influencing not only what actions are possible, but, additionally, *how* well they can be performed. There's a risk to performing the above skip cleanly, that requires Raikou to commit to button inputs without the use of any 'buffering' that would allow him to fix his mistake if he missed by a couple of frames. This is visually identifiable by certain,

more familiar, spectators, prompting them to "pop off", i.e. celebrate, via the live message chat when Raikou performs it cleanly. The meaning that is constructed around this in-game event relies on the rules and structure of the speedrun. It is the explicit goal of wanting to complete the game as fast as possible that makes saving 5-6 seconds so valuable – in turn, justifying this technique's use along with its difficulty. However, if speedrunners were allowed to play a version of *Tomba* that simply allowed the player to skip the event text, this technique would cease to be important, and therefore would no longer be used. This points to the fact that while speedrunning stretches and breaks several elements of a videogame, it still adheres to a structure that comprises both the videogame's internal limitations, and an externally imposed, community-based ruleset that structures and brings meaning to the play practices associated with it. While the lines that distinguish what is and isn't allowed in a speedrun, along with what constitutes a glitch (major vs minor), often appear quite arbitrary, they nevertheless remain integral to the practice of speedrunning, acting as the basis upon which various speedrunning techniques are discovered, perfected, and superseded across members of the community.

In his interview, Raikou described the feeling of achieving this new record after 6 months of attempts, noting: "That's what it's all about. You can't get over the feeling of finally achieving something like that after working hard for it". In Twitch Transcript 4 (p. 111) the chat is observed celebrating alongside Raikou, with several 'GG' messages (i.e. good game) alongside various celebratory Twitch emotes. Among the messages are also several announcing "I was here", pointing to the stream's newfound historical significance. The stream now serves as proof of Raikou's achievement, and will now be stored and uploaded to other platforms (evidenced by messaged in the chat, e.g. "HI YOUTUBE") and referenced by others as the current gold standard for Digimon World speedruns. As previously noted, at timestamp 9 the term 'we' is used by a chat member to imply a collective victory – to humorous effect: "Yeah, WE did it. Well, lets be honest. It was mostly me". While the author of this message jokingly claims credit for Raikou's achievement, Raikou himself exclaims "... we did it!" at the moment he finishes the run. Referring to Hemphill's (2005, 196) earlier quote wherein he noted how the phrase 'more than a game' signalled sports' role in harbouring a "collective expression of national identity", we can observe a similar effect in speedrunning, albeit one disconnected from notions of nationalism. The online community and culture that surrounds speedrunning elevates this moment to 'more than a videogame', in

so much as it connects Raikou, his Twitch channel and his audience members to a broader sociality and history, in turn shaping the significance of this event.

When asked how important it was to have viewers present and participating in the chat during these moments, Raikou replied

Very much. If I did that offline, it wouldn't have been nearly as powerful, or as nice as it was, without having the chat being like "wow this is crazy, he got that barrier broken".

Raikou's comment highlights the audience's role in not only contributing to the emotional 'power' of these moments for Raikou, but also motivating him to accomplish his speedrunning goals. Matsui et al.'s (2020) study into streamers of the competitive videogame *League of Legends* (developed by Riot Games) revealed a trend in which streamers would "...engage in the game for long periods of time and have a longer player history than nonstreamers" (27). While performance (measured using players' kill to death ratio) over time would decay faster for streamers than non-streamers, with streamers' attention and "cognitive bandwidth" being taking away from gameplay, the act of streaming was observed to correlate with longer games and play sessions (Matsui et al. 2020, 27). In the case of speedrunning, where 'chasing' a new PB requires not only skill but luck (due to unpredictable elements [RNG] in videogames), players must make hundreds if not thousands of attempts before achieving a new record. In this context, the presence of an audience may be understood to motivate speedrunners like Raikou while also bringing others (i.e. spectators) into the fold, who can then share in the journey, encouraging and even financially supporting the streamer in the process.

'Twitch culture' and channel growth: finding connection in smaller spaces

Enabling audiences to support streamers financially, as well as through their presence watching the stream, is a key part of Twitch's platform economics. However, although it is heavily monetised and encourages its users to expand their audience and take advantage of the monetisation tools at their disposal, Twitch is predominantly home to small and medium sized streamers who could never rely on Twitch as their sole form of income (Jett 2020;

Twitch streamer summary stats 2023). With the exception of Raikou, who would be considered a medium sized streamer (regularly attracting upwards of 50 concurrent viewers, sometimes over 100), this thesis centres on smaller videogame streamers. My research therefore supports an analysis of the effects Twitch's wider user culture, branding and scripted user qualities have on the platform's numerous smaller streamers' relationships with their audience and their streaming practice.

Sixfourtythree's Twitch channel is smaller when compared to the other streamers interviewed, and, similar to SpamBrah and Captain Perth, his approach to streaming prioritised personal enjoyment over chasing growth metrics. However, Sixfourtythree's general motivation for streaming was more difficult to pin down compared to other streamers, with him noting in his interview "I'm not sure why I stream actually". This response prompted him to describe losing his job because of COVID19, which in turn motivated him to achieve Twitch 'affiliate' status with his newfound free time. While the other streamers interviewed had a clearer idea not only of why they streamed, but their personal brand of streaming, Sixfourtythree's attitude was far more relaxed and less focused on crafting an identity and persona to attract and appeal to viewers. Sixfourtythree is not an especially skilled player like Raikou, nor is he a variety streamer in the strict sense, as he tends to play only a few games on his personal streaming channel, almost always competitive first-person shooters. It is clear from his responses that Sixfourtythree does not approach streaming on Twitch with the primary goal of building and expanding his online profile and community and, by extension, generating an income. Instead, the Twitch platform functions more as a tool for him to engage with members of the gaming community, sharing his experiences and celebrating the videogame titles he enjoys.

Similar to the responses of Cubeyy and SpamBrah, Sixfourtythree considers his personal enjoyment while streaming to be an important part of being a fun and engaging host. Elaborating on this, Sixfourtythree reflected on times when he streamed the highly popular videogame *Fortnite* (developed by Epic Games) and "really didn't enjoy it". Sixfourtythree then described how, despite these streams attracting higher viewership numbers, it was not an overall positive experience for him – "I found myself not really being happy with streams afterwards from a personal perspective". This example distinguishes him from other interviewed streamers, as it brings to light a situation where, despite additional viewers and positive interactions with his chat, Sixfourtythree was left dissatisfied with his streams on a

personal level. This coincides with another remark Sixfourtythree made during his interview, where he described streaming as "my own personal environment that I create". This personal environment extends to the videogames he plays while streaming, with the videogame *Fortnite* appearing to conflict with Sixfourtythree's enjoyment and, to an extent, his identity as a streamer. While he didn't describe precisely why this was, Sixfourtythree considers his streams to be genuine, personal extensions of his private play sessions and, given *Fortnite* is not a game he plays privately, he is not happy streaming it either – regardless of viewership.

The Fortnite example contrasts with Sixfourtythree's experiences streaming the videogame Overwatch (developed by Blizzard Entertainment), a game he enjoys "very very much". There is a crucial team dynamic wrapped up in Overwatch's challenge, with opposing teams comprising several roles, including two 'tanks' (designed to absorb damage), two 'damage' (focused on eliminating other players), and two 'support' (designed to heal and/or buff). Within these delegated team roles are specific "heroes" (i.e. player characters), each aligning with a particular team role, but with their own unique set of abilities. The choice of which hero to play or 'main' (i.e. primarily play) becomes a key feature of each player's playstyle, with them often forming some attachment not only to the mechanics of a particular hero, but the wider narrative and story-telling that surrounds them. This is especially the case in videogames such as *Overwatch*, which currently comprises 32 playable characters, to which its fanbase, in Sixfourtythree's words, have "a very strong connection...". Blizzard places a large emphasis on these characters as vehicles for Overwatch's narrative, with their character designs and voice lines in-game providing players with exposition and context for the wider world they inhabit. On top of this, several animated shorts (typically between 6-8 minutes long) have been released online exploring the origin stories of several of the videogame's characters, as well as key events that have shaped characters' relationships with each other. These narrative elements tie into the playstyles of Overwatch's characters - one example being Sombra, a stealth-focused hacker, whose abilities include allowing her to turn invisible as well as hack opponent characters, disabling their abilities. Thus, the choice of character alters the way the player problem-solves and the tactics they use against the enemy team, while also allowing the player to role-play as the character portrayed in the animated shorts - in Sombra's case, infiltrating and hacking their way to victory.

Sixfourtythree noted that a common question to ask, when meeting someone who plays *Overwatch*, is 'who do you main?', describing it as a big "interacting point" during streams. *Overwatch* characters can be 'stealthy', 'healing-focused', 'high risk high damage' and more, lending them to particular playstyles and player preference. The player's decision of which character to play, and *how* they manipulate the abilities unique to that character in order to 'win', are not only rich avenues for conversation, but also a means of identity forming, with players typically picking one or two 'mains' and labelling themselves in relation to them, e.g. "I am a *Sombra*-main", "*Zarya*-main" (characters in *Overwatch*). In his interview, Sixfourtythree noted that if a spectator sees a streamer playing the same character they 'main' in *Overwatch* "...it's definitely a big push to watching [and] then following that person". Sixfourtythree's response highlights the connections players form with particular styles of playing and, in the case of overwatch, the various characters, or 'heroes', that comprise these playstyles. It also serves to illustrate the interconnected nature of challenge and narrative, and the manner by which these videogame elements structure and influence interactions between players and, in the case of Twitch, between streamers and spectators.

The 'interacting point' Sixfourtythree identifies above ties into his later discussion of the 'player narrative' – something Sixfourtythree considers at the heart of Twitch streams and their general appeal.

I think the player narrative is why people watch things on Twitch... how [streamers] feel about a certain character, why they choose to play them the way they do, what they think of the environments, their attitudes towards them, the friends they've made in that environment, I think that's the reason, that's what people tune into Twitch for.

Here Sixfourtythree offers a cogent description of the agency players and, by extension, streamers bring to videogames, and the way in which streamers' personalities and online personas can be expressed through their performances in and around gameplay. Sharing in a streamer's 'player narrative' involves understanding their approach to playing, which elements of gameplay they enjoy and focus their energy on, and the variety of social encounters that emerge in and around the videogames they play. In the case of *Overwatch*, the variety of different characters and playstyles distinguishes players from one another, and acts as a springboard for interactions between members of the community, influencing how

spectators view, interact and draw meaning from streamers of *Overwatch*, such as Sixfourtythree.

It's important to note the goals Sixfourtythree attaches to streaming are different depending on whether he streams on his personal channel or as part of Sifter. As noted in chapter 3, Sixfourtythree streams on two Twitch channels, his personal channel 'Sixfourtythree' and 'Sifter'. The latter channel includes videogame live streams as well as interviews with developers, with a focus on Australian indie videogames. This positions Sixfourtythree's personal Twitch channel as space for him to stream without having to adhere to any of the organisational goals of Sifter, which is a collaborative channel comprising several individuals. It's also worth noting that while Sifter streams predominantly through Twitch, its content spreads across several other platforms including its own website, YouTube channel, Facebook page, Twitter, Discord and Instagram. This includes written, text-based content, comprising written reviews, news articles and opinion pieces. While only briefly touched on, this provides additional context for interpreting and understanding Sixfourtythree's relationship with streaming, along with the personal nature of his own Twitch channel relative to Sifter. Given Sifter's goal to bring attention to the Australian Indie development scene, its content is more audience-centred with the aim of expanding their reach and popularity. Therefore, Sixfourtythree's videogame preferences have less influence over the content Sifter produces, with the channel acting more as a platform through which game developers can showcase their videogames and engage with the gaming community.

In Sixfourtythree's responses we can identify a certain *pull* on behalf of the Twitch platform, influencing streamers to play particular games with the likelihood of attracting higher viewership. This is something that has come up in other interviews, with SpamBrah noting that she tracked gaming trends on Twitch regularly when deciding which games to stream, and Cubeyy regularly auditing his stream's statistics to determine which games were 'successful' when streaming. Returning to Ask, Spilker and Hansen's (2019) "scripted user qualities" on Twitch, specifically the quality of 'gamer', streamers are observed to regularly confront and negotiate their streaming practice based on what is popular, promoted and generally accepted on the Twitch platform. While the term gamer is quite broad, in the context of what is popular on Twitch this term becomes much narrower, with specific titles like *Fortnite, League of Legends* and *Minecraft* (alongside flashes of popularity amongst others) tending to dominate the Twitch platform long term. On the other hand, there is a *push*

on behalf of streamers to play and celebrate the games they enjoy, regardless of their popularity on the platform and lower potential viewership numbers. Sixfourtythree commented on how "there are certain games people gravitate toward because of the culture of that game", noting that the *Titanfall 2* community generally felt "hard done by" due to a lack of support from its developers and a relatively small player base. However, this inadvertently has made the community more supportive, with Sixfourtythree noting that the fanbase "feel that *Titanfall* needs to be supported, and so they will show up [to streams] regardless of who's playing it", with him receiving comments such as "oh someone's playing it, someone cares, someone likes it". Notably, Sixfourtythree distinguishes the supportive nature of the *Titanfall* community from the general Twitch community, commenting "I don't think that's to do with Twitch, that's the Titanfall community".

Sixfourtythree's responses highlight the myriad communities, from small to large, that operate simultaneously on Twitch, while also alluding to a broader, dominant 'Twitch culture' that permeates throughout the platform. Understanding Twitch's online culture in a more general sense requires a discussion of "influencer culture", and the rise of the "microcelebrity". These broader online trends, traceable back to the camgirls of the 1990s, have influenced the aesthetics and content of live streams on Twitch and continue to inform both the platform's development and design, and its user culture. An "aesthetic of calibrated amateurism" has grown increasingly popular online, with users favouring more ephemeral forms of content that "...appear less constructed, less filtered, more spontaneous, and more real, thus fostering feeling of relatability and authenticity" (Abidin 2018, 92). This turn to an aesthetic of amateurism is emblematic of Twitch's success, which prides its brand identity on the immediacy and genuine 'connection' live streaming can afford (Woodcock and Johnson 2019). It is in this context that Twitch frames its users' social connections, and experiences in and around videogames (regardless of whether they intend to broadcast on Twitch) in terms of community growth and monetisation: "Your creative content thrives here. Bring your passions; we'll help you build a community around them" (from Twitch TV's 'About' page, 2022). For users interested in learning what streaming entails, the website has a section titled "Creator Camp", with modules outlining various tips and guides for streaming on Twitch. These modules contain video segments that include messages from other "successful" streamers offering their advice. There are also modules designed to help prospective streamers understand and interpret channel analytics to better reach an audience. While these modules contain information that would be helpful to anyone new to streaming, underlying

them is the assumption that your channel needs to grow, and that growth defines success on the platform.

Hwang and Foote (2021) identified a tendency amongst researchers to interpret quantitative metrics of online activity as natural indicators of a community's success. This has the effect of framing smaller communities that do not exhibit active growth as failures, unlikely to last long into the future. However, this does not capture accurately the appeal of small online communities and is not in line with research revealing how such communities not only exist in great numbers, but also persist for extended periods of time (Foote, Gergle and Shaw 2017). In Foote, Gergle and Shaw's (2017) research into community founders on the wiki hosting site Wikia.com, they identified a range of different motivations and definitions of success among respondents, leading them to posit:

...the prevailing focus on community growth and longevity obscures the importance of small, niche communities. Small communities are not necessarily failures or cautionary tales. They may be meeting their founders' goals and deserve to be studied on their own terms.

This perspective is useful when examining Sixfourtythree's approach to streaming and his relationship with the Twitch platform. Sixfourtythree's unwillingness to play games that might garner him a larger audience runs counter to the logic Twitch tries to convey to its users. There does not appear to be any guide provided in 'Creator Camp' that offers advice for developing/maintaining a community without the need for continual growth. Instead, it focuses on data analytics, social media strategy, and incremental goals centred around achieving growth as part of monetising streamers' channels. The growth-as-success assumption further feeds into sponsorship deals, awarding streamers able to meet various key performance indictors with additional income and benefits (Woodcock and Johnson 2019). It is in this context, that tighter, smaller communities, such as the *Titanfall 2* community Sixfourtythree describes, take on qualities distinct from larger communities, including increased levels of support and positivity among members and higher rates of group-based participation and identity forming (Hwang and Foote 2021).

While the focus of this section has been on Sixfourtythree, each of the streamers interviewed discussed negotiating their personal interests with what was popular and likely to attract

spectators on Twitch. This process varied across streamers, and informed how they approached creating content on the platform, as well as their expectations and markers of success. The growth-as-success assumption that underlies much of the training tools available to users presents some important questions related to smaller streamers on the platform namely, how they are framed and positioned relative to larger streamers, and the effect this has on how all users (both streamers and spectators) interpret and value streams of different sizes. As noted above, Twitch comprises primarily of medium and small sized channels, with a small portion of very large channels (Kaytoue et al. 2012; Twitch streamer summary stats 2023). Although a more thorough comparison of smaller and larger communities on Twitch is beyond the scope of this thesis, this discussion highlights a tension I return to in the following chapter, one that exists between the creativity and enjoyment of the streamer, and the logics and scripted user qualities of the Twitch platform. This tension affects streamers differently, revealing key differences in how they relate to their streaming practice. This will inform a later discussion of mental health (chapter 5) as it relates to streaming on Twitch, examining the strategies streamers have for navigating and coping with burnout, and maintaining a positive relationship with streaming.

Chapter Conclusion

This chapter began with Keogh's (2018, 47) conceptualisation of gameplay, configuring the player-videogame relationship in terms of a cybernetic circuit, with agency distributed across both the player and the videogame. This approach located the videogame text in neither the virtual or the actual world, "but in the perceptual ebb and flow of attention between the player's flesh, the videogame hardware, and audiovisual-haptic representation" (Keogh 2018, 49), drawing attention to the mediating effect players and videogames have over each other. This also revealed a tension between the agency of the player and the design constraints of a given videogame. From this tension different playstyles borne of different player motivations emerge, structuring how videogames are played, influencing the meanings players derive and the value they attach (Newman 2008). Although the affordances and overall design of a videogame will aim to condition players to encounter it in particular ways, a range of different playstyles and player experiences nevertheless emerge, often going beyond the intentions of the videogame's developers (Newman 2008). Subsequently, online communities form, not only around videogames, but the different approaches to playing them, e.g.

speedrunning, challenge running, role-playing, etc. Twitch streamers play an influential role within these communities, whether by breaking world records, providing critique and teachable moments, analysing and explaining videogame lore, or simply playing and bringing attention to a particular videogame title. Building on these ideas, this chapter analysed the interview responses and transcripts documented in chapter 3, exploring the different gameplay experiences streamers centred their live performances around, and their role in constructing meaningful moments.

How streamers facilitate and leverage meaningful moments – by playing up their failures, unpacking a videogame's story and themes, providing strategies and tips, etc. - varied across the streamers interviewed, depending on their preferences and personal relationship with their streaming practice. When examining how streamers approached both gameplay and discussion with their audience, Vahlo's (2017) pairing of the terms challenge and narrative with coordination and exploration helped to illustrate the types of gameplay streamers centred the performance around, and the different relationships streamers would form with videogames in and outside of streaming. As discussed in chapter 1, Vahlo (2017) considers players to be "profoundly social creatures" in that they rely on their social interaction skills to make sense of and engage with videogames. This account of gameplay was useful in distinguishing streamers from one another, not simply based on their videogame preferences, but on the particular videogame experiences they used to drive their content on Twitch. As evidenced in the interview responses, streamers encounter and derive meaning from videogames differently. In particular, the choice to emphasise a videogame's competition and challenge, as compared to its narrative and role-play elements (and vice versa), resulted in different types of streamer performance. Additionally, this emphasis was observed to influence the types of interactions that emerged between the streamer and their audience of spectators, aiding in the construction of the streamer's online persona.

Recktenwald's (2017) notion of 'pivoting' was useful in identifying patterns in how users communicated during and around meaningful moments, with Cubeyy's stream illustrating how the construction of these moments could be compared with linguistic approaches to understanding humour. While Recktenwald's (2017, 78) use of the term pivot was primarily to make sense of the cacophony of messages that often followed tense and exciting in-game moments on larger sized channels, similar communicative patterns were observed in Cubeyy and Raikou's streams, albeit with less participants, specifically in competitive moments

where failure or victory carried higher stakes than usual. Notably, during streams where the videogames being played were not as competitive (e.g. SpamBrah and Captain Perth's streams) and moved at a pace set by the player, communication was observed to align less with Recktenwald's (2017) notion of pivoting, with interactions taking a more conversational tone, involving less emotes and longer text-based messages. This revealed that an emphasis on competition, or playing to 'win', influenced how streamers and spectators communicated during streams. Additionally, the inability to pause while playing influenced the amount of attention the streamer could provide the live chat at a given moment, in turn encouraging the use of emotes as way of conveying meaning quickly to the streamer. Therefore, depending on the type of videogame being streamed, channels were observed to develop particular norms that guided interactions between streamers and spectators.

When compared to other types of streamers, speedrunners had a more formal and structured approach to videogame play, borne of community efforts to maintain fairness and preserve the play practices associated with a particular videogame title. For spectators familiar with the rules and requirements that structure a given speedrun, this understanding informed their spectating experience, influencing the meanings they derived while watching and participating in the live chat. Raikou's Twitch channel proved to be a valuable case study for examining the media literacy spectators develop while spectating speedruns on Twitch, and the effect this has on the streamer's live performance. Raikou's interview responses revealed that he anticipated the reactions of more familiar members of his live audience, who would often provide immediate feedback, celebrating and/or critiquing (typically in jest) Raikou's ability to execute complex speedrunning manoeuvres while streaming. This example illustrates another means through which streamers leverage videogame affordances as part producing meaningful moments on stream. The "skip" Raikou described involves the normally mundane act of picking up an item in-game; however, within the route of his speedrun, and within the context of a live streaming environment, this moment assumes great significance. This was especially the case during moments where the possibility of a new world record (or personal best) was in sight, generating a degree of suspense for knowing spectators. The significance of this moment was something Raikou could exploit as part entertaining his audience, emotionally reacting to his successes and failures while incorporating messages from the live chat into his performance.

This chapter concluded with an analysis of Sixfourtythree's interview responses and a discussion of community development on the platform, specifically as it relates to smaller Twitch channels which, aside from Raikou, includes all the streamers interviewed for this thesis. This discussion brought to light the tension that exists between the expectations and incentives present on the Twitch platform, and the personal goals and social connections that motivate users to stream. For smaller communities on Twitch, such as fans of the videogame *Titanfall 2*, there is an active attempt to resist the more dominant videogame trends and provide spaces for communities that are smaller, and unlikely to grow, but nevertheless serve the interests of their community members. However, appealing to smaller communities can result in streamers falling short of the expectations they place on their practice, borne of the growth metrics and incentives native to the Twitch platform. Although the focus of this section was on Sixfourtythree, the growth-as-success assumption underlying many of the tools and training resources available on the platform was observed to affect all the interviewed streamers, however, in different ways, and to different extents.

The following chapter will build on this analysis to form a clearer understanding of Twitch's cybernetic circuit of interaction. Key to this approach is an appreciation for the role the videogame has in co-constructing the spectator experience alongside the streamer and their audience. This will segue into a discussion that explores how the player experience shifts and adapts to a live streaming environment, and the relationships streamers form with videogames as part of developing their streaming practice. A streamer's relationship with videogames, in a general sense, forms part of their channel's identity, serving as an avenue through which they can showcase and express their personality. This is evident in the labels used to define different streamer types: variety, speedrunner, etc., but also broadly encompasses the streamer's personal preferences, skill level, and in-game decision making, which collectively inform which in-game experiences they focus their attention on and the topics of conversation that tend to dominate their interactions with the chat. The interview responses also highlighted the importance placed by streamers on their personal enjoyment while streaming, however, they also revealed the negative encroaching effect Twitch's growth metrics and definitions of success had on streamers' ability to enjoy playing for an audience. So far, this thesis has focused on how streamers configure their gameplay in terms of a potential audience as part of constructing meaningful moments. The moments analysed bring streamers and their audiences closer together. However, appealing to an audience can have a damaging effect on how streamer's measure and value their gameplay, both inside and outside of streaming. This is an area that will prompt further discussion in chapter 6, as I examine the difficulties associated with streaming on Twitch, and the strategies streamers have for avoiding burnout, maintaining their mental health, and preserving their passion for videogames.

Chapter 5: Discussion

Twitch's Cybernetic Circuit of Interaction – videogame play and the social dimensions of live streaming

In Keogh's (2018) analysis of videogame play, he draws on Apperley (2010) to highlight how the "rhythms of everyday life" impact the way players experience and engage with videogames, drawing attention to so-called "external rhythms", e.g. toilet breaks, work schedules, etc. This leads Keogh (2018, 183) to posit, in relation to the cybernetic circuit of videogame play,

...that this embodied, corporeal circuit is not hermetically sealed but always already situated within particular material and social contexts—not a closed circuit but a subsystem that branches out and is situated in much broader networks and rhythms.

This framing is useful when considering the broader networks and rhythms live-streaming environments facilitate, and their influence over how play is experienced when compared to private play sessions. While streamers are subject to the same external rhythms as traditional players, bathroom breaks, meals, etc., the Twitch platform situates them in a wider network of interaction, bringing together other factors external to the videogame that influence how play is experienced. For example, videogame play is routinely interrupted by spectators through their engagement in the live message chat, alongside their donations and subscriptions to the channel. These interruptions operate as a different form of external rhythm, borne of the Twitch platform and its interface. They nonetheless structure how streamers engage with the videogame, influencing their moment-to-moment performance as they variously respond to messages from the live chat, and events generated in-game, leveraging both as part of the process of maintaining spectator interest.

Twitch's live message chat was observed to not only routinely interrupt the streamer's videogame play, but also influence *how* the streamer played and their motivations while

doing so. With the exception of Sixfourtythree, the interviewed streamers all described playing differently and often different videogames while on stream when compared to private play sessions. Additionally, streamers were observed playing up their emotions and roleplaying different personas during streams to further engage their live audience. This was a topic discussed in the previous chapter, where streamers were observed placing greater emphasis on the so-called "inauthentic timeline" of their videogame play, leveraging, and even orchestrating, moments such as failure as part of engaging and entertaining their live audience (Keogh 2018). Importantly, the term authentic in this context refers to in-game actions performed by the player that, when done successfully, allow them to progress further in the videogame, with the player's inauthentic timeline describing moments of failure and repetition. The previous chapter also brought to light situations in which the pace of gameplay, and the ability to "pause", would influence the degree of attention streamers could give the live chat, influencing the rhythm of conversation and the modes of communication that would subsequently emerge (i.e., the number of emotes [image-based] relative to textbased messages). These examples further highlight Keogh's (2018) notion that the circuit of videogame play is not hermetically sealed, but rather situated within broader networks and rhythms that structure how meaning is constructed during play. This feeds into this thesis' understanding of meaningful moments and their construction on Twitch, wherein videogame affordances culminate, not only in the service of a videogame's challenge and/or narrative, but in the construction of moments that animate the streamer, engage audience members, and take advantage of the social dimensions afforded by the Twitch platform.

Twitch places additional incentives around the act of play, positioning players, now streamers, as creators of content, with their gameplay and physical performance configured in terms of a potential audience. In this context, progressing through a videogame takes on a performative quality, altering the way streamers and spectators experience videogames when compared to traditional players. Importantly, progress in a videogame comprises both linear and cyclical processes, with Csikszentmihalyi's (1991) "flow state" involving regular instances of failure, through which the player loses, retries, and succeeds, "forging a particular coupling between the player's actual labor over time and the authentic and inauthentic performances of the playable character with the videogame's world" (Keogh 2018, 203). This coupling, between the player's labor and their authentic and inauthentic performances of gameplay, serve as a foundation upon which videogame streamers build their content, and over time develop their online persona. However, it is these "inauthentic"

performances, e.g. a game breaking glitch, the player-character's death, being stuck on a puzzle, that regularly serve as opportunities for streamers to animate themselves and engage their audience. The presence of a live audience may be understood to elevate these moments, in which the streamer responds to and builds on messages and jokes sent via the live chat, incorporating the audience's reaction as part of their performance, both in-game and physically (i.e., voice-commentary and face-cam).

The streamer, and their motivations while playing, inform which elements of a videogame drive their content and their interactions with the live chat - a clear example of this being speedrunners. For streamers like Raikou, their content centres around their expert playing, and the difficulty that comes with speedrunning, particularly at a competitive level. A fundamental feature of speedrunning is its player-centred approach that prioritises completion in the shortest possible time, resulting in gameplay that is often well outside the bounds of the developer's intent. This brings with it an array of strategies and techniques that then influence the types of conversations and interactions that occur between the streamer and the live chat. Notably, different forms of media literacy were observed to emerge around the play practices streamers would associate their content with. This was brought to light when Raikou described a difficult 'skip' he would attempt while streaming Tomba (developed by Whoopee Camp), noting that certain regular members of his audience would be able to visually determine how "cleanly" he was able to execute it. The existence of spectators capable of visually registering and appreciating Raikou's execution of the skip serves to legitimise it as form of performance, with spectators communicating their reactions via messages in the live chat, going as far as to celebrate or critique Raikou's 'form'. The relationship that unfolds between Raikou and his 'regulars', in which he anticipates immediate feedback during difficult moments, further validates his performance while contributing to the tension and suspense that comes with attempting to break a personal, or world, record.

Parallels may be drawn between the spectators of live videogame streams and that of traditional sports, where athletic technique and expert execution are capable of eliciting awe and applause from audience members. This is especially the case when streams grow in popularity and scale, with hundreds, or thousands, of chat participants reacting and contributing to a "waterfall of text", i.e. fast moving live message chat, not unlike the cacophony of applause exhibited in sports stadiums (Nematzadeh et al. 2019). The novelty of the live streaming media form, however, lies in its ability to harbour immediate interactions

between the streamer and their audience, affording spectators a degree of influence over their moment-to-moment performance. It is here that the social dimensions of the Twitch platform coalesce around gameplay, with the streamer's choice of videogame and approach to streaming giving rise to particular forms of interaction. For streamers such as Raikou, Twitch allows them to not only share their speedrunning journey, but actively involve others in the process, with spectators playing an active role in motivating, and even assisting, speedrunners during their streams. While the live chat would rarely, if ever, dictate Raikou's actions during streams, he would often ask questions, drawing on his audience as way of remembering what he had done, and what he had left to do during a run. Additionally, Raikou noted the influence his live audience had in motivating him to stream, claiming that beating a world record would not have the same personal impact if he accomplished it privately. In this sense, the presence and support of spectators is understood to have a direct, and generally positive, influence on Raikou's streams and his ability to accomplish his streaming goals. Through their engagement with the stream, spectators can form personal connections with Raikou, and can, potentially, become emotionally invested in his successes and failures. By forming these connections with Raikou, spectators are brought into the fold, and included in his journey, culminating in moments such as the one captured in Twitch Transcript 4 (p. 111), where the victory of achieving a new world record is shared amongst Raikou and his audience.

This isn't to imply narrative and exploration don't have an important role in Raikou's streams however, as the story, world and wider franchise of *Digimon World*, for example, remain part of his channel's appeal. As Raikou notes in his interview, the nostalgia him and his audience feel for older PlayStation titles feed into his interactions with spectators. Additionally, during streams where Raikou seeks out alternative routes for his run to shave seconds of his best time, he approaches the videogame in a more explorative way, experimenting and testing its technical limitations while conversing with his live chat. However, Raikou's in-game actions are tied to the play practices associated with speedrunning, and therefore emphasise coordination and speed over exploring the videogame in way that would provide a cohesive narrative experience. This is an important distinction, as it highlights the influence the streamer's motivations, and externally imposed goals, have in relation to the videogame, which then informs how spectators view, understand and value videogames within live streaming environments.

It is here that Raikou contrasts most with narrative-focused streamers such as Captain Perth, with narrative playing a primary role in guiding Captain Perth's in-game actions and prompting interactions between him and his audience. As outlined in the previous chapter, Captain Perth's streaming approach involved the use of voices as part of communicating ingame text and character dialogue, alongside his inherent curiosity, which motivated him to ponder, with his audience, the finer details of a videogame's story. This placed a greater emphasis on Captain Perth's commentary, with the gameplay on display moving at a slower pace to encourage regular digressions with his audience. A similar comparison was made between Cubeyy and SpamBrah in the previous chapter, again illustrating how the pace of gameplay influenced the forms of communication that emerged between streamers and their live audience. These comparisons highlight the process through which both streamers and videogames co-construct live content on Twitch, with elements internal to the videogame, e.g. speed of combat, difficulty, score, storytelling, multiplayer participants, etc., influencing the rhythm in which streamers and spectators interact, bringing audience attention to the videogame during moments that align with the focus of the stream, e.g. chasing a new personal best, exploring the story of a videogame, playing casually, etc...

To examine this phenomenon further, I will draw on Vahlo (2017) to explore the playervideogame relationship and how this translates into different spectator experiences on Twitch. In his account of gameplay, Vahlo (2017) describes how:

Rather than being able to shape the intentionality of the player, dictate the continuity of the gameplay or its meanings, a game generates opportunities and possibilities for actions, i.e. affordances. This demarcation designates that in first-person enactivism the player's desire to play, and hence the autonomy of gameplay, should not be understood as a given but as precarious.

Notably, this understanding of gameplay could be seen to contradict the framing of gameplay as a cybernetic circuit, where agency is distributed between both the player and videogame (Keogh 2018). While this thesis considers the effect both videogames and players have in mediating the other, this not to imply that videogames have the same level of agency and control as the streamer or player – the player is the one who decides whether or not to continue playing. However, understanding gameplay in terms of a cybernetic circuit is useful for considering the role of videogames in environments that extend beyond private play such

as Twitch, where the streamer and videogame coexist within the same media interface. In this context, videogames play an active role alongside the streamer in co-constructing a spectator experience - the term 'active' referring to a videogames ability to generate novel, unpredictable and evolving experiences for streamers to leverage as part of their live performance. Videogames are active through the experiences they generate, with these experiences, in turn, invoking emotional reactions in streamers and their audiences. Although the interview responses revealed that streamers were often conscious of their emotional states while streaming, in some cases 'playing up' these emotions for their audience's enjoyment, streamers still considered their live reactions to be genuine. Deciding which videogame to stream, therefore, required streamers to anticipate how it would influence their emotional state, bringing to focus the videogame's mediating effect on the streamer's moment-to-moment performance, and the subsequent interactions that would emerge with their audience.

A streamer's emotional state, however, is the result of a dynamic process, by which the streamer engages with the videogame in ways that conform to the motivations and goals associated with their playstyle. In describing how coordination and exploration manifest within gameplay, Vahlo posits:

Without any coordination, the player appropriates the game for what Roger Caillois (2001 [1961], p. 9) called "playing at 'playing chess'", and what has more recently been labeled toyplay (Bateman and Boon, 2006; Sicart, 2009). Correspondingly, without any exploration, she will just be trying to use the system... As long as the game does not provide changes that emerge for the player as novel affordances for exploration and coordination, the game artifact will deprive the self-sustaining autonomy of gameplay instead of nourishing it.

As Vahlo (2017) outlines, gameplay requires a balance of both coordination and challenge in order to sustain the continued interest of the player. Finding the right balance will depend on the player's playstyle and preference. However, within the context of Twitch, the "self-sustaining autonomy of gameplay" operates as part of a spectacle, with streamers assuming the dual role of player and performer, drawing meaning and enjoyment from both. In this context, affordances serve as the avenues through which streamers may creatively express their online persona in and around gameplay, emphasising challenge and narrative accordingly as part of their performance.

In chapter 1, I discussed Csikszentmihalyi's work on flow theory and the concept's later application to game studies by Sweetser and Wyeth (2005). While flow theory, in terms of the *player* experience, did not accurately apply to streamers, it did reveal some useful distinctions between private play and the act of playing for an audience. In the above quote, Vahlo (2017) noted the precarious nature of gameplay, and the breakdown that would occur if a videogame was unable to offer the player novel affordances for exploration and coordination. This bears similarities with Sweetser and Wyeth's (2005) application of flow theory, which also highlights the possibility of breakdown that may occur due to players' boredom or frustration during gameplay. However, given that a streamer's enjoyment while playing live emerges out of both the videogame, and their interactions with a live audience, they may find value and satisfaction on either side of the flow state, that is, streamers find ways to leverage moments of frustration and boredom as part of entertaining themselves and their audience. This was evidenced in several streamer interview responses – for example, Cubeyy finding enjoyment while playing up his in-game failures ("Chat blows up for twenty, thirty minutes about how stupid I am sometimes, it's brilliant, I love it'), or Captain Perth using lulls in gameplay as opportunities to thank his subscribers by allowing them to choose a coloured butterfly clip for him to place in his beard.

The examples above reveal the nature by which gameplay, and the role of the player, shift within the context of Twitch, producing novel experiences for both streamers and spectators that may be distinguished from those of private play sessions. While videogame affordances are typically understood as opportunities for action that guide the player's in-game experience and culminate as part of a videogame's challenge and narrative, in the context Twitch, these affordances take on new meanings and functions, borne of the motivations of the streamer, the expectations of spectators, and the logics and modes of communication native to the Twitch platform. This was observed to alter the rhythm by which players, now streamers, engage with videogames, illustrating this thesis' understanding of meaningful moments. These moments draw attention to particular elements of videogame play that, again, serve as a vehicle for the streamer to showcase their online persona, producing a form of videogame play that actively responds to the social dimensions the twitch platform affords.

Growth, Monetisation & Mental Health

In Chapters 1 and 4 parallels were drawn between live streaming media and the genre of theatre known as 'sensation plays', highlighting the role of the audience, and their influence on the spectating experience (Senft 2005). In both, audience members are made visible to each other, with their reactions contributing to, and critiquing, the live performance. Additionally, there was an emphasis on the 'real' in sensation plays that aligns with the "authenticity" streamers typically try to cultivate amongst their audience of spectators. My use of the term authenticity here relates to the emotional labour involved with crafting a genuine and relatable online persona as discussed in the chapter 4 – importantly, this is separate to Keogh's (2018) use of the term authentic as it relates to players' in-game timelines. However, there is a link between Keogh's use of the term, and the "aesthetic of calibrated amateurism" discussed in chapter 4 (Abidin 2018, 92). The unedited, long form style of live streams constructs a sense of intimacy and genuineness between streamers and their audience, with the added component of a live message chat giving spectators a direct line of communication to the streamer. In this context, exhibiting emotions such as anger or confusion experienced due to failure or repetition in a videogame (i.e. Keogh's "inauthentic timeline") may be understood to aid streamers in their attempts to craft an authentic persona that spectators may relate to and engage with online. However, this opens into a broader discussion that considers the incentives present on the Twitch platform, and the practices, both positive and negative, that streamers develop as part of attracting and growing an online audience.

At various points throughout this thesis, a tension has been observed between the design and expectations of the Twitch platform and the goals and motivations of its users. This was examined in terms of Twitch's emphasis on channel growth in the previous chapter, exploring the presence of active, but smaller, communities on the platform that resist the dominant, more popular, games and forms of content the platform aims to promote. On this topic, it is helpful to return to Davis' (2020) conditions and mechanisms framework, where it is understood that "technological objects do not just afford or not afford, but request, demand, encourage, discourage, refuse, and allow" (65). This framework provides the basis for analysing how the Twitch platform broadly encourages and facilitates forms of play and

performance, while discouraging and refusing others, leading to greater concentrations of online attention around certain videogames and streamers, alongside the dominance of certain norms and cultural events on the platform, e.g. emotes with broad, or universal, meaning across channels; big 'Twitch drama' that then becomes a key topic of discussion for large portions of the platform. As Davis (2020) posits, "digital connectivity is now the water in which we swim", highlighting the importance of understanding the various systems that nudge, influence, or govern user behaviour online. Thus, in this section I consider how streamers conform, manage and resist trends and expectations borne of the Twitch platform and its users, and the impact this can have on their mental health. Specifically, I draw attention to the mental health challenges that come with engaging a live audience as part of a broader 'Twitch public', as well as the challenges that come with negotiating how, and to what extent, to monetise content on the Twitch platform.

When describing influencers Arriagada & Bishop (2021) argues they are

...tasked with reconciling their contradictory positioning – they are both promoters of consumption, and marshals of 'authentic' sociality and community (2).

Although 'authenticity' is a complex and unstable concept to pin down, this thesis' interview responses revealed a similar tension, between the growth and monetisation logics structuring the design and user culture of the Twitch platform and the personal goals, motivations and social connections that drive individuals to stream. It is worth highlighting again the specific sample of streamers interviewed, and the fact that these streamers reflect the majority of relatively small, but active, channels that comprise the Twitch platform. For these individuals, Twitch does not provide enough income to support them financially, and therefore their reasons for streaming typically centre around social engagement and their own enjoyment. However the Twitch platform dissects and measures streamers' channels in terms of growth and monetisation, providing performance metrics centred around viewer attention and retention, while also offering a 'path to affiliate' and then 'partner' designed around growth, popularity, and time spent streaming. In this sense, even for individuals who may stream primarily, or solely, for their own enjoyment, and not to expand and monetise, they must nevertheless confront their roles as "promoters of consumption" and negotiate the extent

to which this influences their streaming practice (Arriagada & Bishop 2021). While this can take the form of paid product endorsements and sponsorships, it also includes encouraging subscriptions and donations to their channel, as well as efforts to broadly maintain the attention of spectators. Across this thesis' interviews, this was observed to affect not only how streamers performed and communicated with their audience, but also their relationship with their streaming practice and, in a more general sense, their personal happiness.

This thesis does not attempt to establish a clear or fixed definition of 'authentic' sociality and community. Instead, I wish to draw from Woodcock and Johnson's (2019) and Arriagada & Bishop's (2021) respective studies that highlight the emotional labour involved in attaining, or crafting, an online persona that may considered authentic to an online audience. Here, Arriagada & Bishop (2021, 9) brings attention to Aziz's (2018) observations, in which they argue attaining authenticity involves "labour in displaying a vulnerable self", which is considered successful once "evaluated and validated by a relevant audience" (2018, 132). Importantly, Arriagada & Bishop (2021, 10) note that authenticity labour is a highly gendered concept that follows similar definitions of "emotional labour, in which feelings are "evoked or suppressed" along lines of commercial femininity (Hochschild 2012)". This leads them to define the term feminine authenticity, which they describe as

[A] bricolage of intimate confession, aesthetic labor shared with audiences, and discourse that sustain relatability. As authenticity means being both ordinary and real, this quality promotes individualized pathways to success and explicitly sidesteps structural inequalities, representing an "entrepreneurial attitude (adopted by neoliberal capitalism) and a postfeminist ethos of feminine achievement and sexual subjecthood. (Arriagada & Bishop 2021, 10)

Arriagada & Bishop (2021) understanding of authenticity provides further context for examining the mental health challenges streamers face on Twitch, while highlighting the influence streamer's identities, in particular their gender, have over how spectators measure, value and interpret what is 'authentic' online. Additionally, it draws attention to the opportunity these online platforms can provide individuals to bypass structural inequalities that may have prevented them from finding work in other areas of employment. While Twitch remains an attention-based and deeply monetised platform subject to the same structural forces and inequalities that broadly influence who is, and isn't, popular online, there is nevertheless opportunity for marginalised individuals to find success on platforms such as Twitch, and to share their experiences with others. This is an area Johnson (2019) provides valuable context for, as he examines the working conditions of streamers and, in particular, the challenges associated with streaming on Twitch with a disability.

Johnson (2019) brings attention to both the positive and negative aspects of streaming with a disability or with a mental or physical illness. Although none of the streamers interviewed as part of this thesis expressed having any chronic health conditions (however, this was never a topic during interviews), Johnsons' (2019) research outlines the challenges, and the advantages, that variously affect streamers and their ability to participate and find inclusion on the platform. These examples are valuable, as they highlight the appeal of streaming, and the emotional support and economic opportunity it can provide streamers, particularly those who may have trouble finding stable employment due to their mental or physical health. A broad range of chronic conditions are represented by individuals on the platform, with streamers often discussing openly their experiences living with these conditions alongside their live audience (Johnson 2019). A key element of being able to facilitate these discussions involves an active attempt by streamers to foster a supportive community environment and avoid 'trolls', with the words 'positivity' and 'non-toxic' commonly describing the tone streamers tried to cultivate for their channel (Johnson 2019). However, as previously discussed, the pressure to 'succeed' on the platform and to appeal to a broader Twitch public (that can be openly hostile), can place undue pressure and stress on streamers. This was highlighted in the responses found in Johnson's (2019) article, with interviewed streamers noting the negative effects this had on their mental health, and Johnson describing the additional burden this placed on individuals already suffering with mental illness.

The reference to 'trolls' above reflects a common aspect to streaming on Twitch (and inhabiting the internet more generally). Unsurprisingly, *trolls*, broadly understood as individuals whose online tactics typically serve to offend, mock, aggravate, and upset others online, adversely affect streamer's mental health (Johnson 2019). Johnson's (2019, 513-514) interview participants described having to develop "a thick skin" to deal with derogatory, offensive and/or abusive messages from spectators while stressing the importance of knowing "what your limits are", highlighting the grim acceptance of trolls amongst streamers on Twitch. Similarly, this thesis' interview participants noted on several occasions the presence of trolls and 'toxic' communities, and the need to manage and moderate them to preserve the

health of themselves, and their channel. In one example, the streamer Cubeyy noted that he stopped streaming a particular videogame, *Rust*, due the toxicity present in the player community and the negativity they would bring to his streams.

I used to play a lot of Rust before I started streaming but that game, you can't stream that game. People that stream that game, their chats are ridiculously toxic. The communities are generally pretty toxic and I don't want any part of that. It sucks that I stopped playing that game. That was a very fun game.

Another streamer, Sixfourtythree, described his zero-tolerance approach for dealing with trolls and toxic messages in their chat, noting:

I'm pretty heavy handed in terms of who I allow into my chat. I'm not lenient, if I see anything antisocial in anyway, whether its racism, sexism any of that, even passive aggressiveness toward me personally.

These examples reinforce points made in the previous chapter and, notably, while trolls affect all streamers, their harassment and abuse will often differ depending on the identity of the streamer being targeted. SpamBrah's experiences navigating uncomfortable, inappropriate and bigoted messages in her live chat was evidence of this, highlighting how certain issues, e.g. privacy and safety, take gendered forms. Although this thesis did not design its interview questions around the mental health challenges associated with engaging other users on the platform, these examples, alongside Johnson's (2019), serve to illustrate the ubiquitous nature of trolls online and the importance of managing and moderating their negative influence as part of streaming on Twitch and preserving one's mental health.

Although trolls and toxicity raise direct challenges to people's mental health, whether as streamers or audience members, the Twitch platform's measurement of and expectations for "success" pose their own additional challenges for streamers' mental health and happiness. While none of the streamers interviewed earned enough income to consider streaming a proper job, their responses revealed a tendency to approach streaming in ways that resembled one. This was largely attributed to the platform itself, with Twitch communicating, through various means, the importance of growth and monetisation as part of achieving success, while also requiring its users to hit certain measurable goals (time spent streaming, frequency of

streams, average concurrent viewers, etc.) as part of unlocking new social and monetisation tools for their channel. This was observed to influence how streamers valued their live content, along with the videogames they would stream and the meaning they would attach to their live performance. Notably, across the interview responses, the word burnout was mentioned several times with streamers describing having to negotiate their definition of success with the growth metrics the Twitch platform actively defines, values and draws attention to. This prompted several of the interviewed streamers to describe methods for avoiding burnout and the strategies they had in place for maintaining their mental health and a positive relationship with their streaming practice.

Cubeyy placed a strong emphasis on charity work as part of his streaming practice, with a target goal of \$100,0000 visible in the "about" section of his Twitch channel alongside the various charities his channel has contributed to. Charity fundraising is highly encouraged, and often quite effective, on the Twitch platform, and conforms to several of the scripted user qualities outlined by (Ask, Spilker and Hansen's 2019). Cubeyy's ability to incorporate charity streams as part of his Twitch content appeared to have had a positive effect on his channel's growth and his personal relationship with his streaming practice, with him describing a large donation for the WWF as one his favourite moments while streaming - going as far as to have an emote and tattoo made in honour of the event. However, not all interviewed streamers aligned as well as Cubeyy with the norms and user qualities associated with popularity and 'success' on the Twitch platform. This brought to light the process through which streamers negotiated their personal enjoyment and streaming goals with the expectations placed on them by the Twitch platform and its users, and the effect this had on their mental health and relationship with streaming.

In SpamBrah's interview responses, she described a recent shift in how she approaches streaming on Twitch. This shift involved negotiating how she measured success and, importantly, ensuring that her relationship with achieving 'success' on Twitch was not destructive to her mental health. This required SpamBrah to distance herself from metrics such as concurrent viewers, followers, etc., and instead focus on the *quality* of her chat engagement, drawing value from interactions with her audience regardless of their number:

I've gone through a bit of a review myself of what is a successful stream... I was placing value on numbers - be it average concurrent viewers or the

average views or how many followers I was getting, those sort of things – and they would negatively impact my mental state, or my mental relationship with streaming. Like the feel-good feelings you'd get from like "Oh I got X amount of followers today, I'm doing so well" or "I didn't get as many as compared to thirty days ago, what am I doing wrong?". Now, when I get a lot of chat engagement, I don't actually view it as "Ooo I'm getting lots of people talking in my streams I feel really good" because I feel like that's counting numbers.

Success on Twitch is rarely stable or sustainable, and often streamers will be at the mercy of broader cultural and social trends which influence how attention is distributed across the platform. In this context, the incentives and pressure to achieve Twitch's definition of success (i.e. achieving growth and expanded monetisation) can lead streamers to form unhealthy habits with their streaming practice. In Spambrah's above response, she notes the 'feel-good feelings' associated with seeing your viewership and follower numbers rise on Twitch. However, as Spambrah identifies, the consequences of attaching feelings of success to growth metrics such as these are that, once growth inevitably falls, streamers may be left disappointed and, beyond this, critical of their role and purpose as a streamer.

In Sixfourtythree's interview responses, there was a clear attempt to actively resist conforming to trends on Twitch and to, instead, stream only videogames for which he had genuine personal attachment to. When defining success, he prioritised his own enjoyment and, like SpamBrah, his experiences on Twitch had recently prompted him to review his practice and renegotiate his relationship with streaming. This involved an experience Sixfourtythree had while streaming the videogame *Fortnite* which, despite attracting a larger than usual audience, left him feeling dissatisfied:

I really didn't enjoy that game, and I didn't like doing it. The reason why we did it was because it was the 'in game' at the time... [the streams] were popular at the time because people could get in involved... I found myself not really being happy with streams afterwards from a personal perspective. When they ended I felt "I don't really wanna do that again", even though they were kind of successful.

Sixfourtythree's above response highlights the personal and genuine nature of his Twitch channel and reinforces a point he made soon after: "I see streaming as my own personal environment that I create, so I have no room in that environment for things I even find remotely uncomfortable". While this comment was a response to a question regarding navigating uncomfortable topics in the live chat, it highlights Sixfourtythree's resistance to elements within the broader Twitch culture that he disagrees with, something he elaborates on when discussing the small but loyal community of *Titanfall* fans he has encountered on Twitch. In the responses that follow his discussion of the videogame *Titanfall* and its community, it becomes clear Sixfourtythree does not place a strong emphasis on growth as a driving motivator for streaming, with no clear attempts to monetise his channel outside the affordances already present in the Twitch interface.

In the previous chapter, I described the relationship between videogame communities and the Twitch platform as one of push and pull: pull on behalf of the Twitch platform, encouraging certain styles of content, formats and particular videogames and videogame genres depending on what is popular; push on behalf of the users, videogame fans and creators that aim to shift the culture, or simply carve out a space on Twitch for their community to exist within. In the previous two examples, there is a conscious effort from SpamBrah and Sixfourtythree to challenge Twitch's definition of success, with both streamers valuing the social interactions Twitch's interface can support over the monetisation tools and growth metrics the platform tends to emphasise. On the other hand, while the streamers Captain Perth and Cubeyy also prioritised chat engagement as their main measure of success, they exhibited a far more conscious effort to integrate monetisation as part of their live performance, designing and structuring their streams to accommodate these elements. This involved negotiating which aspects of their personality, online persona and playstyle might be leveraged to encourage contributions and express appreciation to spectators.

As noted above, Cubeyy regularly runs charity streams, but in terms of generating an income for himself, he sells access to his private *Minecraft* server, alongside a variety of in-game packs and items. These are made available on his personal website, where there is also a 'charity pack' available, which borrows from the common loot box model present in videogames today, with players who purchase a charity pack receiving a 50% chance of getting nothing but in-game water (something that is already abundant) or receiving a collection of valuable in-game items and materials. Importantly, the website states that 100% of the proceeds go to the organisation *Charity: Water*, with Cubeyy employing some playful irony as part of associating the charity with his *Minecraft* server. While Cubeyy's approach to monetising his content extends beyond the Twitch interface it still centres around his Twitch channel, influencing which games he plays, and how often:

I think there's two main things I consider [before streaming a videogame]. One, is how I'm feeling. In the end if I don't want to stream it, I'm not going to stream it. Two is, I actually have quite a large *Minecraft* community, a separate discord and I got a website for it, I got merch for it, it's a whole separate thing. And we have a network server, which as three servers within it, so it's quite a large thing. So I do have to ensure that I do go back Minecraft constantly, just not for long periods of time, like I wouldn't do it two or three days in a row, but I've got to do it at least every week at some point.

Based on Cubeyy's above response, his *Minecraft* server appears as a direct extension of his Twitch channel, allowing interested spectators to join Cubeyy in-game and become part of his Minecraft community. Although Cubeyy notes that he won't stream a game he doesn't feel like playing, there is nevertheless an obligation Cubeyy has to his Minecraft community. The fact that spectators wishing to participate in the server must first pay for access contributes to this obligation, with Cubeyy's presence on the server appearing to be a selling point for spectators interested in joining.

Captain Perth had a different approach to monetising his channel, performing a ritual of sorts that would follow subscriptions and donations from spectators. As described in chapter 3, this involved placing a brightly coloured butterfly clip, chosen by the spectator who subscribed/donated, in his beard as a symbol of appreciation and thanks. In his interview, Captain Perth noted that since he began this ritual, he had since started incorporating more speedruns and challenge runs as part of his content on Twitch, which made the ritual more difficult to execute as part of his live performance:

[w]hen speedrunning it's kind of hard to put the controller down and put [the clip] in the beard, whereas in a variety stream you could probably pause or take five seconds to do that... Some speedrunners will just not even look at chat or recognise any donations or anything like that, so obviously that's quite

different from my stream currently - not that I think I'd ever become like that because I obviously want to recognise those people supporting the stream in that way.

Despite the difficulty of trying to stream videogames at a high skill level while simultaneously engaging a live audience, Captain Perth still prioritises performing this ritual during his streams - regardless of whether he is completing a speedrun or a non-competitive Let's Play. Thanking members of his community appears important to Captain Perth on a personal level, but also aids in the growth and monetisation of his Twitch channel by rewarding spectators with kind words and a visual reminder of their contribution, visible for remainder of the stream. Outside his efforts to thank and appreciate spectators for their contributions, Captain Perth would also occasionally deal with sponsorships, often in the form of indie developers looking for streamers to draw attention to a videogame title. While Captain Perth noted a desire to support indie developers, he also expressed that he would "tend not to play games simply because [he'd] been offered a sponsorship", opting to play videogames he would get "bit of longevity out of and [would] enjoy playing". Returning to the push/pull relationship outlined above, the tension between the interests of the streamer and the financial incentives present on the Twitch platform is observed manifesting once more, with Captain Perth emphasising his channel's integrity in terms of his control over what he streams, regardless of the financial benefits that may be attached to playing particular videogame titles.

While Cubeyy and Captain Perth both found ways to negotiate their Twitch content in order to monetise their channel, they also identified burnout and poor mental health as a pervading threat, and something they had seen affect their peers and would take efforts to avoid. While Cubeyy never mentioned burnout by name, he described the positive effect hiding his viewer count during streams had on his mental health and live performance:

I turned off my viewer count probably a year ago and it was the best thing I did, I don't know any of my stats while I'm live. I don't look at concurrent viewers, I don't look at how many people are chatting, like obviously I look at chat and reply, but I don't know the stats while I'm live for that stream. I feel like that's very important and since I did that, I've been a lot happier.

I can't believe how many videos I've watched of people on YouTube saying "turn off your viewer count, turn off your viewer count!" and I was like "that's stupid, I want to know how many people are there" and then eventually I did and I went "that's brilliant".

This was an interesting response from Cubeyy, given he is a self-proclaimed "big statistics person". Even for someone who claims to enjoy altering their content based on the statistical performance of previous streams, the presence of a viewer count still has a damaging effect on their live performance and, notably, their happiness.

Captain Perth was quick to identify burnout in his interview, noting that it was motivating factor in his decision to be a *variety* streamer, allowing Captain Perth to follow his gaming interests without establishing a reputation for only playing a particular videogame:

[b]urnout is a very real thing in streaming. I know plenty of people that have either completely left their channels or I haven't heard from or seen them again because I think they just went too hard too fast on games... the problem that lies with that is people become known for that game and then, when they stop playing it their viewership drops... That's kind of why I like the variety because I'm capturing people from lots of different little pockets and they're more likely going to be there for me if they stick around than for the game. I think overall, it's a stronger way to build a community, because you're getting people from all different walks of interest and whatnot.

Captain Perth identifies a logic streamers often follow that can lead them to forming a damaging relationship with their streaming practice. This involves playing a videogame to fill a viewership 'vacuum', i.e. following trends on Twitch to expand a streamer's online presence and audience. Notably, Sixfourtythree's responses reveal an active effort to avoid streaming videogames for this purpose. By following this strategy, streamers can be left feeling trapped in the content model they have built for themselves alongside the videogame they are best known for streaming. Additionally, this can result in audience backlash, with spectators who associate the streamer with a specific videogame expressing disappointment if the streamer ever grows tired of it, or simply wishes to play something else. Notably, Captain Perth posits that playing a variety of videogames is a stronger way to build a community, as it

draws from wider a group of people, of different interests, who are more likely to stick around and interact with Captain Perth regardless of which videogame he streams. These different responses bring to light the tensions that can form between streamers and communities on Twitch and, again, the damage that can come from chasing channel growth without considering one's mental health, and the sustainability of their streaming practice.

Twitch is highly monetised, and therefore, it is important to discuss the various monetisation and communication tools afforded by the platform's interface and the broader social and cultural trends these tools tend to encourage. Twitch has been the subject of studies examining the motivations that drive spectators to contribute to streamers' channels and the various tools native to the Twitch interface that facilitate the platform's patron-based user economy (Partin 2019). In Partin's (2019) paper, *Watch Me Pay: Twitch and the Cultural Economy of Surveillance*, he argues:

Twitch sits at the intersection of what David Lyon calls "surveillance culture," a culture in which watching and being watched is fundamental to individuals' customs, habits, and ways of interpreting the world; and surveillance capitalism, Shoshana Zuboff's term for an emerging logic of accumulation built on data collection and hoarding.

Partin's (2019) framing here is helpful, as it brings to light the systems of surveillance and control within which streamers are embedded. Although streamers often consider Twitch "an empowering tool for self-expression", with Johnson (2019) highlighting the positive impact streaming can have for streamers suffering with chronic illness, this thesis' interview responses brought to light the damaging effect Twitch's emphasis on growth and monetisation can have on users' mental health (Partin 2019, 155). This is alongside Twitch's terms of service and content guidelines (as outlined in chapter 1) regulating and enforcing what is, and is not, permitted on the platform. Simultaneously, streamers are also scrutinised by a broader Twitch public, encompassing spectators and other streamers, who also police and regulate what content appears on the platform, harassing creators they disagree with. Collectively, these elements contribute to the "regulatory assemblage" that forms around streaming which, in turn, shapes streamers' labour and influences how Twitch users interact with one another (Taylor 2018; Partin 2019, 156). It is in this context that online controversies and coordinated 'hate-mobs' manifest on the platform, with the previously

noted growth in 'hot tub streamers' being an example of this phenomenon, which often centre around policing women's bodies and the presence of identities on Twitch that are outside the white male gaming stereotype. This raises questions around what 'success' on Twitch looks like, particularly for minority streamers, and the challenges streamers face depending on their appearance, identity, and their ability to conform or challenge the norms that dominate the platform.

This thesis' discussion of the push/pull relationship that manifests between the Twitch platform and its users has primarily focused on gameplay, examining streamers' ability to broadcast the videogames they want, and in the way they enjoy, without Twitch's encroaching performance metrics negatively affecting how they value and measure success on their channel. However, this segues into a broader discussion that extends beyond videogames: the presence of streamers and forms of content on Twitch that test or break the platform's terms of service (TOS) – including efforts made to broaden Twitch's appeal and inclusivity (particularly for minority streamers), as well as those designed to harass, punish and police others on the platform. On this point, Davis (2020, 60) notes that:

humans and technologies are co-constitutive and human-technology relations are power-laden and political. Technologies are imbued with human subjectivity and deployed by creative subjects...People may use technologies in innovative and creative ways, and the larger implications of technological developments, however they are used, can be surprising and unexpected.

Davis' (2020) description of human-technology relations aligns with (Ask, Spilker and Hansen's (2019) notion of 'co-scription', describing the intertwined relationship between users and developers, with both sides influencing the development trajectory of the Twitch platform. The previously discussed 'hot tub streamers' are an example of this phenomenon, where streamers pushed, or broke, the boundaries of Twitch's TOS as it relates to depicting swimwear and nudity during streams. This has since lead to a change in Twitch TOS, with Hot tub streamers now receiving their own category (*Pools, Hot Tubs, and Beaches*) alongside new stipulations and codes for what is considered fair conduct under the terms of service. This comes after months of controversy, online harassment and inflammatory discourse that circulated the activities and financial success of hot tub streamers on Twitch, and despite hot tub streamers further legitimacy in the form of their own category, their place

on Twitch continues to be regularly undermined by other popular streamers, particularly videogame streamers (Grayson, 2021). This example illustrates the ever shifting and evolving nature of online media, and the cultural battleground that often forms around content moderation and competing user demographics online.

Content moderation on Twitch has been a constant source of controversy, with users and online communities coordinating themselves to harass, intimidate and reveal the real-world identities and addresses of streamers for whom they take issue (Bardhan 2022; Beckwith 2022). As previously discussed, online communities on the Twitch platform, and in videogame culture more broadly, have been known to harbour, and often foster racism, misogyny and homophobia alongside a variety of bigoted and extremist political positions (Kowert, Martel and Swann 2022; Ruberg, Cullen and Brewster 2019; Gray 2016). Despite the experiences of minority streamers on Twitch not being a focus of this thesis, the interview responses gathered highlight the tension that forms between the motivations of streamers and the incentives present within the Twitch platform, shaping how they interpret their live performance, their labour and, in turn, their relationship with videogames. This opens into a broader discussion that encompasses not only the effect growth and monetisation have on the live performances, and mental health, of streamers but also the influence cultural and social norms have on the success and perceived legitimacy of different streamer identities.

Conclusion

This thesis has explored how the player-videogame relationship adapts to a live streaming environment, drawing on Keogh's (2018) "cybernetic circuit of videogame play" while also considering the Twitch platform and, with it, an audience of spectators. The Twitch platform was observed to fracture the player-videogame relationship, introducing additional competing concerns which shaped the way streamers played and enjoyed videogames. The very nature of streaming on Twitch required streamers to configure their gameplay in relation to an online audience and the communicative environment Twitch's interface affords. Consequently, the notion of enjoyment, as it relates to gameplay, shifted within the context of Twitch, with the act of playing taking on new meaning for both the player (now the streamer) and the spectators viewing their gameplay. This brought to light the notion of 'meaningful moments', that is, moments during streams that generated heightened engagement from the live chat and served to animate the streamer's online persona. While coordinating and producing meaningful moments live was a crucial part of engaging spectators and maintaining their continued interest, the interview responses also revealed the influence these moments had over the streamer's enjoyment and overall satisfaction with their stream. Orchestrating meaningful moments, by prompting discussion, 'playing up' their emotional reactions to gameplay, etc., was observed not only to be important for building a brand and audience on the platform, but also for maintaining streamers' enjoyment and continued interest in their streaming practice.

My use of the term 'meaningful moments' aligned with Spilker, Ask and Hansen (2018)'s research into the viewing practices of Twitch users, where spectators would regularly switch between streams of different sizes (spatial) while also switching between different states of engagement and attention (affective). Given that audience attention and size fluctuate over the course of a stream, streamers find novel ways to engage both the videogame and their spectators moment-to-moment. This accommodates the "what's-on-the-menu liveness" that characterises Twitch users' viewing practices, with streamers avoiding lulls during streams to maintain their audience's interest and to draw in prospective spectators (Spilker, Ask and Hansen 2018, 12). How streamers engaged with videogames in order to help orchestrate these meaningful moments differed based on their streamer type (e.g. variety, speedrunner, etc.), their personal relationship with videogames (in and outside of streaming), and their audience

response. The streamer interviews gave insight into the process through which streamers would design and plan their content, drawing on their skill, knowledge and passion for videogames to attract and engage an online audience. Notably, the personal relationship streamers formed with videogames during private play sessions was observed to inform how they approached playing live, while also influencing the types of conversation that emerged between them and their live chat. Even in instances where streamers described going in "blind" to a videogame while streaming, they still assessed the genre and aesthetics of a videogame prior to broadcasting, again pointing to the influence videogames had in generating particular in-game experiences for streamers to leverage as part of entertaining and engaging their audience.

The terms 'challenge' and 'narrative', as understood by Vahlo (2017), helped to distinguish the different in-game experiences streamers used to drive their content, and the subsequent meaningful moments that emerged during streams. The interview responses revealed differences in how streamers approached these two broad facets of gameplay, leveraging various elements of a videogame's challenge and/or narrative in accordance with their particular streaming approach. The emotional state of the streamer was often instrumental in the construction of these meaningful moments, with chat participants typically responding to and feeding off the streamer's live reactions - expressing excitement, happiness, laughter, curiosity, anger, frustration, etc. in response to in-game events. Notably, streamers would find opportunities to engage their audience on either side of the "flow" state, that is, streamers would find ways to incorporate moments of boredom and/or frustration into their live performances, often to great effect. In this sense, videogame affordances were understood to culminate on Twitch, not only in the service of a videogame's challenge and/or narrative, but also in the construction of meaningful moments, animating the streamer, evoking reactions in the live message chat, and drawing the attention of spectators.

Building on Keogh's (2018, 183) understanding that that "the circuit of videogame play is not hermetically sealed", the act of streaming to an audience on Twitch may be understood to alter the material and social context within which player's experience, measure and value their videogame play, positioning them as not only as players, but creators of content. In this context, streamers are incentivised to play particular videogames that are popular on the platform in order to expand their audience. Looking at Twitch's success since its launch in 2001, trends can be observed regarding the videogames that have dominated the platform, and the types of videogame experiences that drive viewership. As previously discussed, the battle royale genre emerged during this time and found enormous success on Twitch, with the videogame title Fortnite rising to enormous heights of popularity after its release in 2017 while continuing to dominate streaming platforms today (Twitch games with most all time viewers 2022). Fortnite, and the battle royale genre broadly, offer a captivating spectacle for audiences on Twitch, with the genre's competitive structure producing frequent moments for streamers to leverage, both in terms of their skill and their online persona. The competitive structure and the wide appeal of *Fortnite* aids in valorising players' in-game skill as form of social capital that they can leverage as part creating a Twitch channel and drawing an audience (Carter et al. 2020). However, videogames that are less popular, and often less competitive in nature, do not attract to the same levels of viewership, and consequently carry with them less social capital for streamers to draw on as part of growing their channel (Twitch games with most all time viewers 2022). This is topic that emerged in thesis' interviews, with streamers balancing their personal interests and videogame preferences with the pressure to grow on the platform and appeal to a broader audience.

While the interview questions were designed to investigate how streamers would configure their gameplay in terms of a potential audience, they revealed a tension between the motivations that drove individuals to stream in the first place, and the metrics Twitch uses to measure 'success' on the platform. Returning to a guiding question of this thesis, i.e. how the 'player-videogame relationship' is maintained, fractured or altered within a live-streaming environment, it was clear from the interviews that Twitch's emphasis on growth and monetisation had a broadly negative effect on the interviewed streamers' mental health, and their relationship with their streaming practice. This was evidenced in their interview responses, where they described strategies they had in place, such as hiding their viewer count, to help prevent burnout and maintain their mental health. In this sense, preserving and protecting one's enjoyment of a videogame while streaming was something that streamers noted they needed to actively work on, taking regular breaks from videogames they felt obligated to return to and re-evaluating how they measured their own success to avoid pinning their self-worth and satisfaction with streaming to the growth metrics Twitch values so highly.

Although the streamers interviewed did not consider their Twitch channel to be a primary source of income, the logics present on the Twitch platform were nevertheless observed to influence how streamers engaged with their audience and valued their practice. To protect their mental health, one streamer, SpamBrah, described confronting their initial motivations for streaming, before reviewing their practice and making changes to prevent pinning their self-worth to Twitch's definitions of success. Other streamers, such as Captain Perth and Cubeyy, similarly described actively avoiding Twitch's growth metrics, following an approach that valued depth over breadth, that is, focusing on the quality of their audience engagement rather than the raw quantity of spectators or participants in their audience at a given time.

The negotiation described above, between the pressure to grow and monetise on Twitch and individuals' personal and social motivations for streaming, speaks to the broader "influencer culture" that currently permeates online social media platforms today. As Arnesson and Bishop (2022, 13) posit:

influencers, consciously or not, function as ideological intermediaries that legitimate neoliberal policies by personifying and promoting a lifestyle that is inspirational, aspirational, and deeply ideological.

As with other social media platforms, Twitch extracts data from users which it then monetises by developing consumer profiles "to map and predict trends, manipulate individual and group behaviour, and sell collected data in markets that individual users are barred from participating in" (Partin 2019, 157). The streamer's ability to cultivate an audience of returning spectators feeds into this model, where holding the attention of an online audience brings with it the ability to generate an income through sponsorship deals and advertisement revenue. While Partin's (2019) above quote more directly relates to higher profile streamers, even for smaller streamers who are not motivated to monetise their content, they must nevertheless reconcile their role as promoters of consumption with their understanding of authenticity as it relates to their audience and their relationship with videogames. Additionally, streamers' presence on the platform, alongside promotional material visible across the Twitch's interface, serve to encourage spectators to try streaming, tapping into their user's social connections and expanding the platform's reach. Arriagada and Bishop (2021, 9) argue that "passion is deeply nested within strategic authenticity, creating a driving force for the influencers' activities". This is especially true of videogame streamers, where skill and passion often serve to legitimise streamers in the eyes of spectators. The word passion appears frequently across Twitch's interface, with the phrase: "Let's help you grow your community! Connect and interact with viewers, and build a community around your passions" appearing at the top of the "creator dashboard" page. Additionally, streamers are expected to be emotionally invested in the outcomes of their videogame play, passionately responding to their successes and failures while streaming. Across the interviews, streamers were observed to anticipate their emotional response to a videogame before playing, designing their content around videogames they felt a genuine interest for, and anticipating how this would feed into their live performance. However, the pressure to expand and monetise on Twitch could lead streamers to playing videogames they wouldn't ordinarily be interested in, which, for streamers like Sixfourtythree, negatively affected their experience streaming. Sixfourtythree's experience streaming Fortnite reveals an instance where, despite attracting a larger than usual audience, he was left disappointed and critical of his streaming practice, preferring to instead stream videogames he felt a genuine interest in - regardless of his audience's size. This example once again highlights a tension between streamers' passion for particular videogames, and the incentives present on the Twitch platform that guide and influence the behaviours of its users. While Sixfourtythree's Fortnite stream would have been considered successful in terms of Twitch's growth metrics, it nevertheless conflicted with how he understood "success", and the value he personally associated with his streaming practice. In this sense, authenticity may be understood not simply as an ideal to cultivate as part of attracting an audience, but a means to preserve one's interest in streaming without the pressure to monetise and expand.

Drawing connections to further research, this thesis raises questions regarding the relationship between live videogame streaming and videogame development. The growth of 'live service' games in many ways mirrors the growth of live videogame streaming, with streamers building their online brand and establishing a career out of the success of modern videogame titles. Live service videogames typically follow a 'seasonal' model, rebalancing the game's mechanics (tweaking weapons, player 'classes', game modes, etc.) and updating it with new content and player cosmetics every few months. Within this content delivery model, streamers provide a valuable service for players, communicating changes and updates

to the videogame, providing tips, and conducting analysis on an ever-evolving gameplay experience. In this sense, streamers and live service videogames may be understood to form a synergistic relationship with one another, with streamers taking advantage of the large audiences these videogames attract, while also maintaining the player base's interest in the videogame title by providing a rich sociality to accompany their in-game experiences.

Another example of the relationship between streaming culture and videogame development can be found in the recent trend of punishing climbing games finding enormous success on Twitch. This includes games such as the above mentioned *Getting Over It with Bennett Foddy* (developed by Bennet Foddy) and the more recent *Only Up* (developed by SCKR Games) which have been described as a sadistic (on behalf of spectators) and masochistic (on behalf of streamers) "craze", with one popular streamer, xQc, attracting upwards of 85,000 concurrent viewers during a stream of *Only Up* (Ostler, 2023). The punishing nature of these games lend themselves well to this thesis' notion of meaningful moments. A single mistake will likely send players back to the beginning of the game, losing all their progress. This raises the emotional stakes of videogame play, forming a tension that aids in the construction of meaningful moments during streams that feeds off the inherent drama of in-game failure, providing a vehicle through which streamers can showcase their online persona while allowing spectators to share and participate in their emotional journey.

Given streaming culture's continued and lasting effect on videogame culture, its influence on videogame development will be an important area of further research. While this thesis provides an analysis centred on the experiences of smaller streamers and their relationship with Twitch, it highlights changes in how players broadly engage with videogames when compared to previous forms of play. Videogame development is an important component to this discussion, with indie developers, in particular, taking advantage of fast-moving trends in streaming culture to attract player and streamer interest (Johnson and Woodcock 2018). While larger, 'AAA' videogame studios are slower to respond to these trends due to longer development periods, there has been an effort to capitalise on the influence of live streaming and a general pivot towards live service videogames, resulting in some large financial successes, but also many failures (Delaney 2023; Tassi 2023). While live service videogames appear to be the current focus of major studios such as Sony, Epic and Riot, this could change

as videogames and the sociality that surrounds them continues to evolve and shift (Tassi 2022). The recent trajectory of videogame 'Let's plays', evolving from text and image-based walkthroughs (gamefaqs and somethingawful) to asynchronous videos (YouTube), and, now, live streams on Twitch, highlights the relationships between online communicative technology, videogame culture and player sociality. Further research should, therefore, consider the effect new and emerging technological trends will have on how players experience and value videogames, and how videogames will evolve in response, and vice versa.

In conclusion, streaming on Twitch changes the meanings and values associated with videogame play, with the streamer's performance, both sides of the glass, configured in terms of a live audience and subject to the incentive structures present on the Twitch platform. This affects individuals differently, based on their streamer type, their personality, the videogames they play, and importantly, how their identity is perceived on the platform. Videogame affordances take on new roles and purpose in this context, with the videogame not simply serving as a foundation for streamers to build their content, but rather, performing an active role alongside the streamer in co-constructing meaningful moments for them to leverage as part of entertaining their audience, as well as themselves. As videogames continue to develop, and the play practices associated with them evolve in response to shifting economic, technological and social conditions, I remain critical of live-streaming platforms such as Twitch and, in particular, the incentives they form around the act of play that shape how individuals experience, understand and value videogames today.

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