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THE WOUNDS THAT NEVER HEALED

An Analysis of Videoludic Trauma in Cry of Fear

ABSTRACT

Samuel Poirier-Poulin: The Wounds That Never Healed: An Analysis of Videoludic Trauma in *Cry of Fear*Master's Thesis
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Building on horror studies and trauma theory, this thesis proposes a conceptualization of videoludic trauma in horror video games, and in Cry of Fear (Team Psykskallar, 2013) in particular. More specifically, it develops the idea that Cry of Fear can induce trauma in the player by putting them in horrifying and intense situations. This thesis starts by defining fiction fear, videoludic fear, art-horror, and real horror, as these concepts were developed in cognitive film theory and game studies. It highlights the dialogue between videoludic trauma and real horror and argues that video games can cut across the reality/fiction divide and deeply impact on the emotional organization of the player. This thesis then presents major works that have shaped the field of trauma studies and conceptualizes videoludic trauma by drawing on bleed theory and current scholarship on transgressive games. It introduces the concepts of impactful trauma and hurtful trauma to differentiate between a relatively safe aesthetic experience and an experience that is more intrusive, stays with the player, and can be harmful on the long term. Finally, using the tools of close reading and transactional theory, this thesis examines how Cry of Fear represents trauma symptomatology through its narrative and visuals. The analysis ends with four vignettes that each focuses on a specific aspect or moment in the game that had a strong impact on my gameplay experience and led me to experience hurtful trauma—from the visceral combat system to the loss of a game character. This thesis contributes to the growing literature on trauma in video games. It is a first step toward a conceptualization of trauma that focuses on its transmission from the game to the player and on the relationship between trauma and the horror genre.

Content note: This thesis contains discussions of suicide, self-harm, physical and sexual abuse, child abuse, and murder. Reader discretion is advised.

Keywords: game studies; horror video games; trauma studies; transgressive games; cognitive film theory; videoludic trauma; close reading; *Cry of Fear*.

The originality of this thesis has been checked using the Turnitin OriginalityCheck service.

Preface

I got the idea for this project in the summer of 2017, while I was doing fieldwork in Uganda, studying the vocalizations of Angolan colobus monkeys. As surprising as it sounds, primatology is what brought me to game studies. I remember going to the jungle five days a week, feeling that everything was wrong, and thinking about zombies and Pokémon instead of monkeys. I had been sure for years that primatology was the right choice for me, but everything had suddenly changed in a couple of days.

Video games came to mind almost immediately when I asked myself what I could be working on for a big part of my life if it were not monkeys. I had taken a game studies course during my bachelor's, back in Montreal, and I knew that game studies were an emerging discipline. From that day on, and for the rest of the summer, I would come back from the jungle, enter my daily data on the computer, eat dinner, and then read about video games until bedtime. During my days off, I would try to come up with a master's project related to *Cry of Fear*, a horror video game that had intrigued me for years. I still cannot believe how motivated I was! One day, while watching reviews of the game on YouTube, I stumbled across a video in which the author briefly suggested that *Cry of Fear* might transmit a form of trauma to the player (see Horror of Video Games, 2015). I instantly knew at that time that I had to dig deeper into that topic. This thesis is the result of a long journey full of surprises, from Canada, to Uganda, to Finland, and from primatology to game studies. Who would have known?

Several people have guided me during this journey, and I am grateful to all of them. First, I would like to thank Frans Mäyrä, my supervisor, for accepting to work with me in "our small team"—as you called it—for all your knowledge, and for your humility. Thank you for your constructive feedback along the way and for constantly pushing me to explore new authors and discover new research avenues. You are truly inspiring. I would also like to thank Jaakko Stenros, for his critical eye; Sabine Harrer, for their enthusiasm for my project; Tom Apperley, for sending along useful readings; and all the participants of the "GAMS06—Master's Thesis Seminar," in particular Heidi Siitari (my horror fan colleague), Henna Tuominen, Satu Malminiemi, and Selja Tanskanen, for their feedback on different versions of this thesis. Thank you to all the members of *Pika-Pi!*, for believing in academic kindness and for great monthly discussions about video games and digital cultures. My deepest thanks to Lauri Luoma and Laura Blanco Rengifo, for always being there for me, and to my family, for supporting me from afar. Lastly, I am grateful to the Fonds de recherche du Québec — Société et culture and to Tampere University for their financial support.

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Table of Contents

1	INTRODUCTION	1
2	WHO'S SCARED OF THE DARK?	6
	 2.1. Cognitive Film Theory and the Sensorium 2.2. Videoludic Fear: From an Evolutionary to a Game Studies Perspective 2.3. Survival Horror Games: Rethinking Genre Boundaries 2.4. When Fear Becomes Horror 	8 13
3	THE ANSWER IS TRAUMA	24
	3.1. Trauma Theory: A Brief Overview	29
4	METHODOLOGY AND DATA COLLECTION	45
	4.1. Close Reading and Transactional Theory.4.2. Data Collection and Self-Care.	
5	VIDEOLUDIC TRAUMA IN CRY OF FEAR	52
	 5.1. Introducing <i>Cry of Fear</i> 5.2. Portrait of a Traumatized Protagonist: Simon 5.3. Traumatic Gameplay: Four Vignettes 5.3.1. Confusing Soundtrack and Absence of Forewarning 5.3.2. Fighting in the First Person 5.3.3. Character Loss and Loneliness 5.3.4. "My Life Ends Here": Murder, Care, and Empathy 5.4. Summary: Transmitting Trauma Through Horror Video Games 	55 62 63 65 67
6	CONCLUSION	74
REI	FERENCES	77
LUI	DOGRAPHY	91

1 INTRODUCTION

This game contains violence and gore, and can cause fear, depression, heart failure and suicide. Users and viewers discretion is advised.

—Introductory screen in Cry of Fear

I first played *Cry of Fear* (Team Psykskallar, 2013) in the winter of 2014. I had just finished *Outlast* (Red Barrels, 2013), and I was up for more thrills. I launched the game and immediately got shaken by its warning message. Considering my love for zombie games, violence and gore were two things I was used to being warned against. But never had I heard of a video game that could cause depression and suicide. Was I supposed to take this message seriously? Was it just meant to scare me? *Clock Tower 2* (Human Entertainment, 1996) came back to mind. Flashback.

Following the Clock Tower Mansion Incidents, Jennifer Simpson, the game protagonist, suffers from severe post-traumatic stress disorder. She has flashbacks and horrible night-mares. She is haunted by the image of the brutal Scissorman chasing her and repeatedly murdering her friends.

The idea that I could experience similar symptoms after playing a horror game was hard to believe. So I played *Cry of Fear*. I played until I got really scared—and it did not take very long. And I don't mean *scared*. I mean SCARED. Scared to the point of not wanting to play the game anymore.

Five years later, I decided to give the game another try. It did not take me much time to remember what I found so disturbing a few years earlier: the monsters with jerky movements, the oppressive atmosphere, and the game's perverse fascination with suicide. As a player, I was disoriented. How can we make sense of video games where a desire to horrify the player seems stronger than a desire to scare them? How can we conceptualize such experiences and talk about them?

Over the last two decades, horror video games have attracted considerable scholarly attention. Of special interest to me is the approach of Bernard Perron (2004, 2005, 2006, 2009, 2018), which strongly builds on cognitive film theory and psychology of emotions. Perron's work has centred on theorizing how fear is instilled in survival horror games and is experienced by the player. While the strength of Perron's approach lies in its emphasis on gameplay and in-game elements that speak to the player, his approach also has the merit of creating a dialogue with film phenomenology, and especially with the concept

of embodiment. To date, however, research on horror games has mainly focused on big franchises such as Resident Evil (Capcom, 1996–2021) and Silent Hill (Konami, 1999– 2014), and most indie games such as Cry of Fear have been ignored (cf., Carr, 2014; Ekman & Lankoski, 2009; Kirkland, 2007; Krzywinska, 2002; Perron, 2012a; Thon, 2019). Although several horror games successfully generate what Perron has called videoludic fear, I would argue that what the player experiences in Cry of Fear goes further and is closer to a form of trauma; I call it videoludic trauma.

As noted by Roger Luckhurst (2008), trauma seems to be "worryingly transmissible: it leaks between mental and physical symptoms, between patients . . . between patients and doctors, and between victims and their listeners or viewers" (p. 3). In this research, I suggest that trauma might be transmissible from a video game to the player, especially if the game puts the player in horrifying and deeply intense situations. Inspired by Michelle Balaev's (2018) definition of trauma, I define videoludic trauma as a "disruptive experience [induced by a video game] that impacts the [player's] emotional organization and perception of the external world" (p. 360).

Although trauma theory has been used in the humanities since the 1990s to better understand the "psychological, rhetorical, and cultural significance of trauma" (Balaev, 2018, p. 360), trauma theory is only starting to make its way to game studies. So far, a few scholars have explored the use or design of games to cope with trauma (Danilovic, 2018; Harrer, 2018; Poirier-Poulin, 2020; Sapach, 2020), whereas others have analyzed the representation of traumatic experiences (Bumbalough & Henze, 2016; Fawcett, 2016; Kuznetsova, 2017; Rusch, 2009), or the use of video games to generate empathy, guilt, and a feeling of powerlessness (Smethurst, 2015a; Smethurst, 2017; Smethurst & Craps, 2015); yet, the idea that video games could transmit trauma to the player needs further attention.

Cry of Fear tells the story of Simon Henriksson, a young man who wakes up in an alley and must find his way back home after a man voluntarily drove on him with his car (see Figure 1). As the player progresses in the game, they realize that Simon is in a wheelchair

¹ The origin of the term "videoludic fear" is somewhat murky. It comes from the French "peur

vidéoludique" and seems to be used in English for the first time in the English title of the research project "From fictional fear to videoludic fear: A genre study of horror video games," directed by Perron from 2008 to 2011 (LUDOV, n.d.). Interestingly, this term has also been used by Guillaume Roux-Girard (2009), one of Perron's former students, in the English abstract of his master's thesis. While Perron (2018) explicitly talks about fear and video games throughout his book, even using the term "videoludic horror," the term "videoludic fear" only appears once, in a figure (p. 118), and this term seems to be absent from all his other publications in English.

following the incident and that the game is a metaphorical depiction of Simon's trauma and his fight against his inner demons. While *Cry of Fear* generally follows the conventions of the survival horror subgenre and requires the player to fight against monsters, solve puzzles, and manage their inventory, the game also contains a few surprising elements, notably monsters with fast and jerky movements, extremely graphic scenes, a confusing soundtrack, and a combat system in the first person that incorporates melee fights. Videoludic trauma is created by this loss of reference points and by an environment that shocks and overwhelms the player. Videoludic trauma is also generated by a morbid reflection on solitude and suicide that reflects Simon's existential angst.



Figure 1. Simon must find his way back home. Screenshot by the author.

With the understanding that research on horror and trauma share a common ground, my thesis aims to answer the following question: how can we conceptualize videoludic trauma in horror video games, and in *Cry of Fear* in particular? More specifically, my thesis proposes to analyze (1) how trauma is experienced by the protagonist in *Cry of Fear*, and (2) what roles the horror genre plays in inducing trauma in the player.

Trauma is a sensitive topic that must be handled with care, but it is nonetheless a topic that deserves academic attention considering its ubiquity in video games and other media. The horror genre in particular has a long history of portraying characters who are confronted with traumatic events and communicating the visceral experience of these characters to its audience, whether it is that of the protagonists in the stories of H. P. Lovecraft (1917–1935/2016), Sally in *The Texas Chainsaw Massacre* (Hooper, 1974), or Isaac

Clarke in *Dead Space* (EA Redwood Shores, 2008). In addition, an increasing number of drama video games have as their protagonists a tortured individual whose lived trauma is the foundation of their entire identity (Bumbalough & Henze, 2016) and often serves as a justification for the violence of the gameplay (Kuznetsova, 2017, p. 31). One can think of characters like Max Payne from the eponymous game (Remedy Entertainment, 2001), Lara Croft from the *Tomb Raider* reboot (Crystal Dynamics, 2013), or Ellie and Abby from *The Last of Us Part II* (Naughty Dog, 2020).

My work is motivated by a desire to bridge the gap between trauma theory and game studies, and to contribute to the growing literature on trauma in video games. It is a first step toward a conceptualization of trauma that specifically focuses on its transmission from the game to the player, and on the relationship between trauma and the horror genre. This research can be situated within the broader debate that puts into question the idea that the player (or even the spectator) is sheltered from what occurs onscreen, and that the boundary between reality and fiction is clearly delineated. On a larger scale, this research is motivated by a desire to contribute to the current reflections on the representation of trauma in video games, including its challenges, and the way trauma can be effectively communicated to the player through specific metaphors and game mechanics.

As highlighted by Torill Elvira Mortensen and Kristine Jørgensen (2020), research on video games with transgressive content has historically followed the tradition of media effects research, seeking to understand whether games with violent content make players more violent (p. 6). Up to this day, "provocative, transgressive games remain framed in a language of concern and protection, blocking a deeper understanding of the process of reception, critical reading, and aesthetic appreciation" (Mortensen & Jørgensen, 2020, p. 6). This has led to a lack of vocabulary to discuss and analyze these games, and to discussions that centre on their problematic nature rather than on their potential to be "aesthetically provocative and transformative" (Mortensen & Jørgensen, 2020, p. 6). My research aims to distance itself from this tradition and can be situated within the body of work that studies transgressive games from an aesthetic perspective (e.g., Jørgensen & Karlsen, 2019; Mortensen & Jørgensen, 2020; Mortensen et al., 2015), and especially from a humanities perspective.

My thesis is structured as follows. Chapter 2 and 3 introduce my theoretical framework and respectively present significant works in the field of horror studies and trauma studies. More specifically, Chapter 2 broadly introduces cognitive film theory and establishes

the theoretical foundations of videoludic fear. It situates *Cry of Fear* in relation to the survival horror subgenre, and then turns to theories of art-horror and real horror, ultimately questioning the reality/fiction divide. Chapter 3 presents major works that have shaped the field of trauma studies, and then critically reviews previous research on trauma in game studies. It ends by theorizing videoludic trauma as an experience that ranges from the aesthetic to the harmful, by drawing on bleed theory and current scholarship on transgressive games.

Chapter 4 introduces my methodology, and more precisely the two reading techniques that informed my analysis of *Cry of Fear*: close reading and transactional theory. It also presents the data collection process, describing my use of a game diary, and highlights the importance of self-care when conducting research on trauma.

Chapter 5 provides a close reading of *Cry of Fear*. It begins with a summary of the game story and then examines how Simon's trauma is narratively and visually represented in the game. It ends with four vignettes that each focuses on a gameplay element that had a strong impact on my experience of videoludic trauma. Overall, my analysis shows that *Cry of Fear* transmits trauma to the player not only through its tragic narrative and disturbing visuals, but also by subverting some of the conventions of the survival horror subgenre and by putting the player in an environment that is intense and overwhelming.

Finally, Chapter 6 concludes this thesis by highlighting its main contributions and suggesting areas for further investigation.

2 WHO'S SCARED OF THE DARK?

Insofar as perception, cognition and emotion are grounded in the body and its dynamical [sic] interactions with the environment, it becomes both difficult to subscribe to a conception of the film viewer—and gamers—as a disembodied eye and necessary to turn to the lived body in front of the screen. (Perron, 2009, pp. 122–123)

As highlighted by Perron (2009), while cognitivism helps us to better understand the experience of the player, it would be a mistake to build on this framework alone, without paying attention to embodiment and the corporeal. This points toward a rejection of Cartesian dualism and a desire to bring elements of film phenomenology into cognitive film theory. It is with that in mind that I wrote this chapter. In what follows, I propose a brief overview of cognitive film theory and draw on this approach to conceptualize fear in video games. I then examine *Cry of Fear* in light of genre theory and conclude by examining the concepts of art-horror and real horror, and the reality/fiction divide.

2.1. Cognitive Film Theory and the Sensorium

Born in the mid-1980s in the United States, cognitive film theory aims to understand how films engage the mind and elicit emotions. While cognitive film theory is strongly associated with the work of David Bordwell (e.g., 1985, 1989) and Noël Carroll (e.g., 1988, 1990), an interest in the aesthetic analysis of film and in psychological research was already apparent in the work of Hugo Münsterberg (1916/2002) a few decades earlier. As Bordwell (2009) notes, Münsterberg was pointing out as early as in the 1910s that cinema had the ability to guide the attention of the spectator² through movement, performance, close-ups, and composition, and to imitate cognitive activity, notably memory through the use of flashbacks.

Cognitive film theory as it is defined today finds its origin in a desire to use the cognitive sciences—especially psychology, neuroscience, and evolutionary theory—to study cinema and to move away from the Marxist-psychoanalytic approach that had dominated film theory since the 1960s. Cognitive film theory is interested in how spectators respond

² Following Giuliana Bruno (2002) and Angela Ndalianis (2012), I use the term "spectator" rather than "viewer" throughout this thesis (except in the case of quotes). This term is more inclusive and in line with the sensorium. It draws on Bruno's definition of the *haptic spectator* (p. 254) and embraces the capacity of the eyes to be "touched emotionally in ways that ignite the entire body into a state of 'kinesthetic perception'" (Ndalianis, 2012, p. 20). It contrasts with the term "viewer," which puts more emphasis on vision and is reminiscent of the ocular-centric model that tends to dominate film studies.

to cinema, and therefore believes in a bottom-up approach (Plantinga, 2002). It asks: "what accounts of human mental activity best help us understand the ways in which films stir our senses, arouse our passions, and provoke us to thought?" (Bordwell, 2009, p. 356). It pays attention to mental processes such as attention, perception, expectation, inference-making, and interpretation. Cognitive film theory also stresses that thinking and feeling are intimately related and draws on the idea that the rhetoric of a text does not solely consist in its ideas, but also in the emotional responses it generates in the spectator (Plantinga, 2002).

Since its inception, cognitive film theory—despite being a minority position—has kept attracting scholars throughout the years: George Wilson (1986) has suggested that spectators make sense of films in similar ways that they make sense of the world, arguing that mainstream narrative cinema builds on our capacities to understand the behaviour of others; Murray Smith (1995) has shown that character engagement is one of the main ways to emotionally involve the spectator; and David Bordwell (2009) has described the spectator as an "active information seeker" (p. 360) who relies on their own expectations, situates actions into broader frameworks, and uses schemas based on cinematic conventions and their own knowledge of the world to get information about the fictive world. As these examples show, cognitive film theory is not characterized by a unifying approach but by a stance: a deep interest in cognition, emotions, and naturalistic processes (Bordwell & Carroll, 1996). It is reflective of Carroll's (1988) call to study how films work rather than how they "purportedly mystify spectators" (p. 2).

While my approach is mostly informed by cognitive film theory, I also see the possibility of a dialogue with film phenomenology, and especially with the concept of the *sensorium*, as theorized by Angela Ndalianis. In *The Horror Sensorium* (2012), Ndalianis examines how horror films (and other media) address the spectator "corporeally, sensorially and intellectually" (p. 1). She is interested in the offscreen multisensory responses to what happens onscreen and argues that the onscreen violence continues across the body of the spectator (pp. 5, 19). For Ndalianis, this is possible thanks to the sensorium, i.e., an integrated unit that merges the sensory mechanics and the intellectual and cognitive functions of the human body (pp. 1, 16). Inspired by Vivian Sobchack's (2004) concept of the *cinesthetic subject*, Ndalianis strongly believes in inter-sensorial exchanges (synaesthesia) and describes the process of watching horror films like a "ping-pong match with multiple balls in play at once—each ball representing a different way of 'being touched' by what's

onscreen" (2012, p. 30). As noted by Sobchack, cinema uses the sense of vision and hearing to trigger other senses; the spectator comes to understand a film through their whole sensorial being (pp. 67–69). Ndalianis stresses that for the spectator, the senses become a way of experiencing the fear, disgust, and trauma of the characters and understanding the ideological issues of a film (pp. 23, 39).

On the other hand, Paul Rodaway (1994) has explored the active role of the senses in mediating our experiences with the world and structuring the information we get from our environment—a phenomenon he calls *sensuous geographies* (p. 4). For Ndalianis (2012), the same goes for the spectator of a horror film, who gives meaning to the fictional geographies of the film through their senses (p. 30). When the spectator is immersed in a film, she says, they follow the path of the characters, come to experience the space they navigate, and allow those spaces to write themselves across their body (p. 20). For Ndalianis, this "site-seeing" may create new memories of our encounters with the world or bring up old ones (p. 20).

In the emerging discipline of game studies, cognitive film theory has notably been used by Perron (e.g., 2004, 2005, 2009, 2018) to study horror video games. Drawing primarily on this scholarship, I define in the following section videoludic fear and examine its specificities.

2.2. Videoludic Fear: From an Evolutionary to a Game Studies Perspective

According to Arne Öhman (2008), fear is a reaction to "an obvious (albeit not necessarily clearly perceived) danger located in space and time that must be dealt with" (p. 710). Fear must be distinguished from anxiety, which is usually prestimulus (anticipatory), depends on a danger whose nature and location are more difficult to determine, and can hardly be coped with through active defence mechanisms (Öhman, 2008). Building on this definition, I define *videoludic fear* as the emotion the player feels in response to a perceived danger inside a video game and caused by make-believe. This definition is based on what is fear-provoking for adults and teenagers, and not for children. It is also meant to be used to study horror video games, i.e., video games that specifically aim to scare the player (e.g., *Clock Tower 2, Outlast*), and supposes that the player is willing to cooperate, i.e., to take horror video games seriously, engage with the disturbing effects of horror, and

"lay their body on the line" (Crane, 1994, p. 37) in order to get scared. With that in mind, I shall now establish the theoretical foundations of videoludic fear.

Fear has deep evolutionary origins. It has been observed in all mammalian species and seems to be part of the evolved mammalian defence system (Öhman, 2008; Reevy et al., 2010, p. 265). At least one structure of the brain, the amygdala, is involved in fear and in the generation of fear responses (LeDoux, 1996; Schafe et al., 2000). The experience of fear is unpleasant³ and leads to strong bodily manifestations: increase heart rate, respiration, and blood pressure; muscle tension; and the release of stress hormones. The immediate reaction to fear may be a freezing, a startle reflex, or a more in-between reaction, such as eye blinking (Reevy et al., 2010, p. 265). At that moment, fear leads to an increase in vigilance and a focusing of attention toward a specific object (Reevy et al., 2010, p. 265). Optimally, fear leads to an urge to defend oneself and to means of getting out of the situation through fight-or-flight responses (Öhman, 2008). According to Seymour Epstein (1972), fear is an avoidance motive and is thus related to coping behaviour. Like other emotions, fear helps us to choose the most efficient decision to a specific context among a myriad of options (Damasio, 1994, pp. 196–198).

Except in the case of phobias, fear is a functional reaction that can lead to life-saving behaviours (Öhman, 2008; Reevy et al., 2010, p. 265). Humans are more likely to fear predators, aggressive conspecifics, death and illnesses, and heights and wide-open spaces (Arrindell et al., 1991; Öhman & Mineka, 2001), i.e., situations that were threatening the survival of their ancestors (Seligman, 1971). Fear is caused by a clear stimulus, and Öhman (1993, 2008) notes that our perceptual system is biased toward discovering threats since false negatives are more costly than false positives. In other words, failing to elicit defence in response to a threat is more evolutionarily costly (it could lead to injuries or death) than eliciting a response to a harmless stimulus (it only leads to an increase level of stress).

In *The World of Scary Video Games* (2018), Perron differentiates between *fiction fear* and *videoludic fear*. Throughout his book, he associates fiction fear with horror films. He refers to Ed Tan's (1996) definition of *fiction emotions* and sees fiction fear as an emotion "rooted in the fictional world with the concerns addressed by that world" (Tan, 1996,

³ It is true that the experience of fear can be pleasurable (especially if we analyze it through the lens of the sublime), but I would argue that when it is the case, fear becomes pleasurable because we have some control over it and are able to tame it. I will examine this in more detail later.

p. 65). Fiction fear is empathetic since the characters in traditional narrative films have human traits and the spectator is interested in their faith (Tan, 1996, p. 82). The spectator does not identify per se with fictive characters but assimilates their situation and is able to know how they assess it (Carroll, 1990, p. 95). The spectator is scared *with* the character, and through this shared reaction, the spectator and the character develop a sense of commonality (Perron, 2018, p. 86). As noted by Carol Clover (1987), the spectator of a slasher film wants to see the final girl survive and defeat the killer more than they want to see her die.

At the same time though, fiction fear is what Tan (1995) describes as a witness emotion, i.e., an emotion that is more felt than acted on. While watching a horror film, the spectator cannot take action and is not called upon to do so (Tan, 1996, p. 76). They must wait for the uncontrollable outcome, and the fact that they only are spectator, probably sitting in the comfort of their home, is part of the reason why they can emotionally relate to film characters (Tan, 1996, p. 76). In video games, however, the player is projected into the world of the protagonist, and the screen becomes a gateway to that world (Poole, 2000, p. 98). The world of the player and the protagonist converge, and the connection between the two is possible through the controller (or the mouse and the keyboard; Perron, 2018, p. 88). In the case of cinema, what the spectator sees, hears, and feels reduces the phenomenological distance between the spectator and the character (Hanich, 2010, p. 95); this is even more true with video games since the player controls the character. As mentioned by Perron (2018), the player is responsible for the life of the protagonist, and in that sense, the player is threatened by an enemy just like the protagonist is (p. 89). The player gets scared because they have control over the protagonist; they are in "the moment of agency and ownership of actions" (Perron, 2009, p. 139).

Whereas one of the frightening powers of horror films comes from the fact that the spectator cannot intervene and must watch the horror unfolding before their eyes (Hanich, 2010, p. 88), Perron (2018) highlights that the frightening power of horror video games comes from the opposite: the fact that the player can intervene and must do so if they want to survive (p. 90). The fear experienced by the player comes from their empathy for the player character, but also, and mostly, from the need to keep them alive to pursue the goal of the game (Ekman & Lankoski, 2009). Even though this fear is rooted in the fictional world, this emotion is no longer a witness emotion, but what Perron (2004) has called a *gameplay emotion*, i.e., an emotion "that arise[s] from the gamer's actions in the

game-world and the consequent reactions of this world" (para. 2). Gameplay emotions mostly rest on the notion of control and do not solely depend on how the threat is audiovisually or narratively framed (like in films), but also on the ludic interests of the player (e.g., how dangerous the monster is and how much ammunition the player has to defeat it; Thon, 2019).

As Nico Frijda (1986) explains, emotions are action tendencies that push us to "establish, maintain, or disrupt a relationship with [our] environment" (p. 71). This is especially significant in video games since the player has some control over this relationship. While in films the emotion felt depends on the coping potential of the character and the spectator's appreciation of it, the emotion felt in video games depends on the player's appraisal of their own coping potential (Grodal, 2000). As Grant Tavinor (2009) notes, video games make the player believe that "certain things are the case" (p. 136), and this is possible because the player character exists in the same ontological world as other characters and enemies (p. 142). For this reason, and thanks to the interactive nature of video games, horror games allow the player to experience fear in a way that is not possible in other media.⁴

This is well illustrated by the possibility of experiencing panic while playing video games, i.e., a sudden sensation of fear that is so strong that it becomes difficult to think clearly (Perron, 2018, p. 93). The player usually loses control and frantically attacks or runs away from the threat without really knowing what they are doing. This happened to me more than once during my first playthrough of *Outlast*, a first-person horror game in which the player investigates a psychiatric hospital. Without any weapon to defend myself, I had to rely on stealth tactics to survive and use the night vision of my camcorder to make my way in the unlit hospital. Several times, while being chased by the sadistic Doctor Trager, I got caught in panic, ran into the wrong room, ended up in a dead end, or chose an obviously bad hiding spot, only to get brutally killed a few seconds later (see Figure 2). Video games allow the player to experience the action on a personal level, and videoludic fear reminds us that video games do not consist solely in representation, but also involve simulation.

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⁴ That being said, it would be a mistake to speculate that horror video games are more frightening than horror films (or other media). My goal here is not to take a stance in this debate, but to examine how fear affects the spectator and the player differently.



Figure 2. Experiencing panic while being chased by Doctor Trager. Screenshot by the author.

A last element worth mentioning are the similitudes between videoludic fear and the *sub-lime*. Edmund Burke (1757/1990) describes the sublime as a mixture of fear and awe; it leads to the recognition of our insignificance within a vast and hostile universe (Hantke, 1997). For Burke, the sublime is intimately related to power and can be experienced in reaction to eternity, infinity, and vastness (pp. 57, 59, 66–68), or to privation—to "Vacuity, Darkness, Solitude, and Silence" (1757/1990, p. 65). Immanuel Kant (1790/2007) adds that the fear experienced through the sublime leads to a surge of vitality, "a discharge all the more powerful," and describes the sublime as "a pleasure that only arises indirectly, being brought about by the feeling of a momentary check to the vital forces" (pp. 75–76). The sublime thus revolves around the passion of fear, including the fear of death, and the apprehension of overwhelming power.

Horror video games allow the player to experience fear in a way that is close to reality while still being enjoyable. They build on the human *fear module* (Clasen & Kjeldgaard-Christiansen, 2016, drawing on Öhman & Mineka, 2001) and condition the player to fear dark corners, to expect deadly encounters when they enter a new space, and to pay attention to the forewarning of a threat (Perron, 2004, 2009). One could even argue that monsters are designed to be predators (Perron, 2009) and that horror video games play with the fact that our affective system is prone to eliciting false positives in dangerous situations (Clasen & Kjeldgaard-Christiansen, 2016).

Yet, the fear experienced is usually pleasurable for fans of the genre because horror video games create what Isabel Pinedo (1996) has called a "bounded experience of fear" (p. 25), i.e., a frightening experience that takes place within a circumscribed space. The player experiences fear at a rather high level while physically being in a safe environment and in control of their experience (they can always stop playing if they are too scared). Control is a crucial element here; according to Marcia Eaton (1982), it allows us to attend events we would otherwise be unable to and experience aesthetic delight. This is reminiscent of Kant's (1790/2007) definition of the sublime. For Kant, the sublime evokes fear, but the fact that we are in safety makes it attractive and even pleasurable (p. 91). The fear experienced through the sublime leads to a feeling of power and a great revelation (even a victory) because it makes us realize that if terror cannot shake us, nothing can (Des Pres, 1983). The most frightening video games arguably allow the player to experience the sublime, and succeeding at them can generate a state that is close to euphoria.

As a last note, I would highlight that while it is useful to distinguish between fiction fear and videoludic fear to better appreciate the specificities of the video game medium, both can be experienced while playing a game (Thon, 2019). Rather than seeing fiction fear and videoludic fear as two separate entities, it might be more appropriate to see the general experience of fear as something fluid, a continuum. The experience of the player seems closer to fiction fear during cutscenes and during story- and exploration-driven segments, and closer to videoludic fear when more inputs from the player are required. In the next section, I continue my exploration of horror video games by looking more deeply at the conventions of the survival horror subgenre and situating *Cry of Fear* in relation to this corpus.

2.3. Survival Horror Games: Rethinking Genre Boundaries

Survival horror games are a type of single-player action-adventure and horror video games. In these games, the player collects items and manages their inventory, solves puzzles, and fights against monsters with the goal of unravelling the mystery behind horrific events (typically murders or disappearances) and escaping the nightmare alive. In contrast with action-oriented games, the player is made to feel vulnerable and less in control through limited resources (weapons, ammunition, health kits); reduced field of vision (blind spaces); and maze-like, dark, and claustrophobic environments; and is encouraged

to evade enemies whenever possible, rather than adopting an offensive strategy (see Figure 3 and 4). While a lot of works on horror video games have centred on the survival horror subgenre, not all horror video games belong to this subgenre. In fact, the question of which games to include in this corpus has been a contentious one for many years, especially when it comes to games that are not part of the classics *Alone in the Dark* (Infogrames, 1992), *Resident Evil* (Capcom, 1996), *Silent Hill* (Team Silent, 1999), *Fatal Frame* (Tecmo, 2001), and *Eternal Darkness: Sanity's Requiem* (Silicon Knights, 2002).



Figure 3. Miku is exploring the haunted Himuro Mansion, searching for her disappeared brother, in *Fatal Frame*. Screenshot by the author.



Figure 4. Jill is evading a zombie in the remake of the first *Resident Evil* (Capcom Production Studio 4, 2002). Screenshot by the author.

In his essay "Games of Fear" (2009), Carl Therrien provocatively asks: "Is the only purpose of genre studies to refine definitions and 'canonize' specific traits in order to clearup 'wrong' genre associations?" (p. 35). For Therrien, the academic attempt to clearly define specific video game genres is not very representative of the dynamic exchange between the production pole, who puts forward diverse concepts, and the reception pole (i.e., critics and players), who reappropriates these concepts. Therrien's critique echoes Hans Robert Jauss's (1982) proposition to move away from a substantive approach to genres—an approach that would only serve classificatory purposes—and to investigate genres through the concept of continuity and from a historical perspective, seeking to understand the relationship between a "unique" text and texts formative of a genre (pp. 88-89). Genres are defined by a number of pre-established conventions, and as Jauss notes, a "new text evokes for the reader (listener) the horizon of expectations and 'rules of the game' familiar to him from earlier texts, which as such can then be varied, extended, corrected, but also transformed, crossed out, or simply reproduced" (1982, p. 88). Summarizing Jauss's aesthetic of reception, Therrien highlights three areas of investigation when studying genres, two of which are more relevant to my argument: (1) the preliminary experiences of the audience with the conventions of the genre, and (2) the relationship between the work under study and previous works, with an emphasis on the reception context.

Keeping that in mind, I would argue that studying genres from a formalist perspective, if done with enough flexibility, can help us understand the experience of players and the meaning-making process. The fact for a video game to be part of a specific genre or subgenre leads the player to have certain expectations, to decode the game and make sense of it in a certain way, and ultimately to adopt a certain play style (Arsenault, 2010; Arsenault & Perron, 2009). As they are playing the game, the player sees how much the game aligns with their expectations, what it brings new to an already well-known formula (in the case of experienced players), refines their expectations accordingly, and this in turn influences their gameplay (following Perron's [2006] heuristic circle of gameplay). This is representative of the cycle I went through during my playthrough of *Cry of Fear*; it influenced the data collection process as well as my analysis of the game.

When defining the survival horror corpus, some scholars have been rather vague or liberal (Clasen & Kjeldgaard-Christiansen, 2016), to the point sometimes of including arcade

rail shooters and first-person shooters (Hand, 2004; van Elferen, 2015), or rather conservative, adding additional temporal, formal, and technological criteria to their definitions (e.g., third-person perspective, clumsy controls⁵) and restricting the corpus to only a few titles (Kirkland, 2007; Perron, 2012b; Perron, 2018; Taylor, 2009). Others have rejected altogether the survivor horror label, seeing it as confusing and as a catch-all term (Weise, 2009), or pointing out that several of its defining characteristics are often limited to a specific video game series (Therrien, 2009). While broad classifications are rather unhelpful because they do not allow us to study the particularities of the survival horror subgenre, more conservative classifications rarely allow us to take into account the process of "imitation, variation, and innovation" that is so fundamental to subgenres (Fowler, 1982, p. 114; see also Jauss, 1982, p. 88). As Alastair Fowler writes in his work on literature, "at the level of subgenre, innovation is life. Here, simple resemblance hardly produces a literary work: at the very least there is elegant variation. And from time to time quite fresh subgenres will be invented, enlarging the kind in new directions altogether" (1982, p. 114). It is not my intention to analyze in detail all the classifications mentioned above, but I believe that the classifications of Matthew Weise (2009) and Bernard Perron (2018) deserve further attention.

According to Weise (2009), the survival horror is specifically tied to the *Resident Evil* series and its combat-oriented gameplay; as he notes, the survivor horror label did not exist prior to 1996, when the first *Resident Evil* came out. Weise thus abandons the term "survival horror" and turns instead to the concept of *procedural adaptation*, analyzing games as computer simulations adapted from films. He proposes the label *stalker simulation* for games inspired by slasher films, like those of the *Clock Tower* series (Human Entertainment, Capcom, 1995–2002), and *zombie simulation* for games inspired by George A. Romero's modern zombie, notably the *Resident Evil* series, the more action-oriented *Dead Rising* (Capcom Production Studio 1, 2006), and the cooperative first-person shooter *Left 4 Dead* (Valve South, 2008). Weise's classification is surely useful to examine the dialogue between video games and films, but it puts a lot of emphasis on

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⁵ The notion of clumsy controls is related to a definition of the survival horror that relies heavily on technology. For Laurie Taylor (2009), the survival horror is "a genre bound with and by technical limitations" (p. 51), in particular those of the 1990s and the consoles on which survival horror games were popularized. Taylor associates the survival horror with controls that are clumsy and hard to master because they change depending on the position of the protagonist in the game environment; these are often called *tank controls* (see also Perron, 2012b, for a similar argument).

visual iconography and narratives, and does not take into consideration gameplay. Playing the first *Resident Evil* hardly feels like playing *Left 4 Dead*; in fact, it feels much more like playing the first *Clock Tower* (Human Entertainment, 1995). Weise's classification is illustrative of a phenomenon widely criticized in game studies but still common: the tendency to classify and study video games based on their aesthetic similarities to prior media forms, notably novels and films, and to mostly ignore their gameplay (Apperley, 2006; Wolf, 2002, p. 114).

On the other hand, Perron (2018) has investigated the crystallization of the survival horror subgenre by examining how horror video games were classified in francophone and anglophone game magazines following their release. This has led him to situate the beginning of the survival horror subgenre in 1992, with the release of *Alone in the Dark*, and to end it in 2005, after the release of *Resident Evil 4* (Capcom Production Studio 4; pp. 176–218). Perron points out that the label survival horror was not created by theorists nor critics but by Capcom itself, as part of its marketing strategy (p. 34). He categorizes horror games that came after this period into two new tendencies that he calls the *antipodal clusters*: (1) horror games that are oriented toward action and combat, and that provide the player with more ammunition and more powerful weapons, such as *Dead Rising*, *Dead Space*, and *Resident Evil 5* (Capcom, 2009); and (2) horror games that focus on stealth mechanics and in which the player is (almost) defenseless, such as *Amnesia: The Dark Descent* (Frictional Games, 2010), *Outlast*, and *Alien: Isolation* (Creative Assembly, 2014; pp. 218–245).

Although Perron (2018) has certainly proposed a nuanced description of the games released during the "crystallization of the survival horror" (p. 176) and has nicely highlighted two new tendencies in horror video games, I would argue that rather than seeing the survival horror as a bygone era, it might be more productive to read some of the games released after *Resident Evil 4* in continuity with the survival horror subgenre. Such a reading allows to better take into consideration the "imitation, variation, and innovation" process described by Fowler (1982, p. 114), and to which Perron refers himself. Overall, Perron's analysis gives a lot of space to the discourse of journalists and to the discourse of Capcom, and I would stress the importance of also paying attention to the discourse of players. A quick look at player reviews of *Cry of Fear* on Steam in both French and English reveals that several players put the game in continuity with the survival horror subgenre, even though the game was released in 2013. For one player, "all the ingredients

[of the survival horror] are there" (Hadess, 2020, my translation); according to another one, "Cry of Fear could easily be considered a homage to the survival-horror genre" (RonRon, 2013, my translation). Two players classify *Cry of Fear* as a "Psychological First Person Shooter Survival Horror" game (InnerConflict, 2013; Nan's Hip Socket, 2014), whereas other players compare the game to classic survival horror games, writing that *Cry of Fear* "reminded [them] of the very first Resident Evil" (isoakuren, 2015, my translation), or that the game is "an atmospheric survival horror game that let you fight back, just like Silent Hill or Resident Evil" (doomsday, 2015).

Following these player reviews and my own experience with the game, I propose to put *Cry of Fear* in continuity with the survival horror subgenre and explore the dialogue between this game and the more traditional games of this corpus. This decision is motivated by the work of Dominic Arsenault (2010), which recognizes that genre classification is influenced by the personal experience of the player. As Arsenault writes,

saying that a game belongs to a specific genre amounts to saying that for one-self, the elements of that game that generate generic effects of this genre have a greater impact, or are encountered more often, than the effects of other genres, and thus take precedence over them. Saying that *Diablo* is an "Action-RPG with a touch of horror" (rather than a "Horror-RPG with a touch of action") is a way to share one's vision that the game is better understood when it is interpreted that way. 9 (2010, p. 4, my translation)

As I will argue in Chapter 5, *Cry of Fear* can be seen as a reinterpretation of the survival horror subgenre; it specifically plays with the conventions of this subgenre to destabilize the player, create an impactful (even hurtful) experience, and generate videoludic trauma. Examining *Cry of Fear* through the lens of genre studies allows to better contextualize this game and to recognize that transgressions are not absolute nor static, but depends on a specific historical and cultural context, on the artistic form, and on individuals (Pötzsch, 2018). For now, I turn to the concepts of art-horror and real horror, and examine them in relation to the reality/fiction divide.

⁶ "tous les ingrédients [du survival horror] sont la [sic]."

^{7 &}quot;Cry of Fear pourrait facilement être considéré comme un hommage au genre qu'est le survival-horror."

⁸ "m'a rappelé le tout premier Resident Evil."

⁹ "dire qu'un jeu est de tel ou tel genre, c'est dire que pour soi, les éléments de ce jeu qui entraînent des effets génériques de ce genre ont un impact plus grand, ou sont rencontrés plus régulièrement, que les effets d'autres genres, et donc qu'ils priment sur ces derniers. Dire que *Diablo* est un « Action-RPG avec une touche d'horreur » (plutôt qu'un « Horror-RPG avec une touche d'action »), c'est partager sa vision comme quoi le jeu est mieux compris lorsqu'il est envisagé ainsi" (Arsenault, 2010, p. 4).

2.4. When Fear Becomes Horror

In *The Philosophy of Horror* (1990), Carroll explores the emotional effect horror narratives and images produce in the spectator; an emotion he calls *art-horror* (p. 24). In Carroll's theory, art-horror combines fear and disgust, and is directed toward the monster, an impure and unclean being that threatens the safety of the characters (p. 23). Carroll argues that the spectator is art-horrified if three conditions are met: (1) the spectator is in a state of abnormal, physical agitation; (2) this agitation has been caused by the thought that the monster is a possible being that could be threatening and impure; and (3) the thought of the monster evokes in the spectator a desire to avoid its touch (p. 27). Carroll examines this phenomenon through the *paradox of fiction*, which states that people can experience strong emotional responses to fictional elements despite recognizing their fictional nature (Radford & Weston, 1975). According to Jeanne Deslandes (2004),

an emotion stirred up by fiction is just as real as in real life. All emotions, in this view, are encountered, embodied and comprehended in the hermeneutic circle described by Heidegger: previous emotional experiences produces [sic], via self-reference, new emotional experiences, whether virtual or not. (p. 343)

Carroll specifically links this paradox to the horror genre, highlighting that the simple thought of something horrible like Dracula can make the spectator experience the emotion of art-horror (p. 81). While this emotion is genuine, Perron (2018) notes that the response to art-horror is a response to the art more than a response to the horror: the spectator distances themselves from the representation and usually appreciates it once the frightening moment is over (p. 76). Carroll also analyzes the reasons why many people are drawn to the repulsive and what would seem natural to avoid; a phenomenon he calls the *paradox of horror* (p. 160). He argues that art-horror is the price the spectator is willing to pay to satisfy their curiosity and fascination for the monster (p. 186).

While this might not be as obvious in the work of Carroll (1990) as in that of other theorists, I would argue that Carroll's argument falls within the large body of work that sees the experience of fear as satisfying or even pleasurable because it takes place within a circumscribed space. Such works are reflective of a tendency to clearly separate reality from fiction. For Pinedo (1996), the (horror) film is temporally and spatially finite: it promises a "contained experience" and an imaginary one, with the screen marking off a "bounded reality" (p. 27). Interestingly, such a perspective has even been adopted in the first *Resident Evil* game. When the player loads a save file, the game introduces them to

the world of survival horror through a message typed in three parts: "You have once again entered / the world of survival horror. / Good luck!" In so doing, the game separates its own universe from the universe of the player, assuming that the player leaves the universe of the game when they turn off their console. Along the same lines, Therrien (2011) has argued in his work on immersion that the character acts as a protective screen, shielding the spectator or the player from what happens in the fictional world (p. 250). Finally, in relation to trauma theory more specifically and drawing on the work of Johan Huizinga (1938/1970, p. 13), Evgeniya Kuznetsova (2017) has suggested that the *magic circle* (i.e., the metaphorical membrane that situates play within a specific space and time) could act as a protective shield, "allowing players to explore the realities of traumatic events and traumatic reactions in a safe and well-structured 'playground,' without fear of this exploration overflowing too violently into the real world" (pp. 19–20).

I wish to introduce here an additional way to look at this phenomenon. I wish to question the idea that the player is necessarily sheltered from what occurs in a video game (and in other media) and the assumption that the boundary between reality and fiction is clearly delineated. I want to ask: does the player ever leave the world of Cry of Fear? Can they bring some elements of the game with them outside the game world? After all, we all have had nightmares because of something we watched, played, read, or even heard of. Being in contact with the horror genre can suddenly lead to new elements becoming relevant to our world-of-concern, such as the floor creaking or a strange shadow inside our bedroom (Veale, 2015). Inger Ekman and Petri Lankoski (2009) interestingly note that sounds in video games "extend into space, even interacting with it. Sounds create continuity and presence, and as a result, confuse the borders of fiction" (p. 188). Following Katie Salen and Eric Zimmerman (2003), I believe that the frontier between the virtual and the outside world is fragile, porous, and permits exchanges between these two worlds which are ultimately connected to one another (pp. 93–99). Video games can leave the player with impressions that continue to resonate in them long after the gameplay session is over, especially in the case of games with transgressive content (Tronstad, 2018).

A few examples have shown over the last centuries that fiction can strongly impact on its audience. In *The Sorrows of Young Werther* (Goethe, 1774/2004), the protagonist falls in love with a woman engaged (and later married) to another man and ends up killing himself. The novel had a considerable influence in Europe, notably on fashion (Heizmann, 2003), and reputedly led to one of the first known examples of copycat suicide (Phillips,

1974). Saddened by the apparent influence of his book on suicide, Goethe (1811/1848) later wrote in his autobiography:

My friends were led astray by my work, for they thought that poetry ought to be turned into reality, that such a moral was to be imitated, and that at any rate one ought to shoot oneself. What had first happened here among a few, afterwards took place among the larger public. (pp. 511–512)

More recently, the first season of the TV series *13 Reasons Why* (Yorkey et al., 2017) has been criticized for its graphic depiction of suicide and for romanticizing and glamorizing suicide (e.g., CMHA, 2017; NASP, 2017). The release of the series was associated with an increase in the overall suicide rates among children and adolescents¹⁰ in the United States (Bridge et al., 2020; Niederkrotenthaler et al., 2019) and in web search queries focusing on suicidal ideation, notably a 9% increase in queries for "how to kill yourself," an 18% increase for "commit suicide," and a 26% increase for "how to commit suicide" (Ayers et al., 2017). These two examples are illustrative of a phenomenon called the *Werther effect*, a term coined by David Phillips (1974) and named after Goethe's novel. The Werther effect is based on the idea that suicide can be contagious and that high media coverage of a suicide is generally followed by an increase in suicide rates (Phillips, 1974). In these instances, suicide seems to be perceived as a solution among others to one's personal problems and would have been legitimized by the media (Phillips, 1974).

I do not aim in this thesis to comment on the likeliness of a specific medium or of a specific video game to cause suicide, nor to present *Cry of Fear* as such; instead, I wish to suggest that video games, and horror video games more specifically, can cut across the reality/fiction divide and deeply impact on the emotional organization of the player. Briefly turning to the concept of *horror* seems appropriate to reflect on that matter.

In his work, Perron (2018) argues that horror films must be distinguished from horrifying ones (p. 77). In fact, despite the advent of splatter films in the 1960s, and of the New French Extremity and the torture porn subgenre at the turn of the 21st century, Perron points out that the number of films that have successfully horrified their audience is rather small (p. 77). Torture, dismembered bodies, and fountains of blood certainly shock and disgust, he says, but the formal and narrative clichés these films often reproduce leave the spectator distanced from what is happening onscreen (p. 77). The terms *scary films* (based

21

¹⁰ Bridge et al. (2020) used the age category "10–17 years old," whereas Niederkrotenthaler et al. (2019) used the age category "10–19 years old."

on the French "films d'épouvante") and *scary video games* seem more appropriate to describe films and video games that belong to the so-called "horror genre" (Perron, 2018, p. 74). In "Real Horror" (2003/2004), Robert Solomon writes:

Horror is an extremely unpleasant and even traumatizing emotional experience that renders the subject (victim) helpless and violates his or her most rudimentary expectations about the world. This way of thinking about horror renders utterly inappropriate any question of enjoying or getting pleasure from horror. (p. 129)

Horror is therefore an emotion that leaves us aghast, frozen in place, and overwhelmed, and whose effects are wholly negative. As Solomon notes, while a decomposing body will disgust us, it is only the decomposing body of someone we know that will really horrify us (p. 114). Horror involves a sense of helplessness (more so than fear) and depends on a sophisticated sense of significance; in the previous example, it depends on the sharp contrast between our expectation that someone is still alive and the realization that this person is dead (Solomon, 2003/2004, pp. 114, 118).

While Perron (2018) remains skeptical about the capacity of video games to horrify the player (p. 78), I would argue that a dialogue between my own experience with *Cry of Fear* and horror as defined by Solomon (2003/2004) is possible. Playing *Cry of Fear* was for me an unpleasant experience that put into question my assumptions about the horror genre: I did not know before playing this game that it was possible to experience fear and art-horror so strongly. As Emmanuel Siety (2006) observes, watching a horror film (or playing a horror game, I would add) is like playing a game with the director,

a game always a little bit dangerous because we are never sure that the film will not cross the lines of what we can endure. Without doubt, this is the first thing we are afraid of: to let ourselves be surprised by the image we did not want to see, the shocking image and the one that is really doing us violence. [1] (pp. 9–10, as translated in Perron, 2018, p. 69)

This quote describes well my experience with *Cry of Fear*: the shocking images of violence, suicide, and depression did me violence. The onscreen violence continued offscreen, across my body (to paraphrase Ndalianis, 2012, p. 5). Thinking back about my experience playing *Clock Tower*, *Resident Evil Zero* (Capcom Production Studio 3, 2002), or *The Evil Within* (Tango Gameworks, 2014)—three games I have finished—

22

¹¹ "jeu toujours un peu dangereux, car nous ne sommes jamais assurés que le film ne dépassera pas les bornes de ce que nous voulons bien supporter. Sans doute est-ce d'abord de cela que nous avons peur : de nous laisser surprendre par l'image que nous ne voulions pas voir, l'image qui choque et nous fait réellement violence" (Siety, 2006, pp. 9-10).

generates feelings of excitement, nostalgia, and pride, but I hardly experience any of these feelings when I think about *Cry of Fear*. In fact, revisiting my memories of this game to write this thesis was rather challenging. Watching back my playthrough, looking at pictures of the game, or reading about it made me feel uncomfortable, anxious, nauseous, and even depressed. I can hardly recall any good memories I had playing *Cry of Fear*, and I do not see myself playing this game again. For me as a player, there will be a "before" and an "after" *Cry of Fear*. This is what pushes me to argue that I experienced something close to horror, and it is precisely there that I see the possibility of a dialogue with trauma theory.

3 THE ANSWER IS TRAUMA

Originally derived from the ancient Greek "wound" or "damage" (τραῦμα), the term "trauma" has become especially prevalent in academia and popular culture over the last thirty years. This "contemporary trauma culture," as Luckhurst (2008, p. 2) calls it, has been shaped by scholars from numerous disciplines (psychology, history, law, sociology, literature, cinema, cultural studies, game studies, etc.) and by various forms of narratives and media (novels, memoirs, photographs, films, video games, etc.). While Dominic La-Capra (2001) notes that "no genre or discipline 'owns' trauma as a problem or can provide definitive boundaries for it" (p. 96), Tobi Smethurst (2015b) highlights that trauma has become a *travelling concept* (Bal, 2002) that "shapes and is shaped in turn by each theoretical context in which it is invoked" (p. 7). Keeping in mind the interdisciplinary nature of trauma studies, this chapter first proposes a selective overview of major contributions in this field, and then highlights how a trauma paradigm has progressively been built in game studies. Finally, it provides a conceptualization of videoludic trauma.

3.1. Trauma Theory: A Brief Overview

The definition of trauma and post-traumatic stress disorder (PTSD) has changed several times since the 1980s, following each new edition of the *Diagnostic and Statistical Manual of Mental Disorders (DSM*; APA) and the *International Statistical Classification of Diseases and Related Health Problems* (WHO), often leading to heated debates. Although my goal in this chapter is not to take a stance on these debates nor to provide an exhaustive definition of trauma or PTSD, I believe that a quick look at a few clinical definitions of trauma is a useful starting point to reflect on that subject matter and how it relates to video games. As Kuznetsova (2017) writes, it permits for a more grounded and critical reading of trauma (pp. 11–12).

According to the World Mental Health surveys, 70.4% of the world population will be exposed to a traumatic event at least once during their life, with most people first experiencing trauma before the age of 40 (Benjet et al., 2018). Five types of trauma are espe-

¹² The World Mental Health (WMH) surveys are an initiative of the World Health Organization. The results mentioned here (and in the following sentence) are based on in-depth interviews conducted with 68,894 respondents between 2001 and 2012, in 24 countries across the five continents. Benjet et al. (2018) note that 70.4% is a conservative estimate. Countries with higher-than-average trauma exposure (% of the

cially widespread across the world: "[1] witnessing death or serious injury, [2] experiencing the unexpected death of [a] loved one, [3] being mugged, [4] being in a life-threatening automobile accident, [5] and experiencing a life-threatening illness or injury" (Benjet et al., 2018, p. 54). Following Ronald Doctor and Frank Shiromoto (2010),

trauma and the traumatic stress disorders are conditions that arise from exposure to extraordinary life-threatening events or accumulated smaller traumas usually experienced in one's developmental years. These conditions are marked by chronic arousal, emotional numbing, avoidance of reminders of the trauma(s), and intrusive thought or dreams related to trauma events. (p. 276)

Trauma generally leads to an altered state of consciousness, especially when resistance is not possible (Herman, 1992/1997, p. 42), and can lead to a reduction in the sense of agency and ownership over one's body (Ataria, 2015). In addition, Bessel van der Kolk (2000) notes that trauma survivors have faced such horror that their conception of themselves, their capacity to cope, and their biological threat perception may be temporarily or permanently altered. While trauma is often seen as the result of a sudden, punctual event, trauma can also be the consequence of daily microaggressions (Moody & Lewis, 2019; Root, 1992), or of a trauma carried across generations, notably as the result of poverty or cycles of abuse within a family (Ney, 1988), or of historical events like colonization, genocide, and slavery (Brave Heart, 2000; Starman, 2006).

On the other hand, the *DSM-5* (APA, 2013) adopts a more conservative approach and defines a traumatic event as an "actual or threatened death, serious injury, or sexual violence" to which someone was exposed by directly experiencing the trauma, by witnessing in person the traumatic event, by learning that the traumatic event has occurred to a loved one, or by being repeatedly exposed to aversive details of the trauma, usually through professional duties (p. 271). Interestingly, the *DSM-5* specifies that repeated exposure "does not apply to exposure through electronic media,¹³ television, movies, or pictures, unless this exposure is work related" (APA, 2013, p. 271), indicating that video games are not considered capable of putting the player in traumatic situations.

the methodology used to conduct the WMH surveys.

population) notably include France (72.7%), New Zealand (79.3%), Lebanon (81.1%), Colombia (82.7%), and the United States (82.7%), whereas countries with lower-than-average trauma exposure notably include Spain (54%), Japan (60.7%), The Netherlands (65.6%), Nigeria (67.1%), and Mexico (68.8%). See Benjet et al. (2018) for more details regarding these results and Kessler et al. (2018) for more details regarding

¹³ The APA includes video games in their definition of electronic media (APA, personal communication, December 18, 2020).

In the modern¹⁴ West, trauma was first described as a psychological rather than physical affliction during the expansion of the railways in the 19th century, among Victorian medical practitioners (Harrington, 2001). Psychological trauma was observed among the survivors of the first train accidents and was then called *railway spine* (Harrington, 2001). Describing the condition of some of the survivors, the surgeon Herbert Page (1883) wrote at the time: "we shall see that the course, history, and general symptoms indicate some functional disturbance of the whole nervous balance or tone rather than structural damage to any organ of the body" (p. 143). And he continues:

It is this same element of fear which in railway collisions has so large a share ... in inducing immediate collapse, and in giving rise to those after-symptoms which may be almost as serious as, and are certainly far more troublesome than, those which we meet with shortly after the accident has occurred. (Page, 1883, p. 147)

One must only imagine the suddenness of the accident, the loud noise, the cries of the passengers injured, and the confusion (Page, 1883, p. 147) to realize how each collision represented by its arbitrariness, violence, and inhumanity trauma as it is perceived today (Harrington, 2001). Interestingly though, one must also realize that train accidents were not the first cases of technological violence and industrial trauma at the time—accidents in the factories were (Luckhurst, 2008, p. 21). If train accidents were the first cases to be discussed more widely, it is because the main victims were members of the middle and upper classes, and because these accidents were more visible to the public (Luckhurst, 2008, pp. 21, 24).

Research on trauma was further developed by Josef Breuer and Sigmund Freud (1895), known for their work with women diagnosed with hysteria, and more notably by Freud in *Beyond the Pleasure Principle* (1920/1961). In this speculative work, Freud attempts to understand traumatic neurosis and what he calls the *compulsion to repeat*, notably observed among shell-shocked soldiers coming back from World War I. As he notes, shell-shocked soldiers kept returning to the terrors of the battlefield through their thoughts and nightmares despite not being consciously preoccupied with remembering these events (pp. 6–7). Freud conceptualized trauma as an intrusion from outside, "powerful enough

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¹⁴ My use of the term "modern" here aims first and foremost to avoid broad generalizations about the birth of psychological trauma. It is meant to refer to a sociocultural period associated with the emergence of individual subjectivity, nationalism, bureaucracy, secularization, objectivism, mass society, and rapid urbanization. It mostly refers to the 19th and 20th centuries. For an analysis of earlier cases of psychological trauma, especially in ancient Greece and ancient Mesopotamia, see Tritle (2000, pp. 55–78) and Abdul-Hamid and Hughes (2014).

to break through the protective shield" (1920/1961, p. 23) of one's mind and bringing in harmful stimuli. According to Luckhurst (2008),

Freud envisaged the mind of a single cell with an outer membrane that does the work of filtering material from the outside world, processing nutrients, repelling toxins, and retaining the integrity of its borders—just as the conscious mind did. A traumatic event is something unprecedented that blasts open the membrane and floods the cell with foreign matter, leaving the cell overwhelmed and trying to repair the damage. (p. 9)

Freud (1920/1961) thus conceived trauma as the result of external stimuli disturbing the functioning of the organism and as an internal reaction (a defence mechanism) trying to master and dispose of these stimuli (pp. 23–24). Building on his observation of the play behaviour of young children, Freud argued that the psyche constantly returns to repressed material to process and master trauma retroactively and integrate it into the psyche as an ordinary memory (pp. 8–9, 26). This is in line with his earlier argument that individuals must work through traumatic events and articulate their thoughts, memories, and dreams to avoid being trapped in a cycle of repetition (see Freud, 1914/1958). A last element worth mentioning is Freud's subtle introduction of the concept of *Nachträglichkeit* (afterwardsness, latency), generally defined as the delay between a traumatic event and the understanding of this event as traumatic (Breuer & Freud, 1895, p. 192). Cathy Caruth (1996) describes it as a form of haunting, as an event that "is experienced too soon, too unexpectedly, to be fully known and is therefore not available to consciousness until it imposes itself again," coming back to haunt trauma survivors (p. 4).

More recently, in *The Trauma Question* (2008), Luckhurst has associated psychological trauma with modernity, rural flight (i.e., the migration from rural to urban areas), and the rise of the "technological and statistical society" (p. 19). For Luckhurst, trauma finds its origin in the transition in the conception of time, space, and social relationships in the socialled "traditional society" and the shocks this transition occasioned (p. 20). As he observes, the modern era was characterized by a transition from the village to the city, and more precisely, by a transition from "the fixity of place, the dense network of social relations and local traditions typical of the village," to the rise of an "abstract, national and increasingly international space" (Luckhurst, 2008, p. 20). Local rhythms, says Luckhurst, were replaced by a standardized time, leading to the routinization of labour and ensuring the coordination between transport systems and national economies (p. 20). At an individual level, this meant a certain release from narrow expectations, accompanied by a liberating but also angst-ridden feeling: the feeling of a future full of opportunities,

but that one must also build for oneself (Luckhurst, 2008, p. 20). Ultimately, these transformations occasioned a series of cultural shocks and transformed the city into a place of "traumatic encounters, rewriting the very notion of experience" (Luckhurst, 2008, p. 20). This feeling is perceptible in the account of commentators and writers of the time, who describe the city as a place of overstimulation and exhaustion filled with crowds, telephones, advertising, and street transport (Luckhurst, 2008, p. 20).

Lastly, I would like to suggest that Albert Camus has somewhat proposed a philosophy of trauma in his work on the feeling of absurdity. In Le Mythe de Sisyphe (The Myth of Sisyphus, 1942/1975), Camus argues that the human condition is absurd because of the conflict between individual's search for meaning in life and the observation that life is meaningless. Camus writes: "This world in itself is not reasonable, that is all that can be said. But what is absurd is the confrontation of the irrational and the wild longing for clarity whose call echoes in the human heart" (1942/1975, p. 26). He continues: "The absurd is born of this confrontation between the human need and the unreasonable silence of the world" (Camus, 1942/1975, pp. 31–32). The feeling of absurdity springs notably from realizing that the future we keep longing for will inevitably lead to our death; from sensing that nature is dense, hostile, and foreign to us; or from looking at someone's inhumane and mechanical gestures, and suddenly wondering why they are alive (Camus, 1942/1975, pp. 19–21). The absurd manifests when we cease to understand the world for a second (Camus, 1942/1975, pp. 20, 49). The absurd is not agreed to, says Camus (p. 35), and from the moment we realize its existence, "it becomes a passion, the most harrowing of all"¹⁷ (1942/1975, p. 27). The feeling Camus evokes is traumatic and leads to existential angst. It makes us question the value of life and the purpose of human existence, and can lead us at times to contemplate suicide.

In his cultural history of trauma, Luckhurst (2008) emphasizes that visual culture has had a considerable influence on the current trauma paradigm and has helped shaping post-traumatic subjectivity (p. 15). For example, the concept of *intrusive images* (i.e., vivid images that involuntarily pop into consciousness and interrupt the ongoing mental activity), symbolically perceptible in war and disaster photography, has had a central place in

¹⁵ "Ce monde en lui-même n'est pas raisonnable, c'est tout ce qu'on peut dire. Mais ce qui est absurde, c'est la confrontation de cet irrationnel et de ce désir éperdu de clarté dont l'appel résonne au plus profond de l'homme" (Camus, 1942/2013, p. 266).

¹⁶ "L'absurde naît de cette confrontation entre l'appel humain et le silence déraisonnable du monde" (Camus, 1942/2013, p. 270).

¹⁷ "l'absurdité est une passion, la plus déchirante de toutes" (Camus, 1942/2013, p. 266).

the contemporary conceptualization of trauma, while the use of the flashback in cinema since the 1910s has had an impact on the diagnostics of PTSD in the 1980s (Luckhurst, 2008, pp. 147, 177–178). Along the same lines, Caruth (1996), despite having been criticized for theorizing trauma as something inherently untellable and unrepresentable (see Gibbs, 2014; Leys, 2000), has rightfully highlighted that art and its metaphors can provide new avenues to understand trauma where direct descriptions and testimonies might fail.

Nevertheless, as Luckhurst (2008, p. 89) and Gibbs (2014, p. 47) have argued, there has been a tendency in trauma studies to analyze certain fictional works deemed more authentic or legitimate than others due to their aesthetic and formal properties (e.g., broken chronology, unreliable narrator, repetitions), leading to certain tropes. Trauma fiction should not be regarded as "a narrow canon of works," says Luckhurst, but "as a mass of narratives that have exploded across high, middle and lowbrow fiction since the late 1980s" (2008, pp. 89–90). While this is something that scholars seem to be embracing more and more when it comes to literature and cinema, only little attention has been paid to trauma in video games, as noted by Smethurst (2015b), including by scholars who favour an interdisciplinary perspective on trauma theory. In the following section, I turn to the work of game scholars and explore how trauma and its effects have been portrayed in video games.

3.2. The Construction of a Trauma Paradigm in Games Studies

The work of Smethurst (2015a, 2015b, 2017; Smethurst & Craps, 2015) has been foundational in shaping trauma theory in game studies. Throughout her work, Smethurst has shown that video games have the potential to explore trauma in ways that other media cannot thanks to their *interreactivity*. According to Smethurst (2015b), interreactivity recognizes that "both the player and the game change state during gameplay, reacting to one another in a cybernetic feedback loop" (p. 13). This concept takes into account the back and forth between the player and the game, and how it is mediated by technology (Smethurst, 2015b, p. 42). It pushes us to see "[the] technology, [the] game, *and* [the] player-in-play" as three variables that are used by game designers to create specific rhetorical

effects and influence the game experience (Smethurst, 2015, p. 42, emphasis in the original).¹⁸ Ultimately, it proposes an alternative to the term *interactivity*, which has been used in rather broad ways in the humanities.¹⁹

In Smethurst's work, the concept of interreactivity is complementary with the notions of on-line and off-line engagement, as theorized by James Newman (2002). In his work on player-character relationships, Newman argues that video games switch back and forth between sequences in which the player actively influences the game world (on-line engagement), and sequences in which inputs from the player are not registered (off-line engagement). While it might be tempting to see on-line and off-line engagement as a binary opposition—the former always referring to a play sequence and the latter to a cutscene—Newman specifies that these types of engagement should rather be seen as a continuum: some cutscenes involve quick-time events and are more interreactive than others, while some play sequences ask for fewer inputs from the player than others. Building on this framework, Smethurst and Craps (2015) have proposed the concepts of online and off-line empathy. According to the authors, on-line empathy is specific to video games and is the result of their interreactive nature, whereas off-line empathy is similar to the empathy felt for characters in novels or films. When the player is on-line, pushing buttons and virtually killing dozens of non-player characters (NPCs), empathy is generally suspended, or at least much reduced; the main concerns of the player at that moment revolve around how the game feels and how to achieve the game's objective (Smethurst

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¹⁸ Smethurst's (2015b) argument here echoes what Arsenault and Perron (2009) have described a few years earlier and have themselves called *inter(re)activity*: "we would argue that a video game is rather a chain of reactions. The player does not act so much as he reacts to what the game presents to him, and similarly, the game reacts to his input" (pp. 119–120).

¹⁹ Both Lev Manovich (2001) and Sabine Harrer (2018) have criticized the "interactivity myth." For Manovich, several principles that have been associated with new media could already be found in older media: interactivity is one of them. Manovich stresses that our experience with most art forms is interactive in the sense that it demands some cognitive or physical efforts from the audience (pp. 55–57). Ellipses in literature, or images that are not directly related to one another in cinema (in relation to montage) both ask the audience to fill in the missing information, he says (pp. 55–57). While Manovich calls this "psychological interaction" (in a way that is strongly reminiscent of cognitive film theory), he notes that interactivity can also be physical, notably when the spectator moves to observe a sculpture from different angles (pp. 55–57). Harrer adds that the term "interactivity" has been problematically used in game studies and game design to suggest that video games enhance the effects of representation, lead by default to empathy and identification with the protagonist, and are necessarily more persuasive and better at engaging their audiences than other media (pp. 24, 30). This discourse seems especially prevalent among scholars and designers who celebrate the video game medium and its "uniqueness" (Harrer, 2018, p. 25).

& Craps, 2015). In some cases, however, games can successfully lead the player to empathize with NPCs during on-line sequences, pushing the player to experience ethical conflicts (Smethurst & Craps, 2015), as I will discuss later.

Drawing on this theoretical framework, Smethurst and Craps (2015) argue that The Walking Dead: Season One (Telltale Games, 2012) pushes the player to empathize with traumatized characters and feel guilty for the traumatic events of the game (i.e., who is saved and who dies). While *The Walking Dead* mostly relies on off-line moments to generate empathy from the player, notably by emphasizing the facial expressions of the characters through close-ups, it also repeatedly switches between on-line and off-line engagement to involve the player as much as possible in traumatic situations (Smethurst & Craps, 2015; see also Madigan, 2012). For example, in one segment of the game, Lee and other survivors find a character named David whose leg is caught in a bear trap. As walkers are slowly approaching and Lee is not able to break the trap, the only viable option if the player wants David to escape the situation alive is to cut off his leg. As Smethurst and Craps highlight, the decision to cut off David's leg is not simply a matter of pressing a button and then watching Lee cutting David's leg. Instead, the game puts the player online by asking them to select the axe and click on David's leg, and repeat the same sequence four times before David's leg is finally cut off (Smethurst & Craps, 2015). Between each sequence, the camera alternates between shots of David screaming in agony and close ups of his mutilated leg, changing the engagement of the player to an off-line state, pushing them to be disgusted by what is going on onscreen (like they would for a horror film), and asking them to recommit to the action each time, knowing what is going to happen (see Figure 5 and 6; Smethurst & Craps, 2015).





Figure 5 and 6. Chopping off David's leg is a gruesome affair. Screenshots by the author.

Focusing more specifically on game narratives, Kuznetsova (2017) has provided a strong framework for examining the construction of traumatized characters in video games. As she notes, narratives have occupied a central place in the discussions in trauma theory, especially those concerned with surviving and coping with traumatic experiences (p. 10). Building on the work of Ian Bogost (2007) on procedural rhetoric and of Jason Begy (2010) on metaphors in video games, Kuznetsova has examined how rules, systems, and processes can be used to symbolically portray trauma narratives, following the idea of *procedural metaphor* (pp. 27–28). While Kuznetsova is not the first scholar to propose a metaphorical reading of trauma in video games (see Rusch, 2009; Fawcett, 2016), her analysis nicely shows the usefulness of procedural metaphors to depict experiences that are hard to capture linguistically (p. 30). More precisely, Kuznetsova argues that two elements usually considered essential to strong game design can be used in subversive ways to represent the disorientation and disengagement that accompany trauma; these elements are (1) agency and (2) a harmonious integration between the ludic and narrative components of a game (*ludonarrativity*).

Rather than seeing agency as a feature inherent to the game medium, Kuznetsova (2017) proposes to see agency as "an affordance . . ., a procedural opportunity that designers can use to make arguments about the distribution of power in real-world situations" (p. 68). As the author shows through her analysis of the interactive drama *Beyond: Two Souls* (Quantic Dreams, 2013), an explicit loss of in-game agency can be a powerful way to represent the loss and reappropriation of agency experienced by a traumatized character (p. 32). In her analysis, Kuznetsova shows that *Beyond* successfully restricts the player's

agency through prompts and quick-time events that do not influence how the story unfolds (see Figure 7 and 8), reflecting the lack of control that Jodie, the game protagonist, has experienced throughout her life—from being given by her adoptive parents to a research laboratory, to being forced to work for the CIA (pp. 59–64). This procedural metaphor, reminiscent of Mawhorter et al.'s (2014) notion of *false choice*, is even more effective considering that players usually expect to be in control when they play a game (Kuznetsova, 2017, p. 32).

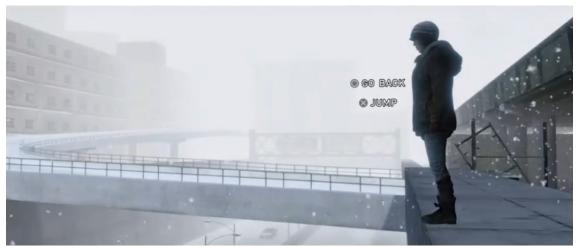




Figure 7 and 8. After choosing to jump to commit suicide, the player is rescued by Aiden, an incorporeal entity, making their decision meaningless. Screenshots by the author.

Kuznetsova (2017) pursues her analysis of trauma narratives in games by examining the potential of *ludonarrative dissonance* (i.e., the apparent contradiction between the gameplay and the story of a game) to evoke "confusion, discomfort and unsettlement" (p. 99). She gives the example of the *Tomb Raider* reboot, which has been criticized for transforming Lara Croft in a rather short lapse of time from an innocent young woman sobbing after killing a man for the first time, to a meticulous killer developing her skills, upgrading

her weapons, and brutally murdering hundreds of enemies. This dissonance has been incorporated in the character progression system, which notably encourages the player to kill as many enemies as possible and in specific ways to gain more experience points, equating proficiency with aggression (Kuznetsova, 2017, p. 95). As Kuznetsova notes, Lara starts as a "Rookie" and ends up as a "Specialist" (following the names in the progression system), learning how to use her climbing axe to execute enemies and developing skills such as "Accomplished Killer," "Shotgun Expert," and "Dodge Kill Mastery." According to Kuznetsova, the ludonarrative dissonance in *Tomb Raider* can be read as a metaphor for Lara's mental and emotional exhaustion in response to trauma and her growing desensitization to violence (p. 97). At the end of the game, Lara has become a heavily traumatized character, "embracing her violent side and purposefully seeking out adventure in the hopes of . . . returning to the places of her painful past" (Kuznetsova, 2017, p. 99).

While the studies I have examined so far have mostly focused on the representation of trauma in video games, other studies have explored more directly the idea that video games could induce trauma in the player. In "Playing Dead in Videogames" (2015a), Smethurst analyzes how the puzzle-platform game Limbo (Playdead, 2010) evokes through its aesthetics the symptomatology of trauma and "how it might feel to be traumatized" (p. 819). In Limbo, the player controls a little boy and moves through a series of black-and-white 2D landscapes, trying to find his sister while avoiding deadly traps and enemies (see Figure 9). According to Smethurst, *Limbo* incorporates the symptomatology of trauma through its bleak graphics, its soundtrack made of disembodied sounds, and the numerous grisly deaths of the protagonist—beheaded by a bear trap, impale by a giant spider, or burned by a group of children, to only name a few. As the player moves the protagonist and fails to see a threat, the player transitions from on-line to off-line engagement and is forced to watch the brutal death of the protagonist for several seconds before being allowed to reload the game (Smethurst, 2015a). As Smethurst writes, the interreactivity of the video game medium makes it possible for Limbo to "pu[t] the player in the fraught position of being both the cause of the death (On-Line) and the subsequent witness to it (Off-Line)" (2015a, p. 829), generating feelings of uneasiness, shock, and guilt. The player, who wants to avoid these negative feelings, ends up in a state of hypervigilance and oversensitivity to certain stimuli, virtually experiencing some of the symptoms of PTSD (Smethurst, 2015a).



Figure 9. Escaping from the giant spider. Screenshot by the author.

The possibility that a game could transmit trauma to the player seems even more plausible when one reads Brendan Keogh (2012) and Tobi Smethurst's (2015b, 2017) accounts of *Spec Ops: The Line* (Yager Development, 2012), a military shooter in which the protagonist, Walker, and his squad are sent in Dubai to carry out a reconnaissance mission. The game is especially known for having the player fire white phosphorous, a controversial incendiary weapon, halfway through the game to destroy the 33rd encampment, and then being confronted with the horrendous effects of their action. As they enter the camp, the player hears screaming and sees the bodies of soldiers on the edge of death. A soldier without a leg is crawling toward the player; another one is buried under some debris and is begging for help. Things get even more tragic when the player discovers a building nearby, filled with the burned bodies of some forty civilians, probably in the process of being evacuated by the soldiers they have just killed. "The trap the game has laid across seven rigidly generic chapters has been snared," writes Keogh. "I walked right into it and revealed that I was always the monster the game knew I was, and now the game is going to make me accept it" (2012, p. 82).

The rest of the game does not feel the same: Walker exhibits more violent and irrational behaviour, denying that he is in the wrong, whereas the player is disillusioned and feels deeply responsible for this tragedy (Smethurst, 2017). From that moment onwards, the game pushes the player to empathize with NPCs while being on-line and simultaneously having to kill them to progress in the game, leading the player to ultimately experience a form of perpetrator trauma (Smethurst & Craps, 2015). This guilty feeling culminates

toward the end of the game, when the player realizes that the game's apparent antagonist was dead all that time, making this whole journey truly meaningless. According to Smethurst, *Spec Ops* lures the player into an empathic relationship with Walker, pushing them to "put [their] hands on the trigger with him" (Rose, 1998, p. 50, as cited in Smethurst, 2017, p. 201) without offering them anything to appease their cognitive dissonance (2015b, p. 15).

A last contribution worth mentioning is that of Souvik Mukherjee and Jenna Pitchford, entitled "Shall We Kill the Pixel Soldier?" (2010). Drawing on the *DSM-R-III*'s (APA, 1987) definition of trauma as something that falls "outside the range of usual human experience" (p. 250), Mukherjee and Pitchford argue that the player of military shooters like *Call of Duty 4: Modern Warfare* (Infinity Ward, 2007) can experience some of the symptoms of war trauma in a milder form, including disorientation, tension, fear of injury, and pressure to protect their teammates. As they note, the player of *Call of Duty 4* moves at a rather slow pace to ensure their firing accuracy, thus mirroring how it feels to be a patrol in modern warfare. James Ash (2013) adds that in order to perform well, the player of *Call of Duty 4* must open their body to visual and auditory feedback, concentrate, and be ready to pick out any relevant detail from their environment, hence putting themselves in a position of affective vulnerability. The game thus creates an intense, draining space that captivates the player and leads to fatigue and overexertion (Ash, 2013), which arguably facilitates the transmission of trauma.

While Mukherjee and Pitchford (2010) nicely point out that some military shooters could induce trauma in the player, their conceptualization of trauma as an extraordinary experience is rather broad and raises one main question: isn't playing video games in many instances something that falls "outside the range of usual human experience" (APA, 1987, p. 250), yet does not generate trauma? When I play *Diablo II* (Blizzard North, 2000), I experience how it might feel to be a sorceress in a dark fantasy universe and to cast fire, ice, and lightning; whereas when I play *Octodad: Dadliest Catch* (Young Horses, 2014), I experience how it might feel to be a clumsy secret father octopus living in a world filled with humans. While all the works presented in this section have examined in their respective ways how trauma has been represented in video games and how games can simulate (or even transmit) trauma, a detailed conceptualization of videoludic trauma appears to be missing. This is what I shall propose in the next section.

3.3. Toward a Conceptualization of Videoludic Trauma

Rationally, I knew this was absurd. Afterwards I reminded myself that these were virtual civilians, not real ones; and besides, the game is programmed in such a way that if you want to finish it, you have to use the white phosphorus. . . . But none of this rationalisation changed how horrified I had felt, along with the protagonist, on discovering the charred bodies that he/we/I had produced. If trauma studies has taught me one thing, it is that fictional events can have real effects on one's outlook and ethics. I have had experiences with—or within?—fiction that have stayed with me for years, to the point that I occasionally have to remind myself that they did not "really" happen to me. . . . The fact that I felt the need to rationalise my guilt over Spec Ops: The Line in the first place demonstrated just how "real" of an effect the game had had on me. (Smethurst, 2015b, p. viii, emphasis in the original)

Playing *Spec Ops* was a traumatic experience for Smethurst (2015b), to the point that we could wonder why someone would want to play such a game. Smethurst mentions how horrified she was, how she tried to rationalize her guilt, and highlights that the tragic events that took place in the game had lasting effects on her. Smethurst's description is in line with the definition of videoludic trauma I have briefly introduced in Chapter 1. As a reminder, I defined videoludic trauma as a "disruptive experience [induced by a video game] that impacts the [player's] emotional organization and perception of the external world" (drawing on Balaev, 2018, p. 360). A few questions come to mind when we reflect more deeply on this concept: how does the player get traumatized? Is it by playing a game that is not suitable for them? Are some games more likely to transmit trauma to the player than others? Is it all a matter of perspective and interpretation?

In the following pages, I take an aesthetic stance to conceptualize videoludic trauma and seek to distance myself from the narrow, black-or-white definitions of trauma often proposed by clinical psychology. I start from the premise that all sad or tragic events have some shades of trauma—from thinking about death or illness, to suffering from loneliness or wondering about our future. I reflect on videoludic trauma by adopting a dual stance. On the one hand, I recognize that games affect people differently and that one's background and life trajectory, level of tolerance, and previous experiences with games impact on the way they experience videoludic trauma (if they experience it at all). On the other hand, I stress that videoludic trauma is also part of a design philosophy and is usually the result of a desire to generate deep emotions and break with certain social norms or genre conventions. Games that generate trauma can be situated within the larger corpus of transgressive games, defined by Mortensen and Jørgensen (2020) as games that challenge the

sensibility of the player, create a sense of discomfort, and put into question the player's willingness to play or keep playing these games (pp. 27, 80). Narratives that address dark topics such as suicide, depression, loneliness, or war have arguably more chances to produce negative feelings in the player and to induce trauma.

In Writing History, Writing Trauma (2001), LaCapra identifies two types of response to trauma narratives: empathic unsettlement and unchecked identification. According to LaCapra, empathic unsettlement happens when the reader feels empathy for the trauma survivor by bringing in their own experiences and points of view, thereby avoiding to take the place of the survivor and relive their trauma (pp. 40–41, 78). On the other hand, unchecked identification occurs when the reader identifies with the survivor so strongly that there is a confusion between the self and the other; the reader ends up incorporating in themselves the traumatic experience without critically reflecting on it, leading in some instances to the transmission of a secondary trauma (LaCapra, 2001, p. 28). LaCapra creates a clear hierarchy between these two responses and argues that empathic unsettlement is both the response the reader should seek to experience and the response the writer should seek to evoke in the reader (p. 41).

Although LaCapra's (2001) reading strategies might be useful for researchers who work on trauma and know beforehand what to expect from certain trauma narratives, such a dichotomy hardly represents the nuanced aesthetic experience most people have with video games and other media. As highlighted by Mortensen and Jørgensen (2020), we tend to accept uncomfortable or even taboo content when we encounter it in a game because we see it as part of an aesthetic experience (p. 4). Our default reaction is to engage with transgressive games, to the point sometimes of lowering our defence mechanisms, "opening" our bodies, and putting ourselves in a vulnerable position to fully experience what these games have to offer us, which in turn facilitates the transmission of trauma. While we know that some games can overwhelm us, we might hope that they will be aweinspiring, allow us to experience the sublime, and ultimately produce feelings that will surpass the negative feelings we first come to experience (Mortensen & Jørgensen, 2020, p. 4). This is in line with Freud's (1920/1961) reality principle, which holds that "the postponement of satisfaction . . . and the temporary toleration of unpleasure [can be] a step on the long indirect road to pleasure" (p. 4).

In addition, while we tend to think of play as something safe because of the possibility we have to stop playing a game that would become too disturbing, I would highlight that one might realize that a game goes too far only once they have already experienced trauma. A game like *Spec Ops* that aims to shock and generate guilt pushes the player to make highly questionable decisions and only let them see the disastrous consequences of their actions once it is too late. A player might also find a game segment to be profoundly transgressive only after thinking about it more deeply (Mortensen & Jørgensen, 2020, p. 139), following what could be interpreted as a period of latency.²⁰

As Smethurst (2015b, p. 67) observes, LaCapra's (2001) concerns about over-identification with traumatized characters are somewhat reminiscent of the moral panics that have troubled video games since the mid-1970s, including the fear that players would so strongly identify with the protagonists of violent games that they would reproduce their behaviour and become more violent (Donovan, 2010, pp. 225–235; Karlsen, 2015; Kocurek, 2012). LaCapra's stance contrasts with the discourse of many game designers who seek to produce an immersive experience and encourage players to identify with the game characters and the game environment (Smethurst, 2015b, p. 14). Of particular interest to my conceptualization of trauma is how this identification process has been theorized in Nordic live action role-playing (larp), which is known for its games specifically designed to generate *bleed*.

Following Sarah Lynne Bowman (2013), bleed consists in "the blurring of the emotions, thoughts, physical state, and relationship dynamics of the player and the character" (4:05), leading to a reduction of the boundary between reality and fiction. This interaction is referred to as *bleed in*, when the life of the player influences the game, and *bleed out*, when the game influences the life of the player (Montola, 2010). Bleed leads to a spillover between two frames of reference, with feelings like guilt, animosity, friendship, or love moving from one frame to another, and at times confusing the player (Bowman, 2013). As highlighted by Markus Montola (2010), bleed play is a form of *brink play* (Poremba, 2007), i.e., a forbidden or taboo game in which the magic circle is used as an alibi to transgress implicit social rules; a game that "embrace[s] the contested space at the boundary of games and life—pairing 'it's just a game' with a knowing wink" (Poremba, 2007, p. 772). For Montola (2010), it is useful to think of play as surrounded by an *interaction membrane* (Goffman, 1961, pp. 58–59) through which bleed in and bleed out can occur, and to see bleed play as a negotiation between safe and raw experiences. Bleed design is

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²⁰ Similarly, a game segment that is disturbing to the player might end up being less shocking than initially thought (Mortensen & Jørgensen, 2020, p. 139).

a powerful way to weaken the protective membrane of play, explore deep emotions, produce intense experiences, and make the play feel more dangerous (Montola, 2011).

For some players, bleed experiences can be very positive, notably when their emotions are synchronized with the emotions of the character, leading to strong moments of catharsis (Bowman, 2015; Kemper, 2017). During these "golden moments," as players often call them, the game offers the player an alibi to express emotions they might otherwise repress or avoid sharing with others (Bowman, 2015). In the case of extreme larp more specifically, Heidi Hopeametsä (2008) and Markus Montola (2010) have argued that games that produce an intense experience of horror and tragedy, sometimes leading players to cry and experience physiological stress reactions, can generate a positive negative experience, i.e., an experience that is not fun nor pleasurable, but that is still meaningful and provides in retrospect some satisfaction to the player. This is in line with Solomon's (2003/2004) work on real horror, in which he concludes that opening up to the horrors and contingencies of life and confronting them may lead to a certain satisfaction for people who rarely experience real horror as part of their "normal" lives. As Ida Toft and Sabine Harrer (2020) summarize, bleed overall can lead to a feeling of growth and selfimprovement (Beltrán, 2013; Montola, 2010), to new insights about oneself (Brown, 2012), or to a form of political liberation (Kemper, 2017).

While experiencing a form of art-trauma (to transpose Carroll's [1990] concept of art-horror) is certainly positive for some players, Anne Rothe (2011) has raised some concerns regarding trauma narratives and the "appropriation of the pain of others" (p. 20). Working more specifically on Holocaust culture in the United States, Rothe has rightfully criticized the fantasies of witnessing trauma, feeling the horror, and presenting secondary trauma as analogous to the trauma of survivors (pp. 20–21, 162). She condemns a culture and an industry fascinated by pain and suffering, and stresses that it is "empirically unsustainable" and "epistemologically impossible" to experience in an unmediated way the trauma of someone else in its totality (Rothe, 2011, p. 162).

A similar critique could be addressed to games specifically designed to generate bleed and trauma, and that somewhat push the player to play at being traumatized. This phenomenon has notably been documented in extreme larps, with players who could be seen as bleed hunters, looking forward to being hit by a game. These players generally want to make a game as difficult and intense as possible and tend to see games that deal with

trauma as a form of challenge (see Montola, 2010), transforming trauma into entertainment and leading to a form of grief tourism.²¹ In the case of video games, we could think of grief tourism in relation to players who purposefully seek to be hit by distressing games like *Papers, Please* (3909 LLC, 2013), *This War of Mine* (11 bits studio, 2014), and *That Dragon, Cancer* (Numinous Games, 2016), or by some of the games analyzed in the previous section. Interestingly, this willingness to play with trauma and to actively seek out that kind of hard experience might explain why the *DSM-5* does not include electronic media in the possible means of being traumatized. The *DSM-5* seems to imply that trauma cannot be an experience that someone purposely seeks.

Rothe's (2011) concerns are worth keeping in mind when theorizing trauma; that said, I believe that videoludic trauma should not be seen as a trauma that the player absorbs from the game protagonist, and therefore appropriates, but as a trauma that the game as a whole transmits to the player. As Smethurst (2015a) writes, the trauma experienced by the player in *Limbo* is hardly the trauma of the game protagonist. In fact, the protagonist does not seem to experience any trauma in that game. The trauma comes from the general atmosphere of the game and the kind of response the game generates in the player (hypervigilance, oversensitivity; Smethurst, 2015a). The idea that trauma could be transmitted from a fictive character to the player seems especially appropriate to theorize larp, where the player interiorizes the emotions and the personality of the fictive character and where the notion of performance and the relation to the body are particularly strong.

The situation is different with video games, and the concept of bleed must be interpreted in a broader sense: in video games, bleed does not blur the boundary between the life of the player and that of the fictive character, but between the life of the player and what happens in the game world at large. Games open up a "new sensorium" and afford the player a "specific experience of spatiality, temporality, speed, graphics, audio, and procedural activity" (Jagoda, 2013, p. 748). As Newman (2002) suggests, when playing video games, the player might not see themselves as the character they play but might

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²¹ Although Montola (2010) does not explore this phenomenon directly, the answers of some of his informants who have played *Gang Rape* (Wrigstad, 2008) support the idea of grief tourism. In this extreme larp, a group of players (the Rapists) take turn at describing how they are raping another player (the Victim), who then describes the Rapists' thoughts and feelings during the rape. In their interviews, some players frame their desire to play one role more than another in terms of challenge, while two players mention having been disappointed because the game was not intense enough, with one wanting to play the game again and make it harder.

rather relate to the game as a whole, to "the sum of every force and influence that comprises the game" ("Thinking," para. 2), or as Smethurst (2015b) puts it, to "all of the game's characters, aesthetics, mechanics, goals, and events" (p. 76). In the case of horror video games, game designers use all the means at their disposal (narrative, visuals, sound-track, artificial intelligence, etc.) to create a specific atmosphere and generate fear and anxiety; the player is affected by the entire game. While I do not question the fact that trauma can be transmitted from one person to another, I believe that the aesthetic experience that results from playing video games needs to be examined from a more holistic perspective.

Digging deeper into the concept of videoludic trauma, I reflect in the remainder of this section on what I call impactful trauma and hurtful trauma. Building on Jørgensen's (2018) concept of positive discomfort, I define impactful trauma as a form of trauma that is valuable to the game experience, provokes reflection, and has a narrative purpose. Impactful trauma is the result of game content that is disturbing and even distressing for the player, but with which the player is still willing to engage. Building on Carroll's (1990) concept of art-horror, we could see this trauma as a form of art-trauma. On the other hand, hurtful trauma is a form of impactful trauma that has gone too far. Like impactful trauma, hurtful trauma is well crafted in the gameplay and the game narrative, but it overwhelms the player, does them violence, and leaves them with wounds that take time to heal. Hurtful trauma can be put in parallel with real horror and might be an attempt by game designers to reproduce its mere titillation. Whereas impactful trauma falls within what Mortensen and Jørgensen (2020) have described as transgressive aesthetics, i.e., "an artistic practice of intentional disturbance" that "mitigate[s] transgression and increase[s] our threshold for tolerance" (pp. 13, 194), hurtful trauma occurs when boundaries are overstepped and when a game segment challenges what the player is willing to endure and engage with; it is thus closer to Mortensen and Jørgensen's description of a profound transgression (pp. 4, 194). Hurtful trauma arguably has more transformative power than impactful trauma and might provide a better understanding of a certain situation, but it becomes costly for the player on the long term. Hurtful trauma is more intrusive and stays with the player. It can hardly be healed by a cathartic experience; in fact, catharsis does not seem to be possible due to its presence. Hurtful trauma is so negative that players usually do not want to experience such feelings (in line with Solomon's [2003/2004] real horror). The fact that players generally play games that generate such experiences only once (or stop engaging with these games without finish them) supports this claim. While

hurtful trauma can be a one-time experience that someone seeks because of the thrill it generates, constantly seeking hurtful trauma can be seen as a form of *bad play*, described by David Myers (2010) as "play that is threatening, risky, or otherwise *harmful* to the self and others" (p. 17, emphasis in the original).²²

Drawing on Mihály Csíkszentmihályi's (1990/2008) foundational theory of flow, I wish to introduce here the concept of horror flow and use it to contrast my experience playing Cry of Fear with that of playing other survival horror games. According to Csíkszentmihályi, flow occurs in situations where there is a "perfect" balance between someone's skills and the challenges at hand, leading to an optimal experience (p. 71). Challenges that are too high for the skills of the participant will lead to frustration and anxiety, and challenges that are too low will lead to boredom; in contrast, a fine balance between skills and challenges creates the *flow channel*, where the participant is deeply concentrated on the activity for its own sake and loses the sense of time and space (Csíkszentmihályi, 1990/2008, pp. 71, 74–75). Even though flow was originally theorized to talk about activities such as rock climbing, making music, or playing chess, this concept has since that time been used to describe the experience of playing video games and is often a goal in game design (e.g., Baron, 2012; Chen, 2007). According to flow theory, a game should get more challenging as the player gains skills. Flow happens in games that belong to different genres and subgenres, and Mortensen and Jørgensen (2020) note that flow is influenced by the emotions of the player, especially emotions that are strongly felt (p. 126).

In the case of horror video games, I would highlight that flow might be better understood in relation to anxiety and fear, two emotions strongly felt by the player when playing these games. The balance between challenges and skills influences the experience of the player, but two elements that might have an even greater importance are the energy the player has at their disposal and the frightening level of a game. If the player is constantly frightened, playing the game will ask them to invest a lot of energy and will become quickly draining, and if the player is not frightened enough, the game will lose its generic effects and will not allow for the expected experience. *Horror flow* happens when there is a fine balance between the player's energy and the frightening elements of the game. In the *horror flow channel*, the player is anxious and frightened while still being able to play the game without becoming too easily exhausted (fear is bearable) and usually gets

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²² In Myers's (2010) work, bad play also includes play that is against the rules (p. 17).

some satisfaction from this experience. The feeling here is comparable to that of flow in the sense that the player is absorbed by the game, but the emotions felt are intimately related to the world of horror video games. I would argue that in the case of *Cry of Fear*, the player never reaches the state of horror flow because they are overstimulated.

To summarize, my goal here was not to classify games based on the "type" of trauma they generate, but to introduce some vocabulary that can help us to talk about our traumatic experiences with video games. These experiences are deeply personal, and what generates impactful trauma for someone might lead to hurtful trauma for someone else. In my case, games like Heavy Rain (Quantic Dream, 2010), Beyond, and especially Papers, Please, in which I played the tragic story of an immigration officer stuck in the dystopic country of Arstotzka, led me to experience impactful trauma. On the other hand, the trauma I experienced while playing Cry of Fear was at times hurtful. I see the experience of videoludic trauma as something fluid, a continuum that can be analyzed, in the case of horror games, through the concept of horror flow. Overwhelming amount of horror and shocks that uses a wide register of fear- and anxiety-inducing tactics will be "too much" for the player to contemplate the game as an aesthetic object. In these cases, the player does not reach the state of horror flow, and a videoludic trauma that was impactful and relatively safe because it was first and foremost an aesthetic experience risks becoming hurtful and falling within the more common-sense understanding of trauma as something harmful with lasting consequences. I will further illustrate my point in Chapter 5, where I will use the concept of horror flow to structure my analysis of Cry of Fear. But before moving to this chapter, an overview of the methodology used for this analysis is necessary.

4 METHODOLOGY AND DATA COLLECTION

So games are a strange medium, where the communication takes place as a constant cycle of players making sense of the game, figuring out what they want to do, and seeing what happens. It is a medium that, by necessity, establishes a dialogue between the game and the players, and amongst players. (Fernández-Vara, 2015, p. 8)

As Clara Fernández-Vara stresses in this quote, it is crucial when we analyze video games to take into consideration the dynamic relationship between the game and the player. In the case of this thesis, taking into account this fundamental dynamic allowed for a better understanding of the player's aesthetic experience of trauma and of *Cry of Fear* itself. In the next pages, I introduce the two reading techniques that inform my analysis of *Cry of Fear*. Then, I turn to the data collection process and highlight some of the challenges of working on a sensitive topic like trauma.

4.1. Close Reading and Transactional Theory

My research uses the tools of close reading and transactional theory to analyze my own playthrough of *Cry of Fear*. While close reading was popularized by New Criticism around the 1940s and was especially common in literary studies in the Anglosphere, close reading is now widely used in game studies. Close reading consists in the careful and sustained analysis of a text. As noted by Jim Bizzocchi and Theresa Tanenbaum (2011), it posits that reading is a complex process during which "contingent meaning" is created from "potential meaning" through exploration, meaning-making, and interpretation (p. 291). It builds on the idea that new meanings can constantly be found and that reading is a cycle of discovery and rediscovery, i.e., a process rather than a product (Bizzocchi & Tanenbaum, 2011). Close reading calls attention to the particular over the general and to the personal reading of a game by the player.

Close reading as theorized by Bizzocchi and Tanenbaum (2011) has the advantage of recognizing the specificities of video games and the central role of the medium in the experience it communicates (following McLuhan, 1995). It is interested in the design of games, and the pleasures and feelings afforded by games (e.g., imagination, immersion, flow). It is a call to not only read games as texts, but to also play games and engage with them intellectually, emotionally, and kinesthetically in a way that is reminiscent of Ndali-

anis's (2012) holistic take on the sensorium. In addition, close reading allows the researcher to pay attention to the *dual structure of games*, i.e., the *core* (the gameplay) and the *shell* (the symbolic representation), and the influence they have on each other (Mäyrä, 2008, pp. 17–18). Although representation and ideology might seem secondary and hidden by the gameplay, they can emerge through critical thinking, and this is what close reading encourages the player-researcher to do.

On the other hand, transactional theory emphasizes the relationship between the reader and the text. According to Louise Rosenblatt (1986; see also Rosenblatt, 1978), the meaning of a text does not lie in the text nor in the reader, but in the exchange (the transaction) between the reader and the text; both mutually influence each other. For Rosenblatt, "reading is a transactional process that goes on between a particular reader and a particular text at a particular time, and under particular circumstances" (1986, p. 123). Each reader brings into the reading act their own backgrounds, emotions, knowledge, and expectations, and therefore, the meaning of a text varies with the reader (Rosenblatt, 1986). Rosenblatt proposes to think about meaning-making in relation to language and word sense. Drawing on Lev Vygotsky (1934/1962), she notes that the sense of a word is not only its public, socially accepted, and lexical meaning, but also "the sum of all the psychological events aroused in our consciousness by the word" (Vygotsky, 1934/1962, p. 8), or in Rosenblatt's own terms, the "private, kinaesthetic, affective, [and] cognitive colorings" (1986, p. 123). Borrowing William James's (1890/1950, p. 242) concept of selective attention, Rosenblatt also highlights that the reading act is influenced by what the reader consciously or unconsciously pays attention to in a text (among all the elements offered to them) and the impact of this selective process on meaning-making.

Nevertheless, it should be noted that the goal of transactional theory is not to centre on isolated readers. It encourages the reader to pay as much attention to the details of the text as to their own responses to it (Rosenblatt, 1986), and therefore, allows them to situate the knowledge that emerges from their readings in relation to all other possible readings. Although Rosenblatt's (1978, 1986) transactional theory was originally developed to study literature, I see the possibility of a dialogue between this theory and the work of Miguel Sicart (2011) and Stephanie Jennings (2018) on the potentialities of play. Sicart recognizes that games in themselves contain arguments, but stresses that play also includes the values, the politics, and the body of the player. Jennings more explicitly talks

about an epistemological theory of *situated play* and sees play as "an appropriative activity that is situated in subjectivity, identity, and experience" (2018, p. 160). Both authors ultimately recognize the expressive and personal nature of play, and the importance of taking into account how players generate knowledge, come to adopt a certain play style, and incorporate their subjectivity into the playing act.

Combined, close reading and transactional theory allow me to locate myself as a player in the game I study. This approach pushes me to understand my reading of *Cry of Fear* within its own reading context, in relation to my own background and the lens I use to read this game. It recognizes the importance of my reading but at the same time acknowledges that my reading is just one among many. It accommodates my subjectivity and recognizes my agency, but also pushes me to create a dialogue between my own reading and previous scholarship on horror video games and trauma. The strength of this approach thus lies in its potential to let multiple voices emerge from a text (following Barthes, 1970), allowing the player-reader to become an active producer of interpretations, while also providing them with tools to analyze video games and making the use of a comparative approach possible.

4.2. Data Collection and Self-Care

Data for this research was collected by playing *Cry of Fear* and writing a game diary. I recorded my playthrough using XSplit Gamecaster (SplitmediaLabs, 2012), which allowed me to later consult videos of specific segments of the game and facilitated my analysis.

In their work on close reading, Bizzocchi and Tanenbaum (2011, 2012) encourage the player-researcher to take a dual stance while playing a game. According to them, the player-researcher must oscillate between (1) enacting the play of a "naïve" player, i.e., playing the game without preconceptions, immersing themselves in the game, going through the pleasures and frustrations of the gameplay as it unfolds, and "commit[ting] to a complete state of immediacy" with "unconditional surrender to the experience" (2011, p. 8); and (2) taking the stance of a researcher, i.e., playing the game in a state of hypermediation, distancing themselves from the gameplay experience, paying close attention to the design choices, and seeking to faithfully record important details of the game. Oscillating between these two states allows the player-researcher to produce close observations and insights while still engaging with the game in a way that is true to the

gameplay experience (Bizzocchi & Tanenbaum, 2011). Since Bizzocchi and Tanenbaum's approach was designed for scholars studying games they have already played, and since I had never really played *Cry of Fear*²³ (though I had watched and read a few reviews of the game), I slightly modified the authors' dual stance. Rather than *enacting* the play of someone encountering the game for the first time, I directly played as a "naïve" player and oscillated between this stance and that of the researcher seeking to analyze the game and its various components. My approach was also in line with Frans Mäyrä's concept of *analytical play*, which he defines as a "more 'utilitarian' playing [that] involves making notes and relating games to wider contexts of historical, conceptual and social range of thoughts that constitutes game studies and game cultures in their reflexive forms" (p. 165).

I wrote in my game diary at the end of each of my gameplay session. Although game diaries have been used by a few researchers to document their gameplay experiences (e.g., Jordan, 2014; Witkowski, 2018), to my knowledge, their use has not been formally theorized in games studies. I will briefly remedy this shortcoming by summarizing my use of a game diary for this research and what it helped me to accomplish. My game diary was introspective in nature. It built on Rosenblatt's (1986) call to adopt a predominantly aesthetic stance and pay attention to what is being lived through during the reading act (in this case, during the playing act), ²⁴ and Jonne Arjoranta's (2015) real-time hermeneutics (adapted from Aarseth, 2003), according to which the player interprets and makes sense of a game as they are playing it and as the game gives them feedback. I usually wrote between 600 and 1000 words at the end of each of my gameplay session, with the goal of documenting meaningful elements and key moments in the game that could later be analyzed in more detail (e.g., symbolism of certain monsters, game characters, story, game mechanics, genre conventions). I would generally alternate between short passages in which I summarized my gameplay session (mostly in relation to the game narrative), and longer ones in which I started interpreting the game or reflected on my feelings and bodily experiences, mostly in relation to frightening and horrifying moments. The first function of my game diary was thus to act as a data collection tool.

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²³ As mentioned in the introduction, I had played the game a little (roughly 30 minutes). This was not long enough to allow me to really experience the game and understand its narrative and mechanics.

²⁴ Rosenblatt (1986) contrasts this stance with a *predominantly efferent stance*, which centres on what needs to be retained after the reading act. Interestingly, she notes that a predominantly efferent stance is what is generally encouraged at school (from elementary school to the university).

As stressed by Mortensen and Jørgensen (2020), it would be a mistake to assume that games and play are necessarily "non-serious, fun, safe, and with little consequence outside itself" (p. 3); on the contrary, games and play can be subversive, unsafe, and distressing. A few questions thus come to mind when conducting research on a topic like trauma: how much does the researcher expect from themselves? How do they know when a game goes too far and crosses the line they can endure? Can they really know beforehand the feelings they might go through and what such research entails? How can they make an informed choice in such circumstances? While these questions are all worth reflecting on, they are rather hard to answer. Working on a topic like trauma is difficult because we do not know before actually starting to play a game, and sometimes even finishing it, what it might trigger in us. It is something we can only assess progressively, little by little. For me, working on trauma was a messy, confusing, and disorienting experience.

My game diary helped me to clarify my thoughts and to put into words what I went through during this process. Considering the graphic content of Cry of Fear, the heavy themes it deals with, and the idea at the core of this research (i.e., that a form of trauma can be transmitted from a video game to the player), my game diary helped me unpack the negative feelings I came to experience while playing the game. It acted as a mitigation technique and allowed me to play the game in a safer way. As Mortensen and Jørgensen (2020) note in their study on transgressive games, mitigation techniques allow players to keep playing a game that challenges their sensibilities, offering them ways to reframe its transgressive content (p. 202). For example, some players might leave the game for a short amount of time, others might laugh and read the game as absurd or exaggerated, while yet others might enter a gamer mode and pay more attention to their own performance than the transgressive content of the game (Mortensen & Jørgensen, 2020, pp. 111, 116–117). In the context of this research, mitigation techniques were not used during but immediately after each of my gameplay session to avoid directly influencing my gameplay experience. This was more in line with the play style I usually adopt when I play horror video games, allowing me to get fully immersed in the game, to put myself in a vulnerable position and "lay [my] body on the line" (Crane, 1994, p. 37), and to ultimately appreciate the game for what it was, with all its disturbing elements. My game diary thus acted as a form of debrief and helped me work through my gameplay experience. As Antti Saari and John Mullen (2020) interestingly write, "working through" can be understood here as a "direct confrontation, naming and being with, rather than avoiding, suppressing or even trying to 'solve' anxiety" (or other feelings and emotions; p. 1473). To further ensure my well-being during this research, I played the game little by little and limited each of my gameplay session to a maximum of 90 minutes per day, with days (and even months) off in-between.

It should be noted that I had previous experience playing horror video games and watching horror films, and had been exposed to similar hard aesthetic experiences—though not as extreme. This influenced my gameplay experience, and more specifically how I experienced videoludic trauma. Mortensen and Jørgensen (2020) remind us that playing horror video games is an "acquired taste" (p. 77), whereas Kendall Walton (1970) stresses that one needs to be familiar with the genre a work of art represents in order to respond to it. Exposure to media violence can also lead to a degree of desensitization (Brockmyer, 2015; Funk et al., 2004; Krahé et al., 2011), and familiarity with the horror genre makes it more predicable. That said, *Cry of Fear* still affected me strongly, and I do not think I was desensitized to this game; this might be particularly telling. My analysis is not only that of a researcher but also that of an aficionado of the horror genre (someone with "horror literacy") who was destabilized by how *Cry of Fear* reinterprets the conventions of the survival horror subgenre to frighten and horrify the player. It starts from the premise that feelings and personal experiences can be valuable sources of knowledge and recognizes the subjective nature of transgressivity.

Lastly, I consulted player reviews of *Cry of Fear* on Steam, with a specific attention to how players classified the game in terms of genre. The selected comments appeared in Chapter 2 (section 2.3.) and indirectly informed my close reading of *Cry of Fear* in the following chapter. These comments are not representative of the whole community of *Cry of Fear*; yet I believe they provide an interesting entry point to think about genre conventions and the definition of the survival horror subgenre. Acknowledging the influence of these reviews on my own understanding of *Cry of Fear*, I interpreted them as *paratexts*, defined by Gérard Genette (1987/1997) as

a zone between text and off-text, a zone not only of transition but also of *transaction*: a privileged place of a pragmatics and a strategy, of an influence on the public, an influence that—whether well or poorly understood and achieved—is at the services of a better reception for the text and more pertinent reading of it. ²⁵ (p. 2, emphasis in the original)

the original).

²⁵ "entre texte et hors-texte, une zone non seulement de transition, mais de *transaction*: lieu privilégié d'une pragmatique et d'une stratégie, d'une action sur le public au service, bien ou mal compris et accompli, d'un meilleur accueil du texte et d'une lecture plus pertinente" (Genette, 1987, p. 8, emphasis in

In other words, I considered these reviews as texts surrounding *Cry of Fear* that shaped my interpretation of the game. Considering the public nature of these reviews, the absence of sensitive information, and to avoid losing information and interesting turns of phrase, I chose to quote parts of them rather than paraphrase them. Following on from this overview of my methodology, and keeping in mind the theoretical framework presented in Chapter 2 and 3, the following chapter proposes a detailed analysis of *Cry of Fear*.

5 VIDEOLUDIC TRAUMA IN CRY OF FEAR

I've always felt alone my whole life, for as long as I can remember. I don't know if I like it... or if I'm just used to it, but I do know this: Being lonely does things to you, and feeling shit and bitter and angry all the time just... eats away at you.

—Simon Henriksson in *Cry of Fear*

This chapter presents a close reading of *Cry of Fear*. My analysis is structured around the concept of horror flow and the idea that *Cry of Fear* explores the sensitive boundary between impactful trauma and hurtful trauma, tempting players who are drawn toward "extreme horror" but simultaneously putting them in danger of being overwhelmed and getting hurt. The chapter starts with a summary of the game story, before moving toward an analysis of the trauma narrative, with an emphasis on the portrayal of Simon as a traumatized protagonist. It ends with four vignettes that each focuses on a specific aspect or moment in the game that had a strong impact on my gameplay experience and led me to experience hurtful trauma.

5.1. Introducing Cry of Fear

Set in a gloomy Sweden, *Cry of Fear* follows the story of Simon Henriksson, a 19-year-old man who wakes up in an alley after a man voluntarily drove on him with his car. As the player takes control of the character, Simon receives a text message from his mother, asking him to get home. Simon starts his journey back home but is attacked by a monster (and numerous others throughout the game) and stabs it to death out of self-defence. He tries to call the police, but his attempt is unsuccessful. As Simon resumes his journey, he receives a text message from a stranger asking for help in an apartment building nearby. Trying to find the apartment of the sender, Simon ends up exploring the whole building and discovers the disturbing "secret notes" and photos of a pedophile and serial killer. Simon finally reaches the apartment of the stranger only to find him dead in a bathtub full of blood. He decides to leave the building but ends up on the bottom floor, where he meets the first boss of the game. After defeating the monster, Simon passes out.

Upon waking, Simon briefly meets Doctor Purnell, a man wearing a gas mask. "Relax! I'm not one of them," he tells a suspicious Simon. "You shouldn't be here, it's very dangerous," he continues. Purnell tells Simon that he cannot trust him and leaves, locking the door behind him. Confused, Simon leaves the room through another door and continues

his journey back home. He faces many threats along the way, sees Purnell beheading someone, and is chased by Sawrunner, a recurrent enemy equipped with a chainsaw.

Reaching Waspet Gardens, Simon gets a phone call from Sophie, his friend and secret love interest, and meets her on the rooftop of a building nearby. "I don't... I don't understand anything now..." he tells her. "The whole fucking city is crawling with... monsters." But Sophie does not know what Simon is referring to. As the conversation goes on, Simon confesses his feelings to Sophie, who answers that she only likes him as a friend. She tells Simon that she wants "[to get] away from everything, away from all this" before suddenly jumping to her death. A new boss appears, Carcass, which Simon blames for Sophie's death. The player has the choice to fight Carcass or to escape through a window nearby.

Simon then heads to the subway station to take the train back home. Upon arriving at the station, he realizes that there are no train around and walks through the subway tunnel to reach another station, where he sees Purnell shooting a man before running away. Simon finally finds a train and leaves. "I mean, what is actually happening with me?" he tells himself while sitting in the train. "Could it be that I'm just hallucinating?" Simon thinks about the car accident, the monsters, his mother asking him to get home, the police he cannot reach, and Doctor Purnell. "Is all this just not real?" he continues. "I'm confused... I'm just... very confused. So many questions, but no answers."

In the middle of the train journey, the train is derailed. Simon's train car is on the brink of falling off a cliff, but Simon gets off the car just in time. Trying to find his way, Simon walks through a dark forest and ends up in front of a psychiatric hospital. There, he meets Doctor Purnell, who asks for a gun in exchange of giving him access to a gate. The player must decide between accepting or refusing his request. Both scenarios result in Purnell shooting Simon in the shoulder and giving him a key. After further exploring the hospital, Simon finds Purnell in the attic and engages in a gun fight with him, ending with the violent death of Purnell.

Simon leaves the psychiatric hospital, walks back through the forest, and crosses a lake in a rowboat. He finally gets to Kirkville, his hometown, and arrives in his neighbourhood. He reaches his house, expecting to find his mother, but the house is empty. Upon entering his room, Simon finds the book he has been writing as part of his therapy. At that point in the game, it is made clear that Simon is in a wheelchair following the car

accident, that Doctor Purnell is his counsellor, and that what has happened in the game so far is a projection of Simon's psyche and a metaphor for his book therapy. Depending on the player's previous decisions, one of the two following boss fights takes place:

- 1) If the player escaped from Carcass AND/OR refused to give the gun to Doctor Purnell, Simon shoots himself, and the player must face Sick Simon (i.e., the real Simon in a wheelchair) as the final boss. After defeating him, the player gets one of these three endings:
 - a. If the player escaped from Carcass AND refused to give the gun to Doctor Purnell, it is revealed that Simon spitefully murdered Sophie and Purnell, and then committed suicide. He left a suicide note in which he expresses his resentment and bitterness. "This is it. I have ended my miserable life," the note says. "Oh I wish I could've taken everybody with me." And the note concludes: "To whoever is reading this: I hope my dead body will haunt you forever. Have fun scraping my brains off the wall. / Fuck you." (This is the worst ending of the game.)
 - b. If the player defeated Carcass BUT refused to give the gun to Doctor Purnell, it is revealed that Simon murdered Purnell and then committed suicide (he spared Sophie). In his suicide note, he blames Purnell for his suicide, writing: "Ironic how that one person who was actually paid to help me only made it worse; gave me that one last push that was needed for me to end myself." He describes Sophie has "the only person who tried to help [him]" and wishes her the best. The note concludes: "This is my conclusion, this is my end, farewell everyone."
 - c. If the player escaped from Carcass BUT gave the gun to Doctor Purnell, it is revealed that Simon possessively murdered Sophie and then committed suicide (he spared Purnell). In his suicide note, he describes Purnell as "the only person that ever tried to help [him]" and apologizes to him. Talking about Sophie's murder, he writes: "I had to end my life, and I had to take my special person with me, Sophie... I wanted to keep her with me. I wanted to keep her all for myself." The note has the same conclusion as in Ending b.
- 2) If the player killed Carcass AND gave the gun to Doctor Purnell, Simon prepares to shoot himself but is interrupted by Book Simon, the final boss of the game (who is strangely similar to the game protagonist). For the first time in the game, the

player moves in a wheelchair, seemingly playing as Sick Simon. Once Book Simon is defeated, it is revealed that Simon was having an episode of psychosis and killed two police officers who came inside his apartment, arguably for a wellness check. Simon is committed to a psychiatric hospital for the rest of his life, where Doctor Purnell continues to be his counsellor—a service Simon is grateful for—and Sophie occasionally visits him. Simon finishes writing his book and mentions now being more in peace with himself. "I think this is a good time to close this book," he concludes. "It has changed my life forever. / The end." (This is the best ending of the game.)

Following on from this summary of *Cry of Fear*, the next section analyzes the construction of Simon as a traumatized protagonist, focusing specifically on the narrative and visual representation of trauma symptomatology.

5.2. Portrait of a Traumatized Protagonist: Simon

As Sonya Andermahr (2013) observes about literature,

the so-called trauma plot revolves around a delayed central secret whose revelation then retrospectively rewrites the narrative. The trauma novel typically presents a model of history which coincides with the idea of traumatic occlusion and the belated recovery of memory. (p. 15)

In *Cry of Fear*, the player plays as an able-bodied character who seemingly does not suffer from trauma. The player progressively discovers that Simon is paralyzed from the waist down following the hit-and-run and suffers from anxiety and depression. Throughout the game, Simon's trauma and disability are hinted to the player through flashbacks (cutscenes or pre-recorded monologues), nightmare sequences (i.e., game segments that take place in a dark, oppressive, and blood-soaked alternate reality), puzzles, and the symbolism of certain monsters. Part of the experience of *Cry of Fear* consists in searching for meaning in a seemingly meaningless world in a way that is reminiscent of the work of Camus (1942/1975) on the absurdity of existence. The player notably learns about Simon's true physical and psychological condition through Doctor Purnell, who describes Simon's trauma in two segments of the game that take the form of flashbacks:

He always goes back to the same place, day after day, just watching it like it was yesterday. Despite the fact that it causes him tremendous anxiety, he insists on returning. He insists it's for "therapeutic" reasons, but I remain skeptical. He doesn't respond well to questions about his personal life, and became

extremely angry when I mentioned events prior to what he insists on describing as "the black day." His school and home-life are no-go topics when discussing these feelings and anxieties. He told me the other day that he'd been seeing hallucinations, but couldn't give a clear description of what he'd been seeing.

Yes, he suffered severe spinal damage in the accident. It's a miracle he still retains upper body motion. From the waist down however, there is not nervous response at all, not to mention the mental trauma he's suffered. From what I can tell, Simon is a deeply disturbed individual who had mental problems even prior to the accident.

Based on Purnell's descriptions, Simon's mental health deteriorated following the hit-and-run. Simon constantly returns to the source of his trauma, in line with what Freud (1920/1961) has called a compulsion to repeat. While Simon already suffered from lone-liness before the incident, he has now become reclusive and spiteful of his life, and refuses to talk about anything too personal. The fact that he refers to the day of the incident as "the black day" highlights the profound impact it had (and still has) on him and how it created a clear rupture in his life.

Simon's disability is progressively revealed in the game through a certain fascination for his lower body parts. For example, in a nightmare sequence at the end of the second chapter, the player must go through corridors filled with dozens and dozens of hands trying to grab Simon's feet. The hands deal a lot of damage to the player, forcing them to run, jump, and self-inject morphine to avoid dying while hearing at the same time Simon's cries of pain. Following this powerful segment, Simon has a flashback of the scene where he was struck by a car. He sees the police cars and the truck of the firefighters with their flashing lights and hears the sirens and the police radio. Later, in the fifth chapter, Simon must find a rotten foot inside a train and put it in a briefcase in which it reads in red "I WANT MY FEET BACK" (see Figure 10). Game segments like these lead the player to experience a mix of sadness and uneasiness, and to feel at times overwhelmed. Ultimately, they reveal how deeply affected Simon is by his disability. These sequences often lead Simon to question his mental health and to emphasize his need to get help: "Damn it! What was that? Hallucinations? Am I going insane? Shit! I need to get some help, or at least... find my way back home." A priori, Simon's urge to get help can be explained by the fact that the city is filled with monsters, but once the trauma narrative revealed, this urge takes on a deeper meaning and becomes reflective of Simon's need for help to cope with his trauma.



Figure 10. Solving an eerie puzzle. Screenshot by the author.

Simon's trauma is best represented by Sawrunner, a very fast and practically invincible enemy who chases the player in five different segments of the game. Like trauma resurfaces every now and then, haunting trauma survivors, this monster constantly reappears, haunting the player with its disturbing appearance, distinctive scream, and the sound of its chainsaw. In *Beyond the Pleasure Principle* (1920/1961), Freud provides a fascinating conceptualization of trauma that can be put in parallel with Sawrunner:

We describe as "traumatic" any excitations from outside which are powerful enough to break through the protective shield. It seems to me that the concept of trauma necessarily implies a connection of this kind with a breach in an otherwise efficacious barrier against stimuli. Such an event as an external trauma is bound to provoke a disturbance on a large scale in the functioning of the organism's energy and to set in motion every possible defensive measure. There is no longer any possibility of preventing the mental apparatus from being flooded with large amounts of stimulus, and another problem arises instead—the problem of mastering the amounts of stimulus which have broken in and of binding them, in the psychical sense, so that they can then be disposed of. (pp. 23–24)

Following Freud's work, Sawrunner can be read as the intrusion from outside that blasts open the protective membrane of Simon's psyche—it first appears in a cutscene, violently destroying a door—causing Simon's traumatic memories to come back and leading to Simon's instant death if it manages to catch him. Sawrunner is overwhelming; the instant it appears, it becomes the player's centre of attention. The only viable option in the game is to run away from it, seeking to dispose of these harmful stimuli. Encounters with this

monster are extremely tense, often forcing the player to move quickly in maze-like environments while avoiding to find themselves in a dead end. The presence of this monster almost instantly triggers a feeling of panic in the player, somewhat representing Simon's anxiety issues.

Several monsters in Cry of Fear are symptomatic of Simon's trauma and can be seen as part of the environmental storytelling of the game (to draw on Jenkins, 2004), complementing the narrative cutscenes. As some authors have pointed out, the symbolism of monsters in horror video games can reveal information about the psyche and the inner demons of the game characters (Kirkland, 2015; Kuznetsova, 2017, pp. 113–114; Mackman, 2001). Writing about psychological horror, Isabella van Elferen (2015) notes that external horror often reveals the internal trauma of the game characters. Some monsters in Cry of Fear are reflective of Simon's struggles to come to term with his disability: the Crawler cannot use its legs and must crawl on the ground to attack the player (see Figure 11); one variation of the Slower is entangled in tendrils, tied to a wall, and hardly able to move; Sawer, the first boss of the game, can instantly kill Simon by slicing him at the waist, cutting off his legs from the rest of his body; and Carcass, the third boss of the game, is restrained to a chair, representing Simon's feeling of being trapped in a wheelchair (see Figure 12).²⁶ Other monsters can be read as a manifestation of Simon's depression and suicidal thoughts: the Drowned has the ability to push Simon to shoot himself (the player must left-click on the mouse several times to "resist the suicidal influence"); the Suicider kills itself when its pistol runs out of bullets or when the player gets too close; and the Hanger hangs itself above the player, falling on them and injuring them. Defeating each of these monsters can be seen as a procedural metaphor representing Simon's fight against his inner demons and showing how well Simon's book therapy is working. The fact that the player is given the choice to defeat or escape from Carcass but must absolutely defeat it in order to unlock the "good" ending is especially telling: Simon's inner demons must be defeated.

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²⁶ Carcass could also represent Sophie rejecting Simon.



Figure 11 and 12. In-game monster models of a Crawler (left) and Carcass (right). Images retrieved from *Cry of Fear Wiki*.

Throughout the game, it is heavily implied that Simon harmed himself or attempted suicide. Every time the player self-injects morphine to recover health, they can see cutting marks on Simon's left wrist. In the second chapter, the player must call a suicide hotline to get the code to open a door, whereas during a nightmare sequence in the fourth chapter, the player must walk on twisted corridors next to people suspended in cages, cutting their wrists or their legs with a knife. Lastly, a banner in the train at the beginning of the sixth chapter reads in Swedish: "SUICIDE / KILL YOURSELF LIKE HELL."27 As these examples show, references to suicide can be found every now and then in the game, as if lurking in the dark corners of Simon's mind. This suicide iconography is taxing on the long term, gives the player the impression that everyone around them wants to die (including the monsters), and creates a deep feeling of loneliness, and even emptiness. The player also encounters a few posters across the city talking about school-related anxiety or advertising for depression pills (see Figure 13). The environment of Cry of Fear is filled with clues about Simon's struggles and ultimately highlights his feeling of helplessness. The streets in the game are filled with broken police cars, and dialling 1-1-2 or 9-1-1 with Simon's phone results in hearing someone being murdered rather than getting any help. Most doors in the game are locked (the player will never be able to open them), which conveys the idea that Simon is stuck in a nightmare, with no way out.

²⁷ "SJÄLVMORD / MÖRDA DIG SJÄLV SOM FAN."



Figure 13. "The best cure to depression." Screenshot by the author.

Simon feels that the world is against him. This is strongly illustrated through his relationship with Doctor Purnell, who must be trusted to get the "good" ending (by giving him a gun), but who is framed as the main antagonist of the game. Purnell wears a gas mask—seemingly trying to avoid breathing the same air as his "toxic" patients—is hostile toward Simon, lies to him, describes him as a "deeply disturbed individual," and is seen murdering two men. Considering how Simon ends up perceiving Purnell in the game's "good" ending, it is likely that Purnell's behaviour in the game reflects how Simon initially perceived him. Interestingly, trusting Purnell and giving him the gun in the sixth chapter result in the permanent loss of a greater chunk of Simon's health bar (after being shot by Purnell) than if the player refuses to do so. This can be read as a metaphor for the costs of opening up to someone and how it causes greater pain in the short term but leads to a larger payoff in the long term (i.e., the possibility to get a "good" ending, with Simon avoiding suicide).

Intimately related to the game narrative about disability and depression is a larger reflection on the meaning of life and existential angst, as theorized by Camus in *The Myth of Sisyphus* (1942/1975). At the heart of Camus's work is a reflection on suicide—the most important philosophical problem according to Camus (p. 11) and a major theme in *Cry of Fear*—and whether it is a solution to counter the feeling that life is meaningless. Camus dismisses the viability of this option and argues instead that one must live fully and authentically in awareness of the absurd condition and constantly revolt against it to achieve freedom and give life a purpose. Revolt becomes a way to "transform into a rule of life

what was an invitation to death"²⁸ and to create meaning in an otherwise cold and silent universe (Camus, 1942/1975, p. 62). For Camus, revolt is

a constant confrontation between man and his own obscurity. It is an insistence upon an impossible transparency. It challenges the world anew every second. Just as danger provided man with the unique opportunity of seizing awareness, so metaphysical revolt extends awareness to the whole of experience. It is that constant presence of man in his own eyes. It is not aspiration, for it is devoid of hope. That revolt is the certainty of a crushing fate, without the resignation that ought to accompany it.²⁹ (1942/1975, pp. 53–54)

Revolt is situated within each one of us rather than within ideologies, Camus says, and when "spread out over the whole length of a life, it restores its majesty to that life" (1942/1975, p. 54).

In *Cry of Fear*, Simon's loneliness, anxiety, depression, and now his disability push him to question the value of life and contemplate suicide. Seeing that Simon has difficulties to open up, Purnell encourages him to write a book as part of a cognitive therapy. The book therapy and the events of the game can be read as Simon's revolt against his condition and his attempt to work through his trauma and cleanse his inner demons. Simon's revolt manifests through a profoundly violent and transgressive gameplay that leads the player to witness horrendous events (decapitations, suicides, murders). Most of these events occur when the player is off-line (i.e., in non-interreactive gameplay mode), leading them to focus on these graphic scenes and be particularly affected by them. Succeeding in this revolt by killing Carcass and trusting Purnell allows Simon to accept his condition (as shown in the "good" ending), whereas failing to do so pushes him to turn to violence in the real world (i.e., outside of his book), to kill himself and to murder at least one other character. In the "good" ending, Simon ultimately represents the Camusian absurd hero, accepting his condition while realizing how revolting spending the rest of his life in a wheelchair and in a psychiatric hospital is.

²⁸ "transforme en règle de vie ce qui était invitation à la mort" (Camus, 1942/2013, p. 291).

²⁹ "un confrontement perpétuel de l'homme et de sa propre obscurité. Elle est exigence d'une impossible transparence. Elle remet le monde en question à chacune de ses secondes. De même que le danger fournit à l'homme l'irremplaçable occasion de saisir, de même la révolte métaphysique étend la conscience tout le long de l'expérience. Elle est cette présence constante de l'homme à lui-même. Elle n'est pas aspiration, elle est sans espoir. Cette révolte n'est que l'assurance d'un destin écrasant, moins la résignation qui devrait l'accompagner" (Camus, 1942/2013, pp. 285-286).

³⁰ "étendue sur toute la longueur d'une existence, elle lui restitue sa grandeur" (Camus, 1942/2013, p. 286).

In short, the game narrative and the visual depiction of Simon's trauma play an important role in generating videoludic trauma in the player. Although they might not transmit trauma to the player in themselves, they consist in a strong foundation on top of which the gameplay takes place. The following section digs deeper into my own gameplay experience and analyzes it in relation to the conventions of the survival horror subgenre.

5.3. Traumatic Gameplay: Four Vignettes

A few researchers have highlighted the potential of subverting genre conventions to destabilize the player and create a meaningful gameplay experience. In particular, many scholars have analyzed how *Spec Ops* plays with the conventions of the military shooter to recreate perpetrator trauma (Smethurst, 2017), to generate a positive negative experience and push the player to reflect on the consequences of war (Mortensen & Jørgensen, 2020, p. 72), and to criticize a romantic and jingoistic depiction of war entangled in the military-entertainment complex (Keogh, 2013; Pötzsch, 2017). A similar phenomenon takes place in *Cry of Fear*: the game plays with the conventions of the survival horror to destabilize the player, create an intense space, and generate videoludic trauma.

As noted by Mortensen and Jørgensen (2020), each game genre respects different conventions, and what is seen as transgressive for a certain genre might not be seen as such in another one (p. 34). As they write:

players are rarely *offended* by horror games; even though the genre may include violent deaths, monstrous representations, and unspeakable terrors, these issues are conventions that are expected of the genre. Also, the situations of horror games . . . tend to be so far removed from our social reality that they can rarely be considered extraludic transgressivity. (Mortensen & Jørgensen, 2020, p. 77, emphasis in the original)

While this observation easily applies to horror games that deal with more conventional topics and that draw on popular culture and folklore (e.g., the zombie of *Resident Evil*, the ghosts and Shinto rituals of *Fatal Frame*, the Xenomorph of *Alien: Isolation*), this observation is more difficult to apply to horror games whose story centres on topics like trauma, sexual abuse, suicide, and mental health. The story of *Cry of Fear* is closer to our social reality, talks about the human condition, and deals with social taboos, "immers[ing] players in the hidden corners of their own mind, disclosing fears, thoughts, and traumas they had rather kept hidden" (van Elferen, 2015, p. 237). In so doing, *Cry of Fear* bridges the gap between reality and fiction, and can be understood in light of bleed. The player

comes to be traumatized because many of the themes explored in the game echo the real world, but also because they take part in the game's overstimulating environment, feel deeply lonely, and ultimately experience pain and despair. In the remainder of this chapter, I analyze through four vignettes key aspects or moments in the game that led me to experience hurtful trauma. I use the first person in segments that are more personal and related to my feelings and how I progressively made sense of the game (real-time hermeneutics), and the third person in segments that focus on formal aspects of the game.

5.3.1. Confusing Soundtrack and Absence of Forewarning

Writing about films, Carl Plantinga (2009) explains that music carries meaning and an affective charge that influences the experience of the spectator (p. 130). Music prefocuses or intensifies emotional responses, he says, and suggests the emotional valence of a scene (pp. 130, 134–135). In the case of video games, one can notably think of the calm musical theme of the save rooms in the *Resident Evil* series, which indicates to the player that they are in safety, or the stressful music that plays whenever Scissorman appears in *Clock Tower* and *Clock Tower 2*, making the scene more tense and informing the player of the presence of a threat. As Zach Whalen (2004) highlights, video games "rely on important cognitive associations between types of music and interpretations of causality, physicality and character" ("Conclusion," para. 3). Music ultimately helps the player to navigate the game space (Whalen, 2004).

Cry of Fear plays with this more conventional use of music, relying on a broken causality to veil aural cues and immerse the player into a universe of "un-knowledge" (Kromand, 2008, p. 18). For example, the third chapter of the game starts with a comforting music, giving the player the impression that they are safely exploring the city following a boss fight and a disturbing nightmare sequence. The player also gets this impression in the seventh chapter of the game, when they finally reach Simon's hometown and explore his peaceful and colourful neighbourhood while hearing birds singing. In both cases, it takes less than two minutes before the player gets attacked again: in the first case, the comforting music stops once the first monster, hidden behind a minivan, screams and attacks the player; in the second one, the birds keep singing despite the sudden presence of monsters. As Ekman and Lankoski (2009) explain, "sounds that evoke maximally contradictory evaluations can invoke a heightened sense of uncertainty and confusion by providing mixed signals" (p. 186). Cry of Fear displaces the "safety state/danger state binary" (Whalen, 2004, "Conclusion," para. 1) to confuse the player, leading them to interpret the

game cues in the wrong way and unconsciously influencing their concentration and their action readiness. Music and sound become here a way to reflect the psychological destabilization of the protagonist and to extend it to the player (van Elferen, 2015).

The game is also characterized by the absence of a warning system that would inform the player of the presence of enemies nearby. As Perron (2004) observes, warning systems have taken different forms in survival horror games: in *Fear Effect* (Kronos Digital Entertainment, 2000), the Fear Meter appears in the presence of an enemy; in *Silent Hill*, the radio of the protagonist starts emitting white noise; and in *Fatal Frame*, the filament at the lower right corner of the screen glows orange. Other games like *Resident Evil* do not contain a warning system but warn the player through offscreen sounds, such as the moaning of zombies or the sound of their footstep (Perron, 2004). While Perron sees forewarning as a way to build suspense, generate anxiety, and intensify emotional reactions, I would point out that forewarning also makes survival horror games more bearable by allowing the player to get ready to face a threat, avoid jumpscares, and deduce when exploring can be done in relative safety and in a way that is less draining. Forewarning allows the player to be more in control.

In contrast, the absence of a warning system and the quasi-absence of offscreen sounds in Cry of Fear make the player feel constantly threatened—to the point of paranoia—and lead them to always be on edge. Sound effects in Cry of Fear are usually heard at the same time or after a threat appears onscreen, making it often too late for the player to react properly. One can notably think of the Faster, who generally appears by destroying a door in front of the player and starts screaming only a few seconds later, or the Hanger, who screams while falling to its death on the player. It is hard for the player to know when an enemy will appear, and considering that most of them are quiet and/or very fast, the player only has a limited amount of time to react when they detect their presence. This is emphasized by the design of the game environment, and in particular the abundance of perpendicular narrow corridors, which makes it hard for the player to see enemies from afar. Sound is not "designed to agitate a tingling sense in anticipation of the need to act" (Krzywinska, 2002, p. 23), but to generate jumpscares. As noted by van Elferen (2015), this sort of game design, as well as the game's confusing soundtrack, pushes the player to rely on their own insights instead of those of the game; at the same time, as the player progresses in the game and gets more and more affected by its disturbing content, it becomes increasingly difficult for them to think clearly.

5.3.2. Fighting in the First Person

Like many survival horror games, *Cry of Fear* is characterized by limited offensive resources: the ammunition is scarce and the inventory only contains six slots (three later on in the game), often pushing the player to drop precious weapons to carry key items. In addition, the aiming is imprecise and the game contains frequent jumpscares, which can easily lead the player to waste bullets. In order to save ammunition, I found myself using melee weapons several times throughout the game. The combination of a gameplay in the first person with the need to use melee weapons makes the encounters with monsters more visceral. As noted by Tanya Krzywinska (2002), the first-person perspective brings the player closer to the horror and reinforces the illusion that it is the player who is being attacked and not an "abstracted virtual self" (p. 19). Perron (2018) adds that games in the first person lead the player to touch with their eyes, to sense texture when they get close to certain objects, and to feel touched when their gaze is stricken or assaulted (p. 273).

In the case of *Cry of Fear*, these observations apply especially well to encounters with the Slower, the most common enemy of the game who attacks the player with a hammer. I could not help but be constantly repulsed by these monsters, fear their touch, and be particularly disturbed by the idea of getting hit by a hammer—hearing the hammer striking Simon's body and crushing his bones. Just like Perron (2009) could feel down his spine Dr. Salvador chopping off Leon's head in *Resident Evil 4*, I could feel through my body these monsters hitting Simon with their hammer, and fighting against them always gave me the chills. Ndalianis (2012) describes well this situation: "the mental, psychological and sensory impact on the bodies of the characters who suffer at the hands of the monsters are not only depicted explicitly but this trauma also thrusts itself on the body of the spectator [or the player]" (p. 23).

I ended up fighting many Slower using my switchblade or my nightstick and was forced every time to confront them up close, to put myself in a vulnerable position, and to face my fear of getting hit by their hammer (see Figure 14). In contrast with games from the *Resident Evil* or *Fatal Frame* series, in which I could respectively focus on getting a headshot and instantly killing a zombie or taking a Fatal Frame shot and inflicting more damage to a ghost, *Cry of Fear* did not allow me to canalize my fear into this kind of actions and to stay calm. During melee fights, the player is encouraged to use their stamina to dodge attacks, making the fight more "physical" and leading to a strong sense of presence. This stamina system leads to a constant oscillation between attacking and being

attacked—to a feeling of always being "in the action"—and to fighting sequences that are more stressful and draining. This impression is reinforced by the presence of narrow corridors that limit the movements of the player, and the presence of monsters with movements that are fast and jerky and thus often end up being surprising and hard to anticipate. The game plays with the fact that the "typical" player of survival horror games is not used to this kind of combat system, and even less in the first person.



Figure 14. First encounter with a Slower. Screenshot by the author.

The combination of this combat system with the audio elements analyzed in the previous vignette generates what Ash (2013) has called an *intense space*, captivating the player and pushing them to become attuned to the game environment to survive the horror. The game encourages the player to put themselves in a position of vulnerability, considered by Ash as an "opening of the body's capacity for sense" (p. 46), and to pay attention to all the intrusions that might be dangerous for the player character (Roux-Girard, 2011). This intense space becomes quickly draining, leads to hypervigilance and oversensitivity, and facilitates the transmission of videoludic trauma through the senses. Making it to the end of the game means having endured for several hours an oppressive atmosphere and having constantly been in a state of worry. While playing *Cry of Fear*, I found myself in a state of affective vulnerability: this did not allow me to reach the state of horror flow and provoked instead an experience that was overwhelming and hurtful.

5.3.3. Character Loss and Loneliness

As I reached Waspet Gardens, I received a phone call from a stranger. I had difficulties to hear them—their voice was breaking up—but I understood that they wanted to meet me on the rooftop of a building nearby. Upon reaching the rooftop, I realized that the caller was Sophie, one of Simon's close friend. Meeting Sophie had a profound impact on me. Sophie was the first character in the game with who I/Simon could have an honest conversation and express my/his feelings. I had met Doctor Purnell but saw him as an antagonist—he had beheaded someone in front of my eyes after all—and his gas mask gave him a rather inhuman appearance. I had also discovered the gruesome picture room of a sexual predator, had found a corpse in a bathtub full of blood, and had witnessed a grisly murder in a snuff-like movie. Needless to say, the encounters I had had with other humans at that point in the game had been rather disturbing and had all been associated with death. The conversation with Sophie lasted a bit over five minutes and provided me with the first peaceful moment of the game after roughly five hours of terror. Simon and Sophie sat down together on the edge of the rooftop, their legs dangling in the air, and talked about school life (see Figure 15):

SOPHIE: Well, I dunno if you knew but I always had a hard time at school. You were... Well, you were pretty much the only guy who was kind to me. I never said it, but I really want to thank you for making my life a little bit more bearable. You're a cute guy, Simon.

SIMON: Yeah... Yeah, you did have it pretty rough... Thank you.

SOPHIE: Yeah...

SIMON: I guess I helped you because I liked you. You were one of the prettiest girls at school and I dunno, I just... I guess I wanted to protect you. I don't love you, but I think I could if we got to know each other better. You're so beautiful Sophie...

SOPHIE: Why haven't you said anything?

SIMON: I never had the courage! I mean, I wasn't exactly the toughest kid in school, was I? But now we're here alone, I feel... stronger. I've always liked you Sophie.

SOPHIE: Oh, Simon... I don't know what to say... I've always liked you too, but... not in that way. I always thought you were just a friend. Nothing more. I'm sorry.

SIMON: Oh...

SOPHIE: Mmm.

SIMON: But... Shit! Damm, so much stuff has happened lately. All this craziness! The darkness and the monsters... I think I'm going crazy. I'm so glad I found you!

SOPHIE: I know, a lot of things have been going on lately.



Figure 15. Talking with Sophie on a rooftop. Screenshot by the author.

While some of the lines are a little cliché and superficial, I found the conversation with Sophie overall touching and deeply humane in a world full of monsters, violence, and gore. The soundtrack changed from an eerie music, with the sound of the wind blowing, to a calm and melancholic one. The sequence alternated between shots of Simon and Sophie talking together, shots of the city at night, and shots of the stars shinning in the sky, giving the scene an overall soothing atmosphere. It was comforting to be able to interact with someone else in a genuine way, and for the first time in the game, I did not feel alone. The scene continued, but suddenly turned tragic:

SIMON: Yeah really... Was it you who tried to phone me by the way?

SOPHIE: Yeah... I wanted to talk to you. To get away from it all.

SIMON: Oh, but what, out here?

SOPHIE (*standing*): No... Away from everything, away from all this.

SIMON: What? What do you mean?

SOPHIE: You know full well what I mean.

SIMON: Wait a sec... You mean all...

Sophie jumps off the rooftop.

The fact that the scene abruptly ended with Sophie jumping to her death instantly transformed a comforting moment into a traumatic one, bringing the theme of suicide at the centre of the game.³¹ I could not believe what had just happened. It was so sudden. I was sad and shocked. I was screaming in my head with Simon: "NO! No no no!" I felt as if

³¹ The player learns at the end of the game that Sophie did not commit suicide in the "real" world. I am interpreting the scene here from the perspective of real-time hermeneutics and what Sophie's suicide meant for me as a player making sense of the game at that particular moment.

something had just slipped from my hand, as if I had not been fast enough to grab Sophie's arm and prevent her from jumping, when in fact I had not been given that option. Although I had only gotten to know Sophie for a few minutes, I was already getting attached to her and feeling less lonely thanks to her. Sophie's suicide evoked for me the absurdity of existence, the feeling that everything was meaningless, pointless. "Why did she?" as Simon told himself. "This... this isn't making any sense!" Sophie had not been suddenly killed by a monster during a peaceful moment with Simon—a common trope in the horror genre—but had chosen to end her life, and I had not been given the option to stop her from doing so. I kept wondering why I was surrounded by death and what was the point to keep existing as Simon, to keep suffering.

Sophie's death had a strong resonance and stayed with me for the rest of the game: each time suicide would later be referred to, it would always bring back to mind not only Simon's suicidal thoughts but also Sophie's tragic end. Meeting Sophie had brought solace to my dark journey, but following her death, I felt that "the world . . . ha[d] become poor and empty" (p. 246), to retake Freud's (1917/1957) description of loss. The absence of other humans and meaningful relationships in the game was not only affecting Simon but was affecting me as well. *Cry of Fear* had successfully put me in the same position as Simon—not knowing more than him where I was and what was going on—reducing narrative and affective mediation and making the experience of loss and loneliness more hurtful. I was now alone again and slowly realizing that I would probably feel alone like this until the end of the game.

5.3.4. "My Life Ends Here": Murder, Care, and Empathy

My experience playing *Cry of Fear* ended tragically. Since I had escaped from Carcass earlier in the game and had refused to give the gun to Doctor Purnell, I witnessed Simon shooting himself and then found myself in a nightmare sequence. As I took back the control of my character, I got immediately shaken by the chaotic soundtrack—a mix of white noise, heavy breathing, screams, and reverberations. I felt claustrophobic and found it hard to breath, as if my breathing were unconsciously following the ragged breath of the soundtrack. I walked past hanged corpses, ran through a series of twisted corridors, and finally found myself in a room filled with books floating in the air. Several pieces of paper were scattered over the floor; others were circling around the books, as if caught in a tornado. I started jumping from one book to another, trying to reach the top of the room, only to realize to my great despair that it was written "suicide" several times in red inside

each book (see Figure 16). I suddenly remembered the title of the chapter: "My Life Ends Here." Each of my jumps was bringing Simon closer to his death, higher and higher, as a soul leaving his body. I knew what was going to happen and it now seemed to be inevitable: death was the only option for Simon.



Figure 16. Bringing Simon to his death. Screenshot by the author.

I arrived in a new room, walked through a narrow corridor, and took an elevator. I naively thought for a second that I was symbolically going to Heaven, but the elevator went down. I realized that I was probably going to Hell, and the upcoming segment would convince me that it was the case.

The game ended with a boss fight against Sick Simon (see Figure 17). The fight alternated between sequences during which Sick Simon, protected behind metal bars, threw objects at me through telepathy, and sequences during which I had to defeat monsters. At the end of the fight, my character ran toward Sick Simon, beat him, and pushed him off his wheel-chair. After witnessing this disturbing moment off-line, I had to strangle Sick Simon by pressing the left button of the mouse, becoming definitely complicit in his death. For the first time in the game, a horrifying dead scene was happening not because of a character on which I had no control, but because of my own actions. While several times throughout the game I had felt that the onscreen violence was transmitted to me offscreen, I felt for the first time that the offscreen violence—the violence I was responsible for—was transmitted onscreen. I was not anymore pressing a button to shoot or hit an ugly monster out of self-defence: I was closing my hand around the mouse like if it were someone's neck,

strongly pressing the left button, and contracting my entire arm to strangle a defenceless Simon. The movement I was doing offscreen was violent in itself and close enough to what I could see onscreen to feel real. Simon was chocking, gasping for air, and slowly dying. I stopped pressing the mouse for a moment, as if to make sure that I was the one responsible for this murder, unconsciously hoping that it was a cutscene.



Figure 17. Boss fight against Sick Simon. Screenshot by the author.

After having gone with Simon through all the horror that was *Cry of Fear*, I was made the last perpetrator in this tragic chain of events. The two bad decisions I had made earlier in the game were responsible for Simon's suicide, and I was now the one who had to carry the burden of ending Simon's life. As Sick Simon's health bar was progressively depleting, that of my character was depleting as well, until both health bars emptied at the same time. I had killed Sick Simon, who was presented to me as an enemy, but I firmly knew that Sick Simon was simply Simon, myself and the character I had been taking care of for roughly fifteen hours. While I regretted earlier that the game took away my agency and did not allow me to stop Sophie from jumping to her death, I was now regretting that the game gave me agency, and in so doing, made me complicit in Simon's death.

Simon had been made a strong anchor point for empathy: I had accompanied him throughout his traumatic journey—experiencing trauma myself in the process—had sought to better understand his life, and wanted the best for him. While Smethurst and Craps (2015) note that feeling empathy while being on-line (i.e., in interreactive gameplay mode) is generally rare since the player tends to focus on the actions they need to perform, the

relationship I had developed with Simon was too strong for me too simply focus on the game's objective in such a tragic moment. *Cry of Fear* had successfully led me to be emotionally invested in Simon's faith and had convinced me that he deserved care and happiness, making the act of killing him to finish the game feel deeply wrong.

5.4. Summary: Transmitting Trauma Through Horror Video Games

Cry of Fear transmits trauma to the player through its narrative, visuals, sound and music, combat system, and the feelings of loss and complicity it evokes in the player. Throughout this chapter, I have highlighted different aspects of the game that strongly resonated with me and that made my experience of videoludic trauma move from the impactful to the hurtful. While I have analyzed some of these game elements separately for the sake of clarity, it is vital to keep in mind that video games are multimodal texts: visuals interact with narrative, which in turns interact with music, and so on. It is the combination of all these elements within the same game that produces a specific gameplay experience, and in the case of Cry of Fear, that creates a space that is horrifying, overwhelming, and that ultimately breaks with horror flow and wounds the player.³²

Moreover, *Cry of Fear* transmits trauma to the player through its gameplay that transgresses some of the conventions of the survival horror subgenre. Interestingly, Caruth (1995) writes that "trauma is the confrontation with an event that, in its unexpectedness or horror, cannot be placed within the schemes of prior knowledge" (p. 153). This quote has a strong resonance with the idea of playing with genre conventions: doing so leads the player to be confronted with unexpected frightening or horrifying moments that do not make sense if they are interpreted from the perspective of traditional survival horror games. Similarly, Camus (1942/1975) writes about the feeling of absurdity:

For a second we cease to understand it [the world] because for centuries we have understood in it solely the images and designs that we had attributed to it beforehand, because henceforth we lack the power to make use of that artifice. The world evades us because it becomes itself again.³³ (p. 20)

³² I am borrowing this expression from Susan Sontag, who writes in *Regarding the Pain of Others* (2003) that images of war and atrocities can "wound the viewer" (p. 44).

³³ "Pour une seconde, nous ne le comprenons plus [le monde] puisque pendant des siècles nous n'avons compris en lui que les figures et les dessins que préalablement nous y mettions, puisque désormais les forces nous manquent pour user de cet artifice. Le monde nous échappe puisqu'il redevient lui-même" (Camus, 1942/2013, pp. 261-262).

Here again, this quote can be read in relation to video games and genre conventions. This is certainly a stretch, a "too-close reading"—after all, Camus talks here about human existence, not horror video games—but I would highlight that the player of *Cry of Fear* is at times confronted with a similar feeling of absurdity: they cease to understand the game world for a moment because it does not make sense in relation to their knowledge of the survival horror; the game suddenly evades them, absorbs them in its own universe, and causes in them a profound vertigo.

6 CONCLUSION

Horror video games propose a fascinating case study to investigate trauma due to the range of emotions they lead the player to experience. As Ekman and Lankoski (2009) put it: "In terms of affective impact, horror games work with an exceptionally broad selection of emotions—ranging from visceral feelings of disgust to ecstasy, loathing to sympathy, suspense and fear to relief" (p. 181). Building on horror studies and trauma theory, this thesis proposed a conceptualization of videoludic trauma in horror video games, and in *Cry of Fear* in particular. More specifically, it developed the idea that *Cry of Fear* can induce trauma in the player by putting them in horrifying and intense situations, and by subverting some of the conventions of the survival horror subgenre.

I showed that videoludic trauma puts into question the assumption that the player is sheltered from what occurs in the game world and highlighted the dialogue between videoludic trauma and real horror, ultimately arguing that video games can blur the boundary between reality and fiction and deeply affect the player. This led me to turn to trauma studies and conceptualize videoludic trauma from an aesthetic perspective, seeking to distance myself from the narrow definition of trauma generally used in clinical psychology. I argued that videoludic trauma is transmitted from the game world at large to the player, rather than from the game protagonist alone. I introduced the concepts of impactful trauma and hurtful trauma to differentiate between a relatively safe aesthetic experience and an experience that is more intrusive, stays with the player, and can be harmful on the long term. I described videoludic trauma as an experience that is fluid and that can be examined, in the case of horror games, through the concept of horror flow. Finally, I used the concept of horror flow to structure my close reading of Cry of Fear and argued that video games that use a variety of fear- and anxiety-inducing tactics can provoke an overwhelming amount of horror and shocks, and be "too much" for the player to reach the state of horror flow. In such instances, a videoludic trauma that was impactful risks becoming hurtful.

While videoludic trauma is part of a design philosophy, it is important to keep in mind that games affect us differently and that factors like our life trajectory or our level of tolerance influence how we experience videoludic trauma. The idea that *Cry of Fear* generates hurtful trauma is based on my own gameplay experience—on the feelings I came to experience while playing the game and how I progressively made sense of the game; it cannot be generalized to describe the experience of all players—though of course, there

are surely some similarities between my gameplay experience and that of other players. As Rosenblatt (1986) rightfully points out: "Someone else can read a text efferently for us, and report or summarize the results. No one else can read a text aesthetically for us; no one else can experience the aesthetic evocation for us" (p. 125). While for some this might be an important limitation of this research, I would highlight that feelings and personal experiences are valuable sources of knowledge, and in the case of this research, allowed for a more detailed analysis of videoludic trauma and of *Cry of Fear* in general. As scholars, it is crucial that we respond to trauma narratives "in a way that does not lose their impact, that does not reduce them to clichés or turn them all into versions of the same story" (Caruth, 1995, p. vii). Deeply engaging with these stories through close reading is a strong way to do so.

Overall, this thesis contributes to our understanding of trauma in video games and its transmission from the game to the player. It provides new analytical tools and vocabulary to talk about our traumatic experiences with games and lays the groundwork for future research focusing on the relationship between trauma and the horror genre. In addition, this thesis has shown the relevance of turning to research on horror, bleed, and transgressive games to better understand videoludic trauma.

Since research on trauma in video games is still in its infancy, I would like to conclude by suggesting two research avenues to further develop this reflection. First, scholars in the humanities have tended to talk about trauma in a rather general way. The concepts of impactful trauma and hurtful trauma proposed in this thesis could be used as a starting point to theorize the transmission of trauma in other video games—whether they belong to the horror genre or not—or in other types of games and media (larp, escape rooms, films, novels, etc.). Talking about our traumatic experiences through these two concepts allows for a more nuanced account of what we go through as players, spectators, or readers and allows us to reflect on key moments where our experiences go from being impactful to being hurtful. Second, it would be interesting to investigate the evolution of games that are seen by players as a source of videoludic trauma and to see how much these games are the product of specific cultural or historical moments. Will games like Spec Ops or Cry of Fear still be described as traumatizing in a decade or two? Will postapocalyptic games filled with zombies and infected be more effective now that we have faced (and are still facing) a global pandemic? Finally, how will the evolution of video game graphics, or the use of virtual reality influence our experiences of videoludic

trauma? Considering the subjective nature of videoludic trauma, it will become easier to answer these fascinating questions as more researchers, critics, players, mental health professionals, and trauma survivors engage with trauma theory and provide personal accounts of their gameplay experiences.

REFERENCES

- Aarseth, E. (2003). Playing research: Methodological approaches to game analysis. *Proceedings of Melbourne Digital Arts & Culture Conference*. http://www.bendevane.com/VTA2012/herrstubbz/wp-content/uploads/2012/01/02.GameApproaches2.pdf
- Abdul-Hamid, W. K., & Hughes, J. H. (2014). Nothing new under the sun: Post-Traumatic stress disorders in the ancient world. *Early Science and Medicine*, 19(6), 549–557.
- American Psychiatric Association (APA). (1987). *Diagnostic and statistical manual of mental disorders* (3rd rev. ed.). American Psychiatric Association.
- American Psychiatric Association (APA). (2013). *Diagnostic and statistical manual of mental disorders* (5th ed.). American Psychiatric Association.
- Andermahr, S. (2013). "Compulsively readable and deeply moving": Women's middle-brow trauma fiction. In S. Andermahr & S. Pellicer-Ortín (Eds.), *Trauma narratives and herstory* (pp. 13–29). Palgrave Macmillan.
- Apperley, T. H. (2006). Genre and game studies: Toward a critical approach to video game genres. *Simulation & Gaming*, *37*(1), 6–23.
- Arjoranta, J. (2015). *Real-Time hermeneutics: Meaning-Making in ludo-narrative digital games* [Doctoral dissertation, University of Jyväskylä]. JYX Digital Repository. https://jyx.jyu.fi/handle/123456789/45647
- Arrindell, W. A., Pickersgill, M. J., Merckelbach, H., Ardon, M. A., & Cornet, F. C. (1991). Phobic dimensions: III. Factor analytic approaches to the study of common phobic fears; An updated review of findings obtained with adult subjects. *Advances in Behaviour Research and Therapy*, 13(2), 73–130.
- Arsenault, D. (2010). Introduction à la pragmatique des effets génériques : l'horreur dans tous ses états [Introduction to the pragmatic of generic effects: Horror in all its forms].

 Loading: The Journal of the Canadian Game Studies Association, 4(6). https://journals.sfu.ca/loading/index.php/loading/article/view/87/84
- Arsenault, D., & Perron, B. (2009). In the frame of the magic cycle: The circle(s) of gameplay. In B. Perron & M. J. P. Wolf (Eds.), *The video game theory reader 2* (pp. 109–131). Routledge.
- Ash, J. (2013). Technologies of captivation: Videogames and the attunement of affect. Body & Society, 19(1), 27–51.
- Ataria, Y. (2015). Sense of ownership and sense of agency during trauma. *Phenomenology and the Cognitive Sciences*, 14(1), 199–212.

- Ayers, J. W., Althouse, B. M., Leas, E. C., Dredze, M., & Allem, J. P. (2017). Internet searches for suicide following the release of *13 reasons why. JAMA Internal Medicine*, *177*(10), 1527–1529.
- Bal, M. (2002). *Travelling concepts in the humanities: A rough guide*. University of Toronto Press.
- Balaev, M. (2018). Trauma studies. In D. H. Richter (Ed.), *A companion to literary theory* (pp. 360–371). Wiley.
- Baron, S. (2012, March 12). Cognitive flow: The psychology of great game design. *Gamasutra*. https://www.gamasutra.com/view/feature/166972/cognitive_flow_the_psychology_of_php?page=2
- Barthes, R. (1970). S/Z. Éditions du Seuil.
- Begy, J. (2010). Interpreting abstract games: The metaphorical potential of formal game elements [Master's thesis, Massachusetts Institute of Technology]. DSpace@MIT. https://dspace.mit.edu/bitstream/handle/1721.1/59570/670220296MIT.pdf?se-quence=2&isAllowed=y
- Beltrán, W. S. (2012). Yearning for the hero within: Live action role-playing as engagement with mythical archetypes. In S. L. Bowman & A. Vanek (Eds.), *The Wyrd Con companion book 2012* (pp. 89–96). Wyrd Con, Creative Commons.
- Benjet, C., Lépine, J.-P., Piazza, M., Shahly, V., Shalev, A., & Stein, D. J. (2018). Crossnational prevalence, distributions, and clusters of trauma exposure. In E. J. Bromet, E. G. Karam, K. C. Koenen, & D. J. Stein (Eds.), *Trauma and posttraumatic stress disorder: Global perspectives from the WHO World Mental Health surveys* (pp. 43–71). Cambridge University Press.
- Bizzocchi, J., & Tanenbaum, T. J. (2011). Well read: Applying close reading techniques to gameplay experiences. In D. Davidson (Ed.), *Well played 3.0: Video games, value and meaning* (pp. 289–316). ETC Press.
- Bizzocchi, J., & Tanenbaum, T. J. (2012). *Mass effect 2*: A case study in the design of game narrative. *Bulletin of Science, Technology & Society*, 32(5), 393–404.
- Bogost, I. (2007). *Persuasive games: The expressive power of videogames*. The MIT Press.
- Bordwell, D. (1985). Narration in the fiction film. University of Wisconsin Press.
- Bordwell, D. (1989). A case for cognitivism. Iris, 9, 11–40.
- Bordwell, D. (2009). Cognitive theory. In P. Livingston & C. Plantinga (Eds.), *The Routledge companion to philosophy and film* (pp. 356–367). Routledge.

- Bordwell, D., & Carroll, N. (1996). Introduction. In D. Bordwell & N. Carroll (Eds.), *Post-Theory: Reconstructing film studies* (pp. xiii–xvii). University of Wisconsin Press.
- Bowman, S. L. (2013, April 18). *Bleed: How emotions affect role-playing experiences* [Video]. YouTube. https://www.youtube.com/watch?v=AtjeFU4mxw4&feature=emb_logo
- Bowman, S. L. (2015, March 2). Bleed: The spillover between player and character. *Nordic Larp*. https://nordiclarp.org/2015/03/02/bleed-the-spillover-between-player-and-character/
- Brave Heart, M. Y. H. (2000). *Wakiksuyapi*: Carrying the historical trauma of the Lakota. *Tulane Studies in Social Welfare*, 21(22), 245–266.
- Breuer, J., & Freud, S. (1955). *The standard edition of the complete psychological works of Sigmund Freud: Vol. 2. (1893–1895): Studies on hysteria* (J. Strachey, Trans.). Hogarth Press. (Original work published 1895)
- Bridge, J. A., Greenhouse, J. B., Ruch, D., Stevens, J., Ackerman, J., Sheftall, A. H., Horowitz, L. M., Kelleher, K. J., & Campo, J. V. (2020). Association between the release of Netflix's 13 reasons why and suicide rates in the United States: An interrupted time series analysis. Journal of the American Academy of Child & Adolescent Psychiatry, 59(2), 236–243.
- Brockmyer, J. F. (2014). Playing violent video games and desensitization to violence. *Child and Adolescent Psychiatric Clinic of North America*, 24(1), 65–77.
- Brown, M. E. (2014). Pulling the trigger on player agency: How psychological intrusion in larps affect game play. In S. L. Bowman (Ed.), *The Wyrd Con companion book 2014* (pp. 96–111). Wyrd Con, Creative Commons.
- Bruno, G. (2002). Atlas of emotion: Journeys in art, architecture and film. Verso.
- Bumbalough, M., & Henze, A. (2016). Infinite ammo: Exploring issues of post-traumatic stress disorder in popular video games. In S. Y. Tettegah & W. D. Huang (Eds.), *Emotions, technology, and digital games* (pp. 15–34). Academic Press.
- Burke, E. (1990). A philosophical enquiry into the origin of our ideas of the sublime and beautiful. Oxford University Press. (Original work published 1757)
- Camus, A. (1955). *The myth of Sisyphus* (Trans. J. O'Brien). Penguin Books. (Original work published 1942)
- Camus, A. (2013). *Le mythe de Sisyphe : essai sur l'absurde* [The myth of Sisyphus: Essai on the absurd]. In *Œuvres* (pp. 251–337). Gallimard. (Original work published 1942)

- Canadian Mental Health Association (CMHA). (2017, April 27). CMHA national statement responding to Netflix series: 13 reasons why. https://cmha.ca/cmha-national-statement-responding-netflix-series-13-reasons
- Carr, D. (2014). Ability, disability and dead space. *Game Studies: The International Journal of Computer Game Research*, 14(2). http://gamestudies.org/1402/articles/carr
- Carroll, N. (1988). *Mystifying movies: Fads and fallacies in contemporary film theory*. Columbia University Press.
- Carroll, N. (1990). The philosophy of horror, or paradoxes of the heart. Routledge.
- Caruth, C. (1995). Introduction. In C. Caruth (Ed.), *Trauma: Explorations in memory* (pp. 151–157). The Johns Hopkins University Press.
- Caruth, C. (1996). *Unclaimed experience: Trauma, narrative and history*. Johns Hopkins University Press.
- Chen, J. (2007). Flow in games (and everything else). *Communications of the ACM*, 50(4), 31–34.
- Clasen, M., & Kjeldgaard-Christiansen, J. (2016). A consilient approach to horror video games. *Akademisk kvarter / Academic Quarter*, 13, 137–152.
- Clover, C. J. (1987). Her body, himself: Gender in the slasher film. *Representations*, 20, 187–228.
- Crane, J. L. (1994). Terror and everyday life: Singular moments in the history of the horror film. Sage Publications.
- Csíkszentmihályi, M. (2008). *Flow: The psychology of optimal experience*. HarperCollins e-books. (Original work published 1990)
- Damasio, A. (1994). Descartes' error: Emotion, reason, and the human brain. Avon Books.
- Danilovic, S. (2018). Game design therapoetics: Authorathographical game autorship as self-care, self-understanding, and therapy [Doctoral dissertation, University of Toronto]. TSpace Repository. https://tspace.library.utoronto.ca/handle/1807/89836
- Des Pres, T. (1983). Terror and the sublime. *Human Rights Quarterly*, 5(2), 135–146.
- Deslandes, J. (2004). A philosophy of emoting. *Journal of Narrative Theory*, 34(3), 335–372.
- Doctor, R. M., & Shiromoto, F. N. (2010). *The encyclopedia of trauma and traumatic stress disorders*. Facts on File.
- Donovan, T. (2010). Replay: The history of video games. Yellow Ant.
- Eaton, M. M. (1982). A strange kind of sadness. *The Journal of Aesthetics and Art Criticism*, 41(1), 51–63.

- Ekman, I., & Lankoski, P. (2009). Hair-Raising entertainment: Emotions, sound, and structure in *Silent hill 2* and *Fatal frame*. In B. Perron (Ed.), *Horror video games:* Essays on the fusion of fear and play (pp. 181–199). McFarland.
- Epstein, S. (1972). The nature of anxiety with emphasis upon its relationship to expectancy. In C. D. Spielberger (Ed.), *Anxiety: Current trends in theory and research* (Vol. 2, pp. 291–337). Academic Press.
- Fawcett, C. (2016). *American McGee's Alice: Madness returns* and traumatic memory. *The Journal of Popular Culture*, 49(3), 492–521.
- Fernández-Vara, C. (2015). Introduction to game analysis (1st ed.). Routledge.
- Fowler, A. (1982). *Kinds of literature: An introduction to the theory of genres and modes*. Harvard University Press.
- Freud, S. (1957). Mourning and melancholia. In *The standard edition of the complete* psychological works of Sigmund Freud: Vol. 14 (1914–1916): On the history of the psycho-analytic movement, Papers on metapsychology and Other works (J. Stratchey, Trans., pp. 243–258). Hogarth Press. (Original work published 1917)
- Freud, S. (1958). Remembering, repeating and working-through (further recommendations on the technique of psycho-analysis II). In *The standard edition of the complete psychological works of Sigmund Freud: Vol. 12 (1911–1913):* Case history of Schreber, Papers on technique *and* Other works (J. Stratchey, Trans., pp. 145–156). Hogarth Press. (Original work published 1914)
- Freud, S. (1961). *Beyond the pleasure principle* (J. Stratchey, Trans.). W. W. Norton & Company. (Original work published 1920)
- Frijda, N. H. (1986). The emotions. Cambridge University Press.
- Funk, J. B., Baldacci, H. B., Pasold, T., & Baumgardner, J. (2004). Violence exposure in real-life, video games, television, movies, and the internet: Is there desensitization? *Journal of Adolescence*, 27(1), 23–39.
- Genette, G. (1987). Seuils [Thresholds]. Éditions du Seuil.
- Genette, G. (1997). *Paratexts: Thresholds of interpretation* (J. E. Lewin, Trans.). Cambridge University Press. (Original work published 1987)
- Gibbs, A. (2014). *Contemporary American trauma narratives*. Edinburgh University Press.
- Goethe, J. W. von. (1848). *The auto-biography of Goethe: Truth and poetry from my own life* (J. Oxenford, Trans.). H. G. Bohn. https://archive.org/details/autobiography-ofg00goet/mode/2up (Original work published 1811)

- Goethe, J. W. von. (2004). *The sorrows of young Werther* (B. Pike, Trans.). Modern Library. (Original work published 1774)
- Goffman, E. (1961). *Encounters: Two studies in the sociology of interaction*. Bobbs-Merrill.
- Grodal, T. (2000). Video games and the pleasure of control. In D. Zillmann & P. Vorderer (Eds.), *Media entertainment: The psychology of its appeal* (pp. 197–213). Lawrence Erlbaum Associates.
- Hand, R. J. (2004). Proliferating horrors: Survival horror and the *Resident evil* franchise. In S. Hantke (Ed.), *Horror film: Creating and marketing fear* (pp. 117–134). University Press of Mississippi.
- Hanich, J. (2010). Cinematic emotion in horror films and thrillers: The aesthetic paradox of pleasurable fear. Routledge.
- Hantke, S. H. (1997). The function of the sublime in contemporary horror: From Edmund Burke to Michael Blumlein. *Foundation*, *71*, 45–62.
- Harrer, S. (2018). *Games and bereavement: How video games represent attachment, loss, and grief.* Transcript.
- Harrington, R. (2001). The railway accident: Trains, trauma, and technological crises in nineteenth-century Britain. In M. S. Micale & P. Lerner (Eds.), *Traumatic pasts: History, psychiatry, and trauma in the modern age, 1870–1930* (pp. 31–56). Cambridge University Press.
- Heizmann, J. (2003). Goethe, le dernier génie universel? [Goethe, the last universal genius?]. In J. Boulad-Ayoub & F. Blanchard (Eds.), *Les grandes figures du monde moderne* [The great figures of the modern world] (pp. 453–478). Les Presses de l'Université Laval.
- Herman, J. L. (1997). *Trauma and recovery: The aftermath of violence—From domestic abuse to political terror*. BasicBooks. (Original work published 1992)
- Hooper, T. (Director). (1974). The Texas chainsaw massacre [Film]. Vortex.
- Hopeametsä, H. (2008). 24 hours in a bomb shelter: Player, character and immersion in Ground zero. In M. Montola & J. Stenros (Eds.), *Playground worlds: Creating and evaluating experiences of role-playing games* (pp. 187–198). Ropecon ry.
- Horror of Video Game. (2015, December 22). *Cry of fear review—In depth* [Video]. YouTube. https://www.youtube.com/watch?v=I7IVZ1vEN08
- Huizinga, J. (1970). *Homo ludens: A study of the play element of culture*. Maurice Temple Smith Ltd. (Original work published 1938)

- Jagoda, P. (2013). Fabulously procedural: *Braid*, historical processing, and the videogame sensorium. *American Literature*, 85(4), 745–779.
- James, W. (1950). *The principles of psychology* (Vol. 1). Henry Holt. (Original work published 1890)
- Jauss, H. R. (1982). Toward an aesthetic of reception (T. Bahti, Trans.). University of Minnesota Press.
- Jenkins, H. (2004). Game design as narrative architecture. In N. Wardrip-Fruin & P. Harrigan (Eds.), *First person: New media as story, performance, and game* (pp. 118–130). The MIT Press.
- Jennings, S. (2018). The horrors of transcendent knowledge: A feminist-epistemological approach to video games. In K. L. Gray & D. J. Leonard (Eds.), *Woke gaming: Digital challenges to oppression and social injustice* (pp. 155–171). University of Washington Press.
- Jordan, N. (2014). World of warcraft: A family therapist's journey into scapegoated culture. *Qualitative Report*, 19(31), 1–19.
- Jørgensen, K. (2018). When is it enough? Uncomfortable game content and the transgression of player taste. In K. Jørgensen & F. Karlsen (Eds.), *Transgression in games and play* (pp. 153–167). The MIT Press.
- Jørgensen, K., & Karlsen, F. (Eds.). (2018). *Transgression in games and play*. The MIT Press.
- Kant, I. (2007). *Critique of judgement* (J. C. Meredith, Trans.). Oxford University Press. (Original work published 1790)
- Karlsen, F. (2015). Analyzing game controversies: A historical approach to moral panics and digital games. In T. E. Mortensen, J. Linderoth, & A. M. L. Brown (Eds.), *The dark side of game play: Controversial issues in playful environments* (pp. 15–32). Routledge.
- Kemper, J. (2017, June 21). The battle of Primrose Park: Playing for emancipatory bleed in Fortune & felicity. *Nordic Larp*. https://nordiclarp.org/2017/06/21/the-battle-of-primrose-park-playing-for-emancipatory-bleed-in-fortune-felicity/
- Keogh, B. (2012). *Killing is harmless: A critical reading of* Spec ops: The line. Stolen Projects.
- Keogh, B. (2013). *Spec ops: The line*'s conventional subversion of the military shooter. *Proceedings of DiGRA 2013: DeFragging Game Studies*, 7, 1–17. http://www.di-gra.org/wp-content/uploads/digital-library/paper_55.pdf

- Kessler, R. C., Heeringa, S. G., Pennell, B.-E., & Zaslavsky, A. M. (2018). Methods of the World Mental Health surveys. In E. J. Bromet, E. G. Karam, K. C. Koenen, & D. J. Stein (Eds.), *Trauma and posttraumatic stress disorder: Global perspectives from the WHO World Mental Health surveys* (pp. 13–42). Cambridge University Press.
- Kirkland, E. (2007). Restless dreams in *Silent hill*: Approaches to video game analysis. *Journal of Media Practice*, 6(3), 167–178.
- Kirkland, E. (2015). Restless dreams and shattered memories: Psychoanalysis and *Silent hill. Brumal: Revista de investigación sobre lo Fantástico*, *3*(1), 161–182.
- Kocurek, C. A. (2012). The agony and the exidy: A history of video game violence and the legacy of Death race. *Games Studies*, 12(1). http://gamestudies.org/1201/articles/carly-kocurek
- Krahé, B., Möller, I., Huesmann, L. R., Kirwil, L., Felber, J., & Berger, A. (2011). Desensitization to media violence: Links with habitual media violence exposure, aggressive cognitions, and aggressive behavior. *Journal of Personality and Social Psychology*, 100(4), 630–646.
- Kromand, D. (2008). Sound and the diegesis in survival-horror games. *Proceedings of Audio Mostly Conference—A Conference on Interaction With Sound*, 16–19.
- Krzywinska, T. (2002). Hands-on horror. Spectator, 22(2), 12–23.
- Kuznetsova, E. (2017). Trauma in games: Narrativizing denied agency, ludonarrative dissonance and empathy play [Master's thesis, University of Alberta]. Education & Research Archive. https://era.library.ualberta.ca/items/17f914b7-917f-420b-ac28-742be6bb4361
- Laboratoire universitaire de documentation et d'observation vidéoludique (LUDOV). (n.d.). *Horror video games*. Retrieved May 31, 2021, from https://www.ludov.ca/en/observation/horror-video-game
- LaCapra, D. (2001). Writing history, writing trauma. Johns Hopkins University Press.
- LeDoux, J. (1996). *The emotional brain: The mysterious underpinnings of emotional life.*Touchstone.
- Leys, R. (2000). Trauma: A genealogy. University of Chicago Press.
- Lovecraft, H. P. (2016). *The complete fiction of H. P. Lovecraft*. Chartwell Books. (Original work published 1917–1935)
- Luckhurst, R. (2008). The trauma question. Routledge.
- Madigan, J. (2012, November 7). The walking dead, mirror neurons, and empathy. *The psychology of video games*. http://www.psychologyofgames.com/2012/11/the-walk-ing-dead-mirror-neurons-and-empathy/

- Manovich, L. (2001). The language of new media. The MIT Press.
- Mackman, P. (2001, November 24). *Silent hill 2 interview*. Gamer.tv. http://web.archive.org/web/20040703103158/http://gamer.tv/page/feature/3924.htm
- Mawhorter, P., Mateas, M., Wardrip-Fruin, N., & Jhala, A. (2014). Towards a theory of choice poetics. *Proceedings of the 9th International Conference on the Foundations of Digital Games*. http://www.fdg2014.org/papers/fdg2014 paper 19.pdf
- Mäyrä, F. (2008). An introduction to game studies: Games in culture. SAGE Publications.
- McLuhan, M. (1995). Understanding media. In E. McLuhan & F. Zingrone (Eds.), *Essential McLuhan* (pp. 149–179). House of Anansi Press.
- Moody, A. T., & Lewis, J. A. (2019). Gendered racial microaggressions and traumatic stress symptoms among Black women. *Psychology of Women Quarterly*, 43(2), 201–214.
- Montola, M. (2010). The positive negative experience in extreme role-playing. *Proceedings of the 2010 International DiGRA Nordic Conference—Experiencing Games:*Games, Play, and Players. 9. http://www.digra.org/wp-content/uploads/digital-library/10343.56524.pdf
- Montola, M. (2011). The painful art of extreme role-playing. *Journal of Gaming and Virtual Worlds*, 3(3), 219–237.
- Mortensen, T. E., & Jørgensen, K. (2020). *The paradox of transgression in games*. Routledge.
- Mortensen, T. E., Linderoth, J., & Brown, A. M. L. (Eds.). (2015). *The dark side of game play: Controversial issues in playful environments*. Routledge.
- Mukherjee, S., & Pitchford, J. (2010). "Shall we kill the pixel soldier?": Perceptions of trauma and morality in combat video games. *Journal of Gaming & Virtual Worlds*, 2(1), 39–51.
- Münsterberg, H. (2002). *Hugo Münsterberg on film:* The photoplay: A psychological study *and other writings*. Routledge. (Original work published 1916)
- Myers, D. (2010). *Play redux: The form of computer games*. The University of Michigan Press.
- National Association of School Psychologists (NASP). (2017). *13 reasons why Netflix series: Considerations for educators*. <a href="https://www.nasponline.org/resources-and-publications/resources-and-podcasts/school-climate-safety-and-crisis/mental-health-resources/preventing-youth-suicide/13-reasons-why-netflix-series/13-reasons-why-netflix-series-considerations-for-educators"

- Ndalianis, A. (2012). *The horror sensorium: Media and the senses*. McFarland & Company.
- Newman, J. (2002). The myth of the ergodic videogame: Some thoughts on player-character relationships in videogames. *Game Studies: The International Journal of Computer Game Research*, 2(1). http://www.gamestudies.org/0102/newman/
- Ney, P. G. (1988). Transgenerational child abuse. *Child Psychiatry and Human Development*, 18(3), 151–168.
- Niederkrotenthaler, T., Stack, S., Till, B., Sinyor, M., Pirkis, J., Garcia, D., Rockett, I. R. H., & Tran, U. S. (2019). Association of increased youth suicides in the United States with the release of *13 reasons why. JAMA Psychiatry*, 76(9), 933–940.
- Öhman, A. (1993). Fear and anxiety as emotional phenomena: Clinical phenomenology, evolutionary perspectives, and information processing mechanisms. In M. Lewis & J. M. Haviland (Eds.), *Handbook of emotions* (1st ed., pp. 511–536). Guilford Press.
- Öhman, A. (2008). Fear and anxiety. In M. Lewis, J. M. Haviland-Jones, & L. F. Barrett (Eds.), *Handbook of emotions* (3rd ed., pp. 709–729). Guilford Press.
- Öhman, A., & Mineka, S. (2001). Fears, phobias, and preparedness: Toward an evolved module of fear and fear learning. *Psychological Review*, 108(3), 483–522.
- Page, H. W. (1883). *Injuries of the spine and spinal cord without apparent mechanical lesion, and nervous shock, in their surgical and medico-legal aspects*. J. & A. Churchill. https://wellcomecollection.org/works/y3yqy6x5/items?canvas=7&langCode=eng-wsierraId=b21211322
- Perron, B. (2004, September 14–16). Sign of a threat: The effects of warning systems in survival horror games [Paper presentation]. COSIGN 2004, the 4th International Conference on Computational Semiotics, Split, Croatia. http://www.cosign.conference.org/downloads/papers/ perron cosign 2004.pdf
- Perron, B. (2005, October 14–15). *Coming to play at frightening yourself: Welcome to the world of horror games* [Paper presentation]. Aesthetics of Play: A Conference on Computer Game Aesthetics, Bergen, Norway. http://www.aestheticsofplay.org/perron.php
- Perron, B. (2006). The heuristic circle of gameplay: The case of survival horror. In M. Santorineos (Ed.), *Gaming realities: A challenge for digital culture* (pp. 62–71). FOURNOS Centre for Digital Culture.
- Perron, B. (2009). The survival horror: The extended body genre. In B. Perron (Ed.), *Horror video games: Essays on the fusion of fear and play* (pp. 121–143). McFarland. Perron, B. (2012a). *Silent hill: The terror engine*. University of Michigan Press.

- Perron, B. (2012b). Survival horror. In M. J. P. Wolf (Ed.), *Encyclopedia of video games:* The culture, technology, and art of gaming (pp. 636–638). Greenwood.
- Perron, B. (2018). *The world of scary video games: A study in videoludic horror*. Bloomsbury Academic.
- Phillips, D. P. (1974). The influence of suggestion on suicide: Substantive and theoretical implications of the Werther effect. *American Sociological Review*, *39*(3) 340–354.
- Pinedo, I. (1996). Recreational terror: Postmodern elements of the contemporary horror film. *Journal of Film and Video*, 48(1–2), 17–31.
- Plantinga, C. (2002). Cognitive film theory: An insider's appraisal. *Cinémas : Revue d'études cinématographiques / Journal of Film Studies*, 12(2), 15–37.
- Plantinga, C. (2009). *Moving viewers: American film and the spectator's experience*. University of California Press.
- Poirier-Poulin, S. (2020). Memory, autofiction, and identity in video games: The case of *Looking back*. An interview with Kristopher Poulin-Thibault. *Loading: The Journal of the Canadian Game Studies Association*, 13(21), 77–90.
- Poole, S. (2000). Trigger happy: The inner life of video games. Fourth Estate.
- Poremba, C. (2007). Critical potential on the brink of the magic circle. *Proceedings of the DiGRA 2007 International Conference: Situated Play*, 4, 772–778. http://www.di-gra.org/wp-content/uploads/digital-library/07311.42117.pdf
- Pötzsch, H. (2017). Selective realism: Filtering experiences of war and violence in first-and third-person shooters. *Games and Culture*, *12*(2), 156–178.
- Pötzsch, H. (2018). Forms and practices of transgressivity in videogames: Aesthetics, play, and politics. In K. Jørgensen & F. Karlsen (Eds.), *Transgression in games and play* (pp. 45–61). The MIT Press.
- Radford, C., & Weston, M. (1975). How can we be moved by the fate of Anna Karenina? *Proceedings of the Aristotelian Society, Supplementary Volumes*, 49, 67–93.
- Reevy, G. M., Ozer, Y. M., & Ito, Y. (2010). Encyclopedia of emotion. Greenwood.
- Rodaway, P. (1994). Sensuous geographies: Body, sense, and place. Routledge.
- Root, M. P. P. (1992). Reconstructing the impact of trauma on personality. In L. S. Brown
 & M. Ballou (Eds.), *Personality and psychopathology: Feminist reappraisals* (pp. 229–265). The Guilford Press.
- Rosenblatt, L. M. (1978). *The reader, the text, the poem: The transactional theory of the literary work*. Southern Illinois University Press.
- Rosenblatt, L. M. (1986). The aesthetic transaction. *Journal of Aesthetic Education*, 20(4), 122–128.

- Rothe, A. (2011). *Popular trauma culture: Selling the pain of others in the mass media*. Rutgers University Press.
- Roux-Girard, G. (2009). L'écoute de la peur : une étude du son dans les jeux vidéo d'horreur [Listening to fear: A study of sound in horror video games] (Master's thesis, Université de Montréal). Papyrus : Dépôt institutionnel. https://papyrus.bib.umontreal.ca/xmlui/handle/1866/5999
- Roux-Girard, G. (2011). Listening to fear: A study of sound in horror computer games. In M. Grimshaw (Ed.), *Game sound technology and player interaction: Concepts and developments* (pp. 192–212). IGI Global.
- Rusch, D. C. (2009). Staring into the abyss—A close reading of Silent hill 2. In D. Davidson (Ed.), *Well played 1.0: Video games, value, and meaning* (pp. 223–242). ETC Press.
- Saari, A., & Mullen, J. (2020). Dark places: Environmental education research in a world of hyperobjects. *Environmental Education Research*, 26(9–10), 1466–1478.
- Salen, K., & Zimmerman, E. (2003). *Rules of play: Game design fundamentals*. The MIT Press.
- Sapach, S. (2020). Tagging my tears and fears: Text-Mining the autoethnography. *Digital Studies / Le champ numérique*, 10(1). http://doi.org/10.16995/dscn.328
- Schafe, G. E., Atkins, C. M., Swank, M. W., Bauer, E. P., Sweatt, J. D., & LeDoux, J. E. (2000). Activation of ERK/MAP kinase in the amygdala is required for memory consolidation of Pavlovian fear conditioning. *Journal of Neuroscience*, 20(21), 8177–8187.
- Seligman, M. E. P. (1971). Phobias and preparedness. *Behavior Therapy*, 2(3), 307–320.
- Sicart, M. (2011). Against procedurality. *Game Studies: The International Journal of Computer Game Research*, 11(3). http://gamestudies.org/1103/articles/sicart_ap?utm source=tech.mazavr.tk&utm_medium=link&utm_compaign=article
- Siety, E. (2006). *La peur au cinéma* [Fear at the cinema]. Actes Sud.
- Smethurst, T. (2015a). Playing dead in videogames: Trauma in *Limbo*. *The Journal of Popular Culture*, 48(5), 817–835.
- Smethurst, T. (2015b). Playing with trauma in video games: Interreactivity, empathy, perpetration [Doctoral dissertation, Universiteit Ghent]. Academic Bibliography. https://biblio.ugent.be/publication/5930001
- Smethurst, T. (2017). "We put our hands on the trigger with him": Guilt and perpetration in *Spec ops: The line. Criticism*, *59*(2), 201–221.

- Smethurst, T., & Craps, S. (2015). Playing with trauma: Interreactivity, empathy, and complicity in *The walking dead* video game. *Games and Culture*, *10*(3), 269–290.
- Smith, M. (1995). *Engaging characters: Fiction, emotion, and the cinema*. Clarendon Press; Oxford University Press.
- Sobchack, V. (2004). Carnal thoughts: Embodiment and moving image culture. University of California Press.
- Solomon, R. C. (2004). Real horror. In *In defense of sentimentality* (pp. 108–130). Oxford University Press. (Original work published 2003)
- Sontag, S. (2003). Regarding the pain of others. Picador.
- SplitmediaLabs. (2012). XSplit gamecaster [Computer software]. https://game-caster.com/
- Starman, H. (2006). Generations of trauma: Victimhood and the perpetuation of abuse in Holocaust survivors. *History and Anthropology*, 17(4), 327–338.
- Tan, E. S. (1995). Film-induced affect as a witness emotion. *Poetics*, 23(1–2), 7–32.
- Tan, E. S. (1996). *Emotion and the structure of narrative film: Film as an emotion machine* (B. Fasting, Trans.). Erlbaum.
- Tavinor, G. (2009). The art of videogames. Wiley-Blackwell.
- Taylor, L. N. (2009). Gothic bloodlines in survival horror gaming. In B. Perron (Ed.), *Horror video games: Essays on the fusion of fear and play* (pp. 46–61). McFarland.
- Therrien, C. (2009). Games of fear: A multi-faceted historical account of the horror genre in video games. In B. Perron (Ed.), *Horror video games: Essays on the fusion of fear and play* (pp. 26–45). McFarland.
- Therrien, C. (2011). *Illusion, idéalisation, gratification. L'immersion dans les univers de fiction à l'ère du jeu vidéo* [Illusion, idealisation, gratification. Immersion in the fictional worlds in the video game era] [Doctoral dissertation, Université du Québec à Montréal]. Archipel. https://archipel.uqam.ca/4087/1/D2185.pdf
- Thon, J.-N. (2019). Playing with fear: The aesthetics of horror in recent indie games. *Eludamos: Journal for Computer Game Culture*, 10(1), 197–231.
- Toft, I., & Harrer, S. (2020). Design bleed: A standpoint methodology for game design. Proceedings of the 2020 DiGRA International Conference: Play Everywhere. http://www.digra.org/wp-content/uploads/digital-library/DiGRA_2020_pa-per-320.pdf
- Tritle, L. A. (2000). From Melos to My Lai: War and survival. Routledge.

- Tronstad, R. (2018). Destruction, abjection, and desire: Aesthetics of transgression in two adaptations of "Little red riding hood." In K. Jørgensen & F. Karlsen (Eds.), *Transgression in games and play* (pp. 207–218). The MIT Press.
- van der Kolk, B. (2000). Posttraumatic stress disorder and the nature of trauma. *Dialogues in Clinical Neuroscience*, *2*(1), 7–22.
- van Elferen, I. (2015). Sonic descents: Musical dark play in survival and psychological horror. In T. E. Mortensen, J. Linderoth, & A. M. L. Brown (Eds.), *The dark side of game play: Controversial issues in playful environments* (pp. 226–241). Routledge.
- Veale, K. R. (2015). Affect, responsibility, and how modes of engagement shape the experience of videogames. *Transactions of the Digital Game Research Association*, 2(1). http://todigra.org/index.php/todigra/article/view/44/83
- Vygotsky, L. S. (1962). *Thought and language* (E. Hanfmann & G. Vakar, Trans.). The MIT Press. (Original work published 1934)
- Walton, K. (1970). Categories of art. Philosophical Review, 79(3), 334–367.
- Weise, M. (2009). The rules of horror: Procedural adaptation in *Clock tower, Resident evil*, and *Dead rising*. In B. Perron (Ed.), *Horror video games: Essays on the fusion of fear and play* (pp. 238–266). McFarland.
- Whalen, Z. (2004). Play along—An approach to videogame music. *Game Studies: The International Journal of Computer Game Research*, 4(1). http://www.gamestudies.org/0401/whalen/
- Wilson, G. M. (1986). *Narration in light: Studies in cinematic point of view*. Johns Hopkins University Press.
- Witkowski, E. (2018). Running with zombies: Capturing new worlds through movement and visibility practices with *Zombies, run! Games and Culture*, *13*(2), 153–173.
- Wolf, M. J. P. (2002). Genre and the video game. In M. J. P. Wolf (Ed.), *The medium of the video game* (pp. 113–136). University of Texas Press.
- World Health Organization (WHO). (2019). 6B40 Post traumatic stress disorder. In *ICD-11 for mortality and morbidity statistics*. https://icd.who.int/browse11/l-m/en#/http://id.who.int/icd/entity/2070699808
- Yorkey, B., Son, D., McCarthy, T., Wettels, J. G., Golin, S., Sugar, M., Gomez, S., Teefey, M., & Laiblin, K. (Executive Producers). (2017). *13 reasons why: Season 1* [TV series]. July Moonhead Productions; Kicked to the Curb Productions; Anonymous Content; Paramount Television Studios.

LUDOGRAPHY

11 bits studio. (2014). This war of mine [PC]. 11 bits studio.

3909 LLC. (2013). Papers, please [PC]. 3909 LLC.

Blizzard North. (2000). Diablo II [PC]. Blizzard Entertainment.

Capcom. (1996). Resident evil [PlayStation]. Capcom.

Capcom. (2009). Resident evil 5 [PC]. Capcom.

Capcom Production Studio 1. (2006). Dead rising [Xbox 360]. Capcom.

Capcom Production Studio 3. (2002). Resident evil zero [GameCube]. Capcom.

Capcom Production Studio 4. (2002). Resident evil [GameCube]. Capcom.

Capcom Production Studio 4. (2005). Resident evil 4 [GameCube]. Capcom.

Creative Assembly. (2014). Alien: Isolation [PC]. Sega.

Crystal Dynamics. (2013). Tomb raider [PlayStation 3]. Square Enix.

EA Redwood Shores. (2008). Dead space [PlayStation 3]. Electronic Arts.

Frictional Games. (2010). Amnesia: The dark descent [PC]. Frictional Games.

Human Entertainment. (1995). *Clock tower* [Super Nintendo Entertainment System]. Human Entertainment.

Human Entertainment. (1996). Clock tower 2 [PlayStation]. Human Entertainment.

Infinity Ward. (2007). Call of duty 4: Modern warfare [PlayStation 3]. Activision.

Infogrames. (1992). Alone in the dark [PC]. Infogrames.

Kronos Digital Entertainment. (2000). Fear effect [PlayStation]. Eidos Interactive.

Naughty Dog. (2020). *The last of us part II* [PlayStation 4]. Sony Interactive Entertainment.

Numinous Games. (2016). That dragon, cancer. Numinous Games.

Playdead. (2010). Limbo [PC]. Playdead.

Quantic Dream. (2010). Heavy rain [PlayStation 3]. Sony Computer Entertainment.

Quantic Dream. (2013). *Beyond: Two souls* [PlayStation 3]. Sony Computer Entertainment.

Red Barrels. (2013). Outlast [PC]. Red Barrels.

Remedy Entertainment. (2001). Max Payne [PC]. Gathering of Developers.

Silicon Knights. (2002). Eternal darkness: Sanity's requiem [GameCube]. Nintendo.

Tango Gameworks. (2014). The evil within [PlayStation 3]. Bethesda Softworks.

Team Psykskallar. (2013). Cry of fear [PC]. Team Psykskallar.

Team Silent. (1999). Silent hill [PlayStation]. Konami.

Tecmo. (2001). Fatal frame [PlayStation 2]. Wanadoo Edition.

Telltale Games. (2012). The walking dead: Season one [PC]. Telltale Games.

Valve South. (2008). Left 4 dead [PC]. Valve.

Wrigstad, T. (2008). Gang rape [live action role-playing]. Tobias Wrigstad.

Young Horses. (2014). Octodad: Dadliest catch [PC]. Young Horses.