



# Acta Ludologica

Faculty of Mass Media Communication

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# Journal Orientation

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Acta Ludologica is a scientific journal in the field of games and digital games. The journal contains professional scientific reflections on digital games; it also offers academic discourses on games, especially media and digital competencies, creation, design, marketing, research, development, psychology, sociology, history and the future of digital games and game studies.

Acta Ludologica is a double-blind peer reviewed journal published twice a year. It focuses on theoretical studies, theoretical and empirical studies, research results and their implementation into practice, as well as professional publication and scientific reviews of digital games.

## Acta Ludologica

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## The New Dimension of the Relationship Between Digital Games and AI: From Behavioural Challenges of NPCs to Generative Realms

In the ever-evolving landscape of digital games, the relationship between gaming experiences and artificial intelligence (AI) has transcended traditional boundaries, from scripted challenges to generative realms.

The conventional perception of AI in the context of digital games is usually twofold. Firstly, the algorithms and mechanics behind the gameplay are responsible for the behaviour of the game system and its components, especially non-playable characters (NPCs). Since the days of *Space Invaders* and *Pac-Man*, AI has evolved significantly towards more intelligent and adaptive NPC behaviour. For example, the Goal-Oriented Action Planning (GOAP) AI system in *F.E.A.R.* lends human-like behaviour to enemies, allowing players to experience unique, unpredictable action sequences even in single-player mode, similar to the groundbreaking Nemesis System utilised in *Middle-earth: Shadow of Mordor*; or the AI in *Alien: Isolation* that allows the xenomorph to learn from the player and adapt its hunting strategies, pushing the boundaries of game horror to a new, personalised level. But AI has not been just about perfecting enemies. Let us not forget the companions that AI can turn into 'real' helpers, such as Elizabeth from *BioShock Infinite*, Ellie from *The Last of Us* or Atrius from *God of War*. The second perception used to be of AI as a story character. There are a number of famous AI villains in digital games (as well as in popular culture as a whole) – such as SHODAN from the *System Shock* series, GLaDOS in the *Portal* games, or the Reapers from the *Mass Effect* series – but lately, we have also seen AI more and more often as protagonists, such as the characters from Detroit: Become Human.

The more modern perception of this relationship is increasingly expanding to include a generative dimension, as games are currently employing AI to procedurally generate content (the game world, animations, conversations with NPCs, etc.), for example the seemingly endless universes in *No Man's Sky*. However, the real challenge facing the contemporary digital gaming world is in the realm of the implementation of generative AI tools into common game production processes,

from development to testing. As generative AI tools become more widely available, small and independent game studios can use them to create games and improve their quality beyond that which they could achieve without them. Will generative AI remain just a tool to relieve game developers of trivial tasks in order to speed up development or reduce costs, or will it have a more significant impact on the entire creative process, especially in terms of authorship issues and plagiarism? Anyway, it seems to be a double-edged sword – unlimited opportunities but accompanied by the threat of homogenisation and copyright infringement. The not-too-distant future will show whether "great power comes with great responsibility".

Just as generative AIs produce a wide range of content for their users, through the present issue of *Acta Ludologica*, authors and contributors are generating knowledge, research, and discussion across a variety of topics within the discourse of the gaming world. Esteban Vera, for example, examines the role of heroes' memories in the process of constructing and reconstructing the world in the narrative of *The Legend of Zelda: Breath of the Wild*. Oleg Dietkow investigates how gamers see themselves in relation to the way they play digital games. The influence of the audiovisual appeal of games on the gaming experience and enjoyment in the Turkish environment is explored by Naz Almaç. Emmanoel Ferreira deals with understanding the relationship between aesthetic experience and digital games in terms of agency, appropriation and politics. Maria Koscelníková focuses on the practices of crediting translators and localisers in Slovak digital games. In the final game study, Anna Hurajová, Alexej Slezák and Vladimíra Hladíková analyse the situation of women and their working experiences in the game industry in Slovakia.

Salomé Honório discusses the shifting sensibilities and use of dissonance in the games of indie studio Analgesic Productions in an interview with game designers Melos Han-Tani and Marina Kittaka. The following section consists of academic reviews of the book *The Rules We Break Lessons in Play, Thinking, and Design* by Eric Zimmerman, the *Cyberpunk 2077* expansion titled *Phantom Liberty*, and the book *Videogames and Agency* by Bettina Bódi. In the add-ons, Matthew Kelly outlines the use of digital games' educational potential for ethical examinations in the classroom.

On behalf of *Acta Ludologica's* editorial team, I sincerely wish that our readers discover enriching insights during the exploration of this issue's content.

**Mgr. Zdenko Mago, PhD.**

*Acta Ludologica's* Editor-in-Chief

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# Following the Hero's Memories: The Role of Memory as a (Re)construction of the Narrative in The Legend of Zelda: Breath of the Wild

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## ABSTRACT:

This paper discusses the concept of the hero and the role of memory as an object of (re) construction of the world in the narrative of the Nintendo digital game *The Legend of Zelda: Breath of the Wild*. Through the analysis of how memory is reconstructed in Link and the characters that inhabit Hyrule, memories, historical and social memory, monuments, documents, space, and gameplay within the same digital game are also reconstructed. Testimonial memory, in turn, will help remember and construct the narrative of Link's personal and social history by reconstructing the story. The personal experience that the player has while interacting with the game through the act of playing can build the meta-discourse between memory and narrative to understand the hero and his journey through the world. In this sense, the importance of the character Link within the game is affirmed, as he is a much more complex subject than a simple archetype within the game mechanics.

## KEY WORDS:

digital games, hero, memory, narrative, *The Legend of Zelda: Breath of the Wild*.

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# Introduction: The Wild and Narrative

Since the appearance of the first game in *The Legend of Zelda series*<sup>1</sup>, which “combined a well-thought-out fairy tale with perfectly crafted gameplay mechanics”,<sup>2</sup> and being S. Miyamoto's first “free-roaming game”,<sup>3</sup> it has managed to establish itself as one of the most innovative games in the digital game industry. 30 years later, a new instalment emerges where the environment presents a narrative that allows “infusing story elements into the physical space of a game or alongside the actions of the players”.<sup>4</sup> Thus, *The Legend of Zelda: Breath of the Wild*<sup>5</sup> is born, which returns to the origins of creating a completely open and unexplored world.

The vastness of *Breath of the Wild* is explicitly and symbolically established the moment Link runs from the Chamber of Resurrection, a confined space, to an overlook, an open space, to gaze upon Hyrule. For a brief moment, we see C. D. Friedrich's painting *Wanderer above the Sea of Fog* (1818) come to life, and just like the painted traveller, Link stands with his back turned, alone in the immensity of the landscape (Picture 1). In the distance, mountains, lakes, and valleys can be seen, which will be explored, presenting the adventure in material form within an open space. As this happens, a particular feeling arises; the music in this part introduces a desire for experimentation with the environment.

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1 NINTENDO R&D4: *The Legend of Zelda (Famicom version)*. [digital game]. Kyoto : Nintendo, 1986.

2 KENT, S.: *The Ultimate History of Video Games*. New York, NY : Three Rivers Press, 2001, p. 468.

3 Ibidem.

4 WOLF, M.: *Encyclopedia of Video Games: The Culture, Technology and Art of Gaming*. Santa Barbara, CA : Greenwood, 2021, p. 684.

5 NINTENDO EPD: *The Legend of Zelda: Breath of the Wild (Nintendo Switch version)*. [digital game]. Kyoto : Nintendo, 2017.

The excitement of exploration emerges while witnessing the beginning of an adventure behind the hero, and the space is tinged with a nostalgic 'reflective' feeling,<sup>6</sup> which persists throughout the ruined world into which the character and the player are introduced, where loneliness and the passage of time over the landscape evoke a past that cannot be accessed at the moment. This spatial nostalgia responds to the character's interaction while navigating a ruined and immense world, where the sounds of wild nature have taken over a civilization that once existed, as evidenced by abandoned buildings and temples, normalizing contemplation and reflection so that the player experiences solitude in the face of nature taking over the place. The music creates a dual harmony, first towards the connection with this space, and second, towards the musical construction<sup>7</sup> of a leitmotif that will expand throughout the gameplay, becoming part of the game's narrative itself. Hence, nostalgia is evoked even if the player has not played any other game in the Zelda franchise. After this scene, a question arises: What has happened to this world? It seems that a dense nature has buried an entire kingdom, along with a narrative that must be explored from every possible angle.



Picture 1: Game opening. Link emerges from the Chamber of Resurrection on the Great Plateau

Source: author's screenshot; NINTENDO EPD: *The Legend of Zelda: Breath of the Wild* (Nintendo Switch version). [digital game]. Kyoto : Nintendo, 2017.

Now, the relationship between the narrated world and the game's storytelling is particular to the gameplay. It presents a non-linear storytelling<sup>8</sup> that can be replayed over and over again. This means that the story can be explored through various paths and folds, which are segregated within the game's open world. In relation to the latter, it presents a space with "powerful environmentalist aesthetics and the immense pleasure of wandering through a virtualized natural world without a proper goal".<sup>9</sup> Link awakens in a post-apocalyptic time, without his memories, gazing upon a vast world and following a voice.

6 FORD, D.: The Haunting of Ancient Societies in the Mass Effect Trilogy and The Legend of Zelda: Breath of the Wild. In *Game Studies*, 2021, Vol. 21, No 4. [online]. [2023-10-25]. Available at: <[https://gamestudies.org/2104/articles/dom\\_ford](https://gamestudies.org/2104/articles/dom_ford)>.

7 For more information, see: PONS, M.: *La música de The Legend of Zelda: Breath of the Wild*. Málaga : Applehead Team Creaciones, 2022.

8 CANAVAN, G.: The Legend of Zelda in the Anthropocene. In *Paradoxa*, 2019-2020, Vol. 18, No. 31, p. 155.

9 Ibidem, p. 161.

Through gameplay and the use of different mechanics, the narrative of the wild space is understood, a space that conceals the ruins of Hyrule's golden ages. Within these ruins lies something of great value to Link – his memories. They represent what once was, what he couldn't do, and what he did in the face of his own identity as a champion. This time, Link decides to be a hero. His memories will embody the experience of having lost everything. As a champion, he was defeated along with the others, but he still has a journey to undertake as a hero. Now, in the present time of the game, Link develops a truthful version of himself in accordance with the discourse of Hyrule's prophecies – the victory of the hero.

In this sense, W. Bradford considers narrative as an “impulse to communicate, and anything that contributes to this impulse is an element of narrative”.<sup>10</sup> The narrative becomes immersive and constantly interacts with the player when they listen to its music, serving as a crucial bridge to communicate symbolism, signs, tension/relaxation situations, and, in general, any information within the gameplay. Thus, the game's narrative also includes its soundtrack, which portrays situations according to each location in Hyrule, such as places where nature or ancestral mechanics are the topics.<sup>11</sup> This is complemented by the nature of a ludonarrative structure,<sup>12</sup> where archetypal characters of good and evil are established.

It is precisely this narrative that will be reconstructed through experimentation and the adventure itself, fulfilling the two elements for the elaboration of a digital game's rhetoric: game proficiency and world design,<sup>13</sup> which must be discerned through the game mechanics.

As the space is discovered in gameplay, the player can realize that, depending on their decisions, the fragmented story of the past and the understanding of the present can be reconstructed if desired. However, the following question arises: What role does the hero Link, play in the narrative reconstruction of the game?

Based on these background details, Link's memories will be approached through a methodological analysis that establishes the aesthetic-literary dimension for the narrative reconstruction of *Breath of the Wild*, both in terms of the construction of the past and the conceptualization of the heroism attributed to Link. Likewise, the (re)construction of memory allows us to understand the heroic dimension associated with Link, not only in the characters but also in the very setting itself. All of this serves to grasp the complexity of the journey that Link undertakes, not only to save Zelda but also to safeguard the past of all of Hyrule and his own. In this way, the meaning of his role is (re)interpreted, emphasizing its significance as a hero, from the present to the past, where the key elements to establish the journey are the analysis of the memories themselves within the digital game's narrative.

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10 BRADFORD, W.: Exploring the Narrative Implications of Emerging Topics in The Legend of Zelda: Breath of the Wild. In *Journal of Sound and Music in Games*, 2020, Vol. 1, No. 4, p. 3. [online]. [2023-11-01]. Available at: <<https://doi.org/10.1525/jsmg.2020.1.4.1>>.

11 Ibidem, p. 7-15.

12 WOLF, M.: *Encyclopedia of Video Games: The Culture, Technology and Art of Gaming*. Santa Barbara, CA : Greenwood, 2021, p. 567.

13 QUIJANO, J.: *The Composition of Video Games: Narrative, Aesthetics, Rhetorics and Play*. Jefferson, NC : McFarland, 2019, p. 109-117.

# The Memories of the Hero and the Narrative Reconstruction

In the Hyrule of 100 years ago, the hero Link appears as just another character among the five champions. When the Calamity of Ganon occurs, Link is destroyed and buried in the Chamber of Resurrection as a champion, only to be resurrected a century later as a hero and find his way through the historical, social, and individual memories of the survivors and new generations of Hyruleans. Link also confronts his own memories and his own identity, witnessing his defeat and loss of everything, but also finding meaning in them as he (re)constructs himself as a hero.

The act of (re)constructing a narrative through memory involves two factors. First, the temporal aspect of storytelling, understanding time as a set of interconnected and nested times between memory and discourse.<sup>14</sup> Link becomes this memorial connection of time, becoming a paratext for the narrative of the game itself. The macro history is seen through gameplay, but the stories of the characters are experienced through the hero's experimentation. This dialogical nature of memory with history reveals the layers of the past Hyrule and, at the same time, the truth of the present. Thus, between social and historical time, memory mediates and has a narrative character of "saying the present, not just the past",<sup>15</sup> always involving a social memory of those who narrate and articulate time, including its narrative dimension, which includes "rhetorical, argumentative, interactional, and aesthetic dimensions".<sup>16</sup> These articulations "form chronotopes, forms of space-time"<sup>17</sup> where, among many things, the various images that the character lives and develops in that space-time are produced. At this point, one may wonder, do these chronotopes have a linear order?

To understand this question, one must comprehend the dimensions in which the hero operates within the narrative, not only in traversing space but also in terms of memory, which associates narrative events from any point in the story, distinguishing between the historical and the fictional, between 'virtual acts' and 'actual occurrences'.<sup>18</sup> Link's memories are necessary for the forms of evocation of a past required by the present. Their intentions are not necessarily historical; memory serves as legitimization, reclamation, or condemnation, structurally linked to current and 'updating needs'.<sup>19</sup> Link is the primary witness of the past, both in space and concerning the characters before the Calamity of Ganon. Therefore, he is needed to provide answers to the unsettling confusion and the fate of Hyrule, as well as to the new protagonists who inhabit it. In this sense, Link, metanarratively, becomes a character who helps give meaning to the leaders and warriors of the surviving tribes.

Secondly, there is the act of remembering in the tensional struggle against forgetting. At the beginning of the game, we find a hero devoid of memories, unable even to discern his own identity. Only through interaction with the space and the characters can

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14 HAYE, A. et al.: Tiempo y memoria: sobre la mediación narrativa de la subjetividad histórica. In *Revista de Estudios Sociales*, 2018, Vol. 17, No. 65, p. 22.

15 *Ibidem*, p. 25.

16 *Ibidem*.

17 *Ibidem*, p. 26.

18 GARCÍA, F.: Ética y narración audiovisual. In GARCÍA, F., RAJAS, M. (eds.): *Narrativas audiovisuales: el relato*. Madrid: Ícono 14, 2011, p. 24.

19 GALÁN, F., RUEDA, J.: Hibridación, televisión y memoria. In GARCÍA, F., RAJAS, M. (eds.): *Narrativas audiovisuales: el relato*. Madrid: Ícono 14, 2011, p. 250.

he gain access to these memories and remember who he was and who he desires to be. Thus “the tension between remembering and forgetting is constitutive of memory, not understood as a closed and immutable space where past experiences are stored as museum pieces, but as a process in time that is redefined from and through the present, open to new readings and interpretations capable of revealing other conceptions of the past and new possibilities for imagining the future”.<sup>20</sup>

Moreover, one must not forget the character of the journey. The hero is undertaking, which naturally drives the fictitious interaction with the virtual space represented, imbuing it with meanings through the player’s gameplay, not limited to mere exploration from the character’s perspective, “but rather, much like our experience of actual space, shaped by our own (albeit fictional) spatial practices”.<sup>21</sup> This spatial practice is one of the greatest features of *Breath of the Wild*, an interactive space endowed with meanings, storytelling, and mechanics to be discovered.

Another notable characteristic is the story sense, which constructs the entire game’s narrative, not just the act of traversing from point A to point B, but rather “the way players can unearth details of the world – the story sense, the narrative ambiance, is richly underscored through the item design, NPCs, and metanarrative discussions around the different games in the series and any links between them”.<sup>22</sup>

To discover Hyrule and himself, Link must not only pursue the objective and purpose of saving Zelda and the rest of the survivors of the kingdom after Ganon’s Cataclysm but also find himself. He will do so through the vastness of the world in which he awakens, a world different from what he once knew, a ruin of what Hyrule used to be. Among many things, Link must recover his memories, which will begin to unveil themselves through the space and the way he interacts with it.

This aforementioned experience goes beyond a mere intermediation between the archetypal character of Link and the player who controls him through mechanics and gameplay. It is the closeness of the protagonist to the player and the creation of strong projection bonds, due to ingenuity in the face of adversity, fighting against insurmountable odds, and being a stranger in his own world.<sup>23</sup> However, Link has a purpose, which he will fulfil by leveraging his internal resources. Nevertheless, depending on the player’s decision, Link could remain devoid of his memories throughout the game if that were their choice.<sup>24</sup> However, the exploration itself allows for almost accidental encounters with beams of light found in the corners of nature and ruins of Hyrule, which grant access to fragments of his memory.

The narrative of a digital game is based on the player’s interaction with the game system, which allows them to access the story. Thus, the player interacts with it at some point through the gameplay process, meaning that “interactive narrative”<sup>25</sup> is closely tied to the

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20 SARACENI, G.: *Escribir hacia atrás: herencia, lengua, memoria*. Rosario : Beatriz Viterbo Editora, 2008, p. 24-25.

21 VAN DE MOSSELAER, N., GUALENI, S.: Representing Imaginary Spaces, Fantasy, Fiction, and Virtuality. In GOTWALD, D., TURNER-RAHMAN, G., VAHDAT, V. (eds.): *Virtual Interiorities. Book Three. Senses of Place and Space*. Pittsburgh, PA : ETC Press, 2022, p. 37.

22 WADESON, D.: Building A Universe. In HEUSSNER, T. (ed.): *The Advance Game Narrative Toolbox*. London : CRC Press, 2019, p. 37.

23 BEAN, A.: Therapeutic Use of Video Games. In KOWERT, R., QUANDT, T. (eds.): *The Video Game Debate 2: Revisiting the Physical, Social, and Psychological Effects of Video Games*. New York, NY : Routledge, 2021, p. 86.

24 See also: VAN VUGHT, J., MITCHELL, A.: The Missing Link: Demonstrating Videogame Formalism Through an Analysis of The Legend of Zelda: Breath of the Wild. In RYAN, M. et al. (eds.): *Proceedings of DiGRA Australia 2023*, Sydney : DiGRA, p. 1-4. [online]. [2023-11-05]. Available at: <[https://digraa.org/wp-content/uploads/2023/01/2023-CAMERA-READY\\_Jasper-van-Vught.pdf](https://digraa.org/wp-content/uploads/2023/01/2023-CAMERA-READY_Jasper-van-Vught.pdf)>.

25 PANG, Q., LI, J.: *Interactive Narrative Design Methods for Video Games: A Framework Based on Game Development and Design*. Released on 7<sup>th</sup> November 2022. [online]. [2023-11-02]. Available at: <<http://dx.doi.org/10.2139/ssrn.4270227>>.

design of the digital game itself. In the case of *The Legend of Zelda: Breath of the Wild*, the plot, main and secondary characters are necessary for gameplay and the development of the story, which is conditioned by the player's immersion through the interactive narrative of the digital game.

In this context, it is understood that: "In all media, a story is never perceived exactly as it was conceived. We all possess different mental models – composed of our own feelings, thoughts, and experiences – that directly affect our individual perception of stories. Due to their abstract and subjective nature, games with a high emergent narrative may face more difficulties in communicating something more significant to players".<sup>26</sup>

Thus, a process of narrativity emerges, where "the receiver actively constructs the story provided by the narrative medium".<sup>27</sup> For *Breath of the Wild*, these narrative elements are formed through dramatic tensions and a dramatic curve, constructing an emergent narrative in which the player interacts with the game, and these elements are "contextualized by a specific story".<sup>28</sup>

Considering all of the above, it is evident that Link is a metanarrative character, encompassing the three distinctions made by K. L. Walton: a) fictional/represented memory of the avatars, b) actual/performed memory of the players, and c) virtual/imaginative memory of the virtual subjects.<sup>29</sup> Going beyond discrepancies, the act of remembering in Link will make him a character that stands out from other franchises and digital game instalments<sup>30</sup> that include memory as part of the narrative.

## Memory and Narrative in *Breath of the Wild*

In the book *Creating a Champion*, the following is introduced: "In the Great Plains, a young man awakens after having been asleep for 100 years, losing his memories. Guided by a mysterious voice, he travels through the vast lands of Hyrule on a mission to defeat Calamity Ganon and recover his memories".<sup>31</sup>

These are the two main elements that shape the narrative of the game: memory and journey. "While the century-long Restoration Sleep heals Link's wounds, it also steals his memories".<sup>32</sup> The hero had no emotions like the chosen champion from a hundred years ago. He awakens in a relatively unknown time. Only a few people who knew him before are still alive. Freed from the attention and expectations of people and with no memories of

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26 BRANDÃO, L.: *A narratividade e a narrativa emergente gerada pela mecânica nos jogos digitais: uma proposta de modelo ludonarrativo de análise*. [Dissertation Thesis]. Recife : Centro de Comunicação e Artes Departamento de Design Programa de Pós-graduação em Design, Universidade Federal de Pernambuco, 2020, p. 15. [online]. [2023-11-05]. Available at: <<https://repositorio.ufpe.br/handle/123456789/41083>>.

27 ALVES, J.: *Narratividade. E-Dicionário de Termos Literários de Carlos Ceia*. Released on 24<sup>th</sup> December 2009. [online]. [2023-11-12]. Available at: <<https://edtl.fcsh.unl.pt/encyclopedia/narratividade/>>.

28 BRANDÃO, L.: *A narratividade e a narrativa emergente gerada pela mecânica nos jogos digitais: uma proposta de modelo ludonarrativo de análise*. [Dissertation Thesis]. Recife : Centro de Comunicação e Artes Departamento de Design Programa de Pós-graduação em Design, Universidade Federal de Pernambuco, 2020, p. 45. [online]. [2023-11-05]. Available at: <<https://repositorio.ufpe.br/handle/123456789/41083>>.

29 VAN DE MOSSELAER, N., CASELLI, S.: The Narrative Effects and Value of Memory Discrepancies in Digital Games. In *Acta Ludologica*, 2022, Vol. 5, No 1, p. 30.

30 For the list of games that can be used for comparison, see: VAN DE MOSSELAER, N., CASELLI, S.: The Narrative Effects and Value of Memory Discrepancies in Digital Games. In *Acta Ludologica*, 2022, Vol. 5, No 1, p. 24-41.

31 RICHARDSON, M.: *The Legend of Zelda: Breath of the Wild. Creating a Champion*. Milwaukee, WI : Dark Horse Books, 2018, p. 59.

32 Ibidem, p. 65.

the past, the Link of this era “is more expressive and joyful than the stoic knight he was before”.<sup>33</sup> We play as him in *Breath of the Wild*, experiencing the burden of memories he carried long ago as we search for the twelve scattered memories in the vastness of space.<sup>34</sup>

As a result, another question arises: why is it necessary to remember while constructing the game’s narrative? Simply because Link’s individual memory is associated with the collective memory of Hyrule. It is important for understanding the past, comprehending the present, and envisioning the future.<sup>35</sup> Thus, the two types of long-term memory that characterize Link are explicit or declarative memory, which is a “conscious recollection of a fact or event”,<sup>36</sup> meaning selective memory. The other type is implicit memory or practical skills,<sup>37</sup> reflected in the character’s swordsmanship and agility, which surpasses that of other warriors in Hyrule.

Now, “memory is narrative in a twofold sense, as a progression of events over time and as the shaping of a plot (with actors, settings, and actions)”.<sup>38</sup> As the gameplay progresses, we understand that memory is a central substance throughout the game. The act of reconstructing memory aims to bring back meaning and remembrance. It is important to note that the surviving people of Hyrule carry the Cataclysm of Ganon latent in their memories, maintaining a ‘shared knowledge’<sup>39</sup> that grants them an identity. Two examples of these practices are reflected in characters within the game. First, there is the figure of the bard embodied by Kass, who narrates feats, myths, legends, stories, and prophecies of Hyrule. This character also evokes the macro-meaning of the adventure the hero must undertake. Second, there is Pikango, who helps find and evoke Link’s past memories into the present, giving new meaning to the century-old recollections. Both characters traverse the entire space and can be found in villages, inns, and the fields of Hyrule. Their objectives are two sides of the same coin, not to reconstruct a non-existent past, as memory is not merely a “reconstitution of the past but an exploration of the invisible”,<sup>40</sup> but rather, “transcending the boundaries of an ephemeral present, they bring to light what remains hidden behind appearances”.<sup>41</sup> While Kass traverses the space to recover stories, legends, myths, and feats, Pikango does so to represent the world of Hyrule through his paintings.

The above leads to the following question: is there a procedure for remembering? For recalling memories? In *Breath of the Wild*, the mnemonic object of ancestral technology, the Sheikah Slate, systematically arranges memories “inserting them into a spatial context that can be traversed in parts”.<sup>42</sup> As the hero uses this tablet to identify the places where he can recover his memories, he gains access to intimate experiences from the past. In this sense, the way individual memory unfolds within the collective becomes a journey in itself. In these interactions, the hero’s narrative information becomes key to giving meaning to the purpose of his journey in the present. In this regard, Link, through his individual memory, preserves elements of self-knowledge that are not collective but rather exclusive to himself.

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33 RICHARDSON, M.: *The Legend of Zelda: Breath of the Wild. Creating a Champion*. Milwaukee, WI : Dark Horse Books, 2018, p. 65.

34 BEATTY, L., PARGNEY, V.: *The Legend of Zelda: Breath of the Wild: The Complete Official Guide*. London : Piggyback, 2017, p. 98.

35 CHANGEUX, J., VERNANT, P., RICOEUR, P.: Introducción. Definiciones. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 15.

36 Ibidem, p. 28.

37 Ibidem, p. 18.

38 GARCÍA, M. J.: Las formas del recuerdo. La memoria narrativa. In *Athenea Digital*, 2004, Vol. 4, No. 6, p. 6. [online]. [2023-11-04]. Available at: <<https://raco.cat/index.php/Athenea/article/view/34157>>.

39 CHANGEUX, J., VERNANT, P., RICOEUR, P.: Introducción. Definiciones. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 21.

40 Ibidem, p. 22.

41 Ibidem.

42 Ibidem.

There are three specific examples where this is established. The first occurs during Princess Zelda's training to access her power, which leads her to undertake arduous tasks and rituals without any success. At the Spring of Power, Zelda is praying to the goddess Hylia while embracing despair for not being able to fulfil her potential (Picture 2). In this intimate moment, she confesses her thoughts and shows her vulnerability. Link is present, listening from behind, close to her, experiencing all her emotions. No one else knows about this experience except Link. No one else has seen Princess Zelda in such a delicate state as the champion has, demonstrating the humanity that exists within the archetype expected of someone who inherits one of the Triforce powers.



Picture 2: Memory #13. Slumbering Power. In Spring of Power, Zelda becomes frustrated for not being able to awaken her sealed power.

Source: author's screenshot; NINTENDO EPD: *The Legend of Zelda: Breath of the Wild* (Nintendo Switch version). [digital game]. Kyoto : Nintendo, 2017.

The second moment occurs between Link and the four fallen champions. As the Hylian champions prepare for battle, individual experiences with each of them take place. For example, we see Link listening to the arrogant Revali from the Orni tribe, who proudly expresses his opinion about having to support the chosen one who wields the Sword that Seals the Darkness. On another occasion, we see him interacting with the skilled Urbosa from the Gerudo tribe, who explains to Link the effort, displeasure, and powerlessness of Princess Zelda in not being able to awaken her power while the chosen one with the sword had already done so. We also witness his interaction with Princess Mipha, the chosen one from the Zora tribe, whom he has known since childhood (Picture 3). Mipha tells Link that she will always heal his wounds and asks if he will visit her once the battle is over. Lastly, Link encounters the powerful Daruk from the Goron tribe, who encourages him to continue defending and fulfilling his duty, even though he knows that Princess Zelda is tough on Link. In these four moments, we see fragments of the champions' personalities, representing the identity of their tribes, and we also see the affection the hero has for them.

A third moment is found in the Post-Calamity period when Link escapes with the Princess after the champions have fallen and much of the kingdom is already destroyed. Here, we witness Zelda's decline into sorrow, on the verge of giving up, mourning the death of the champions. We can see a unique moment of intimacy when Link comforts her with his embrace amidst a powerful storm (Picture 4).



Picture 3: Memory #10. Mipha's Touch. Above Vah Ruta, Link and Mipha discuss the future of Hyrule and the trials that will come.

Source: author's screenshot; NINTENDO EPD: *The Legend of Zelda: Breath of the Wild* (Nintendo Switch version). [digital game]. Kyoto : Nintendo, 2017.



Picture 4: Memory #16, Despair. In Northeast from the Bottomless Swamp, Zelda falls into despair while fleeing from the Cataclysm's destruction over Hyrule, the death of her father, King Rhoam, and Four the Champions

Source: author's screenshot; NINTENDO EPD: *The Legend of Zelda: Breath of the Wild* (Nintendo Switch version). [digital game]. Kyoto : Nintendo, 2017.

In these three moments, Link attempts to “reconstruct the individual past and project one’s own identity into the consciousness of each person”.<sup>43</sup> Moreover, a particular situation arises in the recovery of memories, as testimonial memory occurs within the protagonist’s own consciousness. Link is a witness to himself, observing himself through his memories, a century after the events occurred. He can affirm that what existed, that he was there, and that there are witnesses to it, as the ‘others’ are no longer present.<sup>44</sup>

43 CHANGEUX, J., VERNANT, P., RICOEUR, P.: Introducción. Definiciones. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 24.

44 Ibidem, p. 26-27.

On the other hand, Link is part of a collective memory of the Cataclysm. He is one of the few survivors and embodies the discourse of a ruined, defeated, and fallen Hyrule. Link is a living memory, bridging the past and the present, the individual and the collective. This allows us to understand the function of history for memory and its role as a debt to what was, just like the abilities of the guardians, the empowering objects, the emotional relationships with the champions and Zelda. Link becomes a sort of archon of the memories of past and present Hyrulians who survived the Cataclysm, in the face of the destruction of memory itself and the significant loss of the history of those who came before. Since it is not very safe to communicate the memory of the past to others, the aesthetic and figurative name of Link is powerful; he is a character from the past who now lives in the present, 100 years later.

Regarding the narrative and considering the strong oral tradition in Hyrule, the fragments of the story are the involuntary result of a previous selection, which is subjective and random. This can be reflected in the NPCs of the game, many of whom assume the role of telling the story through the perspective of the defeated. In addition, there are two additional ways to record and preserve memory in the kingdom of Hyrule. On one hand, there are various books, which are records that can be seen in the characters' journals: King Rhoam Bosphoramus, Paya, the warriors of the tribes, the cooks, travellers, etc., also turning Hyrule's collective memory into an "archived collective memory".<sup>45</sup> On the other hand, there are various statues of the goddess Hylia, some dark and others reminiscent of past heroes, as well as memorials of great deeds by the Gerudo, Goron, Zora, Orni, and Hylia, scattered throughout the game map. In this sense, J. Le Goff stated that the document and the monument are elements that perpetuate historical and social memory, with the monument being "everything that can bring back the past, perpetuate the memory",<sup>46</sup> and the document being historical evidence.

The journey undertaken by the player in *Breath of the Wild* will vary based on the decisions they make. If desired, they can directly confront Ganon, or they can follow the story according to the characters they encounter in the open world they must explore. They can also choose to only explore and discover the events for themselves, or even ignore them to fulfil the main storyline of the adventure. In these situations, the player can access the memories that Link has of what happened 100 years after Ganon's destruction of Hyrule, both his pre- and post-cataclysm memories.

This style of storytelling belongs to the fragmented narrative, in which the player must piece together the narrative puzzle of the protagonist's memories since "they probably won't unlock them in order".<sup>47</sup> Due to this, "the kingdom of Hyrule is organically filled with emergent micro-stories [...] in this case, the player, according to their actions, creates their own (micro) narrative".<sup>48</sup> This also applies to: "Missions that require going from point A to point B, [which] don't have the player on a specific and obligatory path to follow. What will happen at those points A and B is the same for all players. But it will be a completely different journey, with each player having their own narrative. The player doesn't even necessarily have to go directly to point B, while others may perform actions or missions, or directly abandon that mission".<sup>49</sup>

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45 CHANGEUX, J., VERNANT, P., RICOEUR, P.: Introducción. Definiciones. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 27.

46 LE GOFF, J.: *El orden de la memoria. El tiempo como imaginario*. Barcelona : Paidós, 1991, p. 228.

47 JARAMAGO, A.: *Bideo-joko narratibaren gaitasunak. Bi kasuren azterketa: The Last of Us eta The Legend of Zelda: Breath of the Wild*. [Master Thesis]. Leioa : Facultad de Ciencias Sociales y de la Comunicación. Universidad del País Vasco, 2021, p. 38-39. [online]. [2023-11-10]. Available at: <<https://addi.ehu.es/handle/10810/55617?show=full>>.

48 JARAMAGO, A.: *Bideo-joko narratibaren gaitasunak. Bi kasuren azterketa: The Last of Us eta The Legend of Zelda: Breath of the Wild*. [Master Thesis]. Leioa : Facultad de Ciencias Sociales y de la Comunicación. Universidad del País Vasco, 2021, p. 40. [online]. [2023-11-10]. Available at: <<https://addi.ehu.es/handle/10810/55617?show=full>>.

49 Ibidem, p. 41.

# Conclusion:

## The Role of the Hero in Memory and Narrative as Personal Experience

“Digital games involve the planning of a dynamic, consistent, and reactive world capable of absorbing all player actions and providing simultaneous diegetic, rewarding, and challenging responses that keep you immersed and engaged”.<sup>50</sup> In this way, the player takes ownership of the immediate object, which is the character, Link in this case, giving rise to gameplay that goes beyond the plot “where the character becomes a blank slate upon which we add details and experiences as we uncover them”,<sup>51</sup> providing a character creation mechanism that takes on a much more prominent role, beyond the needs of their background: “recovering an object, saving someone, or defeating an evil entity that pursues us”.<sup>52</sup>

The manipulation of time, in this case being a digital game, occurs in the narration of a world that is not alien to the protagonist but rather events that directly impact their life. If the protagonist accepts and becomes involved in these events, their real life is (re)interpreted through meaning, changing their feelings and thoughts in symbolic and aesthetic planes of memory and the events that have taken place. Link directly intervenes in his socio-political context, taking the initiative rather than merely reacting to events. As Link’s memories are recalled and assimilated, his identity is not left intact; his personal life is interpreted through the socio-political events he carries out. In this sense, the protagonist is (re)signified as their identity is unveiled through their own memories and those of other characters.

The reproduction of memory not only allows for the reconstruction of the past but also “to distance oneself from the present and generate from this distance images that liberate social and individual thought from the task of recognition-based reproduction, opening dimensions of historicity that in turn frame plural historical and subjective times, so that action can respond to distant conditions and voices, and not just to immediate ones”.<sup>53</sup>

The champions, including Link, are those distant voices who subjectively manage to involve themselves in the meaning of the present through their memories and the dialogue they establish with the protagonist as they act in the story.

Based on all of the above, it can be concluded that Link experienced a loss in three dimensions: his memory itself, the memories of his friends and acquaintances, and his own space, the glorious Hyrule before the cataclysm. Accompanying these losses is a setting of solitude that, in no case, presents itself as a negative effect on the hero or the player. In fact, the game and its narrative have allowed some players to better understand their loneliness and feel more comfortable with themselves in this situation.<sup>54</sup>

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50 BRANDÃO, L.: *A narratividade e a narrativa emergente gerada pela mecânica nos jogos digitais: uma proposta de modelo ludonarrativo de análise*. [Dissertation Thesis]. Recife : Centro de Comunicação e Artes Departamento de Design Programa de Pós-graduação em Design, Universidade Federal de Pernambuco, 2020, p. 117. [online]. [2023-11-05]. Available at: <<https://repositorio.ufpe.br/handle/123456789/41083>>.

51 TATO, G.: Análisis del personaje en el cine y en los videojuegos. Inmersión y empatía. In *Quaderns de Cine*, 2017, Vol. 12, No. 1, p. 108. [online]. [2023-11-14]. Available at: <<http://dx.doi.org/10.14198/QdCINE.2017.12.09>>.

52 Ibidem, p. 109.

53 HAYE, A. et al.: Tiempo y memoria: sobre la mediación narrativa de la subjetividad histórica. In *Revista de Estudios Sociales*, 2018, Vol. 17, No. 65, p. 31.

54 For example, see: LAY, C.: The Legend of Zelda: Breath of the Wild as Philosophy: Teaching the Player to Be Comfortable Being Alone. In JOHNSON, D. et al. (eds.): *The Palgrave Handbook of Popular Culture as Philosophy*. Cham : Palgrave Macmillan, 2022, p. 1-24. [online]. [2023-11-01]. Available at: <[https://doi.org/10.1007/978-3-319-97134-6\\_107-1](https://doi.org/10.1007/978-3-319-97134-6_107-1)>.

The powerful effect of reconstructing the game's narrative through its mechanics and gameplay allows for the realization of something much more implicit. Link forgets, that is, he detaches himself from his past and lightens the burden he carries.<sup>55</sup> In this way, he can make new promises, such as the archetype of Zelda games: to save Princess Zelda by defeating Ganon(dorf), whereas before he was only limited to protecting Zelda. Also, it is concluded that Link is the connection between narrative and space, between memory and the present. As mentioned by D. Lecourt et al: "History does not teach us to act [...] however, it is the memory of the past that tells us why we are who we are and confers our identity".<sup>56</sup>

Regarding the testimonial narrative of the game, due to a traumatic and contextual situation, the surviving Hyrulians and their subsequent generations have not forgotten; rather, they strive to live with this identity and even be part of the resistance. In other words, the survivors of Hyrule are witnesses.

Finally, Link is a hero with memory, witness to his own death, and we have the opportunity to know this through him, to (re)interpret his present through his past. This experience is complete in both the player and Link. The legend of what was is also an important part of what will be. Outside the overarching narrative of *The Legend of Zelda: Tears of the Kingdom*<sup>57</sup>, where the story presents an adventure that transcends and folds through time, in *Breath of the Wild*, it will be through Link, in an intimacy shared by the player, who will witness the entire story and the path this hero will undertake, so the journey will be through memory, (re)constructing his present.

## BIBLIOGRAPHY

- ALVES, J.: *Narratividade. E-Dicionário de Termos Literários de Carlos Ceia*. Released on 24<sup>th</sup> December 2009. [online]. [2023-11-12]. Available at: <<https://edtl.fcsh.unl.pt/encyclopedia/narratividade/>>.
- BEAN, A.: Therapeutic Use of Video Games. In KOWERT, R., QUANDT, T. (eds.): *The Video Game Debate 2: Revisiting the Physical, Social, and Psychological Effects of Video Games*. New York, NY : Routledge, 2021, p. 81-94.
- BEATTY, L., PARGNEY, V.: *The Legend of Zelda: Breath of the Wild: The Complete Official Guide*. London : Piggyback, 2017.
- BRADFORD, W.: Exploring the Narrative Implications of Emerging Topics in The Legend of Zelda: Breath of the Wild. In *Journal of Sound and Music in Games*, 2020, Vol. 1, No. 4, p. 1-21. ISSN 2578-3432. [online]. [2023-11-01]. Available at: <<https://doi.org/10.1525/jsmg.2020.1.4.1>>.
- BRANDÃO, L.: *A narratividade e a narrativa emergente gerada pela mecânica nos jogos digitais: uma proposta de modelo ludonarrativo de análise*. [Dissertation Thesis]. Recife : Centro de Comunicação e Artes Departamento de Design Programa de Pós-graduação em Design, Universidade Federal de Pernambuco, 2020. [online]. [2023-11-05]. Available at: <<https://repositorio.ufpe.br/handle/123456789/41083>>.
- CANAVAN, G.: The Legend of Zelda in the Anthropocene. In *Paradoxa*, 2019-2020, Vol 18. No. 31, p. 145-170. ISSN 1079-8072.
- FORD, D: The Haunting of Ancient Societies in the Mass Effect Trilogy and The Legend of Zelda: Breath of the Wild. In *Game Studies*, 2021, Vol. 21, No 4. ISSN 1604-7982. [online]. [2023-10-25]. Available at: <[https://gamestudies.org/2104/articles/dom\\_ford](https://gamestudies.org/2104/articles/dom_ford)>.

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55 RÉMOND, R., RICOEUR, P., SCHNAPPER, D.: La memoria contra el olvido. In BARRET-DUCROCQ, F. (ed.) *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 75.

56 LECOURT, D. et al.: ¿Sólo puede construirse el futuro sobre la memoria del pasado?. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 185.

57 NINTENDO EPD: *The Legend of Zelda: Tears of the Kingdom (Nintendo Switch version)*. [digital game]. Kyoto : Nintendo, 2023.

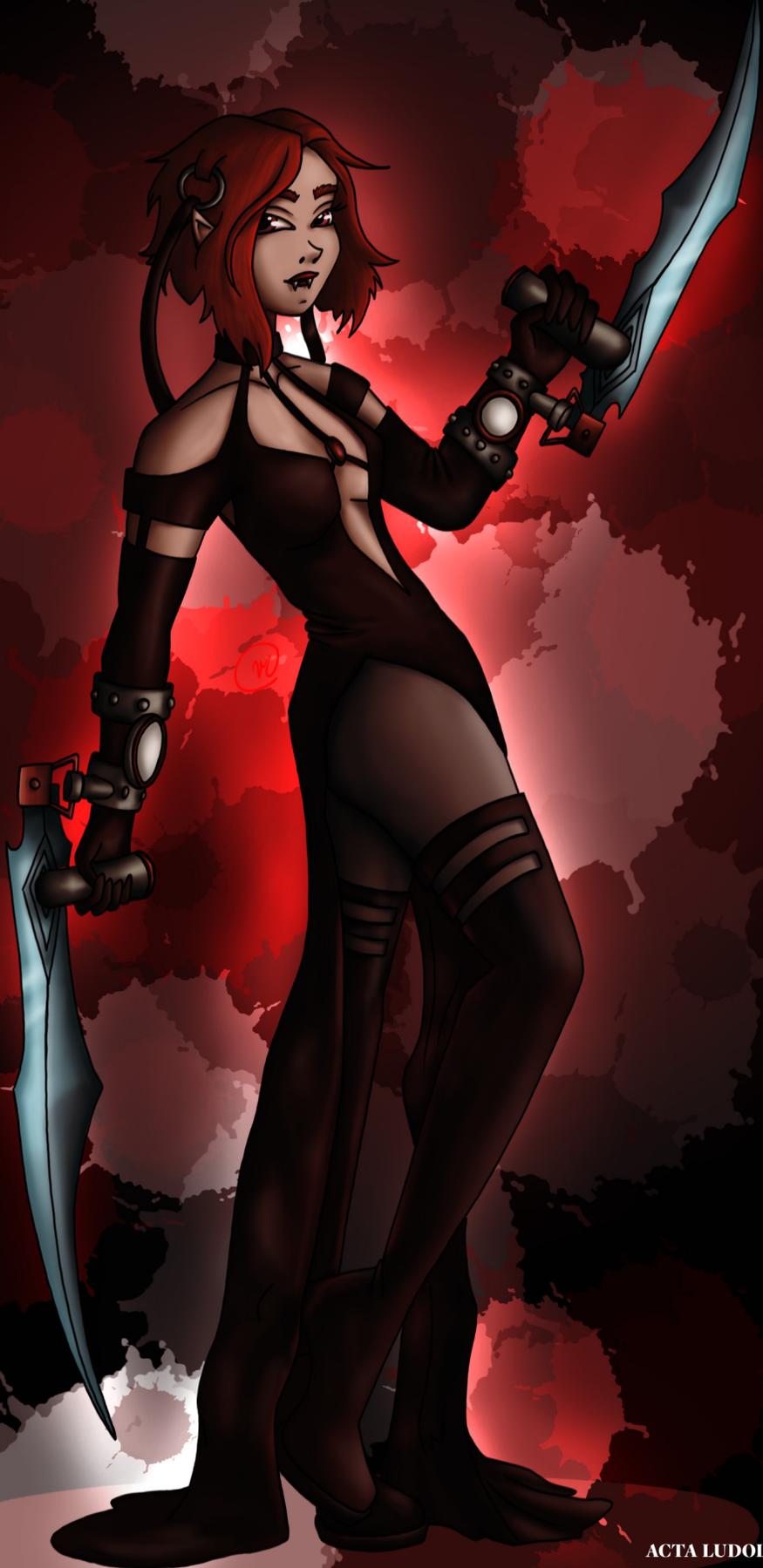
- GALÁN, F., RUEDA, J.: Hibridación, televisión y memoria. In GARCÍA, F., RAJAS, M. (eds.): *Narrativas audiovisuales: el relato*. Madrid : Ícono 14, 2011, p. 243-265.
- GARCÍA, F.: Ética y narración audiovisual. In GARCÍA F., RAJAS, M. (eds.): *Narrativas audiovisuales: el relato*. Madrid : Ícono 14, 2011, p. 13-34.
- GARCÍA, M. J.: Las formas del recuerdo. La memoria narrativa. In *Athenea Digital*, 2004, Vol. 4, No. 6, p. 1-16. ISSN 2014-4539. [online]. [2023-11-04]. Available at: <<https://raco.cat/index.php/Athenea/article/view/34157>>.
- HAYE, A. et al.: Tiempo y memoria: sobre la mediación narrativa de la subjetividad histórica. In *Revista de Estudios Sociales*, 2018, Vol. 17, No. 65, p. 22-35. ISSN 0123-885X.
- CHANGEUX, J., VERNANT, P., RICOEUR, P.: Introducción. Definiciones. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 15-28.
- JARAMAGO, A.: *Bideo-joko narratibaren gaitasunak. Bi kasuren azterketa: The Last of Us eta The Legend of Zelda: Breath of the Wild*. [Master Thesis]. Leioa : Facultad de Ciencias Sociales y de la Comunicación. Universidad del País Vasco, 2021. [online]. [2023-11-10]. Available at: <<https://addi.ehu.es/handle/10810/55617?show=full>>.
- KENT, S.: *The Ultimate History of Video Games*. New York, NY : Three Rivers Press, 2001.
- LAY, C.: The Legend of Zelda: Breath of the Wild as Philosophy: Teaching the Player to Be Comfortable Being Alone. In JOHNSON, D. et al. (eds.): *The Palgrave Handbook of Popular Culture as Philosophy*. Cham : Palgrave Macmillan, 2022, p. 1-24. [online]. [2023-11-01]. Available at: <[https://doi.org/10.1007/978-3-319-97134-6\\_107-1](https://doi.org/10.1007/978-3-319-97134-6_107-1)>.
- LE GOFF, J.: *El orden de la memoria. El tiempo como imaginario*. Barcelona : Paidós. 1991.
- LECOURT, D. et al.: ¿Sólo puede construirse el futuro sobre la memoria del pasado?. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 183-218.
- NINTENDO EPD: *The Legend of Zelda: Breath of the Wild (Nintendo Switch version)*. [digital game]. Kyoto : Nintendo, 2017.
- NINTENDO EPD: *The Legend of Zelda: Tears of the Kingdom (Nintendo Switch version)*. [digital game]. Kyoto : Nintendo, 2023.
- NINTENDO R&D4: *The Legend of Zelda (Famicom version)*. [digital game]. Kyoto : Nintendo, 1986.
- PANG, Q., LI, J.: *Interactive Narrative Design Methods for Video Games: A Framework Based on Game Development and Design*. Released on 7<sup>th</sup> November 2022. [online]. [2023-11-02]. Available at: <<http://dx.doi.org/10.2139/ssrn.4270227>>.
- PONS, M.: *La música de The Legend of Zelda: Breath of the Wild*. Málaga : Applehead Team Creaciones, 2022.
- QUIJANO, J.: *The Composition of Video Games: Narrative, Aesthetics, Rhetorics and Play*. Jefferson, NC : McFarland, 2019.
- RÉMOND, R., RICOEUR, P., SCHNAPPER, D.: La memoria contra el olvido. In BARRET-DUCROCQ, F. (ed.): *¿Por qué RECORDAR? Foro Internacional Memoria e Historia. Unesco, 25, marzo 1998, La Sorbonne, 26 marzo, 1998*. Barcelona : Ediciones Granica, 2002, p. 69-85.
- RICHARDSON, M.: *The Legend of Zelda: Breath of the Wild. Creating a Champion*. Milwaukee, WI : Dark Horse Books, 2018.
- SARACENI, G.: *Escribir hacia atrás: herencia, lengua, memoria*. Rosario : Beatriz Viterbo Editora, 2008.
- TATO, G.: Análisis del personaje en el cine y en los videojuegos. Inmersión y empatía. In *Quaderns de Cine*, 2017, Vol. 12, No. 1, p. 105-117. ISSN 1888-4571. [online]. [2023-11-14]. Available at: <<http://dx.doi.org/10.14198/QdCINE.2017.12.09>>.
- VAN DE MOSSELAER, N., CASELLI, S.: The Narrative Effects and Value of Memory Discrepancies in Digital Games. In *Acta Ludologica*, 2022, Vol. 5, No 1, p. 24-41. ISSN 2585-8599.

VAN DE MOSSELAER, N., GUALENI, S.: Representing Imaginary Spaces. Fantasy, Fiction, and Virtuality. In GOTWALD, D., TURNER-RAHMAN, G., VAHDAT, V. (eds.): *Virtual Interiorities. Book Three. Senses of Place and Space*. Pittsburgh, PA : ETC Press, 2022, p. 21-44.

VAN VUGHT, J., MITCHELL, A.: The Missing Link: Demonstrating Videogame Formalism Through an Analysis of The Legend of Zelda: Breath of the Wild. In RYAN, M. et al. (eds.): *Proceedings of DiGRA Australia 2023*, Sydney : DiGRA, p. 1-4. [online]. [2023-11-05]. Available at: <[https://digraa.org/wp-content/uploads/2023/01/2023-CAMERA-READY\\_Jasper-van-Vught.pdf](https://digraa.org/wp-content/uploads/2023/01/2023-CAMERA-READY_Jasper-van-Vught.pdf)>.

WADESON, D.: Building a Universe. In HEUSSNER, T. (ed.): *The Advance Game Narrative Toolbox*. London : CRC Press, 2019, p. 33-49.

WOLF, M.: *Encyclopedia of Video Games: The Culture, Technology and Art of Gaming*. Santa Barbara, CA : Greenwood, 2021.



# Gamer Identity: How Playing and Gaming Determines How Those Engaged in Gaming See Themselves

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## ABSTRACT:

The issue with gamer identity has been troubling researchers for the last decade. Despite trying to assign different parameters such as time spent playing, individuals themselves do not identify along such lines and the reasons why one person defines themselves as a gamer and another does not have not been clear. The goal of this paper to demonstrate, by applying B. Suits ontology of games and understanding identity in accordance with H.-G. Moeller's concept of proficity as a form of identity construction, the existence of two separate constructs of the gamer label. To demonstrate this, a series of interviews were conducted with two groups of people engaged in gaming: those who sought fun and those that desired winning. Both groups show clear differences in self-identification with their identity and the observed differences explain inconsistencies and issues observed by prior studies. Playing for fun is a factor that acts against seeing oneself as a gamer while playing to win is a factor inducive towards identifying as a gamer. Those that seek winning are likely to seek validation of their identity by comparing themselves to known gamer influencers while those that prefer playing over gaming will construct their definition of a gamer in an authentic manner.

## KEY WORDS:

digital game culture, digital games, gamer identity, proficity, second-order observations.

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# Introduction

'Who is a gamer' is a question that has been touched upon by numerous researchers and scholars,<sup>1</sup> along with the similar question 'what does it mean to be a gamer'. While it may seem semantic in nature, such questions are important to answer, as, especially in current research in the field, the label gamer is used as a variable and predictor. Research titles such as "personal distress as a mediator between self-esteem, self-efficacy, loneliness and problematic video gaming in female and male emerging adult gamers"<sup>2</sup> demonstrate this. The problem with answering this question is its interchangeability between the term 'gamers' and the phrase 'people who play games'. As D. Muriel and G. Crawford have shown,<sup>3</sup> what it means to be a gamer varies from individual to individual. This goes in tangent with popular culture and general stereotypes. Historically, people perceived the

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1 For more information, see: ĆWIL, M., HOWE, W.: Cross-Cultural Analysis of Gamer Identity: A Comparison of the United States and Poland. In *Simulation & Gaming*, 2020, Vol. 51, No. 6, p. 785-801.; MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018.; HOWE, W. et al.: Concerning Gamer Identity: An Examination of Individual Factors Associated with Accepting the Label of Gamer. In *First Monday*, 2019, Vol. 24, No. 3, p. 1-20. [online]. [2023-11-15]. Available at: <<https://firstmonday.org/ojs/index.php/fm/article/view/9443>>; SHAW, A.: Do You Identify as a Gamer? Gender, Race, Sexuality, and Gamer Identity. In *New Media & Society*, 2012, Vol. 14, No. 1, p. 28-44.

2 CUDO, A., KOPIŚ, N., ZABIELSKA-MENDYK, E.: Personal Distress as a Mediator Between Self-Esteem, Self-Efficacy, Loneliness and Problematic Video Gaming in Female and Male Emerging Adult Gamers. In *PloS One*, 2019, Vol. 14, No. 12, p. 1. [online]. [2023-11-16]. Available at: <<https://journals.plos.org/plosone/article?id=10.1371/journal.pone.0226213>>.

3 See: MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018.

label gamer to be associated with white, pale skinned men with poor social skills,<sup>4</sup> as well being associated with misogyny.<sup>5</sup> Recent studies, however, show that the demographics are changing with more diverse groups playing specific games<sup>6</sup> who perceive the term differently and are actively engaged in changing the perception of gamers – as they see it. Other recent studies in the area of gamer identity focus on the *body* aspect of identity<sup>7</sup> (as in creating an avatar that reflects how one sees themselves as opposed to their own body), a topic which this paper will not discuss, and will focus instead on the division between *mind* and *society*. Research such as G. Crawford and D. Muriel's work shows how difficult it is to understand the label as each respondent gave their own, almost unique answer to the question. Further still, using time spent playing as a metric deciding who is a gamer has proven ineffective as either time spent playing is underestimated by individuals, especially women<sup>8</sup> or excludes those that no longer play themselves but enjoy reading about games and regularly watching others play. Therefore, the questions 'who is a gamer' and 'what is a gamer' remain without satisfactory answers. All that is known is that different groups and individuals have different definitions and explanations. We agree with prior research that the most accurate way to understand who is a gamer is achieved by asking those who play games themselves if they consider themselves as such.

This paper will demonstrate, primarily through a qualitative study, how two factors play a vital role in shaping how individuals identify in relation to gaming: whether one plays or games. These two concepts are taken from B. Suit's conceptualization and definition of games, where games evolve from play but still contain elements of it.<sup>9</sup> In order to give context to this division – especially in our current era, a theory of identity formation is provided based on H-G. Moeller's concepts.<sup>10</sup> By understanding that identity, especially for gamers, is primarily performed digitally, the application of H-G. Moeller's concept of profile-based identity construction, or proficity, is used to clarify the answers provided by respondents. The paper will demonstrate that individuals not only reference other profiles when seeking references to who or what a gamer is/looks like, those that prefer playing over gaming will either trend towards rejecting the label of gamer or perform their identity in a non-profilic fashion. By establishing this distinction between play and game, this paper aims to build on studies such as B. Yim et al.<sup>11</sup> where the population studied belongs to dedicated gamer groups with aspirations of becoming professional gamers.

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4 See also: McCCLURE, R. F., MEARS, F. G.: Video Game Players: Personality Characteristics and Demographic Variables. In *Psychological Reports*, 1984, Vol. 55, No. 1, p. 271-276.

5 For example, see: McCULLOUGH, K. M., WONG, Y. J., STEVENSON, N. J.: Female Video Game Players and the Protective Effect of Feminist Identity Against Internalized Misogyny. In *Sex Roles: A Journal of Research*, 2020, Vol. 82, No. 5-6, p. 266-276.

6 See: WILLIAMS, D., YEE, N., CAPLAN, S. E.: Who Plays, How Much, and Why? Debunking the Stereotypical Gamer Profile. In *Journal of Computer-Mediated Communication*, 2008, Vol. 13, No. 4, p. 993-1018.; PAAËN, B., MORGENROTH, T., STRATEMEYER, M.: What Is a True Gamer? The Male Gamer Stereotype and the Marginalization of Women in Video Game Culture. In *Sex Roles: A Journal of Research*, 2017, Vol. 76, No. 7-8, p. 421-435.

7 For more information, see: KIYIJÄRVI, M., KATILA, S.: Becoming a Gamer: Performative Construction of Gendered Gamer Identities. In *Games and Culture*, 2022, Vol. 17, No. 3, p. 461-481. [online]. [2023-11-01]. Available at: <<https://journals.sagepub.com/doi/10.1177/15554120211042260>>.

8 See also: WILLIAMS, D. et al.: Looking for Gender: Gender Roles and Behaviors among Online Gamers. In *Journal of Communication*, 2009, Vol. 59, No. 4, p. 700-725.

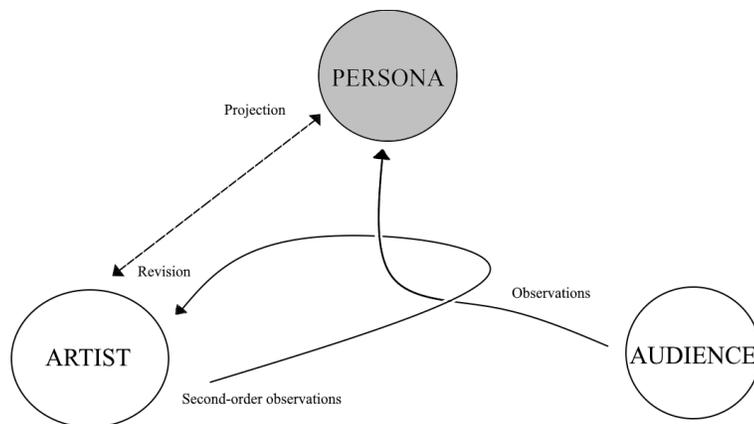
9 For example, see: SUITS, B.: Tricky Triad: Games, Play, and Sport. In *Journal of the Philosophy of Sport*, 1988, Vol. 15, No. 1, p. 1-9.

10 For more information, see: MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021.

11 YIM, B. et al.: The Gamer Identity Scale: A Measure of Self Concept as a Video Gamer. In *Computers in Human Behavior*, 2023, Vol. 138, No. 3. [online]. [2023-11-01]. Available at: <<https://linkinghub.elsevier.com/retrieve/pii/S0747563222002965>>.

# Identity in the Digital Age

What is identity and how does it manifest itself in the digital age? Overall, identity can be understood as a set of “kits of cultural tools that people utilize to define and understand themselves and others and to act in a concrete way”.<sup>12</sup> The meaning of identity and the way we understand it has changed. The plethora of postmodern theories<sup>13</sup> illustrates the uncertainty of the concept and its meaning while modernity declines. We agree that this situation of uncertainty is also about uncertainty of meaning which feeds into unstable identity formation.<sup>14</sup> People find it hard to establish an identity without the need to consume in this period as late-stage capitalism has intrinsically tied identity formation with consumption. Historically, games were marketed as a male pastime with early digital games being designed with a male player in mind – this is reflected in studies showing the majority of people playing games at the time were indeed white males.<sup>15</sup> As Z. Bauman noticed, individuals are no longer as certain of their identities as they were in production-based societies.<sup>16</sup> Under consumerism, constant curation of one's identity is required if it is to be validated. Having said this, all these ideas neglect the key aspect of identity underlined by theorists N. Luhmann and E. Goffman: the observer and the mask/persona.<sup>17</sup> The mask is the necessary part for the social to understand the individual. How one chooses to construct the mask of the self, what technologies and strategies one employs is vital in order to understand that person more so than asking them who they are, as in most cases this occurs without conscious effort (Picture 1). Does one's identity construction necessitate validation from others and how much can one control what one chooses to perform? After all, identity is a performative act.



Picture 1: The nature of the mask of identity – the impact of second order observations on the performer

Source: own processing; FORMILAN, G., STARK, D.: Moments of Identity: Dynamics of Artist, Persona, and Audience in Electronic Music. In *Theory and Society*, 2023, Vol. 52, No. 1, p. 42.

- 12 GUITART, E.: The Consumer Capitalist Society and Its Effects in Identity: A Macro Cultural Approach. In *Revista Psicología Política*, 2011, Vol. 11, No. 21, p. 159.
- 13 See: BAUMAN, Z.: *Liquid Modernity*. Cambridge : Polity, 2000.; GIDDENS, A.: *Runaway World: How Globalisation is Reshaping Our Lives*. London : Profile Books, 2002.; LYOTARD, J.-F.: *The Postmodern Condition: A Report on Knowledge*. Minneapolis, MN : University of Minnesota Press, 1984.
- 14 MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018, p. 144-162.
- 15 McCLURE, R. F., MEARS, F. G.: Video Game Players: Personality Characteristics and Demographic Variables. In *Psychological Reports*, 1984, Vol. 55, No. 1, p. 271-276.
- 16 BAUMAN, Z.: *Liquid Life*. Cambridge : Polity, 2005, p. 3.
- 17 CALHOUN, C. et al.: *Contemporary Sociological Theory*. Malden, MA, Oxford : Wiley-Blackwell, 2012, p. 46-54.; LUHMANN, N.: *Theory of Society, Volume 1*. Redwood City, CA : Stanford University Press, 2012, p. 236-238.

The picture above is taken from a study interested in musical artists and how they construct their identities.<sup>18</sup> By using Luhmanian second-order observations, and the notion of personas, D. Stark and G. Formilan show how there is a constant curation of the identity based on feedback of second-order observations. For N. Luhmann, these observations refer to, in simplistic terms, reacting to what others say and do.<sup>19</sup> As seen in the picture above, the artist's persona is validated by the audience and revisions are made in response to the feedback given. In gaming this is near identical. One creates a profile and curates it to reflect one's own identity. One receives feedback from observers and based on the observations of observers one modifies and revises the persona to better match the expectations of the audience. Take a hypothetical gamer who constructs their identity around being good at a specific role in a team based game. He will display metrics of success and advertise himself in numerous ways to demonstrate this fact about himself. Yet, if he fails to meet these expectations in practice, the audience (fellow players and peers) will consider his persona disingenuousness leading to a crisis of identity. The individual might declare and promote himself as being good at his role, but the observers will disagree and undermine his self-construct. Identity therefore is an amalgamation of societal observation, individual second-order observation and the individual constructing their persona/mask as a reflection of the mind, body and society as per N. Luhmann's definition of the core elements of identity construction.

Going back to the basic definition of identity, another question needs answering – what kind of kits of cultural tools are available and prevalent? How do people construct themselves in relation to second order observations? Philosophers H-G. Moeller and P. J. D'Ambrosio present their concept of the procession of technology of identity up until 2020. By building on prior works, they establish the procession going from identity based on sincerity, which transitions into authenticity being the dominant form of identity formation in modernity towards the current dominant trend they call profilicity. Sincerity as identity is defined as the demand to commitment to roles. The outside is real, and the inside must back it up honestly, otherwise it is considered a dishonest fake.<sup>20</sup> This technology has been with humanity for the vast majority of our existence as a society. One's identity was tied to the role one played within society and any deviation from the expected behaviour assigned to that role was seen as insincere. Authenticity is the opposite of this logic – it demands the pursuit of originality. The inside is real, and the outside must be an accurate representation of it, otherwise it is considered a *hypocritical façade*.<sup>21</sup> Thus, under an authenticity-based technology of identity, society and our roles within it become the oppressor, the labels that need to be disinherited in order to achieve a 'true' identity based on how one feels on the inside. These two concepts of the technology of identity are familiar to those well versed with M. Luhmann and M. McLuhan. These identities are still present within the current developed world and are still being curated by communities. What H-G. Moeller and P. J. D'Ambrosio propose is that since the proliferation of social media after 2004 (when Facebook launched), a new technology of identity has proliferated. Profilicity, as they call it, demands the curation of profiles.<sup>22</sup> The outside is real, and the inside must be truly invested in it, otherwise it is considered a deceptive fraud. What

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18 See: FORMILAN, G., STARK, D.: Moments of Identity: Dynamics of Artist, Persona, and Audience in Electronic Music. In *Theory and Society*, 2023, Vol. 52, No. 1, p. 35-64.

19 LUHMANN, N.: *Theory of Society, Volume 2*. Redwood City, CA : Stanford University Press, 2013, p. 330-332.

20 MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021, p. 135-163.

21 Ibidem, p. 163-193.

22 MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021, p. 35-135.

they are arguing here is that all forms of identification online are moving towards measuring oneself up to a standard set by our internal expectations of what others see in us. This has become even more pronounced, they argue, with the rise in popularity of influencers, hosts and social media celebrities but is not limited to their influence on individuals. Rather, it is an expression of the collective will of others who comment, like, subscribe, comment, upvote and so on. How one views oneself becomes focused on how others react to us, events and others based on online rankings. An example of how this affects gaming identity is the popularity of certain gaming styles over others. Playing games designed for one player on a streaming platform is a fairly common practice, yet it is considered 'un-gamerlike' to use cheats when playing by oneself – regardless if it is authentic to one's own style of play/gaming. At the same time using exploits in the code of the game (programming errors) is considered acceptable and part of the gamer culture – even though the outcome is the same as with cheating – the only difference is semantics. The true gamer will play the correct way – the way that is chosen by the consensus of specific people who like, comment, subscribe, upvote and so on. The gamer will play games that communities of engaged gamers recommend – for the engaged gamer, is active online and will write reviews, comment on videos/streams and press the like button on YouTube. Thus, the validation of one's identity becomes tied to how popular online that identity is. If a game is unpopular and has garnered outrage in some form or another, it is not a valid part of what gamers are and liking it will result in a lack of credibility as a gamer from others.

Profilicity, with the procession of the technology of identity still coexists with authenticity and sincerity. This is explained by M. McLuhan in his rear view mirror analogy: as the new technology replaces the old, it tries to appear familiar and garner a sense of security by appearing as part of the old.<sup>23</sup> In a sense we are all driving in a car, looking in the rear-view mirror as if it is still part of reality, even though what is ahead is vastly different than the old. In gaming identity this would be the desire of individuals to appear authentic while curating their profile. Their goal is to appear authentic to others – the viewers, readers, listeners and so on. But the means by which they achieve this is through profilicity. If a woman wants to be an 'authentic' gamer, she must have all the props that come with performing the gamer identity tied to her online profile, and the validation of her as a gamer comes from the community which she decided to join. She cannot just say she likes digital games. Her profile needs to resemble that of other gamers, who are seen to be predominantly male, or influencer gamer girls that are references to what a woman in gaming should be like – simply based on the popularity which validates that reference. The audience who validates the identity does so not based on knowing the performer, but the profile of the performer. The reference to the real is not the inner self as is the case with authenticity, but what the person curates on their profile.

Reality in gaming is the perception of the majority. When choosing which gaming community to join, one does research. This involves looking at others playing a game, reviewing it, enjoying it, discussing it and so on. One's tastes and opinions become shaped primarily based on how others view an object through their perspective via the medium of the internet. Thus, if a game has a user's review score of 10/10 and another has a score of 1/10 the one with the better score will be the one canonized into the halls of classics, while the one poorly reviewed will go into obscurity. This perception can change over time; however, most are bound by the observations of others – something reinforced by technology through likes and upvoting comments. In simple terms – the more popular something is (regardless of its subjective qualities), the more valid it appears to the observer. If authenticity was the dominant form of identity production, there would be no congregations

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23 McLuhan, M., Fiore, Q.: *The Medium Is the Massage*. Corte Madera, CA : Gingko Press, 2001, p. 100.

build around certain games – everyone would be striving to be unique and creative with their gaming instead of the opposite. It still plays a role and revolutions do occur in game design and conceptualization. In such a cauldron, identity becomes built around N. Luhmann's concept of second order observations<sup>24</sup> in both directions – one is curating one's identity based on the anonymous online community one belongs to and in turn one is curating one's profile to match expectations of second order observations. If one seeks acceptance one no longer looks for the validation of peers – people one is in direct contact with. Instead, the anonymous and the influential become the targets of validation of our identity.

Proficiency, according to H-G. Moeller, is similar to the technology of sincerity – the only difference being the referential. One is not born into proficiency – the idea is that the *general peer* is the reference. It is similar in this instance to the 'big Other' from S. Žižek's and J. Lacan's work.<sup>25</sup> J. Lacan's 'big Other' can be seen as: "The first type of Other is Lacan's 'big Other' qua symbolic order, namely, the overarching 'objective spirit' of trans-individual socio-linguistic structures configuring the fields of inter-subjective interactions. Relatedly, the Symbolic big Other also can refer to (often fantasmatic/fictional) ideas of anonymous authoritative power and/or knowledge (whether that of God, Nature, History, Society, State, Party, Science, or the analyst as the 'subject supposed to know' [sujet supposé savoir] as per Lacan's distinctive account of analytic transference)".<sup>26</sup>

The main difference between H.-G. Moeller's and N. Luhmann's general peer and the big Other stems from the understanding of what the public is. This tradition that the public is a whole sphere in itself goes against the described process of forming proficiency which on the other hand is an assortment of peers who have access to the profile. Unless talking about very rare cases of videos online with billions of views, most shape their identity not in reference to a big Other, but to their own smaller community. This goes in line with N. Luhmann's conceptualization of society. The academic public exists alongside and simultaneously with the gamer public but as any observer would note, both publics have different semantics, languages, norms and behaviours. The identity one chooses to communicate with the academic public will be different than the one chosen to communicate with the gamer public. This is due to N. Luhmann's second order of observations. If we pardon the use of systemic logic and think of it as the science of observing the general peer, second-order observations are the simulacra of reality that postmodern philosopher J. Baudrillard was referring to. In his laments over the loss of authenticity,<sup>27</sup> we can see how a constantly changing identity based on proficiency functions in the second order of observations. A gamer streamer who is performing his gamer identity is accompanied by an audience in the chat which is visible to all that watch him/her. On the one eye the viewer is watching the first order – the game itself, but with the other eye, the observer is drawn to the general peer in chat (in essence reading Twitch chat is a second order observation). Positive reinforcement of an act that was performed by the streamer coming from the chat will shape how the viewer will judge the inherent gamer identity on show. This is the reason why cheating in games is shunned upon – not because of morality, for there is no harm in cheating in a game against a machine, but the general peer's expectations placed on the streamer and viewer which becomes internalized through proficiency. This

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24 MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021, p. 97.

25 ŽIŽEK, S.: Melancholy and the Act. In *Critical Inquiry*, 2000, Vol. 26, No. 4, p. 657-681. [online]. [2023-11-13]. Available at: <<https://www.journals.uchicago.edu/doi/10.1086/448987>>.

26 JOHNSTON, A.: Jacques Lacan. In ZALTA, E. N. (ed.): *The Stanford Encyclopedia of Philosophy*. Stanford, CA : Metaphysics Research Lab, Stanford University, 2018. [online]. [2023-11-13]. Available at: <<https://plato.stanford.edu/archives/fall2018/entries/lacan/>>.

27 BAUDRILLARD, J.: *Simulacra and Simulation*. Ann Arbor, MI : University of Michigan Press, 1994, p. 69.

explains the modern trend of 'reaction content' which is based around a person filming their reaction to something that is currently popular or trending. The audience of such a performance has most likely already seen the object of the reaction and thus the performer is judged if their reaction is within the acceptable parameters for the second order of observations. If the reaction has received a high number of dislikes, downvotes etc, the viewer of such a performance is informed by this manifestation of the second order that anything within this reaction goes against the rules, norms or preferences of the general peer of that specific community.

The key implication from this theory is that there is no such thing as a 'right' or wrong way to construct an identity. All these technologies of identity creation are merely tools with which one is genuinely performing their identities to the best of their abilities.<sup>28</sup> It does not matter if one is building an identity based on sincerity or proflicity. Whichever identity technology one employs, identity is an artifact that functions in accordance with the used technology. For J. Baudrillard, who views the hyper-real as something negative, we have to remember that any technology of identity is stressful and distorts the real. Even if an individual strives to be authentic in all forms of social interactions, one is still doing their utmost to perform and convince the general peer of their authenticity – and it is the general peer that ultimately decides on said authenticity. This is without mentioning the impossibility of one being truly authentic as anything one does is always built upon the existing. Radical individualism would position one as being able to invent without the need for societal help and as such places itself in a position where every action has to be a pure manifestation of said individuals' consciousness. Since the social informs the consciousness about reality, the only innovation possible is to shift the social. Therefore, the dream of pure individuality and authenticity is akin to the resentment of being human as the social is a defined part of our species. This is not a general public – rather a select group of people with similar tastes recommended to us by our own tastes and views by our invisible internet profile. This is visible and pronounced on services like Netflix where after watching and finishing a movie, one receives the prompt "You might also like this movie". This is the general peer informing us through the company algorithm. People who watched the same movie as us also watched other movies and 'liked' them too, therefore our tastes are being validated through our profile. In turn we are more aware of the tastes and identities of our general peers from whom we seek validation of our own identities. It is because of this that Europeans share a common general peer that validates them – most of the discourse surrounding gaming is regional – .pl, .de, .fr, etc. and as such the idea of gamer identity differs from culture to culture.<sup>29</sup> One's peers with whom one plays or socializes on social media with are within similar time zones but the referential other needs to speak the same language. In the end, everyone is genuinely performing who they think they are in relation to who they think their audience is and what expectation that audience has on genuine performance.

To conclude – the dominant form of identity formation in our current historicity is proflicity: the construction of oneself in relation how one is seen by others. These others are not a general public. They are a general peer – someone with similar tastes and values. The gamer identity, while can be performed in an authentic manner, is most commonly performed through the technology of the profile with most interaction occurring online by profiles interacting with one and other and validating each other. This means that there have to be two types of gamers who view the identity and perform it in different ways.

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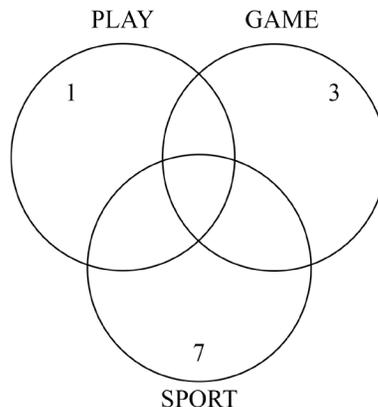
28 MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021, p. 253.

29 See: ĆWIL, M., HOWE, W.: *Cross-Cultural Analysis of Gamer Identity: A Comparison of the United States and Poland*. In *Simulation & Gaming*, 2020, Vol. 51, No. 6, p. 785-801.

# The Typology of Gamers

Before one can talk about gamers and gamer identity, it is vital to establish a definition of what a game *is* and what it offers the players. When one defines themselves as a judge or Japanese it is impossible to understand that identity without knowing what a judge does or what Japan is. If one was to look at gaming as only as something to pass the time, one would quickly find that there are many non-digital games being played all around the world where people pass the time by counting cars on the bus or another similar 'game' to pass a mundane activity. There is a plethora of differing approaches to answering this fundamental question.<sup>30</sup> A broad definition would encompass almost every person on the planet, thus making the theoretical tool useless for analysis so, we will favour a narrower definition.

Before going over the possibilities and arguing our position, it is particularly important to understand the difference between *play* and *game*. There are two possibilities when we examine the meaning of the two<sup>31</sup> from a modern perspective. Either play is a component of games or games are a subset of playing. If we assume that games are a subset of play, then we logically assume, that games are more formalized, rules based and requiring other people, while play is available to an individual without the need for others at all. A child playing alone in the sand is not playing a game but he or she is playing. The question though, in our mind is, can that child learn how to play in the sand without others? And if the child does, will he/she introduce rules? The other argument is that playing is something an individual does while enjoying a game. It is not the focus of the game, nor is it the goal, it is just something that happens while one is gaming. This is perhaps best seen in another language than English. In Polish, when one is playing a game one is literally 'gaming a game' (transl. *grać w grę* as opposed to *bawić się w grę* – to play a game). This means, that games do not have to be 'fun' all the time. This approach has many implications and reflects the theories of B. Suits (Picture 2).<sup>32</sup>



Picture 2: The distinction between play, game and sport

Source: own processing; SUITS, B.: Tricky Triad: Games, Play, and Sport. In *Journal of the Philosophy of Sport*, 1988, Vol. 15, No. 1, p. 7.

30 SALEN, K., ZIMMERMAN, E.: *Rules of Play: Game Design Fundamentals*. Cambridge, MD : The MIT Press, 2003, p. 73-78.

31 Ibidem, p. 71.

32 See: SUITS, B.: Tricky Triad: Games, Play, and Sport. In *Journal of the Philosophy of Sport*, 1988, Vol. 15, No. 1, p. 1-9.

In picture 2, (1) would represent a child on a beach playing in the sand, (3) would be a gamer engaged in a chess tournament while (7) would be the hammer thrower at the Olympics – to use a few examples. This way of thinking allows sociological analysis as opposed to merely looking at the psychological aspect of play. Play and fun are vastly subjective topics that relate to the individual and are not the domain of sociology under normal circumstances. If gaming is its own activity, that's heavily based around social rules and norms and is restricted by knowledge and time investment, then gaming can be analysed and understood by sociological methods. It also limits the scope of the definition of a game. By eliminating play as a necessary component of gaming and making it merely a possible part of gaming, the activity is no longer a not-so-serious pastime, rather can be a serious part of someone's life and time. For this reason, B. Suits conceptualization is not complete for there are two diagrams – one for the designer who is designing a game and one for the player. As with any medium, what the individual sees and interprets is different from that of the author. A serious game by design can be a pure playful experience for some people – as was the case with wargaming which went from being a serious practice of survival to a global phenomenon for people of all ages to socialise and interact over a gaming table.

Another way of looking at it is by thinking of play and game as a spectrum. No one activity is pure play or pure game after all. Going further, for this to occur, like in the history of games, play has to precede game. What is meant by this is that the activity has to attract others through play and only then it can develop into a game. As B. Suits argues by creating a parable, first there must be fun and satisfaction in kicking an object around with another before that interaction can evolve into a game revolving around kicking a ball.<sup>33</sup> This is further reinforced by our knowledge that play is pre social – games evolve from play and contain it. All the successful games in history and of today primarily attract new players through fun. To game on the other hand is to exist in the sphere of strong social laws (rules as boundaries of interactions as a part of what is a game) with a singular understanding of what the goal of the activity is: to achieve the socially constructed idea of winning. By applying and slightly modifying Suits and his concepts, we have a much richer understanding of games and the people who interact with them.

Having established how identity formed, was maintained and the different technologies of the self-prominent in society, as well as understanding that games consist of play and game, the first major typology can be introduced: The divide between passive and engaged gamers. D. Muriel and G. Crawford point out,<sup>34</sup> there are people who dedicate their spare time to playing games but do not consider themselves to be gamers. Some individuals may want to play it for fun or to past the time – after work or school while others will try their best to win at all costs or view games as their primary method for socialization. As D. Muriel and G. Crawford's research shows, many people, who play games for a substantial time (7 hours plus a week) have trouble identifying as gamers, while others who play less gladly accept the label. This conclusion is shared by others who researched this issue.<sup>35</sup> This *liquidity* in the association between their identity and their main hobby is a problem. Then there is the division between the 'hardcore gamer' and the 'casual gamer'.<sup>36</sup>

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33 See also: SUITS, B.: Tricky Triad: Games, Play, and Sport. In *Journal of the Philosophy of Sport*, 1988, Vol. 15, No. 1, p. 1-9.

34 MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018, p. 60-83.

35 For more information, see: ĆWIL, M., HOWE, W.: Cross-Cultural Analysis of Gamer Identity: A Comparison of the United States and Poland. In *Simulation & Gaming*, 2020, Vol. 51, No. 6, p. 785-801.; HOWE, W. et al.: Concerning Gamer Identity: An Examination of Individual Factors Associated with Accepting the Label of Gamer. In *First Monday*, 2019, Vol. 24, No. 3, p. 1-20. [online]. [2023-11-15]. Available at: <<https://firstmonday.org/ojs/index.php/fm/article/view/9443>>; SHAW, A.: Do You Identify as a Gamer? Gender, Race, Sexuality, and Gamer Identity. In *New Media & Society*, 2012, Vol. 14, No. 1, p. 28-44.

36 See also: POELS, Y. et al.: Are You a Gamer? A Qualitative Study on the Parameters for Categorizing Casual and Hardcore Gamers. In *Iadis International Journal*, 2012, Vol. 10, No. 1, p. 1-16.

The task of basing the gamer identity on such divisive self-definitions is a difficult task. 'True gamers', 'hardcore gamers', 'casual gamers', 'social gamers', 'serious gamers' – these are but a few of the labels one can encounter as parameters and typologies of gamers in research. We propose, for the time being, that all different definitions be grouped into two – the engaged gamer and the passive gamer. Passive gamers are those individuals who are unaware of the general peer of gaming or unwilling to interact with said general peer. Engaged gamers on the other hand are those that construct their identity in relation to the general peer of gaming and validate their identity based on the feedback loop – either rejecting the need for validation (but being aware of the general peer observing them) or accepting it.

The passive gamer is not someone who defines themselves via gaming as they view play as the literal English meaning – fun and non-serious past time. For them, meaning is not generated from playing, rather it is a break from the issues of the day and from life. Meaning is generated in other ways for this group. Passive gamers make up the vast majority of the gaming population in the same way casual football fans make up the majority of all the people who watch the World Cup in football. Associating this identity group with any coherent beliefs is difficult by the very nature of this concept of them. Any predictions on how this group views society and gaming based on them playing is just speculation. What can be said is that this group is not strongly associated with gaming thus will not participate in gaming based social movements unless they coincide with their own personal beliefs, and these beliefs are strong enough to be a call to action. Since these people do not draw meaning from games, this relationship is reversed compared to engaged gamers. Secondly, this group is not aware of the fact that they are a social group and will lack any cohesion and ability to mobilize. Simply put – gaming is a part of their lifestyle not their lifestyle. They will not watch gaming content online, will not read about games or participate in online discourse. These individuals, if defining themselves as gamers will do so in an authentic manner – the reference being themselves rather than others when seeking validation. They focus on play (passing time, gaming as a facilitator of social interaction, pure enjoyment). All gamers start out as passive.

The engaged gamer is a person who is more likely to focus their spare time and income on gaming, balancing working and personal life to include games in their daily lives. This group includes those who either play or game or enjoy a mix of the two. Games give meaning to this group and will use gaming language, gaming cultural references and be aware to an extent of the happenings in the world of gaming they are a part of. Due to the prolific nature of their identity formation, they will be aware of optimal ways of playing and are likely to enforce normative structures in play. It is this group that people commonly refer to as gamers and it is divided itself between those who favour play and those who favour game with both groups having different general peers. This results in conflicts around what does being a gamer mean and who is a gamer and who is not. It is due to prolific identity formation that these two groups rarely interact. Play focused engaged gamers will consider game focused engaged gamers as *the other* and vice versa.

## Research Questions and Hypothesis

Having established a conceptualization of gamer identity, the research questions can be posed. The main aim of this paper is to explain why in similar

studies,<sup>37</sup> researchers found that gamer identity does not correlate with time spent playing and appears to be a matter of agency. Additionally, with the theoretical framework, the paper will explain why people who play on phones are significantly less likely to identify as gamers.

The main factors that were chosen were the following: being passive or engaged (does one read, watch or partake in digital game discourse surrounding the games one plays), does one prefer to play or game, the individual's perception of who is a gamer with an example being required, reasonings behind it and if the individual belongs to a gaming community. Gender was not a factor as previous research has demonstrated that men are more likely to consider themselves gamers and have provided explanations for this phenomenon.<sup>38</sup> Their explanations align with the conceptualization of play and game-oriented gamers, with women preferring to play rather than game. The following are the primary questions this study will answer:

- Are people who engage with digital games more likely to consider themselves gamers than those that are passive?
- Are people who game rather than play more likely to consider themselves gamers?
- How important is having an audience (a general peer: friends, community members, viewers) for the individual to identify as a gamer?
- What, if any, are the differences between those who construct their gamer identity based on authenticity and those that do so based on proficiency?

Our assumptions were the following: (1) Passive gamers will be unlikely to define themselves as gamers. This is because they do not construct themselves based on the dominant profilig, game oriented vision of a gamer; (2) Engaged gamers will be divided between those that choose to play for fun and those who game for winning. Individuals who associate their preferred mode of engagement with gaming rather than playing will likely identify as gamers as their approach towards games dominates the discourse; (3) Engaged gamers, when asked to describe a gamer, will reference profiles of other gamers and validate or invalidate themselves as gamers based on that profile; (4) Play orientated engaged gamers will paint the identity in a more negative light, with references to stereotypes and online profiles that fit those stereotypes. This is likely due to antagonisms that exist between the two approaches towards games; (5) Game orientated engaged gamers will be less inclusive towards labelling people as gamers and will justify this stance with feats of skill (achievements, time spent in a game, rank, points and so on) – in other words, only those that curate their profile and reference it will be validated.

## Method

Due to the nature of the topic (a question of identity), statistical analysis would not provide satisfactory answers in explaining the profilig nature of identity. The need to answer questions and analyse what individuals mean when they say gamer requires a more

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37 See: ĆWIL, M., HOWE, W.: Cross-Cultural Analysis of Gamer Identity: A Comparison of the United States and Poland. In *Simulation & Gaming*, 2020. Vol. 51, No. 6, p. 785-801.; HOWE, W. et al.: Concerning Gamer Identity: An Examination of Individual Factors Associated with Accepting the Label of Gamer. In *First Monday*, 2019, Vol. 24, No. 3, p. 1-20. [online]. [2023-11-15]. Available at: <<https://firstmonday.org/ojs/index.php/fm/article/view/9443>>; SHAW, A.: Do You Identify as a Gamer? Gender, Race, Sexuality, and Gamer Identity. In *New Media & Society*, 2012, Vol. 14, No. 1, p. 28-44.

38 BURCH, A., WISEMAN, R.: *Curiosity, Courage and Camouflage: Revealing the Gaming Habits of Teen Girls*. Paper presented at International scientific conference Game Developers Conference (GDC) 2015. San Francisco, CA, presented on 4<sup>th</sup> March 2015. [online]. [2023-11-17]. Available at: <<https://www.gdcvault.com/play/1021899/Curiosity-Courage-and-Camouflage-Revealing>>.

in-depth approach. Therefore, in-depth interviews were the method chosen for this study. However, for the purpose of clarity, minor quantitative results based on answers given are provided in the form of tables. These tables are aggregates of answers to the first three questions in the interviews.

The interviews were a part of a larger PhD thesis study and were conducted on 64 individuals who were recruited through discord communities that played either specific games or were long standing social groups that game across different genres. Game times were set accordingly to European time zones and every respondent was from Europe. The specific gaming communities were built around the following games and divided with accordance with how central winning was to the design of the game (Table 1).

Table 1: The selection of gaming communities and their preference to either play or game (based on the title or gaming style)

Play communities	Game communities
<i>Dota 2 (custom map players)</i>	<i>Dota 2 (ranked players)</i>
<i>Hearts of Iron IV (Role Play communities)</i>	<i>Hearts of Iron IV (competitive communities)</i>
<i>Don't Starve Together</i>	<i>CS:GO</i>
<i>Football Manager 2021</i>	<i>League of Legends</i>
<i>World of Warcraft (social guild)</i>	<i>World of Warcraft (hardcore guild)</i>
<i>Super Mario Maker II</i>	<i>Overwatch</i>
<i>Diablo III</i>	<i>Diablo III (hardcore mode players)</i>

Source: own processing

The main weakness of this selection is that most interviewees are already part of a gaming group or interact with one. This means it is difficult to state what effect belonging to such a group has on their identity construction, as there is no comparison between engaged gamers who belong to gaming communities and those that do not. The main reason for this was accuracy. It is difficult to recruit someone who participates in gaming discourse but is not a member of an online forum or other group. The most direct access to active engaged gamers was through discord.

Both game and play orientated gamers were identified through their group advertisements which they use to attract new members. The selection was intuitive and straightforward. If a group openly stated that it is looking for players to socialize, have fun, have a good time and described themselves as friendly, they were treated as a play focused group. Game groups were identified if a community advertised itself as hardcore, progression orientated, warning potential members that inactivity will result in removal and any form of 'serious'. Despite appearing as an arbitrary selection, both groups had no trouble in understanding the differences between those that play and those that game and were interested why such an 'obvious' typology isn't established in research. The group consisted of 50 males, 13 females and one individual identifying as non-binary with a mean age of 26 years old.

Additionally, in order to account for passive gamers as a means of comparison, a further 50 brief interviews were conducted at Warsaw Central Station. Individuals who were seen playing games on their phones were approached and asked a brief questionnaire consisting of four questions: do you identify as a gamer, do you play for fun or do you play for high scores, winning, points etc, do you read, watch or participate in discussions relating to games you like to play and do you belong to a gaming community. The questions used from the 64-person sample were as follows:

- Do you consider yourself a gamer?
- Do you read about games, watch others play and discuss games with others in your spare time?
- Are you an active member of a gaming community (forums, Facebook groups, discord servers etc)?
- What, in your opinion, does it mean to be a gamer?
- Describe someone who you would consider to be a gamer.
- What is more important to you when playing digital games – fun or winning? (labelled as play and game)
- What do you think of those who play for fun/What do you think of those who game to win?
- How would you describe them?

# Results

The first assumption that can be answered is based on the passive gamer group. By adding three factors that the theoretical assumptions suggest, it becomes clear just how important a referential peer/audience is needed in order to validate oneself as a gamer. Fun also is a predictor.

Table 2: Mobile players and their identification

Passive gamer group (n=50)	Identifying as a Gamer (2 out of 50)	Does not Identify as a Gamer (48 out of 50)
<i>Prefers to play over game</i>	2	45 (3 individuals stated they play to win)
<i>Participates in gaming discourse</i>	2	48
<i>Belongs to a gaming community</i>	2	2

Source: own processing

Knowing that fun stems from the actor not the social in the structure versus agency divide is also vital. In both cases where individuals chose to identify as gamers (the respondent's gender and age are given here in brackets after their answer, and hereafter), their reasoning was the following:

- “Yeah, overall I guess I am a gamer... because why not (chuckles), I play every day on the train so I am a gamer (laughs)” (female, 31).
- “I think I am a gamer. I like games, always have... I know you are looking at me and thinking – hey this guy doesn't look like it – but it's just how I feel. When I am bored at work, the first thing I do is reach for my phone and start up Galaxy of Heroes” (male, 30).

Both statements are from a perspective of authentic identity construction. They are gamers because they feel like gamers – the social is not an important factor in their self-identification and association with the label. Another important factor that needs to be

mentioned here is their choice of games. One individual played *Star Wars: Galaxy of Heroes*<sup>39</sup> while the other was playing *Raid: Shadow Legends*<sup>40</sup>. Both games have strong social elements encouraging players to join guilds/clans to fully experience all the features the game has to offer. This means both respondents were exposed to a general peer of gaming within their preferred titles – something which the first respondent admitted:

- “At first, I was reluctant to join thinking it was going to be just children and teenagers, but when I found out the average age of the guild was around 30, I thought, why not. I have to admit that fact is what drew me in” (female, 29).

This response shows that proficiency is still a factor, possibly akin to the M. McLuhan<sup>41</sup> rear view mirror analogy when it comes to identity construction technologies. Normative reassurance clearly played an important role for this individual. Overall, it is clear for this research and prior works that mobile game players are significantly less likely to view themselves as gamers. What this approach shows however, is that through the introduction of social aspects to games, individuals do see themselves more as gamers, as they get access to a general peer that can validate them. More precise research quantitative research is needed to establish the impact socializing and playing versus gaming has when it comes building gamer identity, however it is apparent that these factors play a role. Moving on, the next question is how passive gamers compare to engaged gamers (Table 1, 2).

Table 3: Game-oriented gamers and their identification

Engaged gamer group who games (n = 32)	Identifying as a Gamer (27 out of 32)	Does not Identify as a Gamer (5 out of 32)
<i>Participates in gaming discourse</i>	27	3
<i>Belongs to a gaming community</i>	32	0

Source: own processing

Table 4: Play-oriented gamers and their association

Engaged gamer group who plays (n = 32)	Identifying as a Gamer (17 out of 32)	Does not Identify as a Gamer (15 out of 32)
<i>Participates in gaming discourse</i>	17	7
<i>Belongs to a gaming community</i>	17	13

Source: own processing

Tables 1 and 2 show clearly the difference playing versus gaming has on self-perception as a gamer. While both groups are more likely to identify as gamers due to being active in communities and more likely to participate in discourse compared to passive gamers, the difference playing versus gaming is pronounced. Consider the contrast between these two statements:

39 EA CAPITAL GAMES, EA MOBILE: *Star Wars: Galaxy of Heroes*. [digital game]. Redwood City, CA : Electronic Arts, 2015.  
 40 PLARIUM GAMES: *Raid: Shadow Legends*. [digital game]. Tel-Aviv : Plarium Games, 2019.  
 41 McLUHAN, M., FIORE, Q.: *The Medium Is the Massage*. Corte Madera, CA : Gingko Press, 2001, p. 100.

- “I don’t think I am a gamer in the sense of how people call it. I see Twitch streamers with their gaming chairs and flashy keyboards and don’t particularly relate to that. I just like playing games, sometimes a lot (laughs). Do I need a label or can I just enjoy what I am doing and who I am?” (male, 25).
- “For me, a gamer is someone who plays more than one game regularly, someone who puts in a lot of effort into those games. Playing just one, even if you are good at it is like saying ‘I like rock music’ but only listening to one band... I will agree that someone is a gamer if that person has the ranks or achievements to prove it – in more games than just one” (male, 23).

The first respondent plays *Counter Strike: Global Offensive*<sup>42</sup> (GS: GO) twice a week with a group of online friends and has done so for the last four years. The second respondent games *Dota 2*<sup>43</sup> with a group of people dedicated to reaching the highest rank possible. The CS:GO player is choosing to construct themselves authentically while the Dota 2 player is building the gamer label on proficility. What is interesting is that the response of the second gamer mirrors statements observed by D. Muriel and G. Crawford<sup>44</sup> except instead of a foodie metaphor, this respondent prefers to use an audiophile analogy. Similar logic was given by other respondents who favoured gaming over playing. For this group, it is clear that to be a gamer, one needs to present evidence that can be judged and validated by the general peer. This is the similarity between sincere identity formation and profilic. The individual needs to present themselves to society and convince them that they are where they belong.

- “I mean, can you call yourself a gamer and be bad at games? For me that’s impossible. A gamer will keep playing until he is good at a game. I think that’s what makes someone a gamer” (male, 29).
- “A gamer is someone who understands games – how to play them and how to be the best at them. That person doesn’t have to be the best, but, like, has to know what is best, like, knowing what the meta is and how to play it” (male, 22).

This form of understanding the term gamer noticeably invalidates those who wish to play: role players/LARPerS, social gamers and so on. This is the *otherness* that is forming between the two understandings of what games are with each group having derogatory terms to describe the other. When asked, what words are often used to describe gamers who try to win at all costs, those that play gave these examples: tryhards, no-lifers, virgins and basement dwellers. In the other direction, game orientated players gave these examples: casuals, noobs, mouth-breathers and general insults relating to low intelligence. This cleavage impacts the way those that play view the label gamer:

- “When I think of someone calling themselves ‘gamer’, I see that guy... from South Park. I know it’s an unfair stereotype, but I think anyone who has played online games or has discussed anything related to games online has had the pleasure of talking to someone like that: elitist, poor social skills” (female, 29).
- “You know, I will tell you a story. One time I went down to my local hobby store to sign up for some Warhammer games. The second I opened the door I smelled it: the sweat and farts were thick in the air... What was worse is everyone was being a stickler for the rules and in general being power gamers in friendly matches... If you are looking for gamers and their culture, well, that is it” (male, 30).

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42 VALVE, HIDDEN PATH ENTERTAINMENT: *Counter Strike: Global Offensive*. [digital game]. Bellevue, WA : Valve, 2012.

43 VALVE SOFTWARE: *Dota 2*. [digital game]. Bellevue, WA : Valve, 2013.

44 MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018, p. 143-180.

This difference in understanding what a game is at the core of why 17 out of 32 play-orientated gamers rejected the label. The advantage of profile-based identity construction is that it homogenises social groups allowing for easy comparisons between individuals and the validity of their identities. An individual has a high rank and powerful items: that person is a gamer, or so the logic goes. For those that focus on the play aspect of games, there exists no referential template of authentic gaming, no unifying trait or quantifiable feature to include or exclude individuals. Out of the 17 play gamers that chose to identify with the label, 11 identified themselves as being 'good' at the games they play. It has to be stated that the use of negative stereotypes weren't the responses of the majority of play and game-oriented gamers though were more prevalent in the latter. 20 play-oriented gamers were generally complimentary with 8 of the 15 who rejected the label also being positive about game-oriented gamers:

- "I wish I had the time and energy to invest in the games I play. I miss the days when life was just about chilling with friends and playing video games. I have a large amount of respect for those 'hardcore gamers'. I know that in a few years they will be just like me" (male, 34).

For game-oriented gamers, 17 had generally positive remarks to make about 'casual gamers', ranging from understanding different preferences and approaches towards gaming to hypothesising that the others simply do not have enough time to play digital games as frequently as they do (due to real life commitments). For the remaining 15, the low opinion of play as a form of gaming can be divided into two categories: 'cringe' and low intelligence. The feeling of cringe is a reaction by the observer to social awkwardness (validation by the social) or a lack of normative behaviour exhibited in an observed individual. Some have linked it to Foucauldian and Deleuzian form of societal control<sup>45</sup> while other see it as a tool for the groups in power to impose their will on normativity.<sup>46</sup> Regardless of one's precise stance on the ontology of cringe, it is clear that it is an external source of validation of one's own behaviour. One can ignore it or be oblivious to it, but the fact that groups of individuals are actively demonstrating their 'cringe' towards that individual informs that person of his or her lack of normative behaviour. As one respondent put it:

- "I just think it's kinda cringe... A few years ago, me and a few of my friends decided to mess about on an RP server in WoW. I felt like I was in an alternative universe: people were throwing virtual parties, having virtual picnicks in Stormwind and talking all in character. I found it all, I don't know if I can say it... Autistic" (male, 27).

This is a symptom of profile-based identity formation with the social being the validator of identity. Avoiding or controlling one's behaviour to avoid cringe indicates an internalization of the general peer. The status of those that game in their respective communities is based on performances and general perception, as per the definition. Others are willing to game only if that individual can guarantee they will give it their all and be 'good' at the game – with chronic underperformance leading to social rejection – something openly advertised by all game orientated groups. It becomes paramount to maintain profile in accordance with others expectations. Further still, the opinion that low intelligence is associated with preferring to play appears also to reflect the nature of current profile construction:

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45 BRODY, C.: "Cringe" Content in Societies of Control. In *Pitt Sociology Review*, 2022, Vol. 12, No. 1, p. 24-31. [online]. [2023-11-29]. Available at: <[https://www.sociology.pitt.edu/sites/default/files/pitt\\_sociology\\_review\\_2022.pdf](https://www.sociology.pitt.edu/sites/default/files/pitt_sociology_review_2022.pdf)>.

46 VERMA, T.: Cultural Cringe: How Caste and Class Affect the Idea of Culture in Social Media. In *Feminist Media Studies*, 2021, Vol. 21, No. 1, p. 159-160.

- “The worst thing in gaming, at least for me, is when you get a random on your team who is clearly there just for the vibes. With all the guides and videos online, if you do not understand the game you are playing, there must be something wrong with you” (male, 25).
- “I understand that different people have different tastes, but, as you say, doing the same thing over and over again and expecting different results is the sign of insanity. The goal of a game is to win, end of story. You don’t get an award for losing to the tutorial boss in a single player game... losing with friends is never more fun than winning alone – no matter what anyone says” (male, 30).

Not playing (or rather gaming) a game in accordance to widely accepted standards, or per the definition of a pure game – to seek out a win, is, as other research has shown<sup>47</sup> considered rude and in extreme cases a sign of poor social intelligence or ignorance. It is for this reason game designers have been segregating players in MMOs and other on-line games. *World of Warcraft*<sup>48</sup> has roleplay servers and player versus player servers for example, while games like *League of Legends*<sup>49</sup> include separate game modes such as ARAM<sup>50</sup> which by design are less win focused (no external validation for winning on the player profile). The goal is to prevent conflicts from arising between the two groups, allowing them to engage with the medium however they prefer, however, it has the added effect of further entrenching the existing cleavage and segregating individuals based on their understanding of what a game is.

## Discussion and Conclusions

The goal of this study was to demonstrate that by building on H.-G. Moeller’s concepts of identity, applying the distinction between play and game, accounting for being aware of a game’s general peer and belonging to a group that plays games regularly together, a clearer picture emerges about the nature of gamer identity, as well as explains issues encountered by previous studies. From the interviews a pattern emerged. Individuals who belong to gaming communities were invested in their gamer profile and their standing within a specific community identified as gamers while those that were ambivalent towards their profile and preferred to play were less likely to do so. Belonging to a gaming community and participating in gaming discourse significantly increases the likelihood one will chose to identify as a gamer – with the concept of the general peer explaining this relation. In fact, being aware one is being observed by others and internalizing it to the extent it affects one’s style of play was a key divider between play and game-oriented gamers, with the latter feeling cringe for non-normative behaviour during gaming. Gaming gamers admitted to self-policing their gaming styles, playing with accordance to the meta<sup>51</sup> and were aware of the expectations the group placed on them.

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47 *Why It’s Rude to Suck at Warcraft*. Released 26<sup>th</sup> November 2022. [online]. [2023-11-28]. Available at: <<https://www.youtube.com/watch?v=BKP117locYU>>.

48 BLIZZARD ENTERTAINMENT: *World of Warcraft*. [digital game]. Irvine, CA : Blizzard Entertainment, 2004.

49 RIOT GAMES: *League of Legends*. [digital game]. Santa Monica, CA : Riot Games, 2009.

50 Remark by the author: ARAM stands for All Random All Mid as is a game mode described by players as a way to relax and unwind after playing ranked mode. Winning is meaningless in this mode as there are no points gained and strategies and tactics are difficult to have as the name implies one has no agency in selecting one’s hero (random).

51 Remark by the author: Meta refers to the socially constructed and understood optimal way to play a digital game.

“To be honest with you, I wouldn’t want to play with someone who isn’t familiar with the current top meta picks and how to play around them. It is even part of the rules for this community” – the interviewee (male, 22) is referencing the rule: Be familiar and up to date with the game. Play gamers on the other hand frequently (29 out of 32) pointed out that they do not care how members of their community decide to play as long as it does not harm the collective fun. They also appear to be less likely to consider themselves as gamers – either finding the label redundant or representing a style of engagement that goes against their own style. Gaming gamers, on the other hand, were quick to identify as gamers with 27 out of 32 choosing said label.

Due to the dominance of prolificity in the construction of gamer identity, those that do not fit into the profile of how a gamer is expected to look / sound / behave, etc. will feel alienated from the identity. Building on this and previous studies in the area of gamer identity it is safe to assume that most women who play games would fall into the categories of passive or play orientated engaged gamers. This is demonstrated by studies<sup>52</sup> that found that women prefer games designed to be played more than gamed. This could be explained by factors such as socialization (competition and winning at all costs are seen as the domain of the male sex), marketing and the dominance of the male image and stereotypical masculine culture being associated with the gamer identity leads those who choose to game to pursue it authentically rejecting the term and requires further study.

Observations made in this study demonstrate how important a referential profile is in shaping the vision of who is a gamer. Those that stated their identity is authentic (they are gamers because they feel like gamers – no validation was provided) predominantly preferred to play: 14 out of the 17 play-oriented gamers. Going further, prolific identification was based on constant curation of the profile – having higher ranks, one’s win rate and so on, causing individuals to experience greater uncertainty with their identity – in some cases a feeling of inadequacy. One interesting observation that should be addressed relates to the 5 engaged gaming gamers who did not identify as a gamer. In each case, the main argument given was a sense of inadequacy in relation to the general peer. Either the person had a low budget computer and no accessories (3 out of 5), considered themselves not a gamer because they only specialize in one game (1 out of 5) or were distancing themselves from the stereotype of a gamer (1 out of 5). This stems from individuals observing other, more visible and pronounced profiles, who are validated by the general peer as gamers. In 4 of the cases the reference was a popular streamer/youtuber. Game-oriented engaged gamers were, in fact, very selective with whom they decided to label a gamer. In general, their vision of who is a gamer is based on empirical observations – quantifiable facts provided to them by the medium itself with this numerical approach reinforced by influencers.

Future research on the topic of gamer identity should consider the cleavage between players and gamers, as it appears to explain the possible reasonings behind why someone who engages with games on a daily basis refuses to associate themselves with the term gamer. Due to the limitations of this study, with its focus on identifying the possible factor causing this disassociation, it is unable to answer questions related to distribution of these two groups, as well as provide the exact relationship between playing and its exact impact on gamer identity.

Overall, this study has demonstrated that the main two predictors if someone considers themselves a gamer are being part of/aware of the discourse surrounding games one plays and belonging to a group that plays games. This is the division between passive

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52 For example, see: YEE, N.: *Beyond 50/50: Breaking Down the Percentage of Female Gamers by Genre*. Released on 19<sup>th</sup> January 2017. [online]. [2023-11-21]. Available at: <<https://quantificfoundry.com/2017/01/19/female-gamers-by-genre/>>.

and engaged gamers. Engaged gamers can be divided into those who play and those who game based on B. Suits conceptualization of what a game is. Those who favour play are less likely to see themselves as gamers and build their identity in relation to gaming in an authentic manner. Those who favour game are very likely to view themselves as gamers and build their identity using proficility thanks to quantifiable feedback received from games that allows them to validate themselves and others.

## BIBLIOGRAPHY

- BAUDRILLARD, J.: *Simulacra and Simulation*. Ann Arbor, MI : University of Michigan Press, 1994.
- BAUMAN, Z.: *Liquid Life*. Cambridge : Polity, 2005.
- BAUMAN, Z.: *Liquid Modernity*. Cambridge : Polity, 2000.
- BLIZZARD ENTERTAINMENT: *World of Warcraft*. [digital game]. Irvine, CA : Blizzard Entertainment, 2004.
- BRODY, C.: "Cringe" Content in Societies of Control. In *Pitt Sociology Review*, 2022, Vol. 12, No. 1, p. 24-32. [online]. [2023-11-29]. Available at: <[https://www.sociology.pitt.edu/sites/default/files/pitt\\_sociology\\_review\\_2022.pdf](https://www.sociology.pitt.edu/sites/default/files/pitt_sociology_review_2022.pdf)>.
- BURCH, A., WISEMAN, R.: *Curiosity, Courage and Camouflage: Revealing the Gaming Habits of Teen Girls*. Paper presented at International scientific conference Game Developers Conference (GDC) 2015. San Francisco, CA, presented on 4<sup>th</sup> March 2015. [online]. [2023-11-17]. Available at: <<https://www.gdcvault.com/play/1021899/Curiosity-Courage-and-Camouflage-Revealing>>.
- CALHOUN, C. et al.: *Contemporary Sociological Theory*. Malden, MA, Oxford : Wiley-Blackwell, 2012.
- CUDO, A., KOPIŚ, N., ZABIELSKA-MENDYK, E.: Personal Distress as a Mediator Between Self-Esteem, Self-Efficacy, Loneliness and Problematic Video Gaming in Female and Male Emerging Adult Gamers. In *PloS One*, 2019, Vol. 14, No. 12, p. 1-18. ISSN 1932-6203. [online]. [2023-11-16]. Available at: <<https://journals.plos.org/plosone/article?id=10.1371/journal.pone.0226213>>.
- ĆWIL, M., HOWE, W.: Cross-Cultural Analysis of Gamer Identity: A Comparison of the United States and Poland. In *Simulation & Gaming*, 2020, Vol. 51, No. 6, p. 785-801. ISSN 1046-8781.
- EA CAPITAL GAMES, EA MOBILE: *Star Wars: Galaxy of Heroes*. [digital game]. Redwood City, CA : Electronic Arts, 2015.
- FORMILAN, G., STARK, D.: Moments of Identity: Dynamics of Artist, Persona, and Audience in Electronic Music. In *Theory and Society*, 2023, Vol. 52, No. 1, p. 35-64. ISSN 0304-2421.
- GIDDENS, A.: *Runaway World: How Globalisation is Reshaping Our Lives*. London : Profile Books, 2002.
- GUIART, E.: The Consumer Capitalist Society and Its Effects in Identity: A Macro Cultural Approach. In *Revista Psicología Política*, 2011, Vol. 11, No. 21, p. 159-170. ISSN 2175-1390.
- HOWE, W. et al.: Concerning Gamer Identity: An Examination of Individual Factors Associated with Accepting the Label of Gamer. In *First Monday*, 2019, Vol. 24, No. 3, p. 1-20. [online]. [2023-11-15]. Available at: <<https://firstmonday.org/ojs/index.php/fm/article/view/9443>>.
- JOHNSTON, A.: Jacques Lacan. In ZALTA, E. N. (ed.): *The Stanford Encyclopedia of Philosophy*. Standford, CA : Metaphysics Research Lab, Stanford University, 2018. [online]. [2023-11-13]. Available at: <<https://plato.stanford.edu/archives/fall2018/entries/lacan/>>.
- KIYIJÄRVI, M., KATILA, S.: Becoming a Gamer: Performative Construction of Gendered Gamer Identities. In *Games and Culture*, 2022, Vol. 17, No. 3, p. 461-481. ISSN 1555-4120. [online]. [2023-11-01]. Available at: <<https://journals.sagepub.com/doi/10.1177/15554120211042260>>.
- LUHMANN, N.: *Theory of Society, Volume 1*. Redwood City, CA : Stanford University Press, 2012.
- LUHMANN, N.: *Theory of Society, Volume 2*. Redwood City, CA : Stanford University Press, 2013.
- LYOTARD, J.-F.: *The Postmodern Condition: A Report on Knowledge*. Minneapolis, MN : University of Minnesota Press, 1984.

McCLURE, R. F., MEARS, F. G.: Video Game Players: Personality Characteristics and Demographic Variables. In *Psychological Reports*, 1984, Vol. 55, No. 1, p. 271-276. ISSN 0033-2941.

McCULLOUGH, K. M., WONG, Y. J., STEVENSON, N. J.: Female Video Game Players and the Protective Effect of Feminist Identity Against Internalized Misogyny. In *Sex Roles: A Journal of Research*, 2020, Vol. 82, No. 5-6, p. 266-276. ISSN 0360-0025.

McLUHAN, M., FIORE, Q.: *The Medium Is the Massage*. Corte Madera, CA : Gingko Press, 2001.

MOELLER, H-G., D'AMBROSIO, P.: *You and Your Profile: Identity After Authenticity*. New York, NY : Columbia University Press, 2021.

MURIEL, D., CRAWFORD, G.: *Video Games as Culture*. New York, NY : Routledge, 2018.

PAAßEN, B., MORGENROTH, T., STRATEMEYER, M.: What Is a True Gamer? The Male Gamer Stereotype and the Marginalization of Women in Video Game Culture. In *Sex Roles: A Journal of Research*, 2017, Vol. 76, No. 7-8, p. 421-435. ISSN 0360-0025.

PLARIUM GAMES: *Raid: Shadow Legends*. [digital game]. Tel-Aviv : Plarium Games, 2019.

POELS, Y. et al.: Are You a Gamer? A Qualitative Study on the Parameters for Categorizing Casual and Hardcore Gamers. In *ladis International Journal*, 2012, Vol. 10, No. 1, p. 1-16. ISSN 1645-7641.

RIOT GAMES: *League of Legends*. [digital game]. Santa Monica, CA : Riot Games, 2009.

SALEN, K., ZIMMERMAN, E.: *Rules of Play: Game Design Fundamentals*. Cambridge, MD : The MIT Press, 2003.

SHAW, A.: Do You Identify as a Gamer? Gender, Race, Sexuality, and Gamer Identity. In *New Media & Society*, 2012, Vol. 14, No. 1, p. 28-44. ISSN 1461-4448.

SUITS, B.: Tricky Triad: Games, Play, and Sport. In *Journal of the Philosophy of Sport*, 1988, Vol. 15, No. 1, p. 1-9. ISSN 0094-8705.

VALVE, HIDDEN PATH ENTERTAINMENT: *Counter Strike: Global Offensive*. [digital game]. Bellevue, WA : Valve, 2012.

VALVE SOFTWARE: *Dota 2*. [digital game]. Bellevue, WA : Valve, 2013.

VERMA, T.: Cultural Cringe: How Caste and Class Affect the Idea of Culture in Social Media. In *Feminist Media Studies*, 2021, Vol. 21, No. 1, p. 159-161. ISSN 1468-0777.

*Why It's Rude to Suck at Warcraft*. Released 26<sup>th</sup> November 2022. [online]. [2023-11-28]. Available at: <<https://www.youtube.com/watch?v=BKP1I7locYU>>.

WILLIAMS, D. et al.: Looking for Gender: Gender Roles and Behaviors among Online Gamers. In *Journal of Communication*, 2009, Vol. 59, No. 4, p. 700-725. ISSN 0021-9916.

WILLIAMS, D., YEE, N., CAPLAN, S. E.: Who Plays, How Much, and Why? Debunking the Stereotypical Gamer Profile. In *Journal of Computer-Mediated Communication*, 2008, Vol. 13, No. 4, p. 993-1018. ISSN 1083-6101.

YEE, N.: *Beyond 50/50: Breaking Down the Percentage of Female Gamers by Genre*. Released on 19<sup>th</sup> January 2017. [online]. [2023-11-21]. Available at: <<https://quanticfoundry.com/2017/01/19/female-gamers-by-genre/>>.

YIM, B. et al.: The Gamer Identity Scale: A Measure of Self Concept as a Video Gamer. In *Computers in Human Behavior*, 2023, Vol. 138, No. 3. ISSN 1873-7692. [online]. [2023-11-01]. Available at: <<https://linkinghub.elsevier.com/retrieve/pii/S0747563222002965>>.

ŽIŽEK, S.: Melancholy and the Act. In *Critical Inquiry*, 2000, Vol. 26, No. 4, p. 657-681. ISSN 0093-1896. [online]. [2023-11-13]. Available at: <<https://www.journals.uchicago.edu/doi/10.1086/448987>>.



21

# Effect of Audio-Visual Appeal on Game Enjoyment: Sample from Turkey

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## ABSTRACT:

A player's subjective interaction with a digital game is referred to as player experience. The consequence of playing a game affects a player's thoughts, feelings, attitudes, and behaviours. To measure player experience there are various qualitative and quantitative methods. Iterative game development and play testing sessions enhance and optimize game designs, to determine the impact of functional and psychosocial consequences of gaming in various cultures, a credible scale is required. To be able to measure and analyse player experience, this study aimed at adapting the 'Player Experience Inventory' (PXI) scale developed by V. V. Abeele<sup>1</sup> to Turkish. The results of test-retest analysis and back-and-forth translation demonstrate that linguistic equivalence is not applicable for the Turkish variant. Only one item for functional – audio-visual appeal – and two items from psychosocial – immersion and autonomy – consequence of gaming have a proper factor structure. In this way an adaption study was carried out by confirmatory factor analysis (CFA) and explanatory factor analysis (EFA) with three items from the scale. The validity and reliability of the scale and relationship of audio-visual appeal of gaming on game enjoyment were tested and this article proposes a model for the functional and psychosocial consequences of gaming.

## KEY WORDS:

digital games, game user research, moderation effect, player experience, scale adaptation.

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# Introduction

The gaming industry has expanded rapidly since the 2000s due to players' demands and technological advancements in computer science. As an academic discipline, game studies brings together quite different disciplines and allows the examination of different dimensions of the situation we define as play. The mathematical pattern of the games, their mechanics, and thus their formal components can be examined, as well as the players and their communities who play the games, as well as the role and meaning of the games that exist together with culture in social life. Thus, what games serve in the historical process is investigated by sociologists, the motivation and psychology of players by psychologists, and the relationship between culture and games by anthropologists.

As the literature suggests, players constitute maybe the most essential part of the gaming industry.<sup>2</sup> Therefore, both digital game companies and academia research players' experiences to understand what motivates people to play and the consequences of gaming. Nowadays, research on player experience has attracted many scholars from different

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1 See: ABEELE, V. V. et al.: Development and Validation of the Player Experience Inventory: A Scale to Measure Player Experiences at the Level of Functional and Psychosocial Consequences. In *International Journal of Human-Computer Studies*, 2020, Vol. 135, No. 1, p. 1-47. [online]. [2023-11-22]. Available at: <<https://doi.org/10.1016/j.ijhcs.2019.102370>>.

2 SALEN, K., ZIMMERMAN, E.: *Rules of Play*. Cambridge, MA : The MIT Press, 2003, p. 313.; JÄRVINEN, A.: *Games without Frontiers: Theories and Methods for Game Studies and Design*. Saarbrücken : VDM Verlag, 2009, p. 96.

fields such as psychology, human-computer interaction, computer science, and game user research (GUR). Evaluation of the player experience varies because of the approaches of the studies as both quantitative and qualitative researches have been carried out by scholars. Although there exist many research designs, such as players writing diaries of their play experience,<sup>3</sup> the most used tools are generally quantitative surveys. However, researchers are still debating which factors of digital game influence game experience. In this way, several newly developed tools measure the experiences of players. GUR experts are collaborating with the digital game industry to produce high-quality games. Several newly developed tools measure players' experiences in terms of engagement, flow, immersion, and presence.

This study aims to adapt the English version of the player experience survey PXI (Player Experience Inventory) to Turkish which is developed by V. V. Abeele. This survey stands out because scholars separate the gaming experience into two topics: functional and psychosocial consequences of gaming. Functional consequences are the direct effects of digital game mechanics on players. Scholars categorize functional consequences as; ease of control, progress feedback, audio-visual appeal, clarity of goals, and challenge. Psychosocial consequences are secondary effects and can be continued after playing. Psychosocial consequences can be listed as; mastery, curiosity, immersion, autonomy, and meaning. PXI's theoretical framework suggests that the direct effect of functional features of digital games is the primary reason of players feeling fun while gaming, according to the scholars this effect is mediated by psychosocial consequences. In this way, direct experience of the functional aspects of the gaming environment produces states such as immersion and autonomy. While developing a Turkish variant for the PXI survey, this paper also asks if the mediation effect of audio-visual appeal on enjoyment mediated by immersion and autonomy is relevant to the Turkish gaming community.

In Turkey, mobile gaming culture, especially the hyper-casual mobile gaming industry, and consumption, has developed rapidly in recent years. Furthermore, universities opened both undergraduate and graduate game design departments. These developments in Turkey have also contributed to the global digital game culture. For this reason, researchers and developers need theoretical tools to measure player experience. Game developers and scholars in Turkey would benefit from measuring player experience by surveying gaming consequences. The only adaptation study of the player experience survey known is conducted by M. İ. Berkman, B. Bostan and S. Şenyer.<sup>4</sup> This study aims to contribute to player experience studies in Turkey and help both developers and researchers understand the gaming experience.

## Research Framework

### a) Immersion

Science-fiction horror movie *eXistenZ*<sup>5</sup> presents a future that imagines people using biotechnical gear to get into a virtual reality game. The bodies of citizens were transformed surgically to be able to wear the devices. In the movie, the game companies

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3 For more information, see: HILLMAN, S.: Diary Methods in AAA Games User Research. In KAYE, J. et al. (eds.): *CHI EA '16: Proceedings of the 2016 CHI Conference Extended Abstracts on Human Factors in Computing Systems*. New York, NY : ACM, 2016, p. 1879-1885.

4 See also: BERKMAN, M. İ., BOSTAN, B., ŞENYER, S.: Turkish Adaptation Study of the Game User Experience Satisfaction Scale: GUESS-TR. In *International Journal of Human-Computer Interaction*, 2022, Vol. 38, No. 11, p. 1081-1093. [online]. [2023-11-22]. Available at: <<https://www.tandfonline.com/doi/full/10.1080/10447318.2021.1987679>>.

5 CRONENBERG, D. (Director): *eXistenZ*. [DVD]. Toronto : Alliance Atlantis, Momentum Pictures, 1999.

created digital games that feel like reality, and several so-called realists fight against these companies to save reality from deforming. This virtual reality machine which resembles reality is a common trope in science-fiction literature, especially cyberpunk movies.

Any medium can suspend the reality of the audience, even traditional movements in arts aim at making a perfect representation of reality. Reading, movie watching, or playing a game sometimes feels like being in an alternate reality. Narrative in any medium, as J. Murray suggests, is experienced by the audience in great intensity, as a result, the world around us does not feel the same.<sup>6</sup> However, in digital media, unlike reading a book, players can feel agency<sup>7</sup> towards the narrative. In this way digital media – or more precisely digital games – immerses players more than traditional narrative structures. As players control a system and take feedback on those actions, the space becomes more absorbing.<sup>8</sup>

In literature, immersion and presence are sometimes used interchangeably but, M. Slater defines two terms as different notions, as according to the author immersion is “simply for what the technology delivers from an objective point of view”<sup>9</sup> and presence is “a human reaction to immersion”.<sup>10</sup> G. Calleja interprets these definitions as “immersion is being used to describe affective properties of the hardware, while presence is the psychological response to this technology”.<sup>11</sup> Nowadays the game industry markets games by their immersive attributes such as photorealistic graphics, high-quality audio, engaging narrative, replayability value, or procedural generation techniques. Listed attributes impact the experience of players and engagement towards the game deepens.<sup>12</sup>

In her groundbreaking book *Hamlet on the Holodeck*, J. Murray defines immersion as: “Immersion is a metaphorical term derived from the physical experience of being submerged in water. We seek the same feeling from psychologically immersive experiences that we do from a plunge in the ocean or swimming pool: the sensation of being surrounded by a completely other reality, as different as water is from the air, that takes over all of our attention, our whole perceptual apparatus”.<sup>13</sup>

Although reading a science-fiction book or listening to a piece of music can be immersive; participatory activities do this by giving a system governed by rules to players whereby players learn these systems and act according to those rules. Boundaries<sup>14</sup> created by the digital system creates a special time and space other than the ordinary world.

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6 MURRAY, J.: *Hamlet on the Holodeck, Updated Edition: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 2017, p. 123.

7 Remark by the author: In cyberspace, the agency is defined as taking meaningful actions in terms of the boundaries of space and seeing the result of these actions. When users type down words in search engines, click a folder on the desktop with a mouse, or use ‘W, A, S, D’ buttons for navigating in a digital game they expect to feel agency.

8 Remark by the author: According to J. Murray digital environments have four essential properties, these environments are procedural, participatory, spatial, and encyclopedic. Procedural and participatory characteristics of digital spaces refer to the interactive ability of the space, spatial and encyclopedic properties make the space navigable and similar to reality, these two make cyberspace immersive.; MURRAY, J.: *Hamlet on the Holodeck, Updated Edition: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 2017, p. 87.

9 SLATER, M.: *A Note on Presence Terminology*. [online]. [2023-11-23]. Available at: <[http://www0.cs.ucl.ac.uk/research/vr/Projects/Presencia/ConsortiumPublications/ucl\\_cs\\_papers/presence-terminology.htm](http://www0.cs.ucl.ac.uk/research/vr/Projects/Presencia/ConsortiumPublications/ucl_cs_papers/presence-terminology.htm)>.

10 Ibidem.

11 CALLEJA, G.: *In-Game: From Immersion to Incorporation*. Cambridge, MA : The MIT Press, 2011, p. 21.

12 Remark by the author: However, K. Salen and E. Zimmerman criticize this view, according to them the most important aspect of games is not their immersive ability, engagement can be reached through interesting mechanics too.; SALEN, K., ZIMMERMAN, E.: *Rules of Play*. Cambridge, MA : The MIT Press, 2003, p. 451.

13 MURRAY, J.: *Hamlet on the Holodeck, Updated Edition: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 2017, p. 124.

14 Remark by the author: J. Huizinga refers to special boundaries created by the play area as a ‘magic circle’, which differentiates reality. Play is often separated from reality by scholars however nowadays this division is criticized as players enter the play system with real-life knowledge as well.; See: HUIZINGA, J.: *Homo Ludens: Kültürün Oyun Unsuru Üzerine bir İnceleme*. İstanbul : Ayrıntı, 2023.

The computer screen, mouse, and joystick or audio-visual aesthetic of the digital space enhances the immersive ability of the experience. Compared to traditional media, cyberspace presents powerful audio-visual technics which enhance the immersion of users through technology. Whether the world wide web or a digital game; visuals of the digital media enhance the absorbing experience. In this way, it is possible to suggest that the audio-visual experience of digital media determines the level of immersion experienced by the player. As J. Murray suggests “[t]he more persuasive the sensory representation of the digital space, the more we feel that we are present in the virtual world and the wider range of actions we will seek to perform there”.<sup>15</sup>

In player experience studies immersion is an important construct for understanding the physical and psychological outcomes of playing.<sup>16</sup> E. Brown and P. Cairns look at immersion in three categories – engagement, engrossment, and total immersion. According to the authors, each level of immersion felt by the player makes them both physically and psychologically absorbed in the activity.<sup>17</sup> Players choose a specific game to play, then the first level of immersion is experienced by the player which is engagement. The second category is described as the player learning game controls and understanding the rules of the game system until the engrossment level emerges. Lastly, when the player becomes emotionally connected to the outcome of the game, the total immersion state is experienced. However, in player experience questionnaires scholars generally add immersion as one category, questions refer to player’s attention towards the game and how they react to outside stimuli while playing. In this context immersion also relates to the engagement notion.

Scholars established a measurement tool grounded in the immersion outcome of playing games called the Gameplay Experience Questionnaire (GEQ), where the attention of players was studied.<sup>18</sup> The study aims to construct a player-oriented game design process and an experiment was carried out to develop an iterative game development process involving the players in the design process. This article presents the importance of user-oriented design and its use in game design. The study examines immersion in terms of three different contexts: Challenge-based immersion, imaginative immersion, and sensory immersion. Players are individuals with subjective feelings, motivations, skills, and expectations. Therefore, within the scope of GEQ, players produce or experience highly subjective meanings because of their interaction with the games. This scale is criticized by M. J. Parnell for three reasons: First, questions arise about the audio-visual elements of the scale which measures high-quality digital games and in return excludes digital games that used 2D or low poly visual style. Second, the author emphasizes that there is a problem with the translation of the scale, which is originally in the Finnish language. Finally, the questions about the game character in the scale indicate that games without an avatar

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- 15 MURRAY, J.: *Hamlet on the Holodeck, Updated Edition: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 2017, p. 152.
  - 16 For more information, see: CHENG, M. T., SHE, H. C., ANNETTA, L. A.: Game Immersion Experience: Its Hierarchical Structure and Impact on Game-Based Science Learning. In *Journal of Computer Assisted Learning*, 2015, Vol. 31, No. 3, p. 232-253.; JENNETT, C. et al.: Measuring and Defining the Experience of Immersion in Games. In *International Journal of Human-Computer Studies*, 2008, Vol. 66, No. 9, p. 641-661.; QIN, H., RAU, P.-L. P., SALVENDY, G.: Measuring Player Immersion in the Computer Game Narrative. In *International Journal of Human-Computer Interaction*, 2009, Vol. 25, No. 2, p. 107-133.
  - 17 For example, see: BROWN, E., CAIRNS, P.: A Grounded Investigation of Game Immersion. In DYKSTRA-ERICKSON, E., TSCHELIGI, M. (eds.): *CHI EA '04: CHI '04 Extended Abstracts on Human Factors in Computing Systems*. New York, NY : ACM, 2004, p. 1297-1300. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/985921.986048>>.
  - 18 ERMI, L., MÄYRÄ, F.: Fundamental Components of the Gameplay Experience. In DE CASTELL, S., JENSON, J. (eds.): *DiGRA '05 – Proceedings of the 2005 DiGRA International Conference: Changing Views: Worlds in Play*. Vancouver : DiGRA, 2005, p. 5. [online]. [2023-11-23]. Available at: <<http://www.digra.org/wp-content/uploads/digital-library/06276.41516.pdf>>.

representation are excluded from the sample.<sup>19</sup> The Gameplay Scale developed by M. J. Parnell, on the other hand, puts forward a different model to overcome these limitations. In this model, the factors that mediate the digital gaming experience are given as experience, challenge, playability, and usability.

The Game Experience Questionnaire (GEQIJ), developed by W. IJsselsteijn is another player experience measurement that includes immersion as one dimension of the consequence of gaming.<sup>20</sup> GEQIJ consists of seven constructs: competence, sensory and imaginative immersion, flow, tension/annoyance, challenge, negative affect, and positive affect. As in other scales, this study added dimensions related to concepts such as immersion and flow.<sup>21</sup> The Game Engagement Questionnaire (GEnQ) developed by J. H. Brockmeyer et al.,<sup>22</sup> similarly describes the player experience in terms of four components: psychological absorption, presence, flow, and immersion. The GEnQ scale mainly focuses on the effect of violent digital games and therefore emphasized the negative emotions that arise in players. The research has presented methods about the harms of violent games for the players and the precautions that can be taken. In their study on the digital game *Horizon Zero Dawn*<sup>23</sup>, B. Bostan and M. İ. Berkman determined that the GEnQ scale was not gathered under the expected factors in a study conducted in Turkey.<sup>24</sup>

Player experience questionnaires generally categorize immersion in different levels as A. K. Przybylski, C. S. Rigby and R. M. Ryan suggest: "Our research approach trifurcates the general immersion state into three subcomponents or subscales: *physical presence*, feeling as if one is actually in the world; *emotional presence*, feeling that game events have real emotional weight; and *narrative presence*, having a personal investment and engagement with the story".<sup>25</sup>

The meaning of the term immersion is categorized or defined rather differently by scholars. G. Calleja interprets this problem by differentiating the scientific fields: "Technologists, media psychologists, and human-computer interaction researchers, among others, refer to this experience as presence, while humanists and, later, social scientists adopted the metaphor immersion".<sup>26</sup>

G. Calleja proposes the Player Involvement Model in which micro-involvement and macro-involvement of player experience are defined through six dimensions. According to the author, kinesthetic involvement, spatial involvement, shared involvement, narrative involvement, affective involvement, and ludic involvement are described as shaping categories of the immersion and presence degree of players.

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- 19 PARNELL, M. J.: Playing with Scales: Creating a Measurement Scale to Assess the Experience of Video Games. [Master Thesis]. London : University College London, 2009, p. 27. [online]. [2023-11-23]. Available at: <<https://uclic.ucl.ac.uk/content/2-study/4-current-taught-course/1-distinction-projects/9-09/2009-parnell.pdf>>.
- 20 See also: IJSELSTEIJN, W. et al.: Measuring the Experience of Digital Game Enjoyment. In SPINK, A. J. et al. (eds.): *Proceedings of Measuring Behavior 2008: 6th International Conference on Methods and Techniques in Behavioral Research*. Wageningen : Noldus, 2008, p. 88-89.
- 21 For more information, see: BOSTAN, B.: *Dijital Oyunlar ve Interaktif Anlatı*. Istanbul : The Kitap, 2021.
- 22 BROCKMYER, J. H. et al.: The Development of the Game Engagement Questionnaire: A Measure of Engagement in Video Game-Playing. In *Journal of Experimental Social Psychology*, 2009, Vol. 45, No. 4, p. 626-630.
- 23 GUERRILLA GAMES: *Horizon Zero Dawn*. [digital game]. San Mateo, CA : Sony Interactive Entertainment, 2017.
- 24 For more information, see: BOSTAN, B., BERKMAN, M. İ.: Explorations in Game Experience: A Case Study of 'Horizon Zero Dawn'. In İŞLER, V. et al. (eds.): *Contemporary Topics in Computer Graphics and Games*. New York, NY : Peter Lang, 2020, p. 119-138.
- 25 PRZYBYLSKI, A. K., RIGBY, C. S., RYAN, R. M.: A Motivational Model of Video Game Engagement. In *Review of General Psychology*, 2010, Vol. 14, No. 2, p. 161-162.; RYAN, R. M., RIGBY, C. S., PRZYBYLSKI, A.: The Motivational Pull of Video Games: A Self-Determination Theory Approach. In *Motivation and Emotion*, 2006, Vol. 30, No. 4, p. 351.
- 26 CALLEJA, G.: *In-Game: From Immersion to Incorporation*. Cambridge, MA : The MIT Press, 2011, p. 33.

As presented above immersion is a main concept for understanding player experience. The player's feelings towards the game can change through their engagement potential in the gaming world. On the other hand, developers of both serious, educational, and even commercial games can use immersive techniques to persuasively educate players or society in general.

## **b) Autonomy**

The Swiss philosopher J. Piaget studied the cognitive development of children and concluded that children's maturation process develops through two phases: heteronomy and autonomy. J. Piaget extensively studied the play element in children, according to him children accept game rules as if the rules are given by a divine right (heteronomy) or they see the rules as changeable and have a choice to take action (autonomy).<sup>27</sup> In play studies, J. Piaget's research on child's play can be the first study that looked at play state through the context of autonomy.

A psychological attainment framework self-determination theory (SDT) applied to digital gaming in several studies where autonomy as a player experience aspect was used by several scholars. One of the most cited works was where the theory was adapted to the theory of pleasure of gaming. Autonomy and competence levels of players while gaming was understood in terms of immersion and presence. The Physical, Emotional, Narrative, Presence Scale (PENS) was developed by the authors and applied to multiple studies, which research several hypotheses grounded in SDT.<sup>28</sup> According to A. K. Przybylski, C. S. Rigby and R. M. Ryan, feelings of autonomy involve "a sense of volition or willingness when doing a task".<sup>29</sup> At the macro level the volition to entering a game world is defined as autonomy, on the other hand on the micro level in-game choices or character customizations are referred to as player autonomy. In player experience studies, Player Experience of Need Satisfaction (PENS) by R. M. Ryan, C. S. Rigby and A. K. Przybylski specifically measures in-game autonomy of digital game players.<sup>30</sup>

Another questionnaire developed through self-determination theory is called the Ubisoft Perceived Experience Questionnaire (UPEQ), a self-determination evaluation tool for digital games that analyses player experience in terms of autonomy, competence, and relatedness.<sup>31</sup> According to SDT, these three basic psychological needs of players are satisfied which affects the well-being of digital game players. Autonomy can be defined as; people seeking freedom in everyday life and when intrinsically motivated, feeling more autonomous toward their actions. Competence is defined as people seeking mastery in experiences in daily life, when these experiences occur the well-being of a person increases. Relatedness is the social part of the theory, and when people feel connected to society again the well-being of players increases. As scholars who work on games from the perspective of SDT add that "self-determination theory (SDT) accounts for game

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27 SUGARMAN, S.: *Piaget's Construction of the Child's Reality*. Cambridge : Cambridge University Press, 1987, p. 84.

28 See: PRZYBYLSKI, A. K., RIGBY, C. S., RYAN, R. M.: A Motivational Model of Video Game Engagement. In *Review of General Psychology*, 2010, Vol. 14, No. 2, p. 154-166.; RYAN, R. M., RIGBY, C. S., PRZYBYLSKI, A.: The Motivational Pull of Video Games: A Self-Determination Theory Approach. In *Motivation and Emotion*, 2006, Vol. 30, No. 4, p. 344-360.; KIM, K. et al.: Is it a Sense of Autonomy, Control, or Attachment? Exploring the Effects of In-Game Customization on Game Enjoyment. In *Computers in Human Behavior*, 2015, Vol. 48, No. 1, p. 695-705.

29 RYAN, R. M., RIGBY, C. S., PRZYBYLSKI, A.: The Motivational Pull of Video Games: A Self-Determination Theory Approach. In *Motivation and Emotion*, 2006, Vol. 30, No. 4, p. 349.

30 Ibidem, p. 351-362.

31 For more information, see: AZADVAR, A., CANOSSA, A.: UPEQ: Ubisoft Perceived Experience Questionnaire: A Self-Determination Evaluation Tool for Video Games. In DAHLKOG, S. et al. (eds.): *FDG '18: Proceedings of the 13th International Conference on the Foundations of Digital Games*. New York, NY : ACM, 2018, p. 1-7. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3235765.3235780>>.

experiences in terms of their ability to satisfy players' intrinsic motivations – autonomy, competence, and relatedness needs – this ultimately enhances the perceived enjoyment of gameplay".<sup>32</sup>

In psychology, intrinsic motivation towards an activity is defined as autotelic. If the activities are performed for their own sake, and not for an external need it is defined as intrinsically motivated. Digital games by their nature can be considered intrinsically motivated activities.<sup>33</sup> In this way, games are considered autotelic activities, which are done only for themselves. Motivation for play is generally intrinsic rather than extrinsic.

Autonomy also refers to the agency of the player, in-game character development and customization, and selecting preferred quests affects the player's sense of control throughout the gameplay. In-game design terms autonomy occur through goals, strategies, and actions. If the game provides flexibility such as multiple game elements in which players have the options to choose, in conclusion players feel in control over the system.

The adaptation of self-determination theory has been problematized as some research papers define autonomy differently. For example, some research papers consider a player's volition to play as an autonomous activity, on the other hand, other papers considered autonomy as in-game options that the game offers.<sup>34</sup> At the same time, autonomy is one aspect of gaming, whether considered as in-game choice elements or player volition towards play activity.

### c) Audio-Visual Appeal of Gaming

Audio-visual aesthetics of games can be defined as the music, sound effects and graphics, and animation that are used in digital games. In player experience studies audio-visual appeal of gaming as heavily affecting the gaming experience, on the other hand, game developers improve gameplay to keep players interested in the gaming environment. In this way, the appeal also can be understood in terms of immersion, according to: "The interaction with such possible audiovisual worlds provides the player with an experience of being immersed in a 'virtual reality,' because our experience of reality is linked not only to the possible salience of what we see and hear but is also centrally linked to whether we are able to interact with such perceptions".<sup>35</sup>

Positive player experience can be enhanced through the audio-visual aesthetics of games, in literature the enjoyment gained by audio-visual feedback is defined as 'juicy' game design.<sup>36</sup> Similar to their definition J. Juul defines this term as positive feedback provided by the digital environment that affects the players.<sup>37</sup> The interaction that digital games present to the players create a feedback loop that can be both positive and negative. However, the game industry's main goal is to engage players in the environment and make them feel good in return while gaming.

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32 KIM, K. et al.: Is it a Sense of Autonomy, Control, or Attachment? Exploring the Effects of In-Game Customization on Game Enjoyment. In *Computers in Human Behavior*, 2015, Vol. 48, No. 1, p. 695.

33 Remark by the author: This argument can exclude eSports players because they play games for external gain such as gaining money or fame.

34 TYACK, A., MEKLER, E. D.: Self-Determination Theory in HCI Games Research: Current Uses and Open Questions. In BERNHAUPT, R. et al. (eds.): *CHI '20: Proceedings of the 2020 CHI Conference on Human Factors in Computing Systems*. New York, NY : ACM, 2020, p. 5. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3313831.3376723>>.

35 GRODAL, T.: Video Games and the Pleasures of Control. In ZILLMANN, D., VORDERER, P. (eds.): *Media Entertainment: The Psychology of Its Appeal*. Mahwah, NJ : Lawrence Erlbaum Associates, 2020, p. 197.

36 See: HICKS, K. et al.: Juicy Game Design: Understanding the Impact of Visual Embellishments on Player Experience. In ARNEDO, J. et al. (eds.): *CHI PLAY '19: Proceedings of the Annual Symposium on Computer-Human Interaction in Play*. New York, NY : ACM, 2019, p. 185-197. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3311350.3347171>>.

37 JUUL, J.: *Half-Real: Video Games Between Real Rules and Fictional Worlds*. Cambridge, MA : The MIT Press, 2011, p. 161.

In this way, different genres create different player experiences in terms of audio-visual aesthetics. A. Järvinen categorizes the audio-visual style of digital games into three categories: photorealism, caricaturism, and abstractionism.<sup>38</sup> The definition made by the author primarily focuses on the graphical elements of digital games. But sound effects are also an important part of the gaming experience. As a functional consequence of gaming, PXI defines audio-visual appeal as the degree to which “a player appreciates the audio-visual styling of the game”.<sup>39</sup> As the theoretical model of PXI suggests, the audio-visual appeal of gaming affects the general game enjoyment.

Lastly the audio-visual aspect of a game shapes the player experience and influences the overall enjoyment of the player. As described above audio is defined as the sound effects, music or voice acting of a game and visual appeal is defined as the graphics, colours or any visual element of a game. The audio-visuals of a game generally enhance the immersion and engagement of the players where the player’s perception throughout the game is shaped by these elements. When these elements align with the gameplay, the player’s enjoyment can be enhanced. However, it is important to consider that individual preferences of gamers may vary, in this way it’s not safe to say that high quality graphics ensure game enjoyment. However, in general, a high-quality audio-visual presentation that effectively supports the game’s themes, mechanics, and narrative has a strong potential to positively influence the player’s enjoyment of the gaming experience.

Literature on digital game studies shows that audio-visual aspects of games are a predictor of level of immersion. Graphics and sounds presented in games create an atmosphere that engages players to the gamified system. According to J. Y. Douglas and A. Hargadon, the aesthetic pleasures of gaming are understood in terms of immersion and engagement.<sup>40</sup> However, the flow experience of games is also an important aspect of engagement to the digital game. The flow experiences can also be achieved through the sound design of digital games. M. N. Grimshaw-Aagaard states that sound design directly effects the player immersion where engagement is increased throughout gameplay.<sup>41</sup>

## Research: Adaptation of the PXI Items

Player experience research – as a field – emerges from the human-computer interaction field where the interaction of both product and user is researched to make the product more feasible. Briefly, user experience is defined as the interaction between the product and the user, where the main goal is to present safe and easy-to-use products. In this way, player experience studies differ from user experience research. C. Hodent defines the player experience as an ecosystem where interacting with a game system allows people to experience different

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38 JÄRVINEN, A.: Gran Stylissimo: The Audiovisual Elements and Styles in Computer and Video Games. In MÄYRÄ, F. (ed.): *Proceedings of Computer Games and Digital Cultures Conference*. Tampere : Tampere University Press, 2002, p. 120-124.

39 For example, see: ABEELE, V. V. et al.: Development and Validation of the Player Experience Inventory: A Scale to Measure Player Experiences at the Level of Functional and Psychosocial Consequences. In *International Journal of Human-Computer Studies*, 2020, Vol. 135, No. 1, p. 1-47. [online]. [2023-11-22]. Available at: <<https://doi.org/10.1016/j.ijhcs.2019.102370>>.

40 DOUGLAS, J. Y., HARGADON, A.: The Pleasures of Immersion and Engagement: Schemas, Scripts and the Fifth Business. In *Digital Creativity*, 2001, Vol. 12, No. 3, p. 153.

41 For more information, see: GRIMSHAW-AAGAARD, M. N.: Sound and Player Immersion in Digital Games. In PINCH, T., BIJSTERVELD, K. (eds): *The Oxford Handbook of Sound Studies*. Oxford : Oxford University Press, 2011, p. 347-366.

emotions and engagement depending on the design system.<sup>42</sup> Literature on game design suggests that before starting to develop a game, the first thing to consider is the possible experiences of players, and game developers have to determine which emotions he/she wants to evoke in players while they interact with the game system.<sup>43</sup> Although game metrics analyses are gaining interest in understanding the player experience, newly developed player experience questionnaires also provide a great way to analyse the player experience. In this way, data obtained from game companies have to be analysed with subjective player evaluations, and studies such as PXI allows scholars to understand the different game genre's impact on players.

The validity and reliability study was designed with the permission of the scale developers to adapt the Player Experience Inventory (PXI)<sup>44</sup> scale to Turkish. The scale's theoretical infrastructure was created by using the Means-End Theory, which is discussed under the discipline of consumer behaviour. The current scale, developed by Computer-Human Interaction scholars and Game Designers, is considered a different approach in the literature that measures the player experience under two main headings – functional results and psychosocial results of gaming. While functional results are expressed as the instantaneous effects of various decisions taken in game design on the player (for example, ease of use, goals, and rules), psychosocial results measure the emotional experiences of the players in the second degree (factors such as mastery, immersion, and meaning can be given as examples). Five factors measure functional outcomes (ease of use, progress feedback, audio-visual appeal, goals and rules, challenge), psychosocial outcomes (meaning, curiosity, immersion, autonomy, mastery), and three questions measuring general satisfaction and enjoyment were added to the scale. The model presented has also been validated through the Mechanics, Dynamics, and Aesthetics (MDA) system, a model unique to digital games. The research questions of the study had been given above:

- RQ1: Does the audio-visual appeal of gaming have an effect on game enjoyment?
- RQ2: If the audiovisual appeal of gaming affects game enjoyment is this mediated by immersion and autonomy?
- RQ3: Does the audio-visual appeal of gaming and the autonomy of players vary between digital game genres?

To answer the research questions audio-visual appeal, immersion, autonomy, and fun items were chosen from PXI. First, the survey questions were adapted to Turkish by the authors and checked by a native English speaker; then, the questions were translated back into English. In the first phase of the research, authors implemented back-and-forth translation for linguistic matching of the PXI items. Various changes were made to the translations at this stage to achieve an accurate version of the items in Turkish, at this stage feedback from gamers, developers, and user experience scholars was obtained for the adaption process and the questionnaire was finalized. In addition, questions were added to the scale in which the participants would evaluate their own gaming experience as a beginner or an expert; demographic questions were also added: gender, age, educational status, working status, and questions on playing habits such as years of playing, weekly hours spent on games, money spent on the game, preferred game playing style.

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42 See: HODENT, C.: *The Gamer's Brain: How Neuroscience and UX Can Impact Video Game Design*. London : CRC Press, 2017.

43 See also: HUNICKE, R., LEBLANC, M., ZUBEK, R.: MDA: A Formal Approach to Game Design and Game Research. In FU, D. et al. (eds.): *AAAI Workshop Papers 2004: Challenges in Game AI*. San Jose, CA : AAAI, 2004, p. 1-5. [online]. [2023-11-23]. Available at: <<https://cdn.aaai.org/Workshops/2004/WS-04-04/WS04-04-001.pdf>>.

44 Remark by the author: Player Experience Research, a sub-field of User Experience Research, has been developing in recent years as an interdisciplinary field that measures and analyzes player experiences to optimize game design. V. V. Abeele, one of the developers of the scale, was contacted via e-mail, and permission was obtained to adapt the scale into Turkish.

Three hundred and eleven participants took part in the study. It was determined that there were one hundred and ninety-seven valid participants in the analysis process, and the remaining participants were not included in the analysis due to reasons such as missing answers and choosing more than one game for analysis. Data were processed into the SPSS 23.0 program for further analysis – AMOS 23.0 and PROCESS v4.1 were used.

## Results

The structures generally examined in social science research consist of the factors that make up the structure and sub-items representing the existing factors.<sup>45</sup> Factor analysis is used to find a consistent but smaller number of factors by bringing together a large number of related items to discover the pattern formed by the items. Within the scope of the research, it was necessary to examine the factors and structures created by the variables of the Turkish adaptation of studies of the scale. For this purpose, studies on the adapted scale were followed and exploratory factor analysis was applied to determine whether the data were suitable for analysis. Principal Axis Factoring is used to know the number of factors in the selection of the variance used in the factor analysis and the factors being related to each other. Both the Kaiser-Meyer-Olkin Measure (KMO) and Barlett Sphericity Test were applied. A KMO value of 0.60 and above indicates that the data are sufficient for factor analysis.<sup>46</sup> All of the factors were performed using Principal Axis Factoring in the same manner as the adapted scale. The result of the KMO test of the data was 0.809, and it was seen that the data containing audio-visual appeal, immersion, autonomy, and enjoyment were suitable for confirmatory factor analysis (Table 1).

After finding the results of the EFA, to analyse the factor structures of the scale items a Confirmatory Factor Analysis (CFA) was applied by the authors. In Table 2 acceptable and perfect values for fit indexes are given.<sup>47</sup> In Table 3 CFA results of the Turkish adaptation of PXI items are given. Results show that the scale structures are acceptable and compatible with the analysis's test results.

Goodness-of-fit-indices were shown above for three items from the scale. However, when all of the items of the PXI scale were examined the overall questions did not show credible factor structure. The authors contacted the scale developers however the factor structure of the original scale could not be obtained. In this way the Turkish variant for the PXI could not be developed.

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45 GÜRBÜZ, S., ŞAHİN, F.: *Sosyal Bilimlerde Araştırma Yöntemleri*. Ankara : Seçkin Yayıncılık, 2014, p. 271.

46 Ibidem.

47 See: MacCALLUM, R. C., BROWNE, M. W., SUGAWARA, H. M.: Power Analysis and Determination of Sample Size for Covariance Structure Modeling. In *Psychological Methods*, 1996, Vol. 1, No. 2, p. 130-149.; SHEVLIN, M., MILES, J.: Effects of Sample Size, Model Specification and Factor Loadings on the GFI in Confirmatory Factor Analysis. In *Personality and Individual Differences*, 1998, Vol. 5, No. 1, p. 85-90.; HOOPER, D., COUGHLAN, J. P., MULLEN, M. R.: Evaluating Model Fit: A Synthesis of the Structural Equation Modelling Literature. In BROWN, A. (ed.): *7th European Conference on Research Methodology for Business and Management Studies*. Reading : ACI, 2008, p. 195-200.; BENTLER, P. M., BONETT, D. G.: Significance Tests and Goodness of Fit in the Analysis of Covariance Structures. In *Psychological Bulletin*, 1980, Vol. 88, No. 3, p. 588-606.; HU, L., BENTLER, P. M.: Cutoff Criteria for Fit Indexes in Covariance Structure Analysis: Conventional Criteria Versus New Alternatives. In *Structural Equation Modeling*, 1999, Vol. 6, No. 1, p. 1-55.

Table 1: Adaptation of the PXI items and explanatory factor analysis (EFA) results

Appeal	Items	EFA
Audio-visual	"I enjoyed the way the game was styled." [Oyunun görsel stilini beğendim.]	.760
	"I liked the look and feel of the game." [Oyunun görselleri ve oyunun bende uyandırdığı his hoşuma gitti.]	.855
	"I appreciated the aesthetics of the game." [Oyunun estetiğini takdir ettim.]	.880
Immersion	"I was no longer aware of my surroundings while I was playing." [Oyunu oynarken artık çevremin farkında değildim.]	.818
	"I was immersed in the game." [Oyuna kendimi kaptırdım.]	.952
	"I was fully focused on the game." [Oyuna tamamen odaklanmıştım.]	1.001
Autonomy	"I felt a sense of freedom about how I wanted to play this game." [Bu oyunu nasıl oynamak istediğim hakkında özgürlük duygusu hissettim.]	.949
	"I felt free to play the game in my own way." [Oyunu kendi istediğim gibi oynamak konusunda özgür hissettim.]	.717
	"I felt like I had choices regarding how I wanted to play this game." [Bu oyunu nasıl oynamak istediğime dair seçeneklerim olduğunu düşündüm.]	.666
Fun	"I liked playing the game." [Oyunu oynamayı sevdim]	.855
	"The game was entertaining." [Oyunu oynamak eğlenceliydi]	.760
	"I had a good time playing the game." [Oyunu oynarken iyi vakit geçirdim]	.880

Source: own processing

Table 2: Confirmatory factor analysis parameters

	Acceptable	Perfect
GFI	.90 <	> .95
AGFI	.85 <	> .90
CFI	.95 <	> .95
NNFI	.90 <	> .97
NFI	.90 <	> .90
RMSEA	.08 – .10	< .08
CMIN/SD.	2 <	< 2

Source: own processing

Table 3: Confirmatory factor analysis of the scale (model fit)

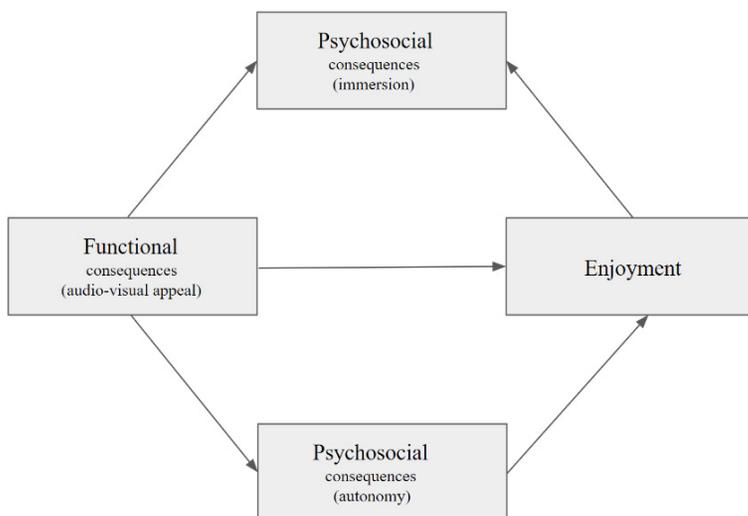
	GFI	AGFI	CFI	NNFI	NFI	RMSEA	CMIN/SD.
PX	.956	.928	.997	.995	.971	.025	54.063

Source: own processing

# Immersion and Autonomy Items as a Mediator to the Audio-Visual Appeal of Gaming

As the final step in the research, mediation analysis was conducted by the authors. We anticipated that the audio-visual appeal of gaming as a functional consequence of gaming positively predicts Enjoyment (RQ1). Secondly, the authors also expected that this relationship is mediated by psychosocial consequences of gaming, such as immersion and autonomy (RQ2).

To be able to understand the mediation effects scale items, average means were computed as a variable. To be able to answer RQ1, regression analysis was conducted through ANOVA and fun construct as an independent variable implemented in the SPSS program. It was seen that the audio-visual appeal of gaming is a significant predictor of game enjoyment. In this way, the direct effect of the functional consequence of gaming on game enjoyment was measured in the sample. After presenting the relationship between the audio-visual appeal of gaming and overall game enjoyment, the mediation analysis of psychosocial consequences was further analysed in the SPSS program by PROCESS v.4.1. The initial finding is presented in Picture 1.



Picture 1: Mediation Analysis and Model

Source: own processing

The proposed model indicates that the audio-visual appeal of gaming is a predictor of game enjoyment and according to the model, this relationship is mediated by immersion and autonomy as a psychosocial consequence of gaming. In this way, RQ2 is also supported. As per the adapted scale the effect of functional consequence of gaming predicted game enjoyment, and immersion and autonomy constructs mediated this process. In this way adapted scales were significantly valid in the Turkish gaming community.

Genre classifications in game studies are relatively hard compared to literature and films because game genre typologies also differ according to game mechanics.<sup>48</sup> In this way, games can be classified through theme, style, and mechanics. According to J. Juul classifying games is difficult because technological advancements in game systems develop at an untraceable speed, therefore games change and mutate according to these advancements.<sup>49</sup> Secondly, compared to film genres, game genres are background components, design patterns, and mechanics of the games are generally prioritized while defining certain games. Chosen game genres<sup>50</sup> are classified according to the PXI article. As for this research, the sample size is relatively small, because the real-time strategy genre for example referred and changed to the strategy genre.

To understand if there any variety between items in terms of genre, the authors looked at the mean of immersion, autonomy, and audio-visual appeal (RQ3). Autonomy and audio-visual appeal were suitable for further analysis. It was determined that players who chose the action-adventure genre for the study felt more audio-visual appeal while gaming compared to first person shooter players. Secondly, action role playing digital game players felt more autonomy during their experience compared to first person shooter players. Lastly action-adventure players felt more autonomy compared to action-adventure gamers. In conclusion the player experience items vary between game genres.

## Demographic Findings

According to the 2020 'Turkish Game Industry' research by Gaming in Turkey, Turkey Gaming and Esports agency, the gaming industry was the industry that received the most investment in Turkey in 2020. The increase in the number of players in our country every year has caused important companies such as Riot Games to open offices in Turkey. The opening of digital game undergraduate and graduate programs in universities has led to increased academic publications related to the field. In the 2020 report, the total number of players living in Turkey is given as 36.000.000+. In addition, the distribution of the players in the Turkey report by age is as follows; 18-24 years 24.7%, 25-34 years 33.4%, 35-44 years 27.4%, 45-54 years 10.8%, 55-64 years 3.7%. When the estimated platforms used by the players for the game are listed; mobile platforms took first place with 35 million players, PC (computer) users with 22 million players, and finally console platforms with 17 million players.<sup>51</sup>

Gaming in Turkey's report states that internet cafes in Turkey are still used by various eSports teams or daily users, which still exist in the gaming ecosystem, to play a

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48 Remark by the author: Game mechanics are generally defined as the rules of the game system. According to B. Brathwaite and I. Schreiber, game mechanics includes: the starting rules of the game (setup), game-ending (victory conditions), general gameplay (progression of play), player abilities (player actions), and information presented on the play area (definition of game views).; For more information, see: BRATHWAITE, B., SCHREIBER, I.: *Challenges for Game Designers*. Boston, MA : Charles River Media, 2009.

49 JUUL, J.: *Genre in Video Games (and Why We don't Talk [more] about It)*. Released on 22nd December 2014. [online]. [2023-12-05]. Available at: <<https://www.jesperjuul.net/ludologist/2014/12/22/genre-in-video-games-and-why-we-dont-talk-about-it/>>.

50 Remark by the author: According to PXI by V. V. Abeele, game genre classification is presented as: first-person shooters, sport simulation games, multiplayer online battle arenas, massively multiplayer online role-playing games, social simulation games, action role-playing games, real-time strategy, massively multiplayer online role-playing games, puzzle games, action-adventure games.; See: ABEELE, V. V. et. al.: Development and Validation of the Player Experience Inventory: A Scale to Measure Player Experiences at the Level of Functional and Psychosocial Consequences. In *International Journal of Human-Computer Studies*, 2020, Vol. 135, No. 1, p. 1-47. [online]. [2023-11-22]. Available at: <<https://doi.org/10.1016/j.ijhcs.2019.102370>>.

51 GIT: *Turkey Game Market 2020 Report*. 2021. [online]. [2023-11-23]. Available at: <<https://www.gaminginturkey.com/files/pdf/turkey-game-market-report-2020.pdf>>.

game. Besides playing games, these areas are places where various game communities can exchange information.<sup>52</sup> Internet cafe users generally consist of young men between 18 and 25 who continue their high school or university education.<sup>53</sup> According to the ethnographic study of M. Binark, G., Bayraktutan-Sütçü and F. Buçakci, the most preferred games in Internet cafes are multiplayer and first-person shooter games.<sup>54</sup> Therefore, it can be seen that there is no change in terms of game preferences in Turkey. In this context, Gaming in Turkey's 2020 report and M. Binark, G., Bayraktutan-Sütçü and F. Buçakci's research was found appropriate.

One hundred and ninety-seven participants filled out the survey, and genre preferences and demographic findings were presented. In the study, various questions were asked about the demographic information and game-playing habits of 197 participants. Most of the participants were called from the gaming communities on social media, and some of them were personal acquaintances found through the snowball method. 70.5% male, 25% female, 2% non-binary, and 2.5% unwilling to disclose participants were also part in the study. Most of the participants were between the ages of 23-29, with an average of 40%, 29.5% were identified in the 18-22 age range. 21% of the participants in the study were within the 30-39 age range, 8.0% of the participants were aged 40-49, 1% were in the 12-17 age range, and finally, one participant was aged 50 and over. The highest level of education completed by the participants appears to be undergraduate. Then, with 29.2%, high school was the second-highest level of education completed. Twenty-four participants who had completed their master's education and seven participants who had completed their doctorate education took part in the study. Finally, two participants marked their education level as primary education. When the working status of the participants was examined, full-time workers and full-time students constituted an important part of the sample. Four part-time students and six part-time students participated in the study. In addition to these, one participant, a homemaker, who retired and was not able to work, participated in the research. Finally, there are sixteen people defined as unemployed.

The details of the weekly time spent by the participants playing games were measured. Playing less than 10 hours represented 36.8%, and the closest to this percentage was 29.4% of respondents playing 10-19 hours per week. 13.9% of the participants who played games between 20-29 hours and 10% of participants who played games between 30-39 hours took part in the study. In addition, 5.5% of participants played games between 40-49 hours. Finally, in terms of time spent on gaming with the lowest number of participants, the lowest levels were between 50-59 hours: 5 people and 4 participants who played 60 or more hours a week. Participants who spend 10-49 TL on the games constitute the highest percentage; a total of 39 participants are in this segment. Following that, 38 participants spent between 50-99 TL for games. An equal number of participants who did not spend any money and participants who spent 100-149 TL were reached, and it was determined that there were thirty-seven people for each topic. Finally, fourteen people who spent between 150-299 TL and twelve participants who spent more than 300 TL per month were reached.

The last question posed about the participants' gaming habits is whether they play alone or with other people. The answers to this question differ from various studies conducted in the past. While 62.1% of the participants preferred to play alone, 37.9% preferred to play with other players. When the demographic findings in the study are compared with the focus group interviews and survey findings of M. Binark,

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52 BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., BUÇAKCI, F.: Türkiye'de İnternet Kafelerde Dijital Oyuncular Yeni Medya Okuryazarlığı: Neden Gerekli?. In BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., FIDANER, I. B. (eds): *Dijital Oyun Rehberi: Oyun Tasarımı, Türler ve Oyuncu*. İstanbul : Kalkedon Yayınları, 2009, p. 207.

53 Ibidem, p. 197.

54 Ibidem, p. 214.

G. Bayraktutan-Sütcü and F. Buçakci's titled as "Digital Players in Internet Cafes in Turkey Why New Media Literacy is Necessary?", no significant difference was observed in the age of the players.<sup>55</sup> When the gender distribution was examined, it was seen that there were more female participants in the current study, but the fact that M. Binark, G. Bayraktutan-Sütcü and F. Buçakci's research is specific to Internet cafes may be the reason for this difference. On the other hand, demographic findings differ from the Gaming in Turkey 2020 report. The current study asked participants to rate a game they remember well or played recently. In this context, most of the participants analysed computer-based games, but Gaming in Turkey's report showed an estimated age range and gender distribution that includes all platforms. Accordingly, it was determined that male players were in the majority, and there was a 10% difference between female and male players. In addition, similarities were determined in the age ranges of the players. 18-24 year olds and the age range of 25-34 constitute an important part of the players living in Turkey.

According to Entertainment Software Association (ESA), ages between 18-34 years is the largest group of U.S. gamers.<sup>56</sup> In this way Turkish and international players age ranges are same. Another aspect that gained attention through the research is that the sample showed Turkish players preferred playing single player games. However, international research shows that multiplayer games are gaining much attention than single player games. Although the sample of this research did not show similarities in terms of playing habits, the player experience of games is highly different. Playing alone or with others effects the consequences of player experience items such as autonomy or immersion.<sup>57</sup>

## Discussion

The digital games industry in Turkey is growing rapidly and consequently the gaming population has increased. As digital games is a transnational phenomenon it is important to understand regional player experience. This study aimed at adapting a player experience questionnaire to Turkish, however several items from the scale did not prove linguistically equivalent. The adaptation study asked participants to fill out the forms according to a digital game that they played recently or a game that they play frequently, because it was important for the study that gamers gameplay experience was still salient. It is believed that participants chose their favourite games, in this way the satisfaction scales showed high scores. This could be the reason that several items could not pass factor analysis. For future player experience studies, it might be better to use adapted scales on specific games and under laboratory conditions.

Secondly, as digital game terminology among gamers is generally in English, genres and gameplay experience when discussed contain another languages wording such as; mechanic, ease of control, immersion etc. In this way there is no commonly used digital game terminology in Turkey. This also might be the reason that several items cannot be translated. Turkish scholars should create a common terminology for digital game components.

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55 BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., BUÇAKCI, F.: Türkiye'de İnternet Kafelerde Dijital Oyuncular Yeni Medya Okuryazarlığı Neden Gerekli?. In BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., FIDANER, I. B. (eds): *Dijital Oyun Rehberi: Oyun Tasarımı, Türler ve Oyuncu*. İstanbul : Kalkedon Yayınları, 2009, p. 197.

56 ESA: *2022 Essential Facts About the Video Game Industry*. 2022. [online]. [2023-12-05]. Available at: <<https://www.theesa.com/wp-content/uploads/2022/06/2022-Essential-Facts-About-the-Video-Game-Industry.pdf>>.

57 For example, see: VELLA, K., JOHNSON, D., HIDES, L.: Playing Alone, Playing with Others: Differences in Player Experience and Indicators of Wellbeing. In COX, A. L., CAIRNS, P. (eds.): *CHI PLAY '15: Proceedings of the 2015 Annual Symposium on Computer-Human Interaction in Play*. New York, NY : ACM, 2015, p. 3-12. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/2793107.2793118>>.

The study aimed to develop a Turkish variant of PXI, however there was only one item for functional consequence of gaming: audio-visual appeal and two items for psychosocial consequence of gaming: autonomy/immersion. As a psychosocial after-effect of gaming, the suggested model suggests that the audio-visual appeal of games is a predictor of game enjoyment. This relationship is mediated by immersion and autonomy. We believe that game developers can benefit from this model to understand the impact of the digital games that they develop.

## Conclusion

Quantitative studies that measure player experience have been developed by scholars from diverse fields. As a result, the consequences of digital gaming and its potential impacts have been studied extensively via surveys. This study gives a summary of these scales from psychology to human-computer interaction. The impact of games is generally studied from a negative perspective. Although several surveys depend on a negative/positive dichotomy, the general assumption is that studying game-related subjects such as mechanics, engagement, immersion, and challenge is more suitable for studying digital games. Player experience surveys allow us to understand how game design decisions affect player behaviours during their interaction with digital games, as well as how they form subjective emotional responses toward players.

Additionally, the Turkish game industry has developed in recent years, as important companies such as Riot Games have opened new branches in the country. However, there are no player experience surveys that measure the experience of players in Turkish. There is only one study that successfully adapts a survey to Turkish, conducted by M. İ. Berkman, B. Bostan and S. Şenyar.<sup>58</sup> In this way, both the Turkish gaming industry and scholars who work on player experience need a tool in order to measure player behaviours. The research conducted by the authors suggests that the audio-visual appeal of gaming creates enjoyment in the player's experience. This model also shows that the relationship between audio-visual appeal and enjoyment is mediated by immersion and autonomy. In this way, the adapted scale can be used by game companies to better understand the gaming experience.

Lastly the authors aimed to develop a Turkish variant for the PXI survey, however validity and reliability tests for the factor structure showed that the items are not applicable. As the scales that developed for player experience studies uses special concepts for defining several experiences, general players do not know these notions. We believe that it is rather hard to translate gaming experiences questions appropriately for the Turkish gaming community. However, with the three items from the scale we believe that the model can be used to understand gaming experiences by scholars and developers. In conclusion, functional consequences of gaming, called audio-visual appeal, directly affected game enjoyment and this relationship is mediated by psychosocial consequences called immersion and autonomy. These items can be used by Turkish game developers to understand player experience. Also, it can help developers to understand functional aspects of their developed games and the psychosocial consequences of player experience.

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58 See: BERKMAN, M. İ., BOSTAN, B., ŞENYER, S.: Turkish Adaptation Study of the Game User Experience Satisfaction Scale: GUESS-TR. In *International Journal of Human-Computer Interaction*, 2022, Vol. 38, No. 11, p. 1081-1093. [online]. [2023-11-22]. Available at: <<https://www.tandfonline.com/doi/full/10.1080/10447318.2021.1987679>>.

## BIBLIOGRAPHY

- ABEELE, V. V. et. al.: Development and Validation of the Player Experience Inventory: A Scale to Measure Player Experiences at the Level of Functional and Psychosocial Consequences. In *International Journal of Human-Computer Studies*, 2020, Vol. 135, No. 1, p. 1-47. ISSN 1095-9300. [online]. [2023-11-22]. Available at: <<https://doi.org/10.1016/j.ijhcs.2019.102370>>.
- AZADVAVAR, A., CANOSSA, A.: UPEQ: Ubisoft Perceived Experience Questionnaire: A Self-Determination Evaluation Tool for Video Games. In DAHLISKOG, S. et al. (eds.): *FDG '18: Proceedings of the 13th International Conference on the Foundations of Digital Games*. New York, NY : ACM, 2018, p. 1-7. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3235765.3235780>>.
- BENTLER, P. M., BONETT, D. G.: Significance Tests and Goodness of Fit in the Analysis of Covariance Structures. In *Psychological Bulletin*, 1980, Vol. 88, No. 3, p. 588-606. ISSN 0033-2909.
- BERKMAN, M. İ., BOSTAN, B., ŞENYER, S.: Turkish Adaptation Study of the Game User Experience Satisfaction Scale: GUESS-TR. In *International Journal of Human-Computer Interaction*, 2022, Vol. 38, No. 11, p. 1081-1093. ISSN 1532-7590. [online]. [2023-11-22]. Available at: <<https://www.tandfonline.com/doi/full/10.1080/10447318.2021.1987679>>.
- BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., BUÇAKCI, F.: Türkiye'de İnternet Kafelerde Dijital Oyuncular Yeni Medya Okuryazarlığı Neden Gerekli?. In BINARK, M., BAYRAKTUTAN-SÜTCÜ, G., FIDANER, I. B. (eds): *Dijital Oyun Rehberi: Oyun Tasarımı, Türler ve Oyuncu*. İstanbul : Kalkedon Yayınları, 2009, p. 187-224.
- BOSTAN, B.: *Dijital Oyunlar ve İnteraktif Anlatı*. İstanbul : The Kitap, 2021.
- BOSTAN, B., BERKMAN, M. İ.: Explorations in Game Experience: A Case Study of 'Horizon Zero Dawn'. In İŞLER, V. et al. (eds.): *Contemporary Topics in Computer Graphics and Games*. New York, NY : Peter Lang, 2020, p. 119-138.
- BRATHWAITE, B., SCHREIBER, I.: *Challenges for Game Designers*. Boston, MA : Charles River Media, 2009.
- BROCKMYER, J. H. et al.: The Development of the Game Engagement Questionnaire: A Measure of Engagement in Video Game-Playing. In *Journal of Experimental Social Psychology*, 2009, Vol. 45, No. 4, p. 624-634. ISSN 0022-1031.
- BROWN, E., CAIRNS, P.: A Grounded Investigation of Game Immersion. In DYKSTRA-ERICKSON, E., TSCHELIGI, M. (eds.): *CHI EA '04: CHI '04 Extended Abstracts on Human Factors in Computing Systems*. New York, NY : ACM, 2004, p. 1297-1300. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/985921.986048>>.
- CALLEJA, G.: *In-Game: From Immersion to Incorporation*. Cambridge, MA : The MIT Press, 2011.
- CRONENBERG, D. (Director): *eXistenZ*. [DVD]. Toronto : Alliance Atlantis, Momentum Pictures, 1999.
- DOUGLAS, J. Y., HARGADON, A.: The Pleasures of Immersion and Engagement: Schemas, Scripts and the Fifth Business. In *Digital Creativity*, 2001, Vol. 12, No. 3, p. 153-166. ISSN 1462-6268.
- ERMI, L., MÄYRÄ, F.: Fundamental Components of the Gameplay Experience. In DE CASTELL, S., JENSON, J. (eds.): *DiGRA '05 – Proceedings of the 2005 DiGRA International Conference: Changing Views: Worlds in Play*. Vancouver : DiGRA, 2005, p. 1-14. [online]. [2023-11-23]. Available at: <<http://www.digra.org/wp-content/uploads/digital-library/06276.41516.pdf>>.
- ESA: *2022 Essential Facts About the Video Game Industry*. 2022. [online]. [2023-12-05]. Available at: <<https://www.thesa.com/wp-content/uploads/2022/06/2022-Essential-Facts-About-the-Video-Game-Industry.pdf>>.
- GIT: *Turkey Game Market 2020 Report*. 2021. [online]. [2023-11-23]. Available at: <<https://www.gaminginturkey.com/files/pdf/turkey-game-market-report-2020.pdf>>.
- GRIMSHAW-AAGAARD, M. N.: Sound and Player Immersion in Digital Games. In PINCH, T., BIJSTERVELD, K. (eds): *The Oxford Handbook of Sound Studies*. Oxford : Oxford University Press, 2011, p. 347-366.

- GRODAL, T.: Video Games and the Pleasures of Control. In ZILLMANN, D., VORDERER, P. (eds.): *Media Entertainment: The Psychology of Its Appeal*. Mahwah, NJ : Lawrence Erlbaum Associates, 2020, p. 197-213.
- GUERRILLA GAMES: *Horizon Zero Dawn*. [digital game]. San Mateo, CA : Sony Interactive Entertainment, 2017.
- GÜRBÜZ, S.: *Sosyal Bilimlerde Araştırma Yöntemleri*. Ankara : Seçkin Yayıncılık, 2014.
- HICKS, K. et al.: Juicy Game Design: Understanding the Impact of Visual Embellishments on Player Experience. In ARNEDO, J. et al. (eds.): *CHI PLAY '19: Proceedings of the Annual Symposium on Computer-Human Interaction in Play*. New York, NY : ACM, 2019, p. 185-197. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3311350.3347171>>.
- HILLMAN, S.: Diary Methods in AAA Games User Research. In KAYE, J. et al. (eds.): *CHI EA '16: Proceedings of the 2016 CHI Conference Extended Abstracts on Human Factors in Computing Systems*. New York, NY : ACM, 2016, p. 1879-1885.
- HODENT, C.: *The Gamer's Brain: How Neuroscience and UX Can Impact Video Game Design*. London : CRC Press, 2017.
- HOOPER, D., COUGHLAN, J. P., MULLEN, M. R.: Evaluating Model Fit: A Synthesis of the Structural Equation Modelling Literature. In BROWN, A. (ed.): *7th European Conference on Research Methodology for Business and Management Studies*. Reading : ACI, 2008, p. 195-200.
- HU, L., BENTLER, P. M.: Cutoff Criteria for Fit Indexes in Covariance Structure Analysis: Conventional Criteria Versus New Alternatives. In *Structural Equation Modeling*, 1999, Vol. 6, No. 1, p. 1-55. ISSN 1070-5511.
- HUIZINGA, J.: *Homo Ludens: Kültürün Oyun Unsuru Üzerine bir İnceleme*. İstanbul : Ayrıntı, 2023.
- HUNICKE, R., LEBLANC, M., ZUBEK, R.: MDA: A Formal Approach to Game Design and Game Research. In FU, D. et al. (eds.): *AAAI Workshop Papers 2004: Challenges in Game AI*. San Jose, CA : AAAI, 2004, p. 1-5. [online]. [2023-11-23]. Available at: <<https://cdn.aaai.org/Workshops/2004/WS-04-04/WS04-04-001.pdf>>.
- CHENG, M. T., SHE, H. C., ANNETTA, L. A.: Game Immersion Experience: Its Hierarchical Structure and Impact on Game-Based Science Learning. In *Journal of Computer Assisted Learning*, 2015, Vol. 31, No. 3, p. 232-253. ISSN 0266-4909.
- IJSSELSTEIJN, W. et al.: Measuring the Experience of Digital Game Enjoyment. In SPINK, A. J. et al. (eds.): *Proceedings of Measuring Behavior 2008: 6th International Conference on Methods and Techniques in Behavioral Research*. Wageningen : Noldus, 2008, p. 88-89.
- JÄRVINEN, A.: *Games without Frontiers: Theories and Methods for Game Studies and Design*. Saarbrücken : VDM Verlag, 2009.
- JÄRVINEN, A.: Gran Stylissimo: The Audiovisual Elements and Styles in Computer and Video Games. In MÄYRÄ, F. (ed.): *Proceedings of Computer Games and Digital Cultures Conference*. Tampere : Tampere University Press, 2002, p. 113-128.
- JENNETT, C. et al.: Measuring and Defining the Experience of Immersion in Games. In *International Journal of Human-Computer Studies*, 2008, Vol. 66, No. 9, p. 641-661. ISSN 1071-5819.
- JUUL, J.: *Genre in Video Games (and Why We don't Talk [more] about It)*. Released on 22<sup>nd</sup> December 2014. [online]. [2023-12-05]. Available at: <<https://www.jesperjuul.net/ludologist/2014/12/22/genre-in-video-games-and-why-we-dont-talk-about-it/>>.
- JUUL, J.: *Half-Real: Video Games Between Real Rules and Fictional Worlds*. Cambridge, MA : The MIT Press, 2011.
- KIM, K. et al.: Is it a Sense of Autonomy, Control, or Attachment? Exploring the Effects of In-Game Customization on Game Enjoyment. In *Computers in Human Behavior*, 2015, Vol. 48, No. 1, p. 695-705. ISSN 0747-5632.
- MacCALLUM, R. C., BROWNE, M. W., SUGAWARA, H. M.: Power Analysis and Determination of Sample Size for Covariance Structure Modeling. In *Psychological Methods*, 1996, Vol. 1, No. 2, p. 130-149. ISSN 1082-989X.

- MURRAY, J.: *Hamlet on the Holodeck, Updated Edition: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 2017.
- PARNELL, M. J.: *Playing with Scales: Creating a Measurement Scale to Assess the Experience of Video Games*. [Master Thesis]. London : University College London, 2009. [online]. [2023-11-23]. Available at: <<https://uclic.ucl.ac.uk/content/2-study/4-current-taught-course/1-distinction-projects/9-09/2009-parnell.pdf>>.
- PRZYBYLSKI, A. K., RIGBY, C. S., RYAN, R. M.: A Motivational Model of Video Game Engagement. In *Review of General Psychology*, 2010, Vol. 14, No. 2, p. 154-166. ISSN 1089-2680.
- QIN, H., RAU, P.-L. P., SALVENDY, G.: Measuring Player Immersion in the Computer Game Narrative. In *International Journal of Human-Computer Interaction*, 2009, Vol. 25, No. 2, p. 107-133. ISSN 1044-7318.
- RYAN, R. M., RIGBY, C. S., PRZYBYLSKI, A.: The Motivational Pull of Video Games: A Self-Determination Theory Approach. In *Motivation and Emotion*, 2006, Vol. 30, No. 4. p. 344-360. ISSN 0146-7239.
- SALEN, K., ZIMMERMAN, E.: *Rules of Play*. Cambridge, MA : The MIT Press, 2003.
- SHEVLIN, M., MILES, J.: Effects of Sample Size, Model Specification and Factor Loadings on the GFI in Confirmatory Factor Analysis. In *Personality and Individual Differences*, 1998, Vol. 5, No. 1, p. 85-90. ISSN 0191-8869.
- SLATER, M.: *A Note on Presence Terminology*. [online]. [2023-11-23]. Available at: <[http://www0.cs.ucl.ac.uk/research/vr/Projects/Presencia/ConsortiumPublications/ucl\\_cs\\_papers/presence-terminology.htm](http://www0.cs.ucl.ac.uk/research/vr/Projects/Presencia/ConsortiumPublications/ucl_cs_papers/presence-terminology.htm)>.
- SUGARMAN, S.: *Piaget's Construction of the Child's Reality*. Cambridge : Cambridge University Press, 1987.
- TYACK, A., MEKLER, E. D.: Self-Determination Theory in HCI Games Research: Current Uses and Open Questions. In BERNHAUPT, R. et al. (eds.): *CHI '20: Proceedings of the 2020 CHI Conference on Human Factors in Computing Systems*. New York, NY : ACM, 2020, p. 1-22. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/3313831.3376723>>.
- VELLA, K., JOHNSON, D., HIDES, L.: Playing Alone, Playing with Others: Differences in Player Experience and Indicators of Wellbeing. In COX, A. L., CAIRNS, P. (eds.): *CHI PLAY '15: Proceedings of the 2015 Annual Symposium on Computer-Human Interaction in Play*. New York, NY : ACM, 2015, p. 3-12. [online]. [2023-11-23]. Available at: <<https://dl.acm.org/doi/10.1145/2793107.2793118>>.

# Agency, Appropriation, Politics: Three Epistemological Keys Towards an Aesthetics of Play

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## ABSTRACT:

Based on a dialogue with authors of pragmatist philosophy, game studies, and communication, this article intends to understand the relationship between aesthetic experience and ludic media, in particular digital games, in what this relationship distinguishes from the aesthetic experiences provided by different media, such as literature, music, film and the arts in general. To better understand this relationship, we propose the presentation and development of three epistemological axes (or keys), namely: i) aesthetics and agency, ii) aesthetics and appropriation, and iii) aesthetics and politics. Furthermore, this article intends to present and comment on selected works of digital games to illustrate the relationship between play and aesthetic experience in each of those respective axes.

## KEY WORDS:

aesthetics, agency, appropriation, digital games, epistemology, play, politics.

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# Introduction

As pointed out by the Dutch historian J. Huizinga in *Homo Ludens*, his seminal work on the relationship between games and culture, *ludic*<sup>1</sup> practices are closely linked to the nature of animals in general and human beings in particular.<sup>2</sup> In an example provided by the author, it is common for young animals, whether wild or domestic, to play with each other in what appears to be, to the most attentive observers, something between free improvisation and a simulation of combat. Even before they know the notions of play and games, children interact with objects at their disposal, exploring their possibilities. M. Jay states that the first sense to be examined by human beings, even as babies, is touch: through this sense, they first apprehend the world around them by interacting with the objects surrounding them.<sup>3</sup>

J. Huizinga was one of the first theorists to point out the relationship between play and cultural practices in different societies and how that would be of fundamental importance in the production of meanings by the subjects. In his treatise *Homo Ludens*, a seminal work for understanding the relationship between play and culture, J. Huizinga states: “[play] adorns life, amplifies it and is to that extent a necessity both for the individual – as a life function – and for society by reason of the meaning it contains, its significance, its expressive value, its spiritual and social associations, in short, as a culture function”.<sup>4</sup>

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1 Remark by the author: Although *ludic* is a term/concept not so widespread within Anglophone game studies research, it can already be found several times J. Huizinga's *Homo Ludens*, as in: “The agonistic or ludic element in war may be illustrated by examples chosen at random from diverse civilizations and periods”; HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 96.; Remark by the author: Therefore, we opted for using this term in this paper, sometimes as a synonym of *play*, sometimes of *playful*.

2 HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 1.

3 JAY, M.: *Downcast Eyes: The Denigration of Vision in Twentieth-Century French Thought*. Berkeley, CA : University of California Press, 1994, p. 6.

4 HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 9.

Based on J. Huizinga's proposition, we can reflect on the role of the ludic – so relegated to a specific inferior stratum nowadays<sup>5</sup> – in the set of experiences that give meaning to human existence itself, since time immemorial, in its daily life. It is not surprising, therefore, that games – structured ways of playing, according to R. Caillois<sup>6</sup> – have had, since ancient times, a prominent place in the most diverse societies. European palaces, for example, shelters for generations and generations of members of the nobility, had – and still have, even if inactive in their original function and maintained as museums today – unique rooms for games, for idle time. Kings, queens, and members of the nobility devoted precious time to recreational activities; games, therefore, were part of the daily life of the courts<sup>7</sup>. These days, in the very 21st century and, probably, following the tradition left by centuries-old ancestors, it is enough to walk through the various gardens of Beijing on weekends to come across groups of individuals around boards of classic Chinese games, such as *Xiangqi* or *Mahjong* (Picture 1).<sup>8</sup>



Picture 1: *Xiangqi*'s game session in Beijing

Source: own processing

Contrary to the idea commonly publicized in the Western world that individuals clustered in public spaces around board game tables are unproductive and idle beings, in the aforementioned China, for example, such activities tend to be seen from another perspective, that is, as forms of sociability and cognitive stimulation, especially among elders. It seems to us that the establishment of capitalism, since at least the 20th century, meant that a fundamental part of the very constitution of the human being, which is the ludic aspect, was left behind in favour of a notion of productivity and wealth generation in which there is no more room for activities that do not bring profit *per se*, as is the case of purely ludic activities.<sup>9</sup>

5 Remark by the author: An exception is made when the word 'ludic' appears as a qualifier of any experience, even though this experience does not necessarily have a relationship with the idea of ludic that we develop in this article, being, in most cases, aimed at marketing advertising purposes, as if the simple fact that something is 'ludic' characterizes it as of greater quality.

6 See: CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

7 For more information, see: PASTOREAU, M.: *A vida cotidiana no tempo dos cavaleiros da tavola redonda*. Sao Paulo : Companhia das Letras, 1989.

8 Remark by the author: We had this first-hand experience when visiting Beijing in 2015.

9 See: BONENFANT, M.: *Le libre jeu: Reflexion sur l'appropriation de l'activite ludique*. Montreal : Liber, 2015.

Provided that the ludic is displaced from its *locus* as an essential element in the production of meanings, as J. Huizinga proposes, what can be said about the association between ludic practices and the production of beauty or, in a broader sense, the production of aesthetic experiences? In this sense, once again, J. Huizinga was one of the pioneers in drawing up such an approach. It is the historian who says, in the same work *Homo Ludens*: “The profound affinity between play and order is perhaps the reason why play, as we noted in passing, seems to lie to such a large extent in the field of aesthetics. Play has a tendency to be beautiful. It may be that this aesthetic factor is identical with the impulse to create orderly form, which animates play in all its aspects. The words we use to denote the elements of play belong for the most part to aesthetics, terms with which we try to describe the effects of beauty: tension, poise, balance, contrast, variation, solution, resolution, etc. Play casts a spell over us; it is ‘enchanted’, ‘captivating’. It is invested with the noblest qualities we are capable of perceiving in things: rhythm and harmony”.<sup>10</sup>

In the scope of this work, we do not limit the understanding of aesthetics to the production of beauty, a common assumption within the disciplines of Aesthetics and Philosophy of Art. Conversely, we understand aesthetics or, even more broadly, the *aesthetic experience* through the same epistemological key that has been developed within the field of communication<sup>11</sup> and first brought to the fore by theorists generally framed in what is conventionally called pragmatist philosophy, or pragmatism, such as J. Dewey and R. Shusterman.<sup>12</sup> More specifically, in this article, we intend to investigate the relationship between ludic practices in general – and videogames in particular – and the production of aesthetic experiences that are somehow ‘triggered’ by ludic activity.

The notion of aesthetic experience, as we work in this article, originates from pragmatist philosophy, especially from the works of C. Peirce, W. James, and J. Dewey.<sup>13</sup> Differently, i) from the analytical tradition, which seeks to understand and extract aesthetic meanings from “foundationalist distinctions and ahistorical positive essences”,<sup>14</sup> or even ii) from the thinking of philosophers such as D. Hume and I. Kant about aesthetics that, despite displacing – to a certain extent – the source of the aesthetic experience from the object to the subject, still has its focus on eminently human aspects, such as D. Hume’s ‘standard of taste’<sup>15</sup> or the ‘aesthetic judgment’ of I. Kant,<sup>16</sup> the pragmatist philosophy seeks to understand and extract meanings from aesthetic experiences – or from ‘an experience’, in the words of J. Dewey<sup>17</sup>, from the interactions between creature and environment. In this sense, what is at stake are the affectations between these two instances, in what is revealed to the senses, to perceptions. Furthermore, in this epistemological key, an aesthetic experience can occur both in the interaction between the subject and the work of art and between the subject and any everyday phenomenon.

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10 HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 10.

11 See: CARDOSO FILHO, J.: Uma matriz comunicacional da sensibilidade. In MENDONÇA, C., DUARTE, E., CARDOSO FILHO, J. (eds.): *Comunicação e sensibilidade: pistas metodológicas*. Belo Horizonte : PPGCOM UFMG, 2016, p. 37-53.

12 For more information, see: DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.; SHUSTERMAN, R.: *Pragmatist Aesthetics: Living Beauty, Rethinking Art*. Lanham, MD : Rowman & Littlefield Publishers, 2000.

13 See also: PEIRCE, C. S.: How to Make Our Ideas Clear. In *Popular Science Monthly*, 1878, Vol. 12, No. 3, p. 286-302.; JAMES, W.: *Pragmatism and Other Writings*. New York, NY : Penguin Books, 2000.; DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

14 SHUSTERMAN, R.: *Pragmatist Aesthetics: Living Beauty, Rethinking Art*. Lanham, MD : Rowman & Littlefield Publishers, 2000, p. 4.

15 See: HUME, D.: *Ensaíos morais, políticos e literários*. São Paulo : Nova Cultural, 2004.

16 For more information, see: KANT, I.: *Crítica da faculdade do juízo*. Rio de Janeiro : Forense Universitária, 2012.

17 For example, see: DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

Therefore, on the one hand, we have an approach that favours intellectual elaboration as a basic premise for aesthetic enjoyment. This, in turn, concentrates a large part of its efforts on experimenting with 'beauty', living up, perhaps, to a tradition that comes from Plato, passing through A. Baumgarten and reaching contemporaneity – without suffering its criticism. In Hippias Major, one of the essential classic texts of the disciplines of Aesthetics and Philosophy of Art, it is Socrates who asks: "So, explain to me, stranger, I would speak again: what is this beauty?".<sup>18</sup> It is A. Baumgarten, admittedly the founder of the discipline of Aesthetics in the eighteenth century, who says: "To the aesthetic doctrine belongs: 1) ALL BEAUTIFUL KNOWLEDGE, that is, knowledge about objects that must be thought of beautifully, since this knowledge exhibits a more adequate knowledge than that provided by non-erudite culture".<sup>19</sup> J. V. G. de Oliveira, philosopher of art, states: "It is opportune to insist: the aesthetic experience begins in the senses and has its conclusive moment in intelligence".<sup>20</sup>

Two assumptions reside in this tradition that, despite not being part of the central questions of this investigation, we intend to question within the scope of the research project that this article is part of: i) that aesthetics is the branch of philosophy that deals with the understanding of beauty, exclusively and; ii) that the aesthetic experience, for it to occur, must necessarily be processed in the intellect. Furthermore, in line with pragmatism philosophy, we believe that the aesthetic experience does not necessarily need an intellectual or conceptual formulation to be apprehended or, in R. Shusterman's words, does not need to be interpreted<sup>21</sup>.

Thereby, the main objective of this article is to present and develop three axes – or keys – to understand the relationship between aesthetic experience and ludic media – a concept that will be worked on in the article – in which this relationship differs from the aesthetic experiences provided by different media, such as literature, music, film and the arts in general. They are i) aesthetics and agency, ii) aesthetics and appropriation, iii) aesthetics and politics. To achieve its objectives, the article first focuses on the concept of *ludic* – a term that reached a ubiquitous place in contemporary media discourses – and proposes the idea of *ludic media*. Then, we develop the three axes mentioned above, presenting, throughout the text, selected works from the universe of digital games to illustrate each proposed axis. In this way, we expect to contribute, to some extent, to the understanding of the aesthetic phenomena resulting from the interaction between the individual and certain media, which we call *ludic media*, which, for the scope of this work, digital games are part of.

## Ludic, Play and Games

Over the last few years, or even decades, the term *ludic* has become pervasive in our society, becoming embedded in the most diverse areas: *ludic teaching*, *ludic learning*, *ludic activity*, *ludic technologies*, and even *ludic games* – which would be a kind of pleonasm, as we will see later – are current expressions that can be seen in different means of communication. At the same time, using this term is often confused with others that, in principle,

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18 PLATÃO: *Hippias Major*. Belém : Editora da Universidade Federal do Pará, 1980, p. 371.

19 BAUMGARTEN, A.: *Estética: a lógica da arte e do poema*. Petrópolis : Vozes, 1993, p. 114.

20 DE OLIVEIRA, J. V. G.: *Estética, vivência humana: temas e controvérsias na filosofia*. Rio de Janeiro : Letra Capital, 2007, p. 113.

21 See: SHUSTERMAN, R.: Beneath Interpretation: Against Hermeneutic Holism. In *The Monist*, 1990, Vol. 73, No. 2, p. 181-204.

would not have a direct relationship, such as *entertainment* or *fun*. Although the ludic can be part of activities aimed at entertainment or fun, this is not an intrinsic relationship.<sup>22</sup> Thus, it is crucial to present a definition, albeit not definitive, about the concept of ludic.

Based on its etymological character, ludic has its roots in the Latin *ludus*, a word that points to multiple meanings, at least in its origin. According to S. Bonner,<sup>23</sup> in ancient Roman society, *ludus* referred to the school in a broad sense. Hence the expressions *ludus litterarius* (school of letters) and *ludus magister* (primary teacher), among other expressions derived from *ludus*. Right away, a central question for this understanding appears: how did a word associated, at first, with the semantic fields of school, teaching, and learning come to be associated with the play universe? According to Bonner, there is no consensus on how the term *ludus* came to designate the concept of play. However, the author points out that Seneca describes *ludus* as a 'training space'<sup>24</sup> – hence, probably, the use of *ludus* as a 'gym' for training gladiators and its association with the concepts of play and competition – the latter being one of the fundamental characteristics of play and games, according to R. Caillois,<sup>25</sup> who describes it as the agonistic character present in play and games.<sup>26</sup>

J. Huizinga<sup>27</sup> also departs from the linguistic sphere in his journey toward understanding the ludic aspect of culture(s). In his linguistic/culturalist approach, the author resorts to Greek, Sanskrit, sets of Germanic, Romance, and Semitic languages, among others. To synthesize and structure J. Huizinga's hypotheses/conclusions, I will enumerate the meanings of the ludic in some of the languages/cultures investigated by the author. However, before that, I would like to explain, together with J. Huizinga, that a linguistic analysis alone cannot handle – at least entirely – the task of defining a concept, especially that of the ludic, however simple it may seem at first sight. As the author well underlines: "When speaking of play as something known to all, and when trying to analyse or define the idea expressed in that word, we must always bear in mind that the idea as we know it is defined and perhaps limited by the word we use for it".<sup>28</sup> Thus, this systematization aims at approximating the concept of play/ludic in its historicity from the language, as observed by the Dutch author.

First, let us make an observation that J. Huizinga himself makes in his work about the difficulty of translating, in different languages, the word used to define the concept of play/ludic, which, many times, is confused a priori with that of *game*. The work *Homo Ludens*, in its translation into English – a language close to Dutch since both belong to the trunk of Germanic languages – uses the word *play* as a synonym for ludic, as we use it in some Latin languages, such as Portuguese (*lúdico*) and French (*ludique*). This can be verified in the translations of his work into Portuguese, as published by Perspectiva, the copyright holder of the work in Brazil. Both in the widespread 1990 edition and the most recent

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22 For example, see: HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980.

23 BONNER, S.: *Education in ancient Rome: from the Elder Cato to the younger Pliny*. London, New York, NY : Routledge, 2012, p. 56.

24 Ibidem, p. 57.

25 See: CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

26 Remark by the author: R. Caillois classifies games into four categories, namely: *agôn*, *alea*, *ilinx*, and *mimicry*. In the author's conception, *agôn* refers to the character of dexterity and skills, usually present in competitive games; *alea* refers to the random character (luck), present in several games, especially in the so-called 'games of chance'; *ilinx* refers to the sensory character present in some games and ludic activities, such as car races or roller coasters, for example; finally, *mimicry* refers to the imaginative character (or 'imitation') present in play and games, such as role-playing games (*Role-Playing Games/RPGs*), or even children's 'make believe' games. Also, according to the author, these categories are not mutually exclusive, and more than one of them can be verified in the same game/ludic activity.

27 For more information, see: HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980.

28 Ibidem, p. 28.

revised and updated 2019 edition,<sup>29</sup> the translators sometimes translate *play* into *game*, sometimes into *ludic*: from chapter 1 to chapter 8 of the Brazilian translation, *play* in their titles is translated directly into *game*. From chapter 9 to chapter 12, *play*, also in their titles, is translated into *ludic*. Thus, for instance, in Portuguese, one can assume the great proximity between the concept of ludic and the idea of play and game, in its most diverse meanings.

Returning to J. Huizinga's propositions, when analysing the idea of play/ludic in the Greek language and culture, the author explains that the Greek language has three words to designate play in general: *paidiá* (παιδιά) referring to children's play/games; *athíro* (ἀθύρω) or *athírma*, (ἀθύρμα) which relates to ideas of frivolity or futility; and, finally, *agón*, (ἀγών) pertaining to ideas of skill, competitions or tournaments. It is essential to point out that R. Caillois<sup>30</sup> performs a general classification of games (or ludic activities) into two large groups, which he calls *ludus* and *paidia*, the first being related to structured games, with established rules, and the second related to free play, without closed rules, expressed primarily in children's activities. In addition, R. Caillois also borrows the word *agón* from the Greek to designate one of the four characteristics of games he proposed.<sup>31</sup>

When analysing the Sanskrit language, J. Huizinga states that at least four verbal roots correspond to the idea of play. They are *kridati*, related to playing between animals, children, and adults, but also with the meaning of 'jumping' or 'dancing'; *divyati*, relating to games of chance and also to the ideas of telling jokes, but also with the meaning of 'throwing' or 'throwing something'; *vilasa*, relating to 'sudden appearance', but also to playing and occupying oneself in general; and, finally, *lila*, which refers to the ideas of 'as if', 'seem', 'imitate', but which would also have the original meaning of 'swing'. According to J. Huizinga, the common denominator among all these radicals would be the idea of 'rapid movement', which approaches the ludic characteristic *ilinx*, as treated by R. Caillois.<sup>32</sup>

Finally, it is of fundamental importance to analyse some Germanic and Romance languages, as performed by J. Huizinga, for a better understanding of the concept of play/ludic. As in Sanskrit, it seems that in ancient Germanic languages such as Old English and High and Low German, the root that would give rise to the idea of play is the same – *lai-kan* – giving rise to the words *leika*, *leka*, and *lege* of recent Scandinavian languages (Icelandic, Swedish, and Danish, respectively), whose meaning is 'to play'. However, the original meaning of the radical would be in the ideas of 'rapid movement', 'rhythmic movement', and the like. According to J. Huizinga: "As we have seen before, rapid movement must be regarded as the concrete starting-point of many play-words. We recall Plato's conjecture that the origin of play lies in the need of all young creatures, animal and human, to leap".<sup>33</sup>

Regarding the idea of play/game in the Dutch and German languages, we have the Proto-Germanic *spil* radical, which refers to the notion of play. Hence, we have *spielen/spiel* and *spelen/spel* (play/game, in German and Dutch, respectively). In the English language, the words that designate the ideas of play and ludic revolve around the same prefix *play*: *play* (noun), *to play* (verb), *playful* (adjective), and *playfulness* (a noun that gives the adjective a sense of quality). Etymologically, *play* originates from the Old English *plega*, which carries the meaning of playing (verb), game, toy, theatrical play, and, not least, physical exercise.<sup>34</sup> In addition to the meanings related to the act of playing a game, *spielen*, *spelen*,

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29 See also: HUIZINGA, J.: *Homo Ludens: o jogo como elemento da cultura*. São Paulo : Perspectiva, 2019.

30 For more information, see: CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

31 Ibidem.

32 Ibidem.

33 HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 37.

34 See: *Play*. [online]. [2023-11-17]. Available at: <<https://en.wiktionary.org/wiki/play>>. *Play*. [online]. [2023-11-17]. Available at: <<https://www.etymonline.com/search?q=play>>.

and *play* also have the sense of playing a musical instrument. According to J. Huizinga, this relationship probably comes from the relationship between the skills needed to play an instrument and “the nimble and orderly movements of the fingers”.<sup>35</sup> The author also deduces the close relationship between playing a game (*to play a game*), playing a musical instrument (*to play the piano*, for example), and the aesthetic experience. In the author’s words: “Making music bears at the outset all the formal characteristics of play proper: the activity begins and ends within strict limits of time and place, is repeatable, consists essentially in order, rhythm, alternation, transports audience and performers alike out of ‘ordinary’ life into a sphere of gladness and serenity, which makes even sad music a lofty pleasure. In other words, it ‘enchants’ and ‘enraptures’ them. In itself it would be perfectly understandable, therefore, to comprise all music under the heading of play”.<sup>36</sup>

In the Romance languages, it seems that the only one that carries this double meaning of playing (a game) and playing (an instrument) is French (*jouer*). According to J. Huizinga<sup>37</sup>, this may have occurred due to the Germanic influence in that language.

In a previous article,<sup>38</sup> we pointed out the relationship between play, music, and aesthetic experience in the European electronic music scene, particularly in the *chiptune music scene*. In our understanding, such a relationship is far from just linguistic but is directly connected to the ludic character of musical activity in terms of poetics, aesthetics, and performance. In this sense, playing the musical instrument is closely related to *playing with* the music/instrument, experimenting and exploring its possibilities, and discovering potential arrangements (and rearrangements) embedded in it. Here, we echo V. Flusser’s idea of playing with the photographic device to defeat it – that is, to extract new poetic and aesthetic possibilities from it.<sup>39</sup>

Finally, in line with J. Huizinga’s reflections on the linguistic origins of the concept of play, we propose the idea of *ludic media* as one that demands direct action – *extranoematics*, in the words of E. Aarseth,<sup>40</sup> as we will see later – on the part of the subject that relates to it. As we saw earlier, a significant amount of the meanings surrounding the concept of play originate – at least in their linguistic aspect – from the ideas of action and movement: playing, playing an instrument, and competing (athletically and sporting), are all activities that presuppose voluntary (non-forced) actions. There are ongoing *interactions* in such activities, whether between subjects or between subjects and objects. Echoing J.-L. Boissier’s conception of relationship as form, according to which “interactivity is not the simple mediation of access to the work, it is an integral part of the work”,<sup>41</sup> we suggest that the completeness of the (aesthetic) experience in the “ludic media” is directly related to the active and direct participation (interaction) of the subject with the work. When approaching interactive works of art, K. Kwastek states that “[...] the aesthetic experience lies in the action of realizing the work”.<sup>42</sup> In line with V. Flusser, K. Kwastek relates the conductive processes of an aesthetic experience in interactive works to “playing,” “playing with the work” (device, in V. Flusser): “The new types of aesthetic experience offered by interactive media art [...] are mainly based on uncovering the structures and control mechanisms

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35 HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980, p. 42.

36 Ibidem.

37 Ibidem.

38 For more information, see: CARDOSO FILHO, J., FERREIRA, E.: Playing (with) the Music: Jogo e Apropriação na Cena Musical Chiptune. In *Journal of Digital Media & Interaction*, 2019, Vol. 2, No. 4, p. 42-57.

39 See: FLUSSER, V.: *Filosofia da caixa preta: ensaios para uma futura filosofia da fotografia*. Rio de Janeiro : Relume Dumará, 2002.

40 See also: AARSETH, E.: *Cybertext: Perspectives on Ergodic Literature*. Baltimore, MD : The Johns Hopkins University Press, 1997.

41 BOISSIER, J. L.: *La relation comme forme: l'interactivité en art*. Dijon : Les Presses du Réel, 2009, p. 10.

42 KWASTEK, K. *Aesthetics of Interaction in Digital Art*. Cambridge, MA : The MIT Press, 2013, p. 48.

used in digital media and related perceptual processes".<sup>43</sup> As we will see later, playing the game is also playing *with* the game in the sense of experimenting with its possibilities and extracting new meanings and aesthetic experiences from it.

# Play and Aesthetic Experience: An Epistemological Proposal

Next, we present the central proposal of this article, that is, the classification of the relationship between aesthetics (or aesthetic experience) and play in three axes or epistemological keys: aesthetics and agency, aesthetics and appropriation, and aesthetics and politics. This tripartite division aims to grant greater clarity and epistemological coherence to the dialogue between two theoretical fields that are distant at first, that of aesthetics, in its pragmatist sense, and that of the study of games (game studies), as the latter has been developed over the last two decades.<sup>44</sup>

## a) Aesthetics and agency

A central element for understanding the relationship between ludic media and aesthetic experience is the activity's role in producing diverse aesthetic experiences. By speaking of *activity*, we intend to differentiate between the cognitive and mechanical demands necessary to experience a given medium. Based on this differentiation, E. Aarseth<sup>45</sup> coined the terms cybertext and ergodic literature. For the author, cybertexts are texts in which it is necessary to make an extranoematic effort to develop the reading experience. By extranoematic effort, the author calls for an effort that goes beyond turning pages and moving the eyes in reading a book or the cognitive effort necessary to understand a film or a printed text. As happens, for example, with the reader of an Interactive Fiction text, who must decide between different options for the text to unfold.

E. Aarseth clarifies that – and despite the term he created – cybertexts are not strictly linked to digital media, pointing to other texts as being cybertexts, such as the Chinese *I Ching* or the novel *Rayuela*, by J. Cortazar. In all these texts, the reader needs to make an extranoematic, non-trivial effort<sup>46</sup> for the text to unfold. A. Machado states that, in these texts, the reader's interaction is "not only desirable but even required".<sup>47</sup> It is not our intention to say that in other types of text, such as literature or film, there is no interaction, primarily cognitive, on the reader's part. Instead, we intend to show that in cybertextual media, the reader has the possibility, at least potentially, of intervening directly in its narrativity; however, many such options are limited by the authors of the work. In any case, there is a crucial difference when interacting with texts that do not depend on the

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43 KWASTEK, K. *Aesthetics of Interaction in Digital Art*. Cambridge, MA : The MIT Press, 2013, p. 55.

44 See: FALCÃO, T., MARQUES, D.: *Metagame: panoramas dos game studies no Brasil*. São Paulo : Intercom, 2017.

45 See also: AARSETH, E.: *Cybertext: Perspectives on Ergodic Literature*. Baltimore, MD : The Johns Hopkins University Press, 1997.

46 For more information, see: ASCOTT, R.: Nature II: Telematic Culture and Artificial Life. In *Convergence: The International Journal of Research into New Media Technologies*, 1995, Vol. 1, No. 1, p. 23-30.

47 MACHADO, A.: Regimes de Imersão e Modos de Agenciamento. In VASSALLO DE LOPES, M. I., DENCKER, A. (eds.): *XXV Congresso Anual em Ciência da Comunicação*. Salvador : Intercom, 2002, p. 2. [online]. [2023-11-17]. Available at: <<http://www.portcom.intercom.org.br/pdfs/9131a28436128d20687f1f8e2bf62e8.pdf>>.

reader to unfold – in their materiality – and texts that rely on their direct action, as in the case of cybertexts. J. Juul,<sup>48</sup> in his study of the ontology of games in general and digital games in particular, points out two biases for the study of games, a first that focuses on the game as an object and a second that focuses on the game as an activity. According to the author, any game, such as a chessboard, has a latent potential to be transformed into a game activity: this happens only when players take ownership of the game object and based on the interaction with its rules, give it life, thus transforming it into an *activity*.

We understand, along with E. Aarseth and J. Juul, that when we talk about activity, we are referring to the process of extranoematic actions concerning interacting with media, which would differentiate, for example, the experience of reading a book or watching a movie from that of playing a digital game. This, even though it inherits elements from previous media – such as written text, audiovisual, etc. – requires extranoematic actions: the player-reader must make decisions and choose paths so that the actions prescribed in the game code are developed.<sup>49</sup> These actions, carried out by the players, are associated with corresponding responses (*outputs*), giving meaning to such actions. It is what J. Murray<sup>50</sup> calls *agency*. In the author's words: "Agency is the satisfying power to take meaningful action and see the results of our decisions and choices".<sup>51</sup> That is to say, in these media in general and in digital games in particular, the reader – or player – is constantly encountering situations in which they must reflect, decide and act, and the agency over such decisions will outline the textual path for reader A, which will be different from reader B, thus providing different experiences. In the words of K. Isbister: "Specifically, two unique qualities, choice, and flow, set games apart from other media in terms of potential for emotional impact".<sup>52</sup> Yet, according to K. Isbister, the player's agency over the game has real consequences for them, unlike other "narrative media," in which the spectator cannot, theoretically, influence its narrativity.

In most cases, these consequences will be emotions related to the binomials victory/defeat, joy/frustration, etc. In the book or the movie, the main character's defeat is just their defeat. In the game, the defeat of the main character directly reflects the player's inability to overcome the proposed challenges. In K. Isbister's words: "This capacity to evoke actual feelings of guilt from a fictional experience is unique to games. A reader or filmgoer may feel many emotions when presented with horrific fictional acts on the page or screen, but responsibility and guilt are generally not among them."<sup>53</sup> In this way, we believe that games can give rise to their own media/aesthetic experiences based on the direct interaction of the reader/player with them.

The relationship between action and aesthetic experience can already be verified in J. Dewey, when the author addresses the act of artistic creation (*poiesis*) as a vector of aesthetic experiences: for J. Dewey, not only the receiver of a work is capable of experiencing aesthetic experiences in relation to that work, but also its creator, during the creation process itself. As J. Dewey says: "The doing or making is artistic when the perceived result is of such a nature that *its* qualities *as perceived* have controlled the question of production. The act of producing that is directed by intent to produce something that is enjoyed in the immediate experience of perceiving has qualities that a spontaneous or uncontrolled

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48 For example, see: JUUL, J.: *Half-Real: Video Games Between Real Rules and Fictional Worlds*. Cambridge, MA : The MIT Press, 2005.

49 See also: AARSETH, E.: *Cybertext: Perspectives on Ergodic Literature*. Baltimore, MD : The Johns Hopkins University Press, 1997.

50 For more information, see: MURRAY, J.: *Hamlet on the Holodeck: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 1998.

51 Ibidem, p. 126.

52 ISBISTER, K.: *How Games Moves Us: Emotion by Design*. Cambridge, MA : The MIT Press, 2016, p. 2.

53 Ibidem, p. 8.

activity does not have. The artist embodies in himself the attitude of the perceiver while he works”.<sup>54</sup>

Therefore, it is possible to draw a parallel between J. Dewey's idea of the artist as a perceiver and the player/interactor of a cybertextual work. As much as they are not the *proponent* of the work, the player will realize the expressive potential of the work/game based on their agency. While performing significant actions, the player/interactor receives *feedback* from their actions, at this moment, as a receiver. In this way, the player/interactor is constantly shifting between the producer of meaningful actions within the interactive system – in our particular case, games – the act of creation (*poiesis*), and the receiver of responses/results (*outcomes*) produced by the system/game: the act of reception and experience (*aisthesis*).

To illustrate the relationship between agency and aesthetic experience, I would like to discuss two digital game titles: *Machinarium*<sup>55</sup> and *The Last of Us*<sup>56</sup>. The first is an *indie* game developed by the Czech studio Amanita Design. The second one is a Triple-A game developed by the North American studio Naughty Dog.



Picture 2: “The Old Man” scene from *Machinarium*

Source: author's screenshot; AMANITA DESIGN: *Machinarium*. [digital game]. Prague : Amanita Design, 2009.

In *Machinarium*, one of the moments in which the sense of agency (in J. Murray's sense) can be raised is at the level that is conventionally called *The Old Man* (Picture 2). In this level of the game, Joseph, the character controlled by the player, must carry out a series of small *quests* to produce a certain amount of sunflower oil that will be placed in the wheelchair of a “robot-lord” so that it returns to function correctly. Although this task is something that the player must necessarily accomplish to advance in the game, this does

54 DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980, p. 48.

55 AMANITA DESIGN: *Machinarium*. [digital game]. Prague : Amanita Design, 2009.

56 NAUGHTY DOG: *The Last of Us*. [digital game]. Santa Monica, CA : Naughty Dog, 2013.

not represent, in any way, an impediment to the (satisfactory) sense of accomplishment on the part of the player; that if it weren't for his sequence of actions – which includes overcoming challenges and solving *puzzles* – that gentleman would never have his wheelchair in total working order again. It is interesting to note how significant this stage of the game was for its community of players shortly after its launch. In a brief survey carried out by the Amanita Design studio on its Twitter account at the end of 2009, which asked its followers to answer what was the most exciting stage of the game, most of the posts contained the answer 'The Old Man'. As J. Cardoso Filho<sup>57</sup> points out, aesthetic experiences configure hegemonic and emerging sensibilities. We may, perhaps, in line with J. Dewey<sup>58</sup>, state that the conclusion of this stage potentially provides the experimentation of *an experience*, a term used by the philosopher.

The Last of Us (TLOU), on the other hand, elicits a sense of agency in a different way than Machinarium. With its gameplay based more on sensory-motor skills and movement/exploration of its virtual world than on *puzzle* solving, TLOU invites the player, in control of the characters Joel and Ellie (the latter on a smaller scale), to survive and advance in a large territorial extension in a post-apocalyptic United States of America, fighting both human beings and other creatures, such as the undead. At various times, Ellie's survival depends on the player's skills – on Joel's control – on overcoming challenges, sometimes tricky (Picture 3). Unlike most survival games, in which one of the main concerns is the preservation of the character controlled by the player, TLOU incorporates aspects related to themes such as otherness and altruism in its *gameplay* and narrative/environment to generate the connection between the player and characters.



Picture 3: A scene from *The Last of Us*, with the characters Ellie and Joel

Source: author's screenshot; NAUGHTY DOG: *The Last of Us*. [digital game]. Santa Monica, CA : Naughty Dog, 2013.

Similar to what was previously described, regarding the closure of The Old Man stage in Machinarium, TLOU also potentially provides several situations in which its presentation/conflict/challenge resolution mechanic is modulated by moments of pure contemplation of the environment and appreciation of the dialogue between Joel and Ellie,

57 See also: CARDOSO FILHO, J.: Uma matriz comunicacional da sensibilidade. In MENDONÇA, C., DUARTE, E., CARDOSO FILHO, J. (eds.): *Comunicação e sensibilidade: pistas metodológicas*. Belo Horizonte : PPGCOM UFMG, 2016, p. 37-53.

58 For more information, see: DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

contributing to the generation of empathy and affection between player and characters. In this sense, the conjunction between *gameplay*, narrative, and setting in TLOU has – potentially – the ability to modulate configurations of the player’s experience that meet one of the ‘demands’ presented by J. Dewey to have an experience or an aesthetic experience: the resolution of tension, towards balance.<sup>59</sup>

## b) Aesthetics and appropriation

The second key/axis in the proposition of this research for the relationship between aesthetic experience and play is what M. Bonenfant<sup>60</sup> calls ludic appropriation (*appropriation ludique*, in the original). M. Bonenfant, bringing back concepts previously discussed by J. Henriot<sup>61</sup> – a francophone theorist who dedicated himself to the study of games – argues that every game, despite being constituted by a particular system of rules, thus composing its structure, is subject to a specific creative and inventive potential on the part of the *player*. If it were a completely closed structure, the player would just be a trigger of predetermined actions by the game developers, having, in this case, little or no agency; were it a completely open structure, the player would lose the sense of purpose and intentionality provided by the game, turning them into sandboxes, free improvisation, in the words of R. Caillois.<sup>62</sup> So that the player can perform creative actions within the possibilities foreseen by the game, there must be a certain *ludic freedom*<sup>63</sup> so that the interactive experience does not tend – to return here to the concepts of *paidia* and *ludus* as developed by R. Caillois<sup>64</sup> – on the one hand, to *infinite freedom* (extreme *paidia*), or *no freedom* (extreme *ludus*). Within the balance between those extreme poles, the player can make unique meanings emerge from their interaction with the game-system. In the words of M. Bonenfant, “[i]f the game is based on rules that are intended to be fixed, it is, however, always updated differently by the player who tries it, giving rise to new meanings”.<sup>65</sup> In other words, appropriating (in a ludic sense) a game consists of apprehending its rules and performing emergent actions endowed with meaning, which will differ from player to player.

As discussed in previous work,<sup>66</sup> ludic appropriations have been part of the culture of games, probably since its beginnings. An example is the Tower-to-Tower Challenge (T2T Challenge), carried out by the *Halo: Combat Evolved*<sup>67</sup> player community from 2004 to 2011. In this challenge, proposed by the user *grenadesticker*, in the HighImpactHalo forum, on the 10th September 2004, players were required to perform an action that had not been anticipated by the game’s developers and which added nothing to the prescribed objectives of the game: to perform a jump – with the character Master Chief – between the two Blue Beam towers of the ‘Halo’ level of the aforementioned *Halo: Combat Evolved*. After years and years of attempts by countless community members, the goal was achieved in June 2011, seven years after its proposition, by the user *duelies*, a performance duly recorded and shared on the Internet, for the enjoyment of the community.

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59 See also: DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

60 For more information, see: BONENFANT, M.: *Le libre jeu: Réflexion sur l'appropriation de l'activité ludique*. Montréal : Liber, 2015.

61 See also: HENRIOT, J.: *Le jeu*. Paris : Editions Archétype82, 1983.

62 For more information, see: CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

63 For example, see: BONENFANT, M.: *Le libre jeu: Réflexion sur l'appropriation de l'activité ludique*. Montréal : Liber, 2015.

64 See also: CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

65 BONENFANT, M.: *Le libre jeu: Réflexion sur l'appropriation de l'activité ludique*. Montréal : Liber, 2015, p. 85-86.

66 For more information, see: FERREIRA, E.: The Game is Not Over: Relationships Between Ludic Appropriation and Production of Meaning in Video Games. In *Journal of Digital Media & Interaction*, 2023, Vol. 6, No. 14, p. 7-20.

67 BUNGIE: *Halo: Combat Evolved*. [digital game]. Bellevue, WA : Bungie, 2001.

When the objectives prescribed by a game have been achieved, when there is nothing more to be done in a given game, individuals propose new challenges and actions not necessarily framed in their original prescriptions. Drawing a parallel with Flusser's thinking in relation to the 'black box' of photography, these actions – appropriations – aim at nothing but the "exhaustion of the program", the struggle "against the photographic apparatus", seeking to extract images – in this case, images and actions – never performed.<sup>68</sup> In line with J. Dewey's thinking,<sup>69</sup> we propose that ludic appropriation actions can lead players to 'an aesthetic experience' since they meet the requirements outlined by J. Dewey for such an experience to exist: intentionality, a cycle of actions that has beginning, development, and conclusion; and, finally, resolution of tension, towards a stable equilibrium. In the words of J. Dewey: "And when the participation comes after a phase of disruption and conflict, it bears within itself the germs of a consummation akin to the aesthetic".<sup>70</sup>

### c) Aesthetics and politics

Finally, the third axis in this journey to build a solid association between play and aesthetics lies in J. Rancière's propositions regarding the relationship between aesthetics and politics. Although almost all of his work addresses – in a more or less close way – this relationship, for the scope of this research, we will take as a basis perhaps one of his most referenced works in the field of communication and the social sciences: *The Politics of Aesthetics – The Distribution of the Sensible*.<sup>71</sup>

Strictly speaking, we are interested in the very idea formulated by J. Rancière of the distribution of the sensible. Far from being an easy or simple idea to be explained by third parties, what is at stake in the idea proposed by J. Rancière are "aesthetic acts as configurations of experience that create new modes of sense perception and induce novel forms of political subjectivity"<sup>72</sup> and who is 'invited' to participate/share in such aesthetic acts. It is, as the author says: "A distribution of the sensible therefore establishes at one and the same time something common that is shared and exclusive parts. This apportionment of parts and positions is based on a distribution of spaces, times, and forms of activity that determines the very manner in which something in common lends itself to participation and in what way various individuals have a part in this distribution. Aristotle states that a citizen is someone who has a part in the act of governing and being governed. However, another form of distribution precedes this act of partaking in government: the distribution that determines those who have a part in the community of citizens".<sup>73</sup>

Thus, instead of referring to aesthetics as a philosophy or discipline aimed at understanding beauty, or even sensitivity, J. Rancière's main concern lies, moreover, on understanding aesthetics and the sensible in their power to affect each and every individual, in the formation of a "specific type of humanity".<sup>74</sup>

To develop his thinking, J. Rancière opposes what he calls the *representative regime* of the arts to the *aesthetic regime* of the arts. While in the former, what is in vogue are the notions of *mimesis* and representation in their organizations of ways of *doing*, *seeing*, and *judging* – art, sensibilities, etc. – in the latter, the *modes of being* of the arts are called to the foreground, freeing them from any hierarchy of genres and themes<sup>75</sup>. In other words,

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68 See: FLUSSER, V.: *Filosofia da caixa preta: ensaios para uma futura filosofia da fotografia*. Rio de Janeiro : Relume Dumará, 2002.

69 See also: DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

70 DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980, p. 15.

71 For example, see: RANCIÈRE, J.: *The Politics of Aesthetics: The Distribution of the Sensible*. London : Bloomsbury, 2013.

72 Ibidem, p. 204.

73 Ibidem, p. 252.

74 Ibidem, p. 450.

75 Ibidem.

what is at stake in the aesthetic regime proposed by J. Rancière is the potential to give visibility to the masses, to the anonymous subject, in their daily lives: “The fact that what is anonymous is not only susceptible to becoming the subject matter of art but also conveys a specific beauty is an exclusive characteristic of the aesthetic regime of the arts”.<sup>76</sup>

In the ludic sphere in general and digital games in particular, in addition to the inclusion of themes and agendas generally left aside by the industry, such as characters belonging to different minorities – which, despite their importance, would still fall within what Rancière presents as a representative regime – we highlight actions carried out by communities of players, aiming at an effective distribution of the sensible. To illustrate this proposition, we bring the example of *Bomba Patch*,<sup>77</sup> a Brazilian *mod* of the game *Pro Evolution Soccer 6*<sup>78</sup> developed and distributed unofficially by members of the game’s players’ community.



Picture 4: A screenshot of the *Bomba Patch* game, captured in March 2020

Source: author’s screenshot; GEOMATRIX: *Bomba Patch*. [digital game]. São Paulo : GeoMatrix, 2007-2023.

Dissatisfied with the lack of voiceovers in Brazilian Portuguese in the *Pro Evolution Soccer* game series – something that, when it comes to football, comprises one of the important elements of the experience of spectatorship/reception of this sport in Brazil – some players started to practice modding – that is, changes to the game’s source code, resulting in various modifications, whether in its audiovisual components or its *game-play*. With specific exceptions, the practice of *modding* is expressly banned by game industry developers and producers, as it would be associated with piracy practices and copyright infringement. Despite such prohibitions, *modders*, in a visibly transgressive attitude, replace the audios of voiceovers in English (for example) with audios obtained from real voiceovers in Brazilian Portuguese, such as those broadcasted on major radio and television networks. In addition to replacing these audios, these *modders* also replace the names of “generic” teams and players with real teams and players – according to each season of Brazilian football, thus bringing greater *verisimilitude* to the sport with which players interact on the screen of their digital games, providing themselves

76 RANCIÈRE, J.: *The Politics of Aesthetics: The Distribution of the Sensible*. London : Bloomsbury, 2013, p. 587.

77 GEOMATRIX: *Bomba Patch*. [digital game]. São Paulo : GeoMatrix, 2007-2023.

78 KONAMI: *Pro Evolution Soccer 6*. [digital game]. Tokyo : Konami, 2006.

and those who will come into contact with their *mods* with aesthetic-ludic experiences that are more in line with their everyday realities. In March 2020, at the beginning of the Covid-19 pandemic in Brazil, the *mod*'s developer team released an update that featured the Japanese player Honda, who had recently signed a contract with Botafogo, a football team from Rio de Janeiro. In the update, in addition to the presence of Honda, the team players wore protective masks, and the stadium seats appeared empty, without fans (Picture 5). I propose that this type of action fits what J. Rancière calls “global political subjectivity, the idea of the potentiality inherent in the innovative sensible modes of experience that anticipate a community to come”.<sup>79</sup>

## Conclusion

The relationship between aesthetics, or the aesthetic experience, and ludic practices, particularly regarding digital games, is still little investigated, both in Brazil and worldwide. I am referring above all to aesthetics not taken in the strict sense, as previously mentioned, but in a broad sense and within the *framework* that communication researchers have worked on and that encompasses central issues for understanding the aesthetic experience in contemporary communication and mediatization processes. In this sense, this work intends to be the starting point for filling a certain gap in investigating the possibilities of agency of aesthetic experiences through *ludic media* – having, in this case, digital games as an object of study. Also, we intend to investigate the possibility of including a fourth axis/key to the proposed epistemological framework in the relationship between play and aesthetic experience, i.e., aesthetics and performance, given the approximation between this and the universe of ludic practices.

Moreover, we believe that academic research that relates essential topics to the field of game studies – in this case, the relationship between play and aesthetic experience, taking videogames as a particular object – is, in a way, something that is still little explored and which deserves attention, if what is desired is to better understand the effects of this *new media*<sup>80</sup> on its audience.

## BIBLIOGRAPHY

- AARSETH, E.: *Cybertext: Perspectives on Ergodic Literature*. Baltimore, MD : The Johns Hopkins University Press, 1997.
- AMANITA DESIGN: *Machinarium*. [digital game]. Prague : Amanita Design, 2009.
- ASCOTT, R.: Nature II: Telematic Culture and Artificial Life. In *Convergence: The International Journal of Research into New Media Technologies*, 1995, Vol. 1, No. 1, p. 23-30. ISSN 1354-8565.
- BAUMGARTEN, A.: *Estética: a lógica da arte e do poema*. Petrópolis : Vozes, 1993.
- BOISSIER, J. L.: *La relation comme forme: l'interactivité en art*. Dijon : Les Presses du Réel, 2009.
- BONENFANT, M.: *Le libre jeu: Réflexion sur l'appropriation de l'activité ludique*. Montréal : Liber, 2015.
- BONNER, S.: *Education in ancient Rome: from the Elder Cato to the younger Pliny*. London, New York, NY : Routledge, 2012.
- BUNGIE: *Halo: Combat Evolved*. [digital game]. Bellevue, WA : Bungie, 2001.
- CAILLOIS, R.: *Les jeux et les hommes: le masque et le vertige*. Paris : Gallimard, 1967.

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79 RANCIÈRE, J.: *The Politics of Aesthetics: The Distribution of the Sensible*. London : Bloomsbury, 2013, p. 562.

80 See: MANOVICH, L.: *The Language of New Media*. Cambridge, MA : The MIT Press, 2001.

CARDOSO FILHO, J.: Uma matriz comunicacional da sensibilidade. In MENDONÇA, C., DUARTE, E., CARDOSO FILHO, J. (eds.): *Comunicação e sensibilidade: pistas metodológicas*. Belo Horizonte : PPGCOM UFMG, 2016, p. 37-53.

CARDOSO FILHO, J., FERREIRA, E.: Playing (with) the Music: Jogo e Apropriação na Cena Musical Chiptune. In *Journal of Digital Media & Interaction*, 2019, Vol. 2, No. 4, p. 42-57. ISSN 2184-3120.

DE OLIVEIRA, J. V. G.: *Estética, vivência humana: temas e controvérsias na filosofia*. Rio de Janeiro : Letra Capital, 2007.

DEWEY, J.: *Art as Experience*. New York, NY : Perigee Books, 1980.

FALCÃO, T., MARQUES, D.: *Metagame: panoramas dos game studies no Brasil*. São Paulo : Intercom, 2017.

FERREIRA, E.: The Game is Not Over: Relationships Between Ludic Appropriation and Production of Meaning in Video Games. In *Journal of Digital Media & Interaction*, 2023, Vol. 6, No. 14, p. 7-20. ISSN 2184-3120.

FLUSSER, V.: *Filosofia da caixa preta: ensaios para uma futura filosofia da fotografia*. Rio de Janeiro : Relume Dumará, 2002.

GEOMATRIX: *Bomba Patch*. [digital game]. São Paulo : GeoMatrix, 2007-2023.

HENRIOT, J.: *Le jeu*. Paris : Editions Archétype82, 1983.

HUIZINGA, J.: *Homo Ludens: A Study of the Play-Element in Culture*. London : Routledge & Kegan Paul, 1980.

HUIZINGA, J.: *Homo Ludens: o jogo como elemento da cultura*. São Paulo : Perspectiva, 2019.

HUME, D.: *Ensaio morais, políticos e literários*. São Paulo : Nova Cultural, 2004.

ISBISTER, K.: *How Games Moves Us: Emotion by Design*. Cambridge, MA : The MIT Press, 2016.

JAMES, W.: *Pragmatism and Other Writings*. New York, NY : Penguin Books, 2000.

JAY, M.: *Downcast Eyes: The Denigration of Vision in Twentieth-Century French Thought*. Berkeley, CA : University of California Press, 1994.

JUUL, J.: *Half-Real: Video Games Between Real Rules and Fictional Worlds*. Cambridge, MA : The MIT Press, 2005.

KANT, I.: *Crítica da faculdade do juízo*. Rio de Janeiro : Forense Universitária, 2012.

KONAMI: *Pro Evolution Soccer 6*. [digital game]. Tokyo : Konami, 2006.

KWASTEK, K.: *Aesthetics of Interaction in Digital Art*. Cambridge, MA : The MIT Press, 2013.

MACHADO, A.: Regimes de Imersão e Modos de Agenciamento. In VASSALLO DE LOPES, M. I., DENCKER, A. (eds.): *XXV Congresso Anual em Ciência da Comunicação*. Salvador : Intercom, 2002, p. 1-16. [online]. [2023-11-17]. Available at: <<http://www.portcom.intercom.org.br/pdfs/9131a28436128d20687f1f8e2bf62e8.pdf>>.

MANOVICH, L.: *The Language of New Media*. Cambridge, MA : The MIT Press, 2001.

MURRAY, J.: *Hamlet on the Holodeck: The Future of Narrative in Cyberspace*. Cambridge, MA : The MIT Press, 1998.

NAUGHTY DOG: *The Last of Us*. [digital game]. Santa Monica, CA : Naughty Dog, 2013.

PASTOUREAU, M.: *A vida cotidiana no tempo dos cavaleiros da tábua redonda*. São Paulo : Companhia das Letras, 1989.

PEIRCE, C. S.: How to Make Our Ideas Clear. In *Popular Science Monthly*, 1878, Vol. 12, No. 3, p. 286-302. ISSN 0161-7370.

PLATÃO: *Hípias Major*. Belém : Editora da Universidade Federal do Pará, 1980.

*Play*. [online]. [2023-11-17]. Available at: <<https://en.wiktionary.org/wiki/play>>.

*Play*. [online]. [2023-11-17]. Available at: <<https://www.etymonline.com/search?q=play>>.

RANCIÈRE, J.: *The Politics of Aesthetics: The Distribution of the Sensible*. London : Bloomsbury, 2013.

SHUSTERMAN, R.: Beneath Interpretation: Against Hermeneutic Holism. In *The Monist*, 1990, Vol. 73, No. 2, p. 181-204. ISSN 0026-9662.

SHUSTERMAN, R.: *Pragmatist Aesthetics: Living Beauty, Rethinking Art*. Lanham, MD : Rowman & Littlefield Publishers, 2000.



# Invisibility of Game Localizers and the Status of Localization in Slovakia

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## ABSTRACT:

The standard industry practice in publishing or audiovisual translation should be mentioning the translators for their work in the credits. When it comes to technical texts, for example manuals or localized texts such as websites, translators or localizers are hardly ever mentioned, especially when translation agencies provide the entire process of translation or localization. Digital games usually do contain credits listing all people working on a digital game, but such lists tend to leave out translators or localizers. The paper aims to investigate the issue of crediting digital game translators or localizers in Slovak digital games and show different crediting practices. We inspect credits in digital games made by Slovak developers and show different crediting practices in the industry. We examine the use of credits in Slovak digital games and rationalize the situation by looking at the localization of digital games, localization training at Slovak universities, and language support for Slovak digital games. The paper contains reviews of 69 selected computer and mobile device games published by 34 studios or developers.

## KEY WORDS:

digital game credits, game localization, localization training, translator crediting.

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# Introduction

In May 2022, a group of translators working for the Gameloc Gathering group, as a significant influential agent, established a Twitter account *Loc in Credits* as a reaction to the practice of digital game publishers not crediting game localizers for their work. They wanted to “bring game localization out of the shadows and to commend language service providers (LSPs), game developers, and publishers that do include translators in the credits”.<sup>1</sup> It should be standard practice to credit a person who was responsible for a given task within the project, and all intellectual property should comply with the copyright legislation of the country. As we have found, this has not always been the case, neither in theory nor practice. L. Venuti, speaking in relation to foreign literature being translated into English, discussed the concept that “[t]he more fluent the translation, the more invisible the translator”.<sup>2</sup> This was a reaction to practices adopted in the perception of literary translations into English. He also discussed the ‘illusion of transparency’ theory, where the fluency of the translated text is believed to be so good, that it is deemed original, and such invisibility adds into the lack of recognition for the translators and thus their ‘disappearance’. Despite the fact that his views concerned mostly poetry and prose, his theory can be applied to practices in the game localization industry as well.

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1 WHYTE, C.: *Online Movement Pushes That Translators Be Named in Game Credits*. Released on 20<sup>th</sup> May 2022. [online]. [2023-11-31]. Available at: <<https://slator.com/online-movement-pushes-that-translators-be-named-in-game-credits/>>.

2 VENU TI, L.: *The Translator’s Invisibility: A History of Translation*. London, New York, NY : Routledge, 2008, p. 1.

In our long-term research of game localization, we have often found that digital games (either computer, console, or mobile device games) lack in crediting the authors of various language versions regardless of the nature of authorship. Such practices sparked our interest in the topic of how game localizers get credits for their work. In this paper, we will use the term 'game localizer' to identify digital game translators, editors or reviewers, and proofreaders of the text that is going to be tested by a language tester. In this paper, we will focus on Slovak digital games and their use of credits. We will focus on how, and if, Slovak digital game creators credit game localizers. We will also try to look into the attitudes of Slovak game developers towards game localization, and also the future of Slovak language in localization of digital games. We will discuss game localization in Slovakia through its historical development, available training, and its specifics. We also will look at Slovak as the target language of digital games developed by Slovak developers, and based on our research sample, we will categorize the crediting practices used by those developers. We conclude our paper by looking at the challenges that the digital games localization industry in Slovakia will face.

# Game Localization in Slovakia: History, Training, Specifics

Before we begin to explore game localization, we must clarify the rationale behind the term 'localization', and the reason why we are not primarily talking about translation. In terms of research, the first data that game localization theory later derived from were focusing on 'software localization'. Scholars such as B. Esselink or A. Pym started to talk about localization from various approaches and the term was later adopted in relation to digital games.<sup>3</sup> The term 'game localization' was defined by practitioners such as H. Chandler,<sup>4</sup> and researchers like M. O'Hagan, C. Mangiron or M. Á. Bernal-Merino,<sup>5</sup> and the definition laid theoretical foundations for researchers and practitioners. All the above mentioned scholars and practitioners used localization as a part of the 'GILT' process, encompassing globalization, internationalization, localization, and translation. The term localization is mostly connected to translation, however, within the digital game production industry, this term covers more processes and is deeply rooted in research and practice. In Slovakia, the use of localization in this precise meaning has only been seen in recent years. The first research on localization in Slovakia by V. Benko and A. Rajčanová was focused on software localization, in comparison to the international milieu.<sup>6</sup> Nonetheless, the research practically ground to a hold until the middle 2010's, due to the lack of Slovak research results published on this issue (there were only some works, but those

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3 For more information, see: ESSELINK, B.: *A Practical Guide to Software Localization*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 1998.; PYM, A.: *The Moving Text: Localization, Translation and Distribution*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 2004.

4 See: CHANDLER, H.: *The Game Localization Handbook*. Hingham, MA : Charles River Media, 2005.

5 See also: O'HAGAN, M., MANGIRON, C.: *Game Localization: Translating for the Global Digital Entertainment Industry*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 2013.; BERNAL-MERINO, M. Á.: *Translation and Localisation in Video Games. Making Entertainment Software Global*. London, New York, NY : Routledge, 2015.

6 For example, see: BENKO, V., RAJČANOVÁ, A.: Lokalizácia softvérových produktov (Jazykovedný pohľad). In NÁBĚLKOVÁ, M. (ed.): *Varia 7. Zborník materiálov zo VII. kolokvia mladých jazykovedcov*. Bratislava : Slovak Linguistics Society SAV, 1998, p. 70-75.

were mostly bachelor or master theses). Further, the research on localization used to be connected to 'technical or specialized translation' or 'audiovisual translation'. Slovak research aimed specifically at the game localization started to grow only recently. The long-term research of M. Koscelníková and M. Kabát, as well as the launch of the *LION Journal* in 2022, invited even more research into the topic of game localization.<sup>7</sup>

The complexity of the term localization and its use abroad in the nineties and the noughties motivated practitioners and Slovak translation agencies to adopt the term 'localization' to cover translation, though the use of this term has not ever been debated since. M. Á. Bernal-Merino proposed that it should be called 'translation of multimedia interactive entertainment software'.<sup>8</sup> Our proposal, in line with *Act no. 40/2015 on Audiovision*, where digital games are considered as 'multimedia works', is that it could be called a 'multimedia translation' or even 'multimodal translation' (a term already used by scholars).<sup>9</sup> But it could possibly add to the confusion, or traceability of research, and therefore this debate is for now left open. However, there is still the need to distinguish between software localization and linguistic localization (translation), and for the purposes of this paper, under 'game localization' we mean translation of textual in-game assets (interface, subtitles, dialogues, etc.).

Besides occasional terminological confusion, localization training in Slovakia has not yet been established, and until recently, there has not been any complex course of study aimed at game localization, or localization in general. While digital games present a medium with varied types of text that can be in some way seen as pieces of literary translation (e.g., poem as a part of a clue), technical translation (e.g., software license agreement) or audiovisual translation (e.g., subtitles in a cut-scene), we must point out that digital games are most of all software, and they should be seen as complex software with all its specifics.

In terms of training in localization training, and the distinction between linguistic localization and software localization, training in Slovakia ought to be provided by a) translation studies/linguistic departments, and b) IT or mass media communication, or film and television departments, or faculties. From the linguistic point of view, as it stands in 2023, of all the Slovak universities providing training in translation studies, there is only one department, at Comenius University in Bratislava, offering a course aimed directly at the localization of non-game and game software. Partially, focusing on the issue of localization, the department of translation studies at the Constantine the Philosopher University in Nitra offers courses aimed at translation and localization of multimedia texts. Apart from these two departments or universities, no other university training translation offers courses aimed specifically at localization, not even universities specifically teaching programming or game design. We consider this problematic, as the Slovak digital game creators are also the authors of Slovak or English (or other) texts in their games. Furthermore, as those texts in digital games often lack consistency, combinations of English and Slovak or Czech terms tend to sound unnatural and show a lack of creativity. This in turn suggests that proper localization (translation) and language courses would be beneficial for the students of the related study programs and future digital game creators. From the digital game production and development point of view, none of the examined Slovak departments or faculties that had study plans for courses aimed at the software development, engineering, or game design, provided course on the game localization.

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7 We specify such research more thoroughly in the article: KABÁT, M., KOSCELNÍKOVÁ, M.: Lokalizácia a jej miesto v translatológii. In *LION Journal*, 2022, Vol. 1, No. 1, p. 4-26.

8 BERNAL-MERINO, M. Á.: *Translation and Localisation in Video Games. Making Entertainment Software Global*. London, New York, NY: Routledge, 2015, p. 6.

9 See: KOSCELNÍKOVÁ, M.: *Translačné špecifiká videohier v slovenskom kultúrnom priestore*. [Dissertation Thesis]. Nitra: UKF in Nitra, 2021.; For more on multimodality, see: KRESS, G.: *Multimodality. A Social Semiotic Approach to Contemporary Communication*. London, New York, NY: Routledge, 2010.

These departments provided only courses such as 'English language', but which are not specifically aimed at localization per se, albeit English language will be a prerequisite of any future game creator. This lack of concern for this aspect of games production causes that localization tends to be seen as a mere source of extra income, rather than an important part of the game. This in turn makes the localization providers seen as less important to be mentioned in credits, as we will demonstrate later. The 'invisibility of localizers' is further fuelled by the lack of interdisciplinary approach, training and the game developers' disregard of the issues concerning localization.

Localization is a complex process, and game localization has its specifics. Depending on the method of localization – either in-house or external, professional, crowdsourced or 'fanslated', the process of localization differs. Each digital game concept encompasses various thematic issues that need to or do not have to be adapted to the given locale, yet, when playing digital games in Slovak: (a) one can often notice terminological inconsistencies (e.g., in the digital game *Subnautica*<sup>10</sup>, we found here 'Subnautica' both with 'c' and 'k' as 'Subnautika'); (b) grammatical errors or bohemisms, and wrongly used words – usually wrong i/y letters, wrong prepositional phrases or bohemisms like 'klud' instead of 'pokoj' ('calm' in English), 'tlačítko', instead of 'tlačidlo' ('key' or 'button' in English), mistaking 'užívateľ' for 'používateľ' ('user' in English), etc.; (c) non-standard subtitle distribution (not respecting standard two-line placement and recommended characters per second); (d) creolized expressions deliberately left untranslated – mostly in settings, or mistranslations (e.g. 'credits' translated as 'kredity' instead of 'autori' or 'záverečné titulky'). Besides such instances, digital games have their own specifics like varied assets, limitations, unspecified recipient, variables, terminology, etc.<sup>11</sup> The final linguistic localization thus depends on translation or localization skills, and the competences of the game localizer, thus the less skilled the localizer, the more inconsistencies are present, and the lower the quality of the final localization.

Additionally, the current situation regarding recognition of game localization and its presence in Slovak study programs at technically oriented departments results in the lack of recognition of the profession in Slovak digital games. In our research sample, plenty of digital games had more than two localizations, yet the authors of the localization were often left out. In the majority of examined credits, the game authors did not mention the authors of the original language version of the game, in terms of in-game texts, only the author of 'the original idea' was mentioned in a few places, but without explicitly specifying their role. In the credits for the games for the Slovak market, using Slovak as a target language, not the source language, the mention of the localizers was nowhere to be found.

## Localizing Slovak Developed Games into the Slovak Language

According to the list of most widely spoken languages, Slovak is a less widely spoken language, with less than 15 million speakers. Despite its status of a 'minor language', it is more and more frequently present in digital games of Slovak or foreign origin. In our

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10 UNKNOWN WORLDS ENTERTAINMENT: *Subnautica* (PC version). [digital game]. San Francisco, CA : Unknown Worlds Entertainment, 2018.

11 For the translation specifics, see: KOSCELNÍKOVÁ, M.: *Translačné špecifiká videohier v slovenskom kultúrnom priestore*. [Dissertation Thesis]. Nitra : UKF in Nitra, 2021.

research focused on less widely spoken languages<sup>12</sup> we have pointed out that regarding Slovak digital games, Slovak game developers usually develop their games in English, and then localize them into Slovak. However, when we tried to find the authors of Slovak texts in digital games, very often we found no information about any of them. The situation instigated our research into the topic and motivated us to study game localization on the Slovak digital games' scene. As it was very easy to get directly in touch with the Slovak game developers, over the years we have accumulated data from the research sample comprising mostly Slovak games with Slovak as the target language, rather than digital games of foreign origin. Slovak in digital games is usually a target language, rather than the original, and we can see that the motivation behind that is not only programming languages being in English, but also the strong position of English as a gaming lingua franca.<sup>13</sup> Certainly, there are Slovak digital games available only in Slovak (e.g. educational games for learning Slovak grammar such as the website Grammar.in), but the majority of digital games we have encountered in our research had several languages to choose from. Nonetheless, it might not be profitable, and the game developers usually opt to provide more languages in their digital games or release their game only in English. This was the reason why we decided to inspect Slovak digital games and to see whether game localizers would be mentioned in the credits. Combining the insight of Slovak game developers which we obtained while writing our research on translation specifics of game localization,<sup>14</sup> we attempt to map the current practice and see, if Slovak game developers credit localizers for their work.

## Methodology

For the purposes of this research, we examined 69 Slovak games developed by 34 Slovak studios or developers, among them 47 computer games, 21 mobile device games and 1 browser game. In the sample, we have categorized four types of language provision: (1) forced language with or without the option to change it manually in-game, (2) pre-set language with the possibility to later change it manually in-game, (3) choice of language that the user can choose prior to launching the game, and (4) games with a single language.

Forced language provision was mostly used in mobile device digital games: they are launched automatically with the language chosen according to the set language of the mobile device, with or without the in-game option to change. For example, if a player prefers to play digital games in English but is a native Spanish, Slovak or Arabic speaker with phone set in one of those languages, the game tutorial will have to be played in the automatically selected language according to the mobile device language, however the player can then change the language of preference. As this could be considered a benefit, and facilitation of communication with a player, players of many digital games, with automatically translated content can find this debilitating to in-game progress and disturb their immersion in the game. This was not found in our research sample, but nevertheless, such use of language based on the device region or language robs players of their ability to choose

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12 See also: KOSCELNÍKOVÁ, M.: Video Games and Less Widely Spoken Languages: The Baltic States. In *Bridge: Trends and Traditions in Translation and Interpreting Studies*, 2020, Vol. 1, No. 1, p. 68-87.; KOSCELNÍKOVÁ, M.: The Localization of Video Games into Less Widely Spoken Languages That Share a Common History: An Example of Slovak and Czech Legislative Parallels. In *The Journal of Internationalization and Localization*, 2021, Vol. 8, No. 1, p. 1-25.

13 See: CHANDLER, H.: *The Game Localization Handbook*. Hingham, MA : Charles River Media, 2005.

14 For more information, see: KOSCELNÍKOVÁ, M.: *Translačné špecifiká videohier v slovenskom kultúrnom priestore*. [Dissertation Thesis]. Nitra : UKF in Nitra, 2021.

the game language freely. It is even more problematic with mobile games for Android phones, where there is no information about the full language support available on the Google Play store page prior to installing or even buying the game. Mobile games for iOS found at the Apple Store usually contain language selection. The question of leaving out information about available languages can also be seen as a lack of recognition and value of localization among the game developers. In terms of pre-set language, regardless of the language of the device, most of our research sample had English as the default language, regardless of the region of the device, but with the latter option to change the language. This was the case with most of the computer games. Several games also offered players the option to select the language prior to launching of the game, but that was just a small proportion of our research sample. As for the games with one language, these were either mobile device games or new translations of Slovak text games from 1980s, that have been made only in English as individual pieces of software.

## Results: Language Support in Slovak Games, Automatic Language Settings, and Invisible Localizers

Most of the research sample had wide language support. The in-game languages included the standard 'EFIGS' group – English, French, Italian, German, and Spanish – but also Chinese or Japanese, and quite a few mobile device games were localized into less widely spoken languages such as Greek, Estonian, or Hungarian. With this strong language support, there should be a need for an increase in the number of people participating in the process of localization, however, when examining the digital game credits of the Slovak games, we encountered various approaches to crediting game localizers. We have categorized this as follows: (1) digital games without mentioning localizers in credits; (2) digital games mentioning localizers in credits only partially, and (3) digital games fully crediting localizers.

In the first group were mostly mobile device digital games with wide ranges of languages, but there were no credits whatsoever, no mentioning of the people responsible for localization regardless of the method of its provision. In these games the player never knows whether the texts are provided by the professionals, by someone from the crowd, fans, or by artificial intelligence. This was recorded in games e.g., by Pixel Federation (all their games), Fineway Studios (*Frankenstein: Master of Death*<sup>15</sup>), Charged Monkey (*What the Hen!*<sup>16</sup>), Powerplay Manager (*Cycling Legends: Team Manager*<sup>17</sup>, *Ski Legends*<sup>18</sup>), Games Farm (*Vikings: Wolves of Midgard*<sup>19</sup>), Cypronia (*Angry Bunnies: Colossal Carrot Crusade*<sup>20</sup>,

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- 15 FINEWAY STUDIOS: *Frankenstein: Master of Death (PC version)*. [digital game]. Helsinki : Jetdogs Studios, 2015.
  - 16 CHARGED MONKEY: *What the Hen! (Android version)*. [digital game]. Prague : Charged Monkey, 2017.
  - 17 POWERPLAY STUDIO: *Cycling Legends: Team Manager (Android version)*. [digital game]. Bratislava : Powerplay Studio, 2022.
  - 18 POWERPLAY STUDIO: *Ski Legends (Android version)*. [digital game]. Bratislava : Powerplay Studio, 2019.
  - 19 GAMES FARM: *Vikings: Wolves of Midgard (PC version)*. [digital game]. Worms : Kalypso Media, 2017.
  - 20 CYPRONIA: *Angry Bunnies: Colossal Carrot Crusade (Android version)*. [digital game]. Michalovce : Cypronia, 2019.

*Cube Life: Island Survival*<sup>21</sup>) and several others. Just to mention, in their first two games *The House of Da Vinci*<sup>22</sup> and *The House of Da Vinci 2*<sup>23</sup>, Blue Brain Games did not mention localizers in the credits, even though the games were localized into more than 10 languages. However, in their third game, *The House of Da Vinci 3*<sup>24</sup> their approach changed, and all localizers can be found in the credits.

The second group of digital games involved mostly computer games and the approach of the studios is indeed varied. In digital games by Bitmap Galaxy (*Yestermorrow*<sup>25</sup>), Lonely Troops (*Megapolis*<sup>26</sup>, *Romopolis*<sup>27</sup>, *Townopolis*<sup>28</sup>, *Hero of the Kingdom*<sup>29</sup>), 3Division (*Workers & Resources: Soviet Republic*<sup>30</sup>), Fatbot Studios (*Vaporum*<sup>31</sup>, *Vaporum: Lockdown*<sup>32</sup>), Games Farm (*Shadows: Heretic Kingdoms*<sup>33</sup>, *Shadows: Awakening*<sup>34</sup>) or ARTillery (*Catie in Meowmeowland*<sup>35</sup>) and others, we could only find inconsistent crediting of localizers. The localizers of only a few languages were mentioned, e.g., in Lonely Troops' game *Romopolis*, German, Italian, English and Russian localizers were credited, while French, Spanish and Slovak localizers were omitted. We also never found the person who was responsible for the Slovak localization, and we can only guess whether 'Script' or 'Original Idea' would truly encompass that role. Also, a 'localization director' or 'localization manager' was frequently mentioned in this category, as the person responsible for all languages. Localizers or advisors could also be hidden under the label 'special thanks to', e.g., in the case of the game *City Climber*<sup>36</sup> by O. Angelovič, a game which had 11 languages including French or Japanese. No localizer was mentioned directly, but names like Louison Hernoux or Seisho Honda appeared in special thanks – we might assume that they were the native speakers helping with the localization, but on the other hand, they might not be and thus, the 'special thanks to' label is vague, and if the former would be true, localizers should be credited properly. It is difficult to understand that where the various categories of work within 'art' are mentioned, spanning from 'concept art' through 'visual art' to 'level design', full credits are available, yet the complete list of people responsible for localizations is completely missed out.

The last is the category where localizers were fully credited. These were the games from studios or developers such as Nine Rocks Games (*Way of the Hunter*<sup>37</sup>), O. Angelovič (*The Flood*<sup>38</sup> – all localizers were named except for the creator of original English texts, while in his other game *City Climber*, with 11 languages, no localizers were mentioned), P. Jurkovský (*Juro Jánošík*<sup>39</sup>) and Blue Brain Games (*The House of Da Vinci 3*). To this category also belong 24 of the Slovak games localized into English, within the Slovak

21 CYPRONIA: *Cube Life: Island Survival (Android version)*. [digital game]. Michalovce : Cypronia, 2018.

22 BLUE BRAIN GAMES: *The House of Da Vinci (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2017.

23 BLUE BRAIN GAMES: *The House of Da Vinci 2 (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2020.

24 BLUE BRAIN GAMES: *The House of Da Vinci 3 (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2022.

25 BITMAP GALARY: *YesterMorrow (PC version)*. [digital game]. Sydney : Blowfish Studio, 2020.

26 LONELY TROOPS: *Megapolis (PC version)*. [digital game]. Halič : Lonely Troops, 2010.

27 LONELY TROOPS: *Romopolis (PC version)*. [digital game]. Halič : Lonely Troops, 2009.

28 LONELY TROOPS: *Townopolis (PC version)*. [digital game]. Halič : Lonely Troops, 2008.

29 LONELY TROOPS: *Hero of the Kingdom (PC version)*. [digital game]. Halič : Lonely Troops, 2012.

30 3DIVISION: *Workers & Resources: Soviet Republic (PC version)*. [digital game]. Košice : 3Division, 2019.

31 FATBOT GAMES: *Vaporum (PC version)*. [digital game]. Bratislava : Fatbot Games, 2017.

32 FATBOT GAMES: *Vaporum: Lockdown (PC version)*. [digital game]. Bratislava : Fatbot Games, 2020.

33 GAMES FARM: *Shadows: Heretic Kingdoms (PC version)*. [digital game]. Worms : Kalypso Media, 2014.

34 GAMES FARM: *Shadows: Awakening (PC version)*. [digital game]. Worms : Kalypso Media, 2018.

35 ARTILLERY: *Catie in Meowmeowland (PC version)*. [digital game]. Sydney : Blowfish Studio, 2022.

36 ANGELOVIČ, O.: *City Climber (PC version)*. [digital game]. Prešov : O. Angelovič, 2017.

37 NINE ROCKS GAMES: *Way of the Hunter (PC version)*. [digital game]. Vienna : THQ Nordic, 2022.

38 ANGELOVIČ, O.: *The Flood (PC version)*. [digital game]. Prešov : O. Angelovič, 2018.

39 JURKOVSKÝ, P.: *Juro Jánošík (PC version)*. [digital game]. Prešov : Black Deer Games, 2021.

Digital Games translation project.<sup>40</sup> All people involved in localization are fully credited, and games in this category should be an example of good practice. Apart from the digital games listed in this category, we did not find any other Slovak games fully crediting the majority or all localizers, or people responsible for localization. Certain digital game credits contained information only about English proofreading; nonetheless digital game credits should contain information about all the agents participating in the localization of game texts. That is the standard practice seen being regularly followed in translated literary works. When it comes to audiovisual translation, not all streaming platforms, or television, follow proper crediting of the authors of the translation, so far, we saw this standard followed only on the Disney+ platform. It is indeed difficult to fully credit everyone responsible for translation and localization, when it is not uniformly followed everywhere, but we can only hope that in terms of game localization, it will stop being seen as an inferior or supplementary part of the game development process.

## Discussion and Conclusion

Since the creation of the first digital games,<sup>41</sup> they have fundamentally changed. They are far more technologically advanced, they can offer immersive and extensive environments, and depending on genre, a lot of text. The former concerns of people about the safety of digital games, their influence mostly on children, or their impact on health are slowly receding, and new topics of concern like diversity, inclusion, accessibility, or cultural issues emerge and are constantly discussed in the game industry nowadays. When it comes to game localization into Slovak, finding information on language support is still difficult and inaccurate. In our research experience of less widely spoken languages in digital games,<sup>42</sup> we have often found discrepancies between the information about the language support of the selected digital game on the store page and the real number of languages in-game. For the purposes of this paper, we had to buy the selected digital games (if we could not obtain them as a gift or received them earlier unrelated to this research), install them and only then we could verify how many languages the digital game contained and whether their number is the same as described on the store page or in the box (either no information or partial information were provided). On several game selling platforms or e-shops the information on language support tends to be still incomplete (e.g., the digital game *Way of the Hunter* with Slovak support, Steam or PlayStation store page contain information about Slovak support, although the Epic store page does not mention Slovak at all). Looking at digital games in general, many other standard digital

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40 SGDA: *Playable English Localizations of Slovak Digital Games From the Late 80s Period (Updated)*. Released on 28<sup>th</sup> December 2022. [online]. [2023-11-31]. Available at: <<https://sgda.sk/playable-english-localizations-of-slovak-digital-games-from-the-late-80s-period/>>.

41 Remark by the author: Some say *Tennis for Two* by W. Higinbottam (1958) is the first game, others that *Spacewar!* by S. Russell (1962), another mention *Bertie the Brain* (1950), *Nimrod* (1951) or *Pilot ACE* (1952).; For more information on history of digital games, see: KENT, S. L.: *The Ultimate History of Video Games, Volume 1: From Pong to Pokémon – The Story Behind the Craze That Touched Our Lives and Changed the World*. New York, NY : Three Rivers Press, 2001.; ŠVELCH, J.: *Klíč ke kultu. Proč jsou některé hry proslulé a jiné upadnou brzy v zapomnění?*. In DOBROVSKÝ, P., BACH, M., POLÁČEK, P. et al. (eds.): *O hrách a lidech*. Prague : Xzone Originals, 2022, p. 72-79.

42 For more information, see: KOSCELNÍKOVÁ, M.: *Translačné špecifická videohier v slovenskom kultúrnom priestore*. [Dissertation Thesis]. Nitra : UKF in Nitra, 2021.; KOSCELNÍKOVÁ, M.: *The Localization of Video Games into Less Widely Spoken Languages That Share a Common History: An Example of Slovak and Czech Legislative Parallels*. In *The Journal of Internationalization and Localization*, 2021, Vol. 8, No. 1, p.1-25.; KOSCELNÍKOVÁ, M.: *Video Games and Less Widely Spoken Languages: The Baltic States*. In *Bridge: Trends and Traditions in Translation and Interpreting Studies*, 2020, Vol. 1, No. 1, p. 68-87.

game sellers often do not consider it important to inform buyers about language support in a game at all). Localization is being considered as something extra. The invisibility of people responsible for localization, or just the mere use of their nicknames can be seen. This is because of the concept of using nicknames in the game, hiding oneself under a false name, this phenomenon is often noted in digital game credits, or in game-related texts and events. Since digital games have initially been considered a 'lesser medium' or 'mere sources of entertainment without deep meaning', they have given players the opportunity to hide themselves in their immersive fantasy worlds. Nickname usage practice in digital games then usually transfers into the real world, having their nickname in the middle of their name and surname. As a constrain can be seen the use of nicknames in interviews, reviews, blogs, websites, where we can find plenty of authors either hidden under such a nickname, or nickname allowing them to get away from the seriousness of the real world. Such nicknaming can also negatively impact the need to take localization seriously, and for proper crediting of the work. Many 'fanslators' do not wish to be named, they use nicknames, and this is also common in crowdsource translation, which in turn results in the lack of gravitas of their work, for example, the credits of *The House of Da Vinci* by Blue Brain Games container 'special thanks' section with the name 'This is Locco', or credits of *Catie in Meowmeowland* by ARTillery credited Ľubomír "Double Ash" Haraksim for 'music composing', but in the section 'additional sound design' he was credited without nickname. Moreover, translation being the 'illusion' mentioned in the introduction of our paper, allows, or motivates localizers to be unseen, thus not think about this issue and they consider it normal. When it comes to remuneration, money is an important issue in localization and the available languages depend on the willingness of the developers to invest in localization of their digital game. Another issue is the common problem of lack of funds. Therefore, many developers tend to use the crowd for localization – it is 'anonymous' and 'free'. Despite this situation, localizers from the crowd should be mentioned in credits properly, but it is often not the case as it is not feasible. There were several cases in other countries, of using fan localization in official games without mentioning the localizer and not remunerating them, but still the localizer did not consider it important to be rewarded for their work.<sup>43</sup> In some other cases, the translators were completely left out of the credits,<sup>44</sup> or translators were left out as it was at the developer's discretion to mention them or not.<sup>45</sup> While inspecting the credits of Slovak digital games, we have noted that the authors did not have a problem to credit themselves as several agents of the game creation process, however, localisation is a branch of the gaming industry that is considered quite differently, and while the lack of being credited and remunerated properly provoked the Loc in Credits movement abroad, Slovak academics and trainers, as well as between trainers, localizers, and game developers, will hopefully soon change, and this could play an important role in changing the approach towards the whole games localization sector. During interviews with some Slovak game developers in our former research, we have learned that many of them localized their games by themselves, and while they credited themselves for various roles within the game development process, they left out their role as localizers.

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43 GEIGNER, T.: *Fan Translator Likely Finds His Work in Official Game Release and Is Totally Cool with It*. Released on 24<sup>th</sup> October 2018. [online]. [2023-11-31]. Available at: <<https://www.techdirt.com/2018/10/24/fan-translator-likely-finds-his-work-official-game-release-is-totally-cool-with-it/>>.

44 PLUNKETT, L.: *Persona 3 & 4 Translators Left Out of Game's Credits [Update]*. Released on 23<sup>rd</sup> January 2023. [online]. [2023-11-31]. Available at: <<https://kotaku.com/persona-localisation-translation-credits-sega-3-4-1850017066>>.

45 KUROSAWA, Y.: *Game Translators Discuss Being Left Out of the Credits & Why Veterans Are Leaving the AAA Space*. Released on 24<sup>th</sup> December 2021. [online]. [2023-11-31]. Available at: <<https://automaton-media.com/en/news/20211224-7911/>>.

Localization should not be deemed a complementary process, and only open dialogue among academics, practitioners and developers can bring a change to this situation in the future. A series of meetings with Slovak digital game developers or open discussions about localization with translation scholars and software developers shall bring an improvement to this sector. Furthermore, this whole new sector might call for the proper development of study materials and training courses.

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## BIBLIOGRAPHY

- 3DIVISION: *Workers & Resources: Soviet Republic (PC version)*. [digital game]. Košice : 3Division, 2019.
- ANGELOVIČ, O.: *City Climber (PC version)*. [digital game]. Prešov : O. Angelovič, 2017.
- ANGELOVIČ, O.: *The Flood (PC version)*. [digital game]. Prešov : O. Angelovič, 2018.
- ARTILLERY: *Catie in Meowmeowland (PC version)*. [digital game]. Sydney : Blowfish Studio, 2022.
- BENKO, V., RAJČANOVÁ, A.: Lokalizácia softvérových produktov (Jazykovedný pohľad). In NÁBĚLKOVÁ, M. (ed.): *Varia 7. Zborník materiálov zo VII. kolokvia mladých jazykovedcov*. Bratislava : Slovak Linguistics Society SAV, 1998, p. 70-75.
- BERNAL-MERINO, M. Á.: *Translation and Localisation in Video Games. Making Entertainment Software Global*. London, New York, NY : Routledge, 2015.
- BITMAP GALARY: *YesterMorrow (PC version)*. [digital game]. Sydney : Blowfish Studio, 2020.
- BLUE BRAIN GAMES: *The House of Da Vinci (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2017.
- BLUE BRAIN GAMES: *The House of Da Vinci 2 (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2020.
- BLUE BRAIN GAMES: *The House of Da Vinci 3 (PC version)*. [digital game]. Bratislava : Blue Brain Games, 2022.
- CYPRONIA: *Angry Bunnies: Colossal Carrot Crusade (Android version)*. [digital game]. Michalovce : Cypronia, 2019.
- CYPRONIA: *Cube Life: Island Survival (Android version)*. [digital game]. Michalovce : Cypronia, 2018.
- ESSELINK, B.: *A Practical Guide to Software Localization*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 1998.
- FATBOT GAMES: *Vaporum (PC version)*. [digital game]. Bratislava : Fatbot Games, 2017.
- FATBOT GAMES: *Vaporum: Lockdown (PC version)*. [digital game]. Bratislava : Fatbot Games, 2020.
- FINEWAY STUDIOS: *Frankenstein: Master of Death (PC version)*. [digital game]. Helsinki : Jetdogs Studios, 2015.
- GAMES FARM: *Shadows: Awakening (PC version)*. [digital game]. Worms : Kalypso Media, 2018.
- GAMES FARM: *Shadows: Heretic Kingdoms (PC version)*. [digital game]. Worms : Kalypso Media, 2014.
- GAMES FARM: *Vikings: Wolves of Midgard (PC version)*. [digital game]. Worms : Kalypso Media, 2017.
- GEIGNER, T.: *Fan Translator Likely Finds His Work in Official Game Release and Is Totally Cool with It*. Released on 24<sup>th</sup> October 2018. [online]. [2023-11-31]. Available at: <<https://www.techdirt.com/2018/10/24/fan-translator-likely-finds-his-work-official-game-release-is-totally-cool-with-it/>>.
- CHANDLER, H.: *The Game Localization Handbook*. Hingham, MA : Charles River Media, 2005.
- CHARGED MONKEY: *What the Hen! (Android version)*. [digital game]. Prague : Charged Monkey, 2017.
- JURKOVSKÝ, P.: *Juro Janošík (PC version)*. [digital game]. Prešov : Black Deer Games, 2021.

KABÁT, M., KOSCELNÍKOVÁ, M.: Lokalizácia a jej miesto v translatológii. In *LION Journal*, 2022, Vol. 1, No. 1, p. 4-26. ISSN 2730-0757.

KENT, S. L.: *The Ultimate History of Video Games, Volume 1: From Pong to Pokémon – The Story Behind the Craze That Touched Our Lives and Changed the World*. New York, NY : Three Rivers Press, 2001.

KOSCELNÍKOVÁ, M.: The Localization of Video Games into Less Widely Spoken Languages That Share a Common History: An Example of Slovak and Czech Legislative Parallels. In *The Journal of Internationalization and Localization*, 2021, Vol. 8, No. 1, p. 1-25. ISSN 2032-6904.

KOSCELNÍKOVÁ, M.: *Translačné špecifiká videohier v slovenskom kultúrnom priestore*. [Dissertation Thesis]. Nitra : UKF in Nitra, 2021.

KOSCELNÍKOVÁ, M.: Video Games and Less Widely Spoken Languages: The Baltic States. In *Bridge: Trends and Traditions in Translation and Interpreting Studies*, 2020, Vol. 1, No. 1, p. 68-87. ISSN 2729-8183.

KRESS, G.: *Multimodality. A Social Semiotic Approach to Contemporary Communication*. London, New York, NY : Routledge, 2010.

KUROSAWA, Y.: *Game Translators Discuss Being Left Out of the Credits & Why Veterans Are Leaving the AAA Space*. Released on 24<sup>th</sup> December 2021. [online]. [2023-11-31]. Available at: <<https://automaton-media.com/en/news/20211224-7911/>>.

LONELY TROOPS: *Hero of the Kingdom (PC version)*. [digital game]. Halič : Lonely Troops, 2012.

LONELY TROOPS: *Megapolis (PC version)*. [digital game]. Halič : Lonely Troops, 2010.

LONELY TROOPS: *Romopolis (PC version)*. [digital game]. Halič : Lonely Troops, 2009.

LONELY TROOPS: *Townopolis (PC version)*. [digital game]. Halič : Lonely Troops, 2008.

NINE ROCKS GAMES: *Way of the Hunter (PC version)*. [digital game]. Vienna : THQ Nordic, 2022.

O'HAGAN, M., MANGIRON, C.: *Game Localization: Translating for the Global Digital Entertainment Industry*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 2013.

PLUNKETT, L.: *Persona 3 & 4 Translators Left Out of Game's Credits [Update]*. Released on 23<sup>rd</sup> January 2023. [online]. [2023-11-31]. Available at: <<https://kotaku.com/persona-localisation-translation-credits-sega-3-4-1850017066>>.

POWERPLAY STUDIO: *Cycling Legends: Team Manager (Android version)*. [digital game]. Bratislava : Powerplay Studio, 2022.

POWERPLAY STUDIO: *Ski Legends (Android version)*. [digital game]. Bratislava : Powerplay Studio, 2019.

PYM, A.: *The Moving Text: Localization, Translation and Distribution*. Amsterdam, Philadelphia, PA : John Benjamins Publishing Company, 2004.

SGDA: *Playable English Localizations of Slovak Digital Games From the Late 80s Period (Updated)*. Released on 28<sup>th</sup> December 2022. [online]. [2023-11-31]. Available at: <<https://sgda.sk/playable-english-localizations-of-slovak-digital-games-from-the-late-80s-period/>>.

ŠVELCH, J.: Klíč ke kultu. Proč jsou některé hry proslulé a jiné upadnou brzy v zapomění?. In DOBROVSKÝ, P., BACH, M., POLÁČEK, P. et al. (eds.): *O hráč a lidech*. Prague : Xzone Originals, 2022, p. 72-79.

UNKNOWN WORLDS ENTERTAINMENT: *Subnautica (PC version)*. [digital game] San Francisco, CA : Unknown Worlds Entertainment, 2018.

VENUTI, L.: *The Translator's Invisibility: A History of Translation*. London, New York, NY : Routledge, 2008.

WHYTE, C.: *Online Movement Pushes That Translators Be Named in Game Credits*. Released on 20<sup>th</sup> May 2022. [online]. [2023-11-31]. Available at: <<https://slator.com/online-movement-pushes-that-translators-be-named-in-game-credits/>>.

# Women in the World of Digital Games: The Case of Slovakia

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## ABSTRACT:

This research paper aims to provide a picture of women's participation in various positions in the field of digital games in Slovakia, such as creators of game content, women involved in eSports, the gaming industry, casual gamers as well as women working in the field of digital game education. Based on theoretical knowledge and qualitative in-depth interviews with seven women working in various positions in the gaming industry, the women's positive and negative work experiences, and the problems and obstacles linked to their gender were identified. The research is specifically focused on the situation of women in the gaming industry in Slovakia. The results show that female gamers and streamers face negative behaviour from their fellow players and viewers which may result in an array of negative consequences. Findings also indicate that the low representation of women in some areas of the gaming industry is a consequence of prevailing gender roles in society. Furthermore, women's participation in eSports and competitive gaming is limited due to toxic meritocracy, prevailing masculinity and sexism.

## KEY WORDS:

eSports, gaming industry, gender, obstacles, stereotypes, women.

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# Introduction

Currently, there are hundreds of millions of active players in the world, and this number is constantly growing.<sup>1</sup> It is only recently that the participation of women in this medium has begun to stand out. Thanks to women's emancipation within the technological world and feminist efforts, the area of digital games has become more tolerant of both male and female participants.<sup>2</sup> In this respect, women are gaining bigger space and are speaking out against prejudices and stereotypes related to the female gender. Although the euphoria of the game consumes mainly men, female players are getting closer to equalizing this score. The gaming industry experienced its biggest boom during the coronavirus crisis when women were much more inclined to try a new form of entertainment. The fact that digital games are still considered to be predominantly a male hobby is supported by gender-specific socialization, which simply means that from birth we are exposed to different gender roles that have been socially and historically determined.

Globally, the interest of men and women in being engaged in games is balanced; however, there have been several prejudices, fears, and stereotypes that discourage women and prevent them from being fully engaged in this industry.<sup>3</sup> Women who play online

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1 HOWARTH, J.: *How Many Gamers Are There? (New 2023 Statistics)*. Released on 10<sup>th</sup> August 2023. [online]. [2023-12-06]. Available at: <<https://explodingtopics.com/blog/number-of-gamers>>.

2 See: SZCZEPANSKA, A. M.: Women's Inclusion and Neoliberal Governmentality in the Swedish Digital Game Industry: An Analysis of Discursive Positions and Recruitment Strategies. In *Gender, Work & Organization*, 2023, Vol. 30, No. 3, p. 842-861. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1111/gwao.12923>>.

3 See also: STYHRE, A. et al.: Masculine Domination and Gender Subtexts: The Role of Female Professionals in the Renewal of the Swedish Video Game Industry. In *Culture and Organization*, 2018, Vol. 24, No. 3, p. 244-261. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1080/14759551.2015.1131689>>.

games and women who are publicly known often face sexism and sexualization. The gaming industry is a particular breeding ground for the culture of misogyny and sexual harassment. Women, LGBTQ people, and people of colour trying to break into this industry are exposed to toxic masculinity, which often encourages sexual abuse and bullying.<sup>4</sup> Furthermore, research has acknowledged that social dominance orientation and forms of masculinity such as the desire for power over women and the need for heterosexual presentation<sup>5</sup> or, quite surprisingly, religiosity and game exposure<sup>6</sup> define digital game sexism.<sup>7</sup> A study by B. Ruberg, A. Cullen and K. Brewster address gender-based harassment in game live streaming, which is a problem for female streamers.<sup>8</sup> The persistence of a culture of masculine dominance is dealt with by J. Drenten, R. Harrison and N. J. Pendarvis, M. Condis and L. Eklund.<sup>9</sup> There are still few female figures in senior positions in the digital games industry, including management, and the most commonly cited reasons are the lack of perspective in the industry and opportunities for career growth, as the vast majority of permanent positions in management are occupied by men. Additional reasons include the fear of being judged and the stereotypical opinion that the gaming industry is a male domain; lack of awareness and the persistent idea that girls and women are not interested in games, which is evident in the way game content is designed, making it obvious that the target audience is male by creating provocatively dressed or even undressed characters.<sup>10</sup> The lack of well-known female role models is also a problem – there are only a few role models that women could identify with.<sup>11</sup> However, the key turning point could be the visibility of popular women in eSports. Successful women in the industry could help overcome stereotypes and female role models could bring other gamers closer to the gaming industry.

Research dealing with the representation of women in the world of digital games in Slovakia has not been the focus of researchers so far, and to the best of our knowledge, there are no academic studies in Slovakia into the investigation of the representation and position of women in the digital games and the gaming industry. In the Czech environment, studies examining the position of women in Czech video game journalism have been conducted, e.g., the study conducted by T. Fousek Krobová and

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4 LORENZ, T., BROWNING, K.: *Dozens of Women in Gaming Speak out about Sexism and Harassment*. Released on 23<sup>rd</sup> June 2020. [online]. [2023-12-07]. Available at: <<https://www.nytimes.com/2020/06/23/style/women-gaming-streaming-harassment-sexism-twitch.html>>.

5 For more information, see: FOX, J., TANG, W. Y.: Sexism in Online Video Games: The Role of Conformity to Masculine Norms and Social Dominance Orientation. In *Computers in Human Behavior*, 2014, Vol. 33, No. 1, p. 314-320.

6 For example, see: BÈGUE, L. et al.: Video Games Exposure and Sexism in a Representative Sample of Adolescents. In *Frontiers in Psychology*, 2017, Vol. 8, No. 1, p. 1-7. [online]. [2023-12-12]. Available at: <<https://doi.org/10.3389/fpsyg.2017.00466>>.

7 See: COTE, A. C.: *Gaming Sexism: Gender and Identity in the Era of Casual Video Games*. New York, NY : New York University Press, 2020.

8 See also: RUBERG, B., CULLEN, A., BREWSTER, K.: Nothing but a “Titty Streamer”: Legitimacy, Labor, and the Debate on Women’s Breasts in Video Game Live Streaming. In *Critical Studies in Media Communication*, 2019, Vol. 36, No. 5, p. 466-481. [online]. [2023-12-10]. Available at: <<https://doi.org/10.1080/15295036.2019.1658886>>.

9 For more information, see: DRENTEN, J., HARRISON, R., PENDARVIS, N. J.: More Gamer, Less Girl: Gendered Boundaries, Tokenism, and the Cultural Persistence of Masculine Dominance. In *Journal of Consumer Research*, 2023, Vol. 50, No. 1, p. 2-24.; CONDIS, M.: *Gaming Masculinity: Trolls, Fake Geeks, and the Gendered Battle for Online Culture*. Iowa City, IA : University of Iowa Press, 2018.; EKLUND, L.: Who Are the Casual Gamers? Gender Tropes and Tokenism in Game Culture. In LEAVER, T., WILLSON, M. (eds.): *Social, Casual and Mobile Games: The Changing Gaming Landscape*. New York, NY : Bloomsbury Publishing, 2016, p. 15-30.

10 See: KONDRAT, X.: Gender and Video Games: How is Female Gender Generally Represented in Various Genres of Video Games?. In *Journal of Comparative Research in Anthropology and Sociology*, 2015, Vol. 6, No. 1, p. 171-193.

11 See also: ROGSTAD, T. E.: Gender in Esports Research: A Literature Review. In *European Journal for Sport and Society*, 2022, Vol. 19, No. 3, p. 195-213.

J. Švelch<sup>12</sup>. In general, research into digital games in Slovakia is not abundant, which is related to the exclusivity of this field of study at universities and the low number of academics dealing with digital games. Therefore, the authors of this study aim to fill a research gap in this area.

# Representation of Women in the Gaming Community

Statistics addressing the distribution of digital game players in the US from 2006 to 2022 show that in 2022, males make up the majority of players, namely 52%, and females make up 48% of digital game players. In 2022 and 2014, the number of female players was the same and at the same time, at the highest level among the years listed above. Women had the lowest player representation in 2006 and 2007 when they made up only 38% of players. According to these statistics, the trend of direct percentage growth of women stopped in 2012.

From 2014, the representation of women decreased to 41% in 2016 and 2020, and it did not return to the level of 2014 until 2022.<sup>13</sup> A 2017 report by the German video game analytics company Quantic Foundry, based on surveys of approximately 270,000 gamers, found different proportions of male and female gamers across different game genres. The study did not attribute the percentage differences solely to gender, illustrating a correlation between games played less by women and features that discourage women, such as the lack of female protagonists, the need to communicate with strangers online, or the games' tendency to cause motion sickness. Furthermore, Match3 puzzles and family or farm simulators are the only two genres in which women players have a majority position making up 69% of all players. The percentage of women in other types of games varies by theme, with female representation ranging from 36% to 16% in MMOs, 33% to 20% in RPGs, and 18% in the adventure genre. Women are not interested in strategy games and make up between 7-11% of players of this genre. They are least interested in sports games, shooting games, and racing games. Women make up only 2% of sports game players, 4-7% of shooter players, and 6% of racing game players.<sup>14</sup>

However, it is worth noting that despite the increasing diversity of video game audiences in recent years, individuals who do not fit the stereotypical image of a straight, White, male 'gamer' often encounter exclusion and harassment within online gaming communities. Nonetheless, many persist in playing games despite this adversity, employing specific coping mechanisms to either sidestep or address the harassment they face.<sup>15</sup>

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- 12 FOUSEK KROBOVÁ, T., ŠVELCH, J.: "Never Good Enough": Player Identities, Experiences, and Coping Strategies of Women in Czech Video Game Journalism. In *Games and Culture*, 2023. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1177/15554120231166791>>.
  - 13 CLEMENT, J.: *Distribution of Video Gamers in the United States from 2006 to 2022 by Gender*. Released on 6<sup>th</sup> November 2023. [online]. [2023-11-21]. Available at: <<https://www.statista.com/statistics/232383/gender-split-of-us-computer-and-video-gamers/>>.
  - 14 YEE, N.: *Beyond 50/50: Breaking Down the Percentage of Female Gamers by Genre*. Released on 19<sup>th</sup> January 2017. [online]. [2022-11-21]. Available at: <<http://quanticfoundry.com/2017/01/19/female-gamers-by-genre/>>.
  - 15 See: COTE, A. C.: "I Can Defend Myself" Women's Strategies for Coping with Harassment while Gaming Online. In *Games and Culture*, 2017, Vol. 12, No. 2, p. 136-155.

# Low Presence of Women in Esports and Competitive Gaming

Esports, or electronic sports, is a growing market that includes professional gaming and competition in digital games. Despite the growing popularity and financial investment in eSports, there is still one big barrier for female players and that is the low representation of women in this industry. When it comes to participation, opportunities for girls and women to participate in eSports competitions are scarce and often accompanied by extra obstacles.<sup>16</sup> As a result, well-known competitive games such as *Overwatch*<sup>17</sup> (26% women), *Hearthstone*<sup>18</sup> (26% women), *Counter Strike: Global Offensive*<sup>19</sup> (24% women), *Rainbow 6: Siege*<sup>20</sup> (23% women) consistently show low interest among women and only 35% of those engaging in eSports games, primarily on consoles or PCs, are females.<sup>21</sup> L. Darvin et al. found that the situation is improving for girls between the ages of 13 and 15. They are more likely to watch and participate in eSports than boys in the same age group. The number of women among eSports fans has steadily increased in previous years, with female viewership of eSports events rising from 23% in 2016 to over 30% in 2018.<sup>22</sup>

Several studies examining the differences in genre preferences observed that male gamers tend to exhibit greater competitiveness and a stronger inclination towards action-packed and role-playing game genres compared to female gamers.<sup>23</sup> O. Ruvalcaba et al. categorized games between hardcore games and casual games and found that 85.9% of men played hardcore games, compared to 42.7% of women. Only 16% to 26% of teenage females reported playing hardcore games.<sup>24</sup> Moreover, women play more games that are aimed at entertaining the player regardless of their skill such as *Candy Crush Saga*<sup>25</sup> which is a type of game that is not found in eSports. C. Chen and L. Leung documented that 69% of Candy Crush Saga players were women.<sup>26</sup>

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- 16 See also: DARVIN, L. et al.: Breaking the Glass Monitor: Examining the Underrepresentation of Women in Esports Environments. In *Sport Management Review*, 2021, Vol. 24, No. 3, p. 475-499.
  - 17 BLIZZARD ENTERTAINMENT: *Overwatch*. [digital game]. Irvine, CA : Blizzard Entertainment, 2016.
  - 18 BLIZZARD ENTERTAINMENT: *Hearthstone*. [digital game]. Irvine, CA : Blizzard Entertainment, 2014.
  - 19 VALVE CORPORATION, HIDDEN PATH ENTERTAINMENT: *Counter-Strike: Global Offensive*. [digital game]. Bellevue, WA : Valve, 2012.
  - 20 UBISOFT MONTREAL: *Tom Clancy's Rainbow Six Siege*. [digital game]. Saint-Mandé : Ubisoft, 2015.
  - 21 DARVIN, L. et al.: Breaking the Glass Monitor: Examining the Underrepresentation of Women in Esports Environments. In *Sport Management Review*, 2021, Vol. 24, No. 3, p. 476.
  - 22 DARVIN, L., VOORIS, R., MAHONEY, T.: The Playing Experiences of Esport Participants: An Analysis of Treatment Discrimination and Hostility in Esport Environments. In *Journal of Athlete Development and Experience*, 2020, Vol. 2, No. 1, p. 37. [online]. [2023-11-23]. Available at: <<https://scholarworks.bgsu.edu/jade/vol2/iss1/3/>>.
  - 23 See: HASSAN, H., MAILOK, R., HASHIM, M.: Gender and Game Gender Differences in Playing Online Games. In *Journal of ICT in Education*, 2019, Vol. 6, No. 1, p. 1-15. [online]. [2023-12-08]. Available at: <<https://doi.org/10.37134/jictie.vol6.1.2019>>.
  - 24 RUVALCABA, O. et al.: Women's Experiences in Esports: Gendered Differences in Peer and Spectator Feedback During Competitive Video Game Play. In *Journal of Sport and Social Issues*, 2018, Vol. 42, No. 4, p. 297.
  - 25 KING: *Candy Crush Saga*. [digital game]. Stockholm, London : King, 2012.
  - 26 CHEN, C., LEUNG, L.: Are You Addicted to Candy Crush Saga? An Exploratory Study Linking Psychological Factors to Mobile Social Game Addiction. In *Telematics and Informatics*, 2016, Vol. 33, No. 4, p. 1156.

# Depictions of Female Protagonists in Digital Games

Some authors, e.g., M. Skowronski, R. Busching, B. Krahé,<sup>27</sup> and L. N. Matthews, T. Lynch and N. Martins,<sup>28</sup> emphasize the negative portrayal of women in video games, claiming that the negative portrayal of women is mostly associated with sexism, objectification, and unrealistic standards of women's bodies, which can lead to women's dissatisfaction with their bodies and other problems related to women's mental health. Often, they also mention the lack of female protagonists. M. F. Perreault et al. points out that there has been a lack of depth in female characters and that the female protagonists in the games have been largely limited and defined by male figures.<sup>29</sup> M. Burgess, S. Stermer and R. Burgess analysed the number of female characters in 33 Nintendo games, and found that 41% of the games did not contain any women. In 21% of the games, they were shown in a situation that required the help of a man, and only 10% of games had women as protagonists, and the authors describe that they were often sexualized.<sup>30</sup>

A more recent study conducted by J. Friedberg states that men acted as game characters in 51% of the games studied, while in the case of women, it was only in 26.5% of the games. Women were also more likely than men to wear revealing clothing and be sexualized.<sup>31</sup> Another study conducted by S. Cheryan et al. investigated the so-called 'Lara phenomenon' in 12 digital games in which there were 22 characters and revealed that 13 of the 22 game characters are men. The vast majority of male characters (70%) did not appear in the leading parts. This research shows a higher representation of women in games; however, the research sample of games was small.<sup>32</sup>

## Underrepresentation of Women in the Gaming Industry

Game development is stereotypically seen as a male issue and for this reason, the majority of workers in the gaming industry are men. Stereotyping that people engaged in the gaming industry and in computer science, in general, are males with masculine

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27 See also: SKOWRONSKI, M., BUSCHING, R., KRAHÉ, B.: The Effects of Sexualized Video Game Characters and Character Personalization on Women's Self-Objectification and Body Satisfaction. In *Journal of Experimental Social Psychology*, 2021, Vol. 92, No. 1, p. 1-10. [online]. [2023-12-08]. Available at: <<https://doi.org/10.1016/j.jesp.2020.104051>>.

28 For more information, see: MATTHEWS, L. N., LYNCH, T., MARTINS, N.: Real Ideal: Investigating How Ideal and Hyper-Ideal Video Game Bodies Affect Men and Women. In *Computers in Human Behavior*, 2016, Vol. 59, No. 1, p. 155-164.

29 PERREAULT, M. F. et al.: Depictions of Female Protagonists in Digital Games: A Narrative Analysis of 2013 Dice Award-Winning Digital Games. In *Games and Culture*, 2018, Vol. 13, No. 8, p. 843.

30 BURGESS, M., STERMER, S., BURGESS, R.: Sex, Lies, and Video Games: The Portrayal of Male and Female Characters on Video Game Covers. In *Sex Roles*, 2007, Vol. 57, No. 5-6, p. 420.

31 FRIEDBERG, J.: *Gender Games: A Content Analysis of Gender Portrayals in Modern, Narrative Video Games*. [Master Thesis]. Atlanta, GA : Georgia State University, 2015, p. 23. [online]. [2023-11-20]. Available at: <<https://doi.org/10.57709/7000435>>.

32 JANSZ, J., MARTIS, R.: The Lara Phenomenon: Powerful Female Characters in Video Games. In *Sex Roles*, 2007, Vol. 56, No. 3-4, p. 146.

interests may make some women doubt whether they belong to this area.<sup>33</sup> In 2021, a game developer survey aimed at game developer distribution worldwide 2014-2021 found that 61% of game developers worldwide were men and 30% were women with the share of female game developers rising by 21% in 2017. About 8% of game developers identified themselves as non-binary, genderfluid/genderqueer, two-spirited, and transgender.<sup>34</sup> However, it should be noted that although the question of sexual orientation or gender identity is another intersectional variable, and this study consciously does not work with it.

The segment of the creation of digital games and related services in Slovakia has been growing continuously for several years, according to the updated survey entitled Slovak Game Industry in 2023, published by the Slovak Game Developer Association (SGDA).<sup>35</sup> A survey conducted by the Next Gen Skills Academy found that there is a problem with corporate discrimination. In 2015, 45% of women working in the gaming industry in the UK claimed that their gender was a restraining factor in their career promotion, and 33% of them expressed their experience with harassment or even bullying directly connected with their gender at the workplace.<sup>36</sup> As regards the situation in Slovakia, there are 70 companies professionally engaged in game creation which currently employ 1,079 professional creators, of which 16.4% are women and 7 % are foreign developers. The most popular job positions in Slovakia include programmers, game designers, and graphic designers.<sup>37</sup> The findings of a 2020 study on female representation in the gaming industry conducted by 20-first, a global firm focused on empowering leaders to achieve gender balance, reveal that in the top global gaming companies, 84% of executive positions are occupied by men. Outside the executive positions, women constitute only 24% of those working in the industry.<sup>38</sup>

## Data and Methods

The paper aims to provide a picture of the presence of women in various positions in the field of digital games in Slovakia, to identify the reasons for the low representation of women in various areas of the gaming industry, and to investigate the problems, prejudices, as well as positive attitudes that women encounter in the workplace due to their gender. It also aims at identifying the pathways for change and improvement of their situation in the industry. All these aspects are described from the perspective of our respondents. The research problems were formulated in the form of research questions as follows:

- RQ1: What are the experiences of women engaged in the gaming industry?
- RQ2: According to the respondents, what are the reasons for the low representation of women in the gaming industry and how could this situation be improved?
- RQ3: What obstacles and challenges do women have to overcome to succeed in the various fields of the gaming industry?

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33 See: CHERYAN, S. et al.: The Stereotypical Computer Scientist: Gendered Media Representations as a Barrier to Inclusion for Women. In *Sex Roles*, 2013, Vol. 69, No. 1-2, p. 58-71.

34 CLEMENT, J.: *Distribution of Game Developers Worldwide from 2014 to 2021, by Gender*. Released on 12<sup>th</sup> December 2023. [online]. [2023-12-19]. Available at: <<https://www.statista.com/statistics/453634/game-developers-gender-distribution-worldwide>>.

35 SGDA: *Slovak Game Industry 2023*. 2023. [online]. [2023-12-12]. Available at: <[https://sgda.sk/wp-content/uploads/2023/09/SGDA\\_catalog\\_2023.pdf](https://sgda.sk/wp-content/uploads/2023/09/SGDA_catalog_2023.pdf)>.

36 PEARSON, D.: *Survey: 45 % of the UK Industry's Women Feel Gender Is a "Barrier"*. Released on 13<sup>th</sup> January 2015. [online]. [2023-12-12]. Available at: <<https://www.gamesindustry.biz/survey-45-percent-of-the-uk-industrys-women-feel-gender-is-a-barrier>>.

37 SGDA: *Slovenský herný priemysel v roku 2022*. 2022. [online]. [2023-11-24]. Available at: <<https://sgda.sk/wp-content/uploads/2022/08/infografika-SK-1-1.pdf>>.

38 20-first's 2020 Gender Balance Scoreboard. *Top 14 Global Gaming Companies*. 2020. [online]. [2023-12-08]. Available at: <<https://20-first.com/wp-content/uploads/2020/08/200825-2020-Global-Gaming-Scorecard-Web.pdf>>.

A research sample consisting of 7 women was selected to represent as many areas as possible from the world of digital games. In total, around 20 women were approached; however, most of them were not interested in the interview and did not respond. The selection of the research sample was deliberate and women from different areas of the gaming industry were chosen, such as game content creators, female eSports gamers, casual gamers actively involved in the gaming community, and women working in various positions in gaming companies as well as institutions of tertiary education in the field of digital games. Women journalists publishing articles about digital games as well as activists focusing on women in digital games and eSports were also contacted, but without success. Six of the respondents lived in Slovakia and one in the UK. For ethical reasons, the real names of the interview participants were not revealed but they were assigned numbers from 1 to 7.

Respondent No. 1 is 25 years old, lives in Slovakia, and is a player of the competitive game *Apex Legends*<sup>39</sup> in which she regularly participates in tournaments with her team. She also broadcasts regularly on the Twitch platform, where she has created her own community. Respondent No. 2 lives in Slovakia, she works in an institution of tertiary education in the field of digital games as a lecturer, and she is also a digital game player. Respondent No. 3 is currently developing her own game, but in the past, she worked in a game studio. She prefers hardcore single-player games and AAA titles. Respondent No. 4 is mainly a player of competitive games, she is currently playing *Apex Legends*, and she also streams on the Twitch platform, where she has an established base of followers. Respondent No. 5 is a Slovak living in England, she is a player of leisure and competitive games, and she is currently playing *Apex Legends*. Respondent No. 6 is 22 years old, lives in Slovakia, and is a university student of digital game theory. She is a player in one of the school's eSports teams, and in the past, she was part of the all-female eSports team of the eSuba organization. She prefers competitive games, but also plays sports and leisure games. Respondent No. 7 is 23 years old, lives in Slovakia, and plays leisure and parlour digital games.

Data for this study were collected through qualitative in-depth interviews. The interviews were recorded using software, as the interviewees were recruited online. Consequently, the recorded conversations were transcribed on paper, and then irrelevant information from the obtained data was removed, such as pauses or hesitation sounds. Some interviewees' quotations were slightly reworded for clarity purposes while keeping their meaning. The interviews consisted of 13 questions; however, the first question focused on biographical information, so the 12 remaining questions were actually analysed. The interview questions were open-ended to provoke a broader discussion and additional questions during the conversation. The interviews took place over video chat and were recorded so that the findings could be consequently explored. The interview questions addressed encounters with the world of digital games depending on the respondents' work experience, and also frustrating moments, obstacles, and challenges they need to overcome in this predominantly male world.

When evaluating the collected data, qualitative coding was conducted as developed by A. Strauss and J. Corbin.<sup>40</sup> A three-stage coding process was used – open, axial, and selective coding. The first approach to the data was applying open coding which deals with labelling, and subsequently, through an intensive analysis of the data, phenomena were conceptualized and categorized. After identifying the phenomena, axial coding was needed to study the relationships between concepts and categories developed in the process

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39 RESPAWN ENTERTAINMENT, PANIC BUTTON GAMES: *Apex Legends*. [digital game]. Redwood City, CA : Electronic Arts, 2019.

40 STRAUSS, A., CORBINOVÁ, J.: *Základy kvalitativního výzkumu. Postupy a techniky metody zakotvené teorie*. Brno : Sdružení podané ruce, 1999.

of open coding. The broken-up data were joined together in a new way to work out links between a category and its subcategories. In short, axial coding helped to identify the main themes from which ten categories and subcategories were created. The next step, selective coding, is very similar to axial coding, but it is conducted on a more abstract level. The goal of selective coding is to theoretically integrate the different categories that may need to be refined and further elaborated into a coherent theory. Once having found the core category around which other categories are merged, a grounded theory that arose from the data was created.<sup>41</sup>

## Findings

Below are described in sufficient detail the categories and subcategories created by in-depth interviews with female respondents engaged in the areas of the gaming industry such as game content creators, female eSports gamers, casual gamers actively involved in the gaming community, and women working in various positions in gaming companies as well as institutions of tertiary education in the field of digital games.

# Women in the World of Digital Games

Using the method of in-depth interviews, the stories of women who are still active in some areas of the world of digital games were revealed. Six out of seven female respondents got into the world of digital games through their family members, and three respondents were given some kind of game console by their family members as a present.

Respondent No. 2 started playing games on a game console her parents bought her and currently plays digital games in her spare time, which was an impulse that triggered her interest in finding a job position in the field of digital games education.

Respondent No. 3 received a game console and various games from her parents for her birthday. Subsequently, she described how from that time on, she started to enjoy games and plays digital games until now. At the same time, they ignited the spark of her interest in digital games in general and, consequently, she found a job as a game developer. Currently, she is completing a game that will be available soon. Respondent No. 5 received a game console from her uncle when she was 5 years old. After that, she had newer game consoles and is currently playing Apex Legends.

Respondents No. 4, 6, and 7 were shown games on home computers by their parents. As she states, respondent No. 4 has a great experience from her childhood: "When I was little and I was about 5 years old, I sat in my father's arms and played Barbie games". Respondent No. 6 started playing the game *Counter-Strike 1.6*<sup>42</sup> at a young age and has continued to play competitive games until today, and currently, she spends her free time playing a newer version of the game called Counter Strike: Global Offensive. Playing digital games also led her to study the field of theory of digital games at university.

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41 See: VOLLSTEDT, M., REZAT, S.: An Introduction to Grounded Theory with a Special Focus on Axial Coding and the Coding Paradigm. In KAISER, G., PRESMEG, N. (eds.): *Compendium for Early Career Researchers in Mathematics Education*. Cham : Springer, 2019, p. 81-100.

42 VALVE: *Counter-Strike*. [digital game]. Los Angeles, CA, Bellevue, WA : Sierra Studios, Valve, 2003.

Most of the women played single-player games at the start and respondents No. 1 and 6 started with competitive games. The only respondent who started playing digital games as an adult is respondent No. 1. Since she started playing games only a few years ago, she still plays the game she started with, the competitive FPS Apex Legends.

The respondents were also asked to provide an answer about their favourite game genres, and it was found that four out of seven women like playing competitive games. The term competitive games include several genres, but their main feature is competition between players. Although compared to the average of female players, there is a high number of women who like competitive games in this research sample, these women also like leisure games. In this research sample, five out of seven women play leisure games. Three out of seven women play competitive games and leisure games at the same time, so they do not focus on just one game genre. Two of the women play primarily leisure games and only one of the women plays purely competitive games. Other game genres are also represented, e.g., sports games such as *FIFA*<sup>43</sup>, story games, popular AAA games, multiplayer social games, and, in general, multiplayer games where there is no element of competition.

The results obtained from the in-depth interviews may be in line with those reported in studies available,<sup>44</sup> which state that not only are women engaging more in video gaming, including widely popular online games, but they have also evolved into more skilled gamers who actively compete against others. Owing to the small research sample, it cannot be determined whether competitive games are that popular among women, but the well-known stereotype that women only play leisure games can be rejected.

## Digital Games and Reactions from the Outside World

Based on the interviews, it was found that the majority of female respondents encountered all types of reactions, i.e. negative, neutral, and positive. Two female respondents encountered only positive reactions, three female respondents received mixed reactions from the people surrounding them, one female respondent described the reactions as neutral, and one of the female respondents encountered only negative reactions. Positive reactions and support for five out of seven female respondents came from their friends, i.e. the younger generation. Two of the women encountered negative reactions from their friends or classmates. The negative reactions of the majority of female respondents came from their family, i.e. the older generation. Four women expressed that their families had negative reactions or did not support them in their activities in the field of digital games.

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43 EXTENDED PLAY PRODUCTIONS, EA VANCOUVER, EA ROMANIA: *FIFA (series)*. [digital game]. Redwood City, CA : EA Sports, 1993-2022.

44 LACONI, S., PIRÈS, S., CHABROL, H.: Internet Gaming Disorder, Motives, Game Genres and Psychopathology. In *Computers in Human Behavior*, 2017, Vol. 75, No. 1, p. 652-659.; LOPEZ-FERNANDEZ, O.: Generalized Versus Specific Internet Use-Related Addiction Problems: A Mixed Methods Study on Internet, Gaming, and Social Networking. In *International Journal of Environmental Research and Public Health*, 2018, Vol. 15, No. 12, p. 1-33. [online]. [2023-12-09]. Available at: <<https://doi.org/10.3390/ijerph15122913>>; LOPEZ-FERNANDEZ, O., WILLIAMS, J. A., KUSS, J. D.: Measuring Female Gaming: Gamer Profile, Predictors, Prevalence, and Characteristics from Psychological and Gender Perspectives. In *Frontiers in Psychology*, 2019, Vol. 10, No. 1, p. 1-13. [online]. [2023-12-09]. Available at: <<https://doi.org/10.3389/fpsyg.2019.00898>>.

### **a) Positive reactions to women's interest in digital games**

As mentioned above, most of the positive reactions came from friends, but there were positive reactions from the family, too. Respondents No. 4 and 7 state that they received positive reactions from their families, but they are in the minority. Respondent No. 4 states: "I was mainly supported by my father, but my mother doesn't really understand playing and when I played for 12 hours a day, she didn't understand it at all, but she knows that I am doing what I enjoy and now she supports me". She expressed that her only friend at the time supported her.

Respondent No. 7 received positive reactions mainly because when some of her friends found out that she played digital games, they could play the game together and she did not face any negative reactions. She also remembers how she played games with her friends and evaluates her gaming experiences positively.

The support of female respondents from friends took different forms, respondent No. 1 said that she received "a lot of support from her friends". The support did not consist only of positive comments but also of help that led to the improvement of game skills and the explanation of various game mechanics.

Respondent No. 5 did not get any support from her parents who only allowed her to play games for an hour a day, but she found support from her friend and his mother: "I often went to my friend's house and his mother allowed us to play all the time, that was the only time we could play games together, she was very supportive". Respondent No. 6 also describes the positive reactions of her friends: "Most of my friends were excited that a girl like me succeeded in establishing herself in this domain, that is, that I had an influence on the boys' scene for a while".

### **b) Negative reactions to women's interest in digital games**

During the in-depth interviews, the women described various negative experiences and reactions from those around them. The first part of negative reactions dealt with reactions from their family with five out of seven female respondents stating that they did not have support from their family or had experienced negative reactions.

Respondent No. 1 said that she received a lot of negative reactions from her parents: "They think that I am addicted to the computer and that it affects me negatively when I play such games". Respondent No. 3 had negative reactions in that her parents restricted her from playing digital games because, in their opinion, it was a waste of time. Respondent No. 5 was also restricted from playing games, and as mentioned above, she used to play games with her friend. Respondent No. 6 stated that her mother also restricted her from playing digital games: "My mother was not a big fan of it and wanted me to be a diligent student".

Respondent No. 2, who works in the field of digital games education, described the negative reaction of a family member, which consisted of stereotyping digital game players as 'addicts'. This information raises the question of whether gender plays a role. Not a single woman commented that her gender played a role in the negative reactions from parents. As for the reasons for negative reactions, they stated that their parents thought that games were a waste of time, game players are stereotyped as addicts regardless of their gender, and parents wanted respondents to devote more time to their studies. Two female respondents expressed that the older generation does not understand digital games and does not perceive any positive aspects of games.

Three women faced negative reactions from friends and the wider community. Respondent No. 1 faces negative reactions from the wider community, which consist of the stereotyping of female streamers: "I often hear such comments when I tell someone that I stream, so they think that I make bathtub streams". Bathtub streams are a live streaming

category popular on the Twitch platform which includes women dressed only in swimsuits and mostly sitting in an inflatable pool. This kind of stream is controversial in the gaming community because these women use nudity to get money from viewers.

Respondent No. 3 faced negative reactions from her classmates and ex-partners that resulted from the expected social role: "I wasn't open about playing games because when I ever talked about it, their reactions were that it's not a feminine thing to play games".

When respondent No. 5 was at elementary school, she faced negative reactions from her friends, which also consisted of conservative expectations of her social role: "None of my friends played games and they condemned me because of it, so as a result, I stopped playing games for about a year". When asked if her gender played a role in the negative reactions, she answered: "Yes, my friends at the time were very feminine women, playing games did not fit their criteria of what a woman should do".

From the information obtained in this category, it was found that negative reactions by family do not seem to relate to gender, and negative reactions by the wider environment seem to relate to gender.

## Reactions of the Gaming Community to Women

This category deals with the reactions of the gaming community to women and contains information from in-depth interviews with the respondents based on their opinions and experience with the gaming community. The category is divided into several sub-categories because women's experiences differ in different areas of the gaming world. Every digital game player who is part of the gaming community has encountered negative reactions that have negative psychological effects on them.

### **a) The experience of women in multiplayer games**

The majority of female respondents take the view that women face worse treatment than men in multiplayer games from random teammates. Five out of seven women base their opinions on their experiences, and respondent No. 2 bases her opinion on information that she acquired during her time in the field of digital games education. Respondent No. 7 does not think that women face worse treatment from teammates and justifies it as follows: "In my opinion, not at all, everyone complains about everyone in the games and everyone finds a target to insult you and because you are a woman, so everyone complains that you are a woman. Many of my friends I used to play with used to say worse things to each other than to me". Three female respondents stated that the insults directed at them by their teammates are adapted to their gender, and if they were men, their teammates would also insult them, but they would use different types of insults.

Regarding the types of negative reactions and specific experiences of women, respondent No. 1 indicated several types of negative reactions that, in her opinion, she would not have experienced if she were a man: "People threaten to rape you or do something to you, and they have inappropriate comments. They scream that you should shut up because you are a woman, and you shouldn't play games". Three respondents, including respondent No. 1, identified the sexualization of women by random teammates. Other types of negative reactions are misogynistic comments. Five respondents have experienced misogynistic comments.

Respondent No. 4 described her negative experience as follows: "A Russian YouTuber made a video of me swearing at him in the game, he edited the video to make me look like a bad one but in fact, it was him who said terrible things to me. I was 16 years old then, the video had 260 thousand views and I woke up to people threatening me with death, via email, on stream, on Instagram, and just everywhere. It took about 2 weeks until I managed to demonetize the video and set up a private account on all platforms. It was very traumatic".

Respondent No. 6 perceives that women are generally underestimated in digital games. The above-mentioned negative experiences and reactions only apply to random teammates, that is, people with whom women have no relationship.

### **b) The experience of women on streaming platforms**

The research sample contains three female respondents who are actively streaming or have streamed in the past. Respondents have from 2 to 9.6 thousand followers. Respondent No. 1 sees the support and mostly positive reactions of visitors to her live broadcast and has created a close community in which she considers part of her followers to be her friends. In terms of corporate sponsorships for streamers, she does not think that women are in any way disadvantaged. Respondent No. 4 feels that she cannot say certain things on the stream because consequently, she would be sexualized. So he feels that men can say unspecified things without being sexualized by the opposite sex. She also mentioned the positive side of the community of the game Apex Legends, in which she is active, and described the community as 'very nice'.

Respondent No. 5 identifies sexism as a problem, not only when streaming, but also when playing games, but she considers the overall reactions of her viewers to be mostly positive: "I received a lot of positive reactions, and I think it's because my community was made up of grown-up people". When asked if people's reactions to her stream would be different if she were a man, she said: "Yeah, I think there's a bit of truth in it when people say that it's easier for women to get a community of viewers if you're a funny woman and you start streaming so it's a little bit easier for you. People prefer to watch women because there aren't as many of them as men in the field of FPS games, but there is a ceiling". Women have mostly positive reactions from their viewers, but they also perceive negative reactions which include sexualization and sexism.

### **c) Consequences of negative behaviour towards women**

Five respondents mention the consequences of negative behaviour towards women. The most widespread consequence among our female respondents was a reluctance to play which was recorded by 3 female respondents. Another consequence of negative comments is lower self-esteem which was observed in two female respondents.

Respondent No. 1 states that it depends on what someone says to her, she does not experience horror-inducing comments daily and it has no effect on her, and if it does, she can get rid of the unpleasant feeling quickly. The problem comes when more negative reactions from people accumulate in a shorter period: "Then I feel down, I'm in a bad mood, I'm uncomfortable and I feel sexualized even though I'm not doing anything sexual". She feels that her self-esteem is low when someone comments negatively on her appearance.

Respondent No. 3 mentions the only consequence of negative behaviour, more specifically, she sometimes does not feel comfortable travelling to gaming conventions alone. However, it is difficult to state whether the digital game players or the overall society in which she lives are to blame for this consequence.

When respondent No. 4 was around 15 years old, she faced a feeling of insecurity, and depression and was influenced by the negative comments she faced: “When someone told me that I was bad at the game, I believed it. I listened to such things every day and it made me feel like I was a different person than I really am, it lowered my self-confidence and self-worth. There were times when I went to my father crying because I was being bullied in the game”.

Respondent No. 6 stopped playing with random teammates, not only because of their negative sexist comments but also because her teammates were killing her in the game and thus made her playing uncomfortable. The negative consequence was also caused by her mother and resulted in her stopping playing Counter Strike: Global Offensive competitively for about a year.

As a result of her teammates making the game unpleasant, respondent No. 7 felt unwilling to play, she also expressed that if she were younger, she would be affected by negative comments directed towards her in the gaming community in which she is active and she would have negative feelings. Respondent No. 5 does not mention any negative consequences that she would have to deal with, but she feels angry if someone scolds her friends with whom she plays.

## Negative Stereotyping of Women

Not a single respondent from the research sample regards any form of positive stereotyping such as being considered smart, being ‘nerdy’ in a positive way, or being techy and good with gadgets.<sup>45</sup> The most widespread stereotype felt by women is that women play digital games worse than men, and this stereotype is noticed by all female respondents. This stereotype may be based on the fact that there is a lower representation of women in the field of eSports. According to 2019 stats, nearly half (35%) of gamers are women, but among that group, only 5% are recognized as professional eSports athletes.<sup>46</sup>

Respondent No. 2 stated that digital game players are stereotyped as nerds, addicts, and people who have no life. The answer of respondent No. 2 suggests that women in the field of digital games face a double barrier of stereotypes. The first barrier is how they are perceived by the wider society and the second barrier is how they are perceived among digital game players. Another stereotype mentioned by respondent No. 3 is that women only play leisure games. This stereotype may be based on the fact that women prefer more relaxing game genres in which there is no element of competition.

Respondent No. 4 mentions another stereotype that women should not play games, but should take care of the family. Respondent No. 5 notices several unique stereotypes: “Women who play games are perceived as tomboyish.<sup>47</sup> Another stereotype is that women play games only to please men, that is, to have something in common with men”.

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45 AMBY, A. et al.: *Analysis of stereotypes: How non-gamers view gamers*. 2020. [online]. [2023-12-09]. Available at: <<http://www.academia.edu/download/62301617/Analys-of-Stereotypes-how-nongamers-view-gamers20200307-128480-ha50k8.pdf>>.

46 BADILLO, K.: *How Many Women Gamers are There in Esports Worldwide?*. Released on 6<sup>th</sup> December 2023. [online]. [2023-12-09]. Available at: <<https://playtoday.co/blog/stats/how-many-women-are-esports-gamers/>>.

47 Remark by the authors: There is no equivalent of the word ‘tomboyish’ in Slovak, but it is a description of women who are engaged in masculine activities, dress in a masculine way, and behave like males. This stereotype may be based on the fact that part of society still sees playing digital games as a boyish activity.

Respondent No. 7 mentions that the stereotype that women play games worse than men is followed by another stereotype saying that women need more time to find their feet in the games and it takes them longer to acquire skills compared to men.

Prejudices of individuals are based on certain stereotypes or previous experiences that led to them, and negative prejudices can be an obstacle to success, which in this case may hinder women's complete involvement in the gaming industry.

Concerning streamers, respondent No. 1 notes only one obstacle she has had to face because of her gender. The obstacle she mentioned is the sexist and lewd behaviour of some people on streaming platforms. She sees this as an obstacle because some women may not be able to cope with this type of interaction, and as a result, they may limit their activity on streaming platforms. For women to be successful, they have to cope with a certain amount of negative comments directed at them precisely because of their gender. Respondent No. 4 notes the fact that she cannot say certain things because of which she would be sexualized as an obstacle and thus she is limited in a certain way. Respondent No. 5 is also the last respondent who is engaged in streaming and does not perceive any obstacles in creating content for the public.

Four of the respondents are engaged in eSports. Respondent No. 1 has experience with the fact that someone would not want to play with her because of her gender; however, it is one negative experience out of many. When asked if she faced any obstacles related to her gender, she answered: "Probably not real obstacles, but maybe respect or recognition is what I would like to get, and I'm still overcoming it. I feel that if I'm doing anything and I'm doing great, I'm trying and I'm getting good results, it's still not enough. I played in a tournament in which I had good results, but still, people insulted me and playing skills were held in very low regard". Respondent No. 4 states that concerning obstacles to success, it is more difficult for women to find their feet in eSports and find a team, which results in women not having room for improvement because players improve the most if they play against more experienced people. Respondent No. 5 notes that when selecting new players for eSports teams, women are stereotyped in such a way that worse results are expected from them than from men. Also, she maintains that men in eSports teams often do not agree with a woman leading the team.<sup>48</sup> Respondent No. 7 perceives the fact that women must make a greater effort to gain awareness on the eSports scene as an obstacle to success. In her opinion, women face double dilemma barriers and if they want to achieve success, they must first gain awareness in the women's eSports community and then also in the men's eSports community because that is where the best players and the best teams are.

Respondent No. 2, who works in the field of digital games education, feels that men are taken more seriously on professional platforms. She has this feeling even when she is lecturing or presenting somewhere but she attributes part of it to the fact that she may be less confident as a woman and to other factors that can influence this feeling.

Respondent No. 3 stated that she was evaluated and promoted based on her good work performance and that her boss treated her kindly. She sees the fact that some men were not open to her ideas in the beginning, and she had to try harder to get men to listen to her and give her ideas a chance as an obstacle.

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48 Remark by the authors: The position called IGL means in-game leader, which means the team leader who leads the team in multiplayer competitive games, and this position is held by the most experienced player in the team.

# Depictions of Female Characters in Digital Games

During the in-depth interviews, the topic of the portrayal of female characters in digital games was addressed, and women's opinions on the positive and negative portrayal of female characters in digital games and, at the same time, the influence of the portrayal on game selection were sought.<sup>49</sup>

Respondent No. 1 stated: "If I saw that in some game someone was trying to support women and portray them as independent and strong, it would add points to my view of that game, but I don't know if this would be the reason for this game to play because I mostly only play Apex". Respondent No. 2 said that when choosing a game, the style of portraying female characters does not play a role for her, but other factors are more important. If there is a choice to play as a male or female character in the game, respondent No. 2 usually chooses a male. She also commented on the negative portrayal of female characters: "Sometimes it upsets me when there's a game in which a woman is completely stereotyped, portrayed as a stupid-head, and it's on purpose, but sometimes it's not, because that's the purpose of the game, or there's a reason for it".

Respondent No. 3 expressed her reaction to the negative portrayal of female characters as follows: "I'm interested in it, but not that much, I roll my eyes and I wouldn't give the game a good rating if a woman was portrayed negatively, but not only because of that, but also because it's not a good story and it's a cliché. I mainly play games because of their game mechanics, and I wouldn't play a game I'm not interested in just because a woman is portrayed positively". Respondent No. 3 does not have a problem with the excessive sexualization of women in digital games because she perceives it as art.

Respondent No. 4 is not interested in the fact of how women are portrayed in digital games, nor is she bothered by the sexualization and stereotyping of women. Regarding the influence of the portrayal of female characters when choosing a game, she said that she finds the negative portrayal of a female character embarrassing, but if the game was fun, she would play it. She finds the negative portrayal of female characters unpleasant, but she thinks it can have a purpose: "When there are some stereotypes shown and it's explicitly pointed out that such stereotyping is bad, then I would play the game anyway. If such a display is intended as a mockery, then it will discourage me from playing". As she states, if a game contains a female character she considers this fact to be a great asset when choosing a game. According to respondent No. 7, the style of portraying women in a game plays a role to some extent but she is not bothered by the negative portrayal of women in digital games.

Summarizing women's opinions on this topic is not easy, because most of them perceive the style of portraying women in digital games differently. While three respondents feel there has been a positive shift in the portrayal of women, two other respondents do not mind women being portrayed negatively. The style of representation of women influences the choice of the game only to a certain extent, and women focus more on other factors such as game mechanics. Anyway, most of the respondents would react either positively or negatively regarding the representation of women in games.

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49 Remark by the authors: Negative portrayal in this context does not mean antagonistic characters, but female characters who are negatively stereotyped, sexualized, and sexist.

# Improving the Situation of Women in the Gaming Industry

When asked about the possible solutions for improving the situation of women who are active in eSports, respondent No. 1 stated that the rules in tournaments should be tightened up and communicated to the players: "If someone has sexist comments and you have proof, you can send it to admins. That's the way it is now, but nobody talks about it and it's not mentioned in the rules". From her answer, it can be deduced that some women do not know about the possibility of reporting negative behaviour to the tournament admin because it is not mentioned directly in the rules. Thus, there is room for improving players' awareness of the rules and their rights to report violations of the rules. Respondent No. 4 sees room for improvement for women with mixed tournaments that give women a chance to demonstrate their skills and play against men, as the top players in Apex Legends are overwhelmingly male. In this way, women can gain a reputation in the eSports community. Although mixed tournaments are organized in Apex Legends, respondent No. 4 considers their number to be insufficient. In the mixed tournaments she talks about there is a rule saying that each team must include at least one woman. Respondent No. 6 perceives an opportunity for improvement through the integration of women in the field of eSports. She perceives that it is gradually being worked on and the situation is visibly improving; as an example of progress, she points to the increase in female commentators of eSports matches. According to respondent No. 7, the situation of women would improve if they learned how to play digital games better, which would consequently lead to other women having someone to look up to and be inspired by. As she has no experience with eSports, she commented on the overall situation of women who play digital games, so her answer also includes eSports and the process by which women get into the eSports community. The respondents were also asked whether quotas aimed at the equality of the number of women and men in the highest leagues of eSports tournaments would be a good solution; however, all respondents who work in the field of eSports have a negative attitude towards quotas.

Streamers constitute another large group of female respondents. In their opinion, the possibility of improvement comprises the increased moderation of chat on streaming platforms and thus the limitation of problematic chatters. Currently, streamers can ban people they do not want in their chat. What content should be blocked on platforms belongs to a long discussion and a common consensus will probably never be found. So it is up to the streamers what content they keep in their chat and what content they delete. Platforms like Twitch penalize accounts for inappropriate behaviour but nothing prevents people from creating a new account.

Respondent No. 2 who works in the field of digital games education sees opportunities for improvement in schools: "Girls are not so supported in programming, for example, and education is still stereotypical. But it is difficult to eradicate it from society. We cannot force parents how to raise their children, but schools should show those girls that they can be active in this field as well, for example, based on role models. It needs to be explained to the children at schools and maybe even the parents should be trained to it". Respondent No. 3, who works as a game developer, sees the possibility of improvement as well as room for improvement in supporting the interest of young girls in the digital games and gaming industry. According to her, the situation in the gaming industry would improve if women

felt more valued and did not have to face the negativity associated with their gender in this predominantly male industry.

Respondents were asked to express their opinions regarding the disproportion of women and men in the fields of the gaming industry they are engaged in. As outlined above, according to the respondents, more problems can cause the disparity between women and men. The most common problem that women mentioned is persistent stereotypical upbringing by the older population who do not understand games, and still consider digital games to be 'male-to-male stuff'. During the in-depth interviews, four respondents mentioned stereotypical education as the reason for the low representation of women in the gaming industry. Another problem women note is the lack of role models to inspire them. Respondents No. 6 and 7 confirmed previous findings that women are less interested in competitive games. Respondent No. 7 also stated that women do not spend as much time on games as men and that they do not enjoy information technologies or the development of games, i.e. working in the gaming industry.

## Conclusion

For six out of the seven respondents, family members were the ones who introduced them to the realm of digital gaming, indicating that their entry into the gaming world largely relied on their families. However, most women do not find support from them; this may not be because of their gender but parents want their children to engage more in activities that they consider meaningful, such as studying for school. They get as much support as possible from their friends. Women face mostly negative comments in connection with digital games from older people and from people who have insufficient knowledge about the world of digital games.

Women like different genres of games but compared to the available statistics, in our research sample, there was a higher number of women who like competitive games; women also play leisure games and AAA games to a larger extent regardless of genre.

Female online gamers face negative behaviour from their fellow players, which can lead to negative consequences such as depression, dislike of the game, and bad moods, they may also stop playing games with strangers, and they may stop playing games for a certain period. Female players would receive negative comments from teammates even if they were male, random teammates modify negative comments according to the characteristics of the person they want to offend. Some negative reactions would appear only based on the feminine gender. Female streamers also face negative consequences, but the negative comments come from their viewers. Despite a certain amount of negative reactions, streamers receive mostly positive reactions from their viewers.

Other widespread stereotypes revealed in this study include the fact that women play games less skilfully than their male counterparts, female gamers are ugly and fat, a woman cannot achieve success in the gaming industry without the help of a man, women are supposed to take care of the family rather than playing games, or women play games only to please men and have some common interests with them. Among streamers, opinions on women being disadvantaged differed. Two of the three female streamers do not feel disadvantaged compared to men as long as they can cope with negative comments; one streamer feels disadvantaged by not being allowed to say certain things that may cause her to face sexualization. The available body of research on gaming and gender supports our findings by arguing that gaming culture is actively unfriendly toward women,

not seeing and accepting them as true gamers despite their demonstrably similar gaming behaviour.<sup>50</sup>

There are several reasons why there is a low representation of women in some areas of the gaming industry. It can be argued that gender-related factors affect a child's future, specifically the choice of further education which is related to helping them succeed in the competitive labour market,<sup>51</sup> and which indicates that gender roles are present in society and that males and females are expected to fulfil different tasks. This assumption was not confirmed nor refuted because most of the women interviewed entered this industry thanks to their family members; however, there is not a sufficient amount of information from women who may have been denied their careers in the industry by the different expectations of people surrounding them.

In light of the opinions expressed by the respondents, there is room for improving the number of women in the industry through educational institutions, which can present women with opportunities even in fields that are perceived as stereotypically male and increase their interest in digital games. The lack of and need for female role models in the world of digital games to inspire women were identified, which can subsequently increase their interest in the industry.

In the field of eSports and competitive gaming, women's participation is low; however, they are not in favour of quotas to determine the minimum number of women gamers in the highest eSports competitions, on the contrary, they argue that players should be evaluated in the light of their skills, not on their gender. Our findings support the conclusions drawn from previous studies referring to eSports and competitive gaming as areas dominated by toxic meritocracy and prevailing masculinity, and women's room for participation in eSports as still being very limited, both as regards their presence and ways of participation.<sup>52</sup> The conclusions drawn from our research are consistent with another study that concludes that despite a strong belief in meritocracy in eSports and competitive gaming, there are still prevailing barriers limiting the participation of women gamers in competitive Overwatch such as doubts about their identity and requests to prove it, threats of publishing private personal information to reveal the identity of the female gamer without her consent, bullying, and other forms of misogynist hostility.<sup>53</sup> Elements of gender discrimination that may lead to harmful stereotypes against women are undoubtedly present in digital games.<sup>54</sup>

As for obstacles and challenges women in the gaming industry face, women creating content on streaming platforms perceive sexism and sexualization by the visitors of their stream as the only obstacles. In the eSports scene, women recognise several obstacles that they have to face. They find it difficult to win respect in the eSports scene and face negative comments from some members of the community who criticize their skills,

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50 See: PAAßEN, B., MORGENROTH, T., STRATEMEYER, M.: What is a True Gamer? The Male Gamer Stereotype and the Marginalization of Women in Video Game Culture. In *Sex Roles*, 2017, Vol. 76, No. 7-8, p. 421-435.

51 See also: MORTREUIL, F.-X., ROŠTEKOVÁ, M.: Multilingualism in the Daily Life of Companies. What Challenges for Slovakia?. In *Politické Vedy*, 2019, Vol. 10, No. 2, p. 212-219.

52 For more information, see: RUOTSALAINEN, M., FRIMAN, U.: "There Are No Women and They All Play Mercy": Understanding and Explaining (the Lack of) Women's Presence in Esports and Competitive Gaming. In VERHAGEN, H. et al. (eds.): *DiGRA Nordic '18: Proceedings of 2018 International DiGRA Nordic Conference: Subversion, Transgression, and Controversy in Play*. Bergen : DiGRA, 2018, p. 1-14. [online]. [2023-12-09]. Available at: <[http://www.digra.org/wp-content/uploads/digital-library/DiGRA\\_Nordic\\_2018\\_paper\\_31.pdf](http://www.digra.org/wp-content/uploads/digital-library/DiGRA_Nordic_2018_paper_31.pdf)>.

53 For example, see: FRIMAN, U., RUOTSALAINEN, M.: Gender and Toxic Meritocracy in Competitive Overwatch: Case "Ellie". In RUOTSALAINEN, M., TÖRHÖNEN, M., KARHULAHTI, V.-M. (eds.): *Modes of Esports Engagement in Overwatch*. Cham : Palgrave Macmillan, 2022, p. 135-154.

54 See also: BALTEZAREVIĆ, B. et al.: Stereotypical Negative Female Gender Roles in Digital Games. In *Acta Ludologica*, 2021, Vol. 4, No. 2, p. 42-61.

attributing this criticism to their gender. As mentioned above, when selecting new members, some teams prefer men, which is linked to stereotypes against women, and they expect worse results from women than from men. The best players in the most famous eSports are men, higher-level players improve their skills by playing against more experienced players. As a result of the fact that teams prefer men, women have less room to play against better teams and, at the same time, room for improvement. In competitive games in which players play in teams, an IGL, the so-called in-game leader, is needed, who leads the team and is the most experienced player. Some players do not want their team to be led by a woman, which can be considered a form of discrimination. Women engaged in digital games education and working in the gaming industry note that men are not so open to their ideas and are not taken so seriously. The respondent who works in the field of digital games education feels that this feeling can also be caused by the fact that she may be less self-confident.

Most of the research we came across is carried out abroad; however, the authors of this study wanted to go further and focus on the situation of women in the world of digital games in Slovakia and shed light on this completely unexplored area. They are aware of the fact that there are some limitations to this study resulting from its qualitative nature and a limited number of respondents. In future research, it would be worthwhile investigating a wider variety of barriers, stereotypes, and challenges women in this industry are exposed to. More research should also be conducted to explore the experience of women working in managerial positions in gaming companies.

## BIBLIOGRAPHY

20-first's 2020 Gender Balance Scoreboard. *Top 14 Global Gaming Companies*. 2020. [online]. [2023-12-08]. Available at: <<https://20-first.com/wp-content/uploads/2020/08/200825-2020-Global-Gaming-Scorecard-Web.pdf>>.

AMBY, A. et al.: *Analysis of stereotypes: How non-gamers view gamers*. 2020. [online]. [2023-12-09]. Available at: <<http://www.academia.edu/download/62301617/Analyssof-Stereotypes-how-nongamers-view-gamers20200307-128480-ha50k8.pdf>>.

BADILLO, K.: *How Many Women Gamers are There in Esports Worldwide?*. Released on 6<sup>th</sup> December 2023. [online]. [2023-12-09]. Available at: <<https://playtoday.co/blog/stats/how-many-women-are-esports-gamers/>>.

BALTEZAREVIĆ, B. et al.: Stereotypical Negative Female Gender Roles in Digital Games. In *Acta Ludologica*, 2021, Vol. 4, No. 2, p. 42-61. ISSN 2585-8599.

BÈGUE, L. et al.: Video Games Exposure and Sexism in a Representative Sample of Adolescents. In *Frontiers in Psychology*, 2017, Vol. 8, No. 1, p. 1-7. ISSN 1664-1078. [online]. [2023-12-12]. Available at: <<https://doi.org/10.3389/fpsyg.2017.00466>>.

BLIZZARD ENTERTAINMENT: *Hearthstone*. [digital game]. Irvine, CA : Blizzard Entertainment, 2014.

BLIZZARD ENTERTAINMENT: *Overwatch*. [digital game]. Irvine, CA : Blizzard Entertainment, 2016.

BURGESS, M., STERMER, S., BURGESS, R.: Sex, Lies, and Video Games: The Portrayal of Male and Female Characters on Video Game Covers. In *Sex Roles*, 2007, Vol. 57, No. 5-6, p. 419-433. ISSN 0360-0025.

CLEMENT, J.: *Distribution of Game Developers Worldwide from 2014 to 2021, by Gender*. Released on 12<sup>th</sup> December 2023. [online]. [2023-12-19]. Available at: <<https://www.statista.com/statistics/453634/game-developers-gender-distribution-worldwide>>.

CLEMENT, J.: *Distribution of Video Gamers in the United States from 2006 to 2022 by Gender*. Released on 6<sup>th</sup> November 2023. [online]. [2023-11-21]. Available at: <<https://www.statista.com/statistics/232383/gender-split-of-us-computer-and-video-gamers/>>.

- CONDIS, M.: *Gaming Masculinity: Trolls, Fake Geeks, and the Gendered Battle for Online Culture*. Iowa City, IA : University of Iowa Press, 2018.
- COTE, A. C.: *Gaming Sexism: Gender and Identity in the Era of Casual Video Games*. New York, NY : New York University Press, 2020.
- COTE, A. C.: "I Can Defend Myself" Women's Strategies for Coping with Harassment while Gaming Online. In *Games and Culture*, 2017, Vol. 12, No. 2, p. 136-155. ISSN 1555-4139.
- DARVIN, L. et al.: Breaking the Glass Monitor: Examining the Underrepresentation of Women in Esports Environments. In *Sport Management Review*, 2021, Vol. 24, No. 3, p. 475-499. ISSN 1441-3523.
- DARVIN, L., VOORIS, R., MAHONEY, T.: The Playing Experiences of Esport Participants: An Analysis of Treatment Discrimination and Hostility in Esport Environments. In *Journal of Athlete Development and Experience*, 2020, Vol. 2, No. 1, p. 36-50. ISSN 2642-9276. [online]. [2023-11-23]. Available at: <<https://scholarworks.bgsu.edu/jade/vol2/iss1/3/>>.
- DRENTEN, J., HARRISON, R., PENDARVIS, N. J.: More Gamer, Less Girl: Gendered Boundaries, Tokenism, and the Cultural Persistence of Masculine Dominance. In *Journal of Consumer Research*, 2023, Vol. 50, No. 1, p. 2-24. ISSN 0093-5301.
- EKLUND, L.: Who Are the Casual Gamers? Gender Tropes and Tokenism in Game Culture. In LEAVER, T., WILLSON, M. (eds.): *Social, Casual and Mobile Games: The Changing Gaming Landscape*. New York, NY : Bloomsbury Publishing, 2016, p. 15-30.
- EXTENDED PLAY PRODUCTIONS, EA VANCOUVER, EA ROMANIA: *FIFA (series)*. [digital game]. Redwood City, CA : EA Sports, 1993-2022.
- FOUSEK KROBOVÁ, T., ŠVELCH, J.: "Never Good Enough": Player Identities, Experiences, and Coping Strategies of Women in Czech Video Game Journalism. In *Games and Culture*, 2023. ISSN 1555-4120. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1177/15554120231166791>>.
- FOX, J., TANG, W. Y.: Sexism in Online Video Games: The Role of Conformity to Masculine Norms and Social Dominance Orientation. In *Computers in Human Behavior*, 2014, Vol. 33, No. 1, p. 314-320. ISSN 0747-5632.
- FRIEDBERG, J.: *Gender Games: A Content Analysis of Gender Portrayals in Modern, Narrative Video Games*. [Master Thesis]. Atlanta, GA : Georgia State University, 2015. [online]. [2023-11-20]. Available at: <<https://doi.org/10.57709/7000435>>.
- FRIMAN, U., RUOTSALAINEN, M.: Gender and Toxic Meritocracy in Competitive Overwatch: Case "Ellie". In RUOTSALAINEN, M., TÖRHÖNEN, M., KARHULAHTI, V.-M. (eds.): *Modes of Esports Engagement in Overwatch*. Cham : Palgrave Macmillan, 2022, p. 135-154.
- HASSAN, H., MAILOK, R., HASHIM, M.: Gender and Game Gender Differences in Playing Online Games. In *Journal of ICT in Education*, 2019, Vol. 6, No. 1, p. 1-15. ISSN 2289-7844. [online]. [2023-12-08]. Available at: <<https://doi.org/10.37134/jictie.vol6.1.2019>>.
- HOWARTH, J.: *How Many Gamers Are There? (New 2023 Statistics)*. Released on 10<sup>th</sup> August 2023. [online]. [2023-12-06]. Available at: <<https://explodingtopics.com/blog/number-of-gamers>>.
- CHEN, C., LEUNG, L.: Are You Addicted to Candy Crush Saga? An Exploratory Study Linking Psychological Factors to Mobile Social Game Addiction. In *Telematics and Informatics*, 2016, Vol. 33, No. 4, p. 1155-1166. ISSN 0736-5853.
- CHERYAN, S. et al.: The Stereotypical Computer Scientist: Gendered Media Representations as a Barrier to Inclusion for Women. In *Sex Roles*, 2013, Vol. 69, No. 1-2, p. 58-71. ISSN 0360-0025.
- JANSZ, J., MARTIS, R.: The Lara Phenomenon: Powerful Female Characters in Video Games. In *Sex Roles*, 2007, Vol. 56, No. 3-4, p. 141-148. ISSN 0360-0025.
- KING: *Candy Crush Saga*. [digital game]. Stockholm, London : King, 2012.
- KONDRAT, X.: Gender and Video Games: How is Female Gender Generally Represented in Various Genres of Video Games?. In *Journal of Comparative Research in Anthropology and Sociology*, 2015, Vol. 6, No. 1, p. 171-193. ISSN 2068-0317.

LACONI, S., PIRÈS, S., CHABROL, H.: Internet Gaming Disorder, Motives, Game Genres and Psychopathology. In *Computers in Human Behavior*, 2017, Vol. 75, No. 1, p. 652-659. ISSN 0747-5632.

LOPEZ-FERNANDEZ, O.: Generalized Versus Specific Internet Use-Related Addiction Problems: A Mixed Methods Study on Internet, Gaming, and Social Networking. In *International Journal of Environmental Research and Public Health*, 2018, Vol. 15, No. 12, p. 1-33. ISSN 1660-4601. [online]. [2023-12-09]. Available at: <<https://doi.org/10.3390/ijerph15122913>>.

LOPEZ-FERNANDEZ, O., WILLIAMS, J. A., KUSS, J. D.: Measuring Female Gaming: Gamer Profile, Predictors, Prevalence, and Characteristics from Psychological and Gender Perspectives. In *Frontiers in Psychology*, 2019, Vol. 10, No. 1, p. 1-13. ISSN 1664-1078. [online]. [2023-12-09]. Available at: <<https://doi.org/10.3389/fpsyg.2019.00898>>.

LORENZ, T., BROWNING, K.: *Dozens of Women in Gaming Speak out about Sexism and Harassment*. Released on 23<sup>rd</sup> June 2020. [online]. [2023-12-07]. Available at: <<https://www.nytimes.com/2020/06/23/style/women-gaming-streaming-harassment-sexism-twitch.html>>.

MATTHEWS, L. N., LYNCH, T., MARTINS, N.: Real Ideal: Investigating How Ideal and Hyper-Ideal Video Game Bodies Affect Men and Women. In *Computers in Human Behavior*, 2016, Vol. 59, No. 1, p. 155-164. ISSN 0747-5632.

MORTREUIL, F.-X., ROŠTEKOVÁ, M.: Multilingualism in the Daily Life of Companies. What Challenges for Slovakia?. In *Politické Vedy*, 2019, Vol. 10, No. 2, p. 212-219. ISSN 1335-2741.

PAAßEN, B., MORGENROTH, T., STRATEMEYER, M.: What is a True Gamer? The Male Gamer Stereotype and the Marginalization of Women in Video Game Culture. In *Sex Roles*, 2017, Vol. 76, No. 7-8, p. 421-435. ISSN 0360-0025.

PEARSON, D.: *Survey: 45 % of the UK Industry's Women Feel Gender Is a "Barrier"*. Released on 13<sup>th</sup> January 2015. [online]. [2023-12-12]. Available at: <<https://www.gamesindustry.biz/survey-45-percent-of-the-uk-industrys-women-feel-gender-is-a-barrier>>.

PERREAULT, M. F. et al.: Depictions of Female Protagonists in Digital Games: A Narrative Analysis of 2013 Dice Award-Winning Digital Games. In *Games and Culture*, 2018, Vol. 13, No. 8, p. 843-860. ISSN 1555-4120.

RESPAWN ENTERTAINMENT, PANIC BUTTON GAMES: *Apex Legends*. [digital game]. Redwood City, CA : Electronic Arts, 2019.

ROGSTAD, T. E.: Gender in Esports Research: A Literature Review. In *European Journal for Sport and Society*, 2022, Vol. 19, No. 3, p. 195-213. ISSN 1613-8171.

RUBERG, B., CULLEN, A., BREWSTER, K.: Nothing but a "Titty Streamer": Legitimacy, Labor, and the Debate on Women's Breasts in Video Game Live Streaming. In *Critical Studies in Media Communication*, 2019, Vol. 36, No. 5, p. 466-481. ISSN 1529-5036. [online]. [2023-12-10]. Available at: <<https://doi.org/10.1080/15295036.2019.1658886>>.

RUOTSALAINEN, M., FRIMAN, U.: "There Are No Women and They All Play Mercy": Understanding and Explaining (the Lack of) Women's Presence in Esports and Competitive Gaming. In VERHAGEN, H. et al. (eds.): *DiGRA Nordic '18: Proceedings of 2018 International DiGRA Nordic Conference: Subversion, Transgression, and Controversy in Play*. Bergen : DiGRA, 2018, p. 1-14. [online]. [2023-12-09]. Available at: <[http://www.digra.org/wp-content/uploads/digital-library/DiGRA\\_Nordic\\_2018\\_paper\\_31.pdf](http://www.digra.org/wp-content/uploads/digital-library/DiGRA_Nordic_2018_paper_31.pdf)>.

RUVALCABA, O. et al.: Women's Experiences in eSports: Gendered Differences in Peer and Spectator Feedback During Competitive Video Game Play. In *Journal of Sport and Social Issues*, 2018, Vol. 42, No. 4, p. 295-311. ISSN 0193-7235.

SGDA: *Slovak Game Industry 2023*. 2023. [online]. [2023-12-12]. Available at: <[https://sgda.sk/wp-content/uploads/2023/09/SGDA\\_catalog\\_2023.pdf](https://sgda.sk/wp-content/uploads/2023/09/SGDA_catalog_2023.pdf)>.

SGDA: *Slovenský herný priemysel v roku 2022*. 2022. [online]. [2023-11-24]. Available at: <<https://sgda.sk/wp-content/uploads/2022/08/infografika-SK-1-1.pdf>>.

SKOWRONSKI, M., BUSCHING, R., KRAHÉ, B.: The Effects of Sexualized Video Game Characters and Character Personalization on Women's Self-Objectification and Body Satisfaction. In *Journal of Experimental Social Psychology*, 2021, Vol. 92, No. 1, p. 1-10. ISSN 0022-1031. [online]. [2023-12-08]. Available at: <<https://doi.org/10.1016/j.jesp.2020.104051>>.

STRAUSS, A., CORBINOVÁ, J.: *Základy kvalitativního výzkumu. Postupy a techniky metody zakotvené teorie*. Brno : Sdružení podané ruce, 1999.

STYHRE, A. et al.: Masculine Domination and Gender Subtexts: The Role of Female Professionals in the Renewal of the Swedish Video Game Industry. In *Culture and Organization*, 2018, Vol. 24, No. 3, p. 244-261. ISSN 1477-2760. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1080/14759551.2015.1131689>>.

SZCZEPANSKA, A. M.: Women's Inclusion and Neoliberal Governmentality in the Swedish Digital Game Industry: An Analysis of Discursive Positions and Recruitment Strategies. In *Gender, Work & Organization*, 2023, Vol. 30, No. 3, p. 842-861. ISSN 1468-0432. [online]. [2023-12-06]. Available at: <<https://doi.org/10.1111/gwao.12923>>.

UBISOFT MONTREAL: *Tom Clancy's Rainbow Six Siege*. [digital game]. Saint-Mandé : Ubisoft, 2015.

VALVE: *Counter-Strike*. [digital game]. Los Angeles, CA, Bellevue, WA : Sierra Studios, Valve, 2003.

VALVE CORPORATION, HIDDEN PATH ENTERTAINMENT: *Counter-Strike: Global Offensive*. [digital game]. Bellevue, WA : Valve, 2012.

VOLLSTEDT, M., REZAT, S.: An Introduction to Grounded Theory with a Special Focus on Axial Coding and the Coding Paradigm. In KAISER, G., PRESMEG, N. (eds.): *Compendium for Early Career Researchers in Mathematics Education*. Cham : Springer, 2019, p. 81-100.

YEE, N.: *Beyond 50/50: Breaking Down the Percentage of Female Gamers by Genre*. Released on 19<sup>th</sup> January 2017. [online]. [2022-11-21]. Available at: <<http://quanticfoundry.com/2017/01/19/female-gamers-by-genre/>>.

# Shifting Sensibilities, and the Uses of Dissonance

Interview with Melos HAN-TANI  
and Marina KITTAKA

## **Melos Han-Tani**

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Melos Han-Tani (he/him) is a Tokyo-based game designer and composer of Japanese/Taiwanese/Irish descent, known for his work on *All Our Asias*, the *Anodyne* series and more. He enjoys writing stories and essays on his blog, <https://melodicambient.substack.com/>, as well as reading and walking. He is on Twitter at @han\_tani.

## **Marina Kittaka**

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Marina Ayano Kittaka is an artist and video game developer, best known as the co-creator of the *Anodyne* series and *Sephonie*. She also wrote the essay "Divest from the Video Games Industry!" and created the open-source blogging engine Zonelets. She has a website (<https://marinakittaka.com/>) and is on twitter (@even\_kei).

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Salomé Honório (they/them) is a poet, writer, and researcher based near Lisbon, Portugal. They hold a PhD in Comparative Studies from the University of Lisbon, where they completed a thesis on political indeterminacy and contradiction in the writings of U.S. author Kathy Acker. They are currently a postdoctoral researcher with the FCT-funded project "UrbanoScenes. Post-Colonial Imaginaries of Urbanisation: A Future-Oriented Investigation From Portugal and Angola" (PTDC/GES-URB/1053/2021) at the Institute of Social Sciences of the same university. Their research interests include critical genealogies of queer theory and discourse; the problematization of the ideal of "trans visibility"; and the obviation of whiteness as a political and aesthetic category. Their poetry has been featured on platforms such as *Amberflora*, *ZARF*, the *Earthbound Poetry Series*, *Futch Press*, and *Smoke & Mold*.



**Salomé Honório (S. H.):** Looking at your collaborations over the years, we can trace a move from a design sensibility deeply indebted to classic 2D gaming, to one which draws on later eras (and technologies) for inspiration. What is your own perception of this gradual shift? And how do you feel about the discourse of nostalgia that seems to permeate gaming culture?

**Marina Kittaka:** Choosing what kind of game to make is always a very multifaceted process. Perhaps we feel like a certain lineage of design is underdeveloped. For instance, our current game, *Angeline Era*, takes inspiration from lesser-discussed action RPGs, like early Ys games' bump combat system. We also take into consideration what themes and narrative ideas we are interested in, usually based on things we are reading or experiencing. Visual decisions, like 2D or 3D, as well as what kind of genre or camera style we use, are also heavily influenced by our experience level and tools. Creating something interesting usually involves working a bit outside my comfort zone, but not so far out that it becomes too inefficient to finish. It is exciting to learn new skills, and I would not really feel content making a game that looks too much like one of my old games. The idea of mastering one particular 'look' is unsatisfying and makes me feel restless. Nostalgia is fine, but it is important to find other ways to connect with, evaluate, and create art.

**Melos Han-Tani:** From a formal standpoint, I have always been a bit more interested in 3D spaces in games, and how easy it is to plop down some geometry and create a space. There is a rich history of 2D games having a strong sense of space, perhaps created in part by the memory and resolution limitations of earlier games, which forced designers to abstract. Analogues to that in 3D exist, particularly in earlier 3D PC, PS1 or PS2-era games. But for the most part, the current generation of game designers does not understand – or does not even realize it does not understand – why 3D games feel lacking, relative to their sense of space. Evidence to my claim is the rise of checklists, quest markers, waypoints, external wikis and guides. Rather than making the best possible use of what 3D offers us as game designers, 3D games usually feel like a container for some mundane task, like pushing a block. Of course, most games – ours included – incorporate these elements to varying extents. But my point is that they often take precedence over the substance of 3D space itself. That 'lack' in 3D games might be why I am more drawn to designing them. Nostalgia is a comforting feeling in moderation. But in games, it often has a chokehold on someone's perception of what is pleasurable, often calcifying around sensations that childhood games gave them. I think it is important for adults to avoid the 'disappointment loop' of *Zelda 20* not being just like *Zelda 3*, and to find other ways to enjoy games, or simply try new things. For designers, nostalgia can be a powerful motivation for analyzing why some games were enjoyable. But it can also be misleading, especially if an old game's design decisions are shallowly copied. It can also lead a designer to be too narrowly focused on what games might be useful reference points. Of course, if you are lucky enough to be okay with going for full nostalgia, then it can also be very profitable. As a developer, on the 'good' side, we might get pigeonholed as being a 'nostalgic reference' game. On the 'bad' side, there is a vocal minority, conjuring their own demons about our games representing an 'outdated past,' despite them often liking some choice old games. Either way, the game is not being engaged with on its own terms, but through a reductive lens of nostalgia.

**S. H.:** Correspondingly, how has the process of shifting from 2D to 3D projects – and even between the two, as is the case with *Anodyne 2* – impacted the ways you approach game making? Be it from a technical or a creative point of view?

**Marina Kittaka:** I love 3D. I think it is incredibly interesting to work with, and it feels in some ways like it is much easier to take inspiration from how it feels to move around in the world and put it into a 3D game. With 2D, I have always found it a drag to create polished images. Because the camera moves around in 3D, and creates new compositions of shapes, it feels a bit more forgiving in terms of meshing together varying degrees of art asset polish. On the downside, it can be exhausting trying to get a certain lighting effect in 3D, especially to create a really stylized look. And in general, it is a slow process compared to banging out pixel art. It would be a whole different level of fun and interesting if I could create 3D art faster.

**Melos Han-Tani:** Creatively, it is empowering, as we can generally look at any game and have an idea of what is making it work, having done much of it ourselves. Experience in 2D and 3D helps with confidence, as so much of game making is having to problem-solve as you go. Nothing is too hard, as long as there is time. On another note, working with different camera perspectives in 2D (top-down, side-scroll) and 3D (free camera, fixed camera) also expands our critical faculties when it comes to analysing other games or working on our own. I also feel like it is easier to take inspiration from everyday life with 3D games, in terms of thinking about spaces you walk through every day, and how they could be abstracted and represented in a game.

**S. H.: *Anodyne* makes rare use of semi-controllable glitches as a game (or post-game) mechanic. In retrospect, how do you feel about this decision to experiment with the game's final structure? And how do you feel it fits into the game's core themes and mechanics?**

**Melos Han-Tani:** I am happy it is there. It was a last-minute addition that made use of the game's existing structure, and thematically, it fit perfectly into Young as a character: either you end the game by meeting Briar, or you meticulously pore over every corner of the game, trying to find some alternate ending and meaning, only to be blocked by an impassable gate, with no answers beyond. On a character level, it feels like Young is searching endlessly. But for the player, I think it is a nice, quiet way to enforce the finitude of games, and how an important part of the playing process is to accept that there *is* an end.

**S. H.: *Anodyne 2* is, at times, a sharply discontinuous game, both at the level of narrative and in terms of gameplay. The horror sequence might be the single strongest example of this kind of deliberate dissonance, suddenly jolting players' expectations. Could you talk a bit about this particular segment, and what motivated it?**

**Marina Kittaka:** On a very basic level, the sequence was simply something I wanted to make in a general sense, and after consideration, it seemed like it could fit into *Anodyne 2* in a beneficial way. I think one of the best parts of media by small creators is that there can be a very living sense of 'anything can happen'. With big, corporate media, there are certain assumptions that you can make based on the budget tier, target audience, etc. With the horror sequence, that is of course a deliberately jarring shift. However, there are many other oddities in *Anodyne 2* that are more subjective: amateurish 3D models, weirdly obtuse jokes, unsettling characters... At no point was I trying to intentionally make 'bad' art. However, creating janky yet powerful art can have the effect of jostling the audience out of a 'consumer product evaluation' mindset. If you are playing a game, and inside your head thinking 'these graphics are 3/10', but then you have a deep and resonant experience with those graphics, then that might expand your experience of life a bit.

**Melos Han-Tani:** On my end, I riffed off the idea by including the 'debug area' content that happens right before entering the horror sequence. I think that moment helped to create the right sense of continuity between the 'regular game' and the horror sequence, rather than drop you right into it. Another note is that the horror section has the same controls as the 2D parts of the game, just slightly modified and with different art. I think it is a great example of slightly tweaking what we already had to convey something far different.

**S. H.: Is the exploration of dissonance between different stylistic registers and forms of gameplay important to your creative process, more generally?**

**Marina Kittaka:** Yes, I always want there to be interesting tension in my work. Contrasting styles is one way of doing that. One of the most fun parts of being a game designer is playing with expectations. Sometimes people think the goal is to ultimately fulfil the player's expectations or wishes. That is boring. I am always a bit scared of making art that is too instantly appealing or too perfectly captures a particular aesthetic. It is helpful for marketing, but I feel like it also kind of makes the work feel disposable.

**Melos Han-Tani:** For me, it is a powerful tool. It is kind of like juxtaposing two artworks in an art gallery: our perception of one object is different due to the context the other object adds. When I do get to write stories, I like intertwining different types of writing. There is a trend in games towards homogeneity, in which a glance at a trailer captures the entire experience. A game created to be the 'most action-packed,' the 'most heart-rending', etc. Kind of like buying 'orange juice' at the store. It will taste like orange. But life is full of jarring juxtapositions. Dissonance – huge jumps in the story's tone, different gameplay systems, 'contradictory' characters – feel truer to humanity. There is a point when a game is so polished, and its experience so 'perfect', that it feels like an odd, comforting illusion, almost. I want to see the imperfect human on the other end, when playing a game. In short, the world is complex and messy, and it is telling that people often say recent news would feel contrived in a piece of media. I feel like that speaks to an inherent failure in the collective imagination behind media-making.

**S. H.: How – if at all – does this relate back to personal experiences, and ways of relating to social norms? Do you find that these kinds of discrepancies or discontinuities carry over from lived experience, to some extent?**

**Marina Kittaka:** From a young age, I was always pretty insistent on having a funny or unique way of doing things. I think mainly it was just my personality. However, I also think it functioned as a kind of release valve for certain social and cultural pressures that I experienced. For example, I felt I had to be a 'perfect' Christian, student, etc... While simultaneously fearing that others saw me as a cold, robotic, 'high-achieving' Asian stereotype. Doing things my own way, even if it was just something small or insignificant, allowed me to carve out some space for my own sense of self.

**Melos Han-Tani:** Growing up in the American suburbs was a confusing experience. With non-dominant culture around me (Chinese language, Asian food, other minority friends...), this made life feel very shape-shifter-y in terms of what I should become: an athlete, a doctor, a banker. Or what friends to hang around: musicians, science kids, gamers. Neither

my mom (a Taiwanese 1.5-generation immigrant<sup>1</sup> who only rarely visited Taiwan) or dad (a mixed Irish/Japanese American) seemed to me to be as particularly situated within America's fabric as other families, although nowadays they have admirably eked out their own communities. As a kid I felt weirdness with our tiny extended family, and the relative smallness of trying to follow American traditions, like having barbecues or celebrating Thanksgiving. Every one of the hundreds of Asian friends or people I knew growing up had different family and living environments that felt unique in their own way of trying to fit into America, and which made me wary of easy-to-digest narratives about being 'Asian'. Since I did not have stereotypical 'Asian Parents', there was even less of a cultural narrative to hold onto. Generally, there was a sense of being an outsider in school and in college, and using academic performance as a way of fitting in, despite my grade school interests mostly being in music, games, or journaling. Nowadays, I see that this was in part just "How It Is Living in America", upwards class aspirations, and the effects cultural intermixing and immigration can have on kids. But I think it was informative on my taste in art-making, and a preference for works that speak to the ambiguities I experienced growing up, and still see around me today.

**S. H.: With its strong emphasis on the Asian diaspora, *Sephonie* strongly arks back to *All Our Asias* (AOA), and the ways that earlier work explored personal and social perceptions of ethnicity, culture, and belonging. Would you consider this an important question in your work?**

**Melos Han-Tani:** Yeah, although it has shifted a bit more outwards over the years, from specific questions of Asian-Americanness with AOA, to international 'Taiwanese' with *Sephonie*, and currently I am more interested in the cultural themes, and the different scales of culture in particular: from popular, state-led ones, like Corporate Pop Music, to local ones, like friends making games together. For a variety of reasons, I think one of the tricks to a better future is for people to feel less risk-averse about trying out new things (whether that be meeting others or consuming media) at smaller scales, rather than tuning in to the most heavily-marketed whatever. Rather than waiting for something to happen – a huge game or film to drop –, we should all be trying to make things happen, together. I think global media has tricked us into thinking people are really similar, when there is an inherent richness to every person.

**S. H.: Do these factors impact your own experience of the gaming industry? What has it been like to navigate the primarily white, ciscentric, male-dominated and eurocentric spaces of western gaming culture? Be it in conversations with peers, or in interactions with larger forces in the industry?**

**Marina Kittaka:** My experiences around this are all pretty squishy, and I am not sure how to compress it down. I do not recognize myself in most US discursive narratives about minorities and 'culture'. I do think that I communicate things about my experience in my art and writing. It has also been a lot of fun to team up with academics at the intersection of Asian American and games studies, such as C. Patterson<sup>2</sup> and T. Fickle.<sup>3</sup>

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1 Remark by the interviewer: The term 1.5 generation (abbreviated to 1.5G) is used to refer to people who immigrated as children, as opposed to first generation immigrants (born outside the country they migrate to) or second generation immigrants (whose parents were born abroad, but are born in the country their parents migrated to, themselves).

2 For more information, see: *Christopher B. Patterson*. [online]. [2023-11-18]. Available at: <<https://grsj.arts.ubc.ca/profile/christopher-patterson/>>.

3 See also: *Tara Fickle*. [online]. [2023-11-18]. Available at: <<https://tarafickle.com/>>.

**Melos Han-Tani:** I have met a lot of great people through games! Usually on the margins. However, I do come into contact with the dominating order of games a lot, and I mostly find it largely unimaginative, both on the part of other developers and on the business side. There is a slapstick quality to the way people in power self-justify their short-sighted practices, or how popular developers insularly co-network. Like, were we not in games to make good games? Maybe not. There is an absurdity to how people like me, on a smaller scale, are stuck reading tea leaves in order to market their way to a golden ticket (led on by the superstitious myths perpetuated by the 'upper indie class', who always seem to be making certain kinds of games)... Or, on the larger scale of big indie to corporate games, how people find themselves in a weird, quagmire-like cycle of making mediocre, platform-endorsed games in order to procure funding. I think games (or gamified apps like TikTok) are like the mental equivalent of oil and plastics companies, in terms of their pollution.

**S. H.:** How would you situate *Sephonie* within wider discussions about the ways in which we relate to nature – including discussions of climate change, the concept of the Anthropocene, and the irreversible effects of human action on the world at large? Are there any particular debates that influenced *Sephonie's* conception?

**Marina Kittaka:** Even though many of our games contain so-called environmental themes, my thoughts on this topic are fairly complicated. I am fascinated by biodiversity and learning about the natural world, and I consider it obvious that humanity's current relationship to the rest of the Earth is destructive and that it is incredibly important to change this for the better. However, I would say that *Sephonie* is not primarily *about* these themes. I tend to find 'green' pop culture frustrating – such as in the dynamic of D. Attenborough documentaries, vaguely scolding mankind, while actively obscuring context about things like colonialism, capitalism, urbanization, and their own production, that would give us a more meaningful and actionable understanding of our world.<sup>4</sup> With environmentalist themes in the media, there is so often a sort of compulsive push and pull dynamic of doom and hope, guilt and absolution, contamination and purity. I think this encourages audiences to anxiously turn inward, and also easily slips into an anti-human or eco-fascist logic. *Sephonie* is exploring very specific themes about borders and how we draw them: between nations, between groups, between organisms. It is not unrelated to environmentalism, but there is no desire to hook the player into that anxious push-pull cycle. It is a story about specific humans and the imperfect, sometimes frightening and beautiful ways that they experience connection.

**Melos Han-Tani:** Nothing inspired the environmental aspects specifically. For me, those stemmed more from how the game was founded around the limits of things like nationalism. A lot of problems seem to be caused by groups of people defining an identity that lets them exert superiority over other identity groups, and of course this is connected to the environment – e.g. for the middle class/'first world' countries to prosper, put the polluting factories in the lower class/'third world 's' backyards...

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4 For example, see: MARRIS, E.: *The Nature You See in Documentaries is Beautiful and False*. Released on 12<sup>th</sup> April 2021. [online]. [2023-11-18]. Available at: <<https://www.theatlantic.com/culture/archive/2021/04/problem-nature-documentaries/618553/>>; TAN, J.: *Watching "A Life on Our Planet," or How I Ruined David Attenborough for Myself*. Released on 23<sup>rd</sup> May 2021. [online]. [2023-11-18]. Available at: <<https://lareviewofbooks.org/article/watching-a-life-on-our-planet-or-how-i-ruined-david-attenborough-for-myself/>>.

**S. H.: We are witnessing a moment in gaming culture – and arguably, in pop culture at large – where trans creators are increasingly vocal, visible, and capable of reaching their desired audiences. How would you position yourselves in relation to this wider cultural landscape? Especially when it comes to the complexities of trans representation, and trans-affirmative storytelling?**

**Marina Kittaka:** I do not really feel that plugged into gaming or pop culture these days, so it is difficult to situate myself. It certainly impacted my life positively, that being an indie game developer in the 2010s put me in circles with a lot of trans people. However, a lot of the promises of that cultural moment have kind of come to ring hollow, and in a broader sense, there is a significant cultural and political backlash against trans visibility, in the U.S. and beyond. So it is messy, but I am happy to live my life and make art, etc. I am genuinely happy if people feel represented or affirmed by my work, despite those concepts not really speaking to me that much, in terms of my own relationship to identity and art.

**Melos Han-Tani:** Although I am not trans, there is a lot about trans-created media that speaks to me from an angle relating to race, identity and cultural belonging – and likewise with queer media, more generally. So I would say my work has some overlap with those themes. Games are such a great space to unsettle your sense of self and open up the idea that you can change in some way. I feel very flattered that games like *Anodyne* or *Anodyne 2* have been cited by some trans players as one of the pieces in their journey to gender self-discovery. Regarding representation... Generally speaking, I think the best work does not focus on trying to be perfect representation, and the best analysis does not try to hail something as universally representative. I think keeping this in mind, creators and critics can avoid pushing forward western-centric and white-centric narratives or frameworks of understanding – with regards to gender, race, etc. – the way it can sometimes happen with Americans criticizing other countries or work from other countries, with different histories.

**S. H.: You recently announced *Angeline Era*, which seems to signal a move into more fantasy-based landscapes and tropes. What shaped this decision, and in what other ways do you feel the project stands apart from your previous work?**

**Marina Kittaka:** *Angeline Era* has an Ireland-inspired setting, which definitely leads to more overlap with European fantasy genre media. That basically came from the fact that I got interested in Ireland for some reason over the past few years. Funnily enough, this is by far our most rigorously researched game yet, at least on my end. It is set in an alternate history 1950s Earth, and I have really dug into the history of Japanese Americans and the early Christian church, as well as Ireland and other topics. I had used up a lot of floating imagery from my personal life experiences in our previous games, so I really wanted to dig deep into whatever topics called out to me and replenish my well of inspiration. Many games draw on similar imagery, so it has been tricky to find *Angeline Era*'s unique visual identity – the devil is really in the details, this time around. It is an exciting challenge, and I cannot wait to show more!

**Melos Han-Tani:** Early on in *Angeline Era*'s development, we had a huge range of ideas that were moving in a kind of *Anodyne*-ish direction, in the sense that parts of the game felt self-referential to video games. Even with the bumpslash ideas in place, it felt a bit up in the air as to what exact world design we'd be expressing them within. The research

starting from Ireland helped give a more concrete basis for where the levels would be situated, as this is probably the most level design intensive game we have made. Compared to other games, there has been more focused research into games of all sorts (especially in the 80s and 90s), to get a more holistic sense of the evolution of action and its goals. Generally, what I have identified are two things. First, there is this still existing yet rare art of expression, through the shapes and spaces you can find in early action games like *Hydride 2*, or a kind of raw power to the 3D spaces of something like *Brightis*, or the enemy compositions of *Dark Souls 1*. Playing a bunch of these games has helped me develop my direction in keeping the levels unique, intriguing, unusual, and communicating in a vocabulary unique to Angeline Era. Secondly, I hope playing Angeline Era gets people more interested about the physical aspects of their life, as well. This is more abstract, but I think action games nowadays tend to lack a connection to the sense of physically *being* in real life. Maybe it is because the internet takes up more free time, but you can see this most evidently in the high focus on animation, which in the most ridiculous cases – like *Genshin Impact* finishers, which amount to just doing 10,000 damage – are a kind of sensory overload. The other one is the concept of the dodge roll, which cancels out physical logic in favour of preserving action fantasy. The physicality of S. Arakawa and M. Gins' *Site of Reversible Destiny*, which I finally visited this year (2023), was an important piece in helping me put these ideas into place: the way in which environmental feedback – for instance, through slanted stones – can help us think more carefully about our relation to the physical environment. So I want to do a bit of that with my enemy and level design direction in Angeline Era: unusual ways of moving the character, anticipating enemy movements, etc... while using micro-frictions from stuff like sports to influence my ideas. I hope this can get players thinking more about their regular life, after they have played the game!

**S. H.: The bumpslash system seems to present players with a surprising twist on standard, action button-based game mechanics. What design options does it open up? And what kinds of limits does it create, in terms of those productive constraints that help shape level design?**

**Melos Han-Tani:** The bumpslash, combined with the top-down camera, lets us make fairly chaotic screens, since it is easy to see all the information at once. There is an athletic, playful physicality to the bumpslash that allows enemies and situations to feel almost sports-like. For one, fighting some enemies might feel faintly like certain types of ball games. By moving beyond the current standard of timing-based action (dodge rolls, parries, and combos), the level design allows you to be as aggressive as you want, judging for yourself what is the best time to draw away from a group of enemies. I am able to use enemies in a more compositional manner: screens full of enemies *feel* different to fight, sometimes in surprising ways. I can communicate all sorts of environments or moods with the vocabulary of these enemies, obstacles, and level geometry.

**S. H.: Finally, what can we expect from Analgesic Productions in the near – and maybe not so near – future? Any hints of projects under development?**

**Melos Han-Tani:** We are hoping to have Angeline Era out sometime in the second half of 2024. As far as collaborations between Marina and I go, we are not sure. It depends on how well Angeline Era sells, and our interests in the future! We have thrown around ideas like reusing the Angeline Era combat engine, returning to the Anodyne series, or Sephonie prequels... But who knows – maybe it will be something else! Personally, I have a lot of

story, game and research ideas that I am exploring in my spare time, so perhaps those will come to bear on whatever we do next.<sup>5</sup>

## BIBLIOGRAPHY

HAN-TANI, M.: *Sanpo Game Devlog: (006) – Moving on from “Shuffled World”*. Released on 15<sup>th</sup> September 2023. [online]. [2023-11-18]. Available at: <[https://melodicambient.substack.com/p/sanpo-game-devlog-006-moving-on-from?utm\\_source=profile&utm\\_medium=reader2](https://melodicambient.substack.com/p/sanpo-game-devlog-006-moving-on-from?utm_source=profile&utm_medium=reader2)>.

*Christopher B. Patterson*. [online]. [2023-11-18]. Available at: <<https://grsj.arts.ubc.ca/profile/christopher-patterson/>>.

MARRIS, E.: *The Nature You See in Documentaries is Beautiful and False*. Released on 12<sup>th</sup> April 2021. [online]. [2023-11-18]. Available at: <<https://www.theatlantic.com/culture/archive/2021/04/problem-nature-documentaries/618553/>>.

TAN, J.: *Watching “A Life on Our Planet,” or How I Ruined David Attenborough for Myself*. Released on 23<sup>rd</sup> May 2021. [online]. [2023-11-18]. Available at: <<https://lareviewofbooks.org/article/watching-a-life-on-our-planet-or-how-i-ruined-david-attenborough-for-myself/>>.

*Tara Fickle*. [online]. [2023-11-18]. Available at: <<https://tarafickle.com/>>.

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5 For the latest on one of M. Han-Tani’s long-term side projects, see: HAN-TANI, M.: *Sanpo Game Devlog: (006) – Moving on from “Shuffled World”*. Released on 15<sup>th</sup> September 2023. [online]. [2023-11-18]. Available at: <[https://melodicambient.substack.com/p/sanpo-game-devlog-006-moving-on-from?utm\\_source=profile&utm\\_medium=reader2](https://melodicambient.substack.com/p/sanpo-game-devlog-006-moving-on-from?utm_source=profile&utm_medium=reader2)>.



## THE RULES WE BREAK: LESSONS IN PLAY, THINKING AND DESIGN

ZIMMERMAN, E.: *The Rules We Break: Lessons in Play, Thinking And Design*. New York, NY : Princeton Architectural Press, 2022. 208 p. ISBN 979-16-499-6067-3.

Juraj Kovalčík

E. Zimmerman is an acknowledged game designer, scholar, and educator, working in the game industry and game studies for more than 30 years. His early games include *Gearheads*<sup>1</sup> and *Sissyfight 2000*<sup>2</sup>. In the 2000s his New York-based studio Gamelab (co-founded with P. Lee) developed dozens of award-winning games such as *Diner Dash*<sup>3</sup>. The Institute of Play, a nonprofit spinoff from Gamelab, co-founded with P. Lee and K. Salen, aimed to “transform education through play and designed entire schools where the curriculum was based on games and play”.<sup>4</sup> E. Zimmerman’s design work includes large scale art installation projects with N. Pozzi and other non-digital projects like the tabletop games *The Metagame* and *Quantum*.

As a lecturer, E. Zimmerman worked at MIT, NYU, Parsons School of Design and The School of Visual Arts, and is a founding faculty and Arts Professor at the NYU Game Center, Tisch School of Arts. In 2003, he and K. Salen Tekinbaş co-authored *Rules of Play: Game Design Fundamentals*, described as “the first comprehensive attempt to establish a solid theoretical framework for the emerging discipline of game design”<sup>5</sup> that has since become a standard textbook in game design courses all over the world. It was followed by *The Game Design Reader* in 2006 and dozens of essays, for example *Narrative, Interactivity, Play, and Games: Four Naughty Concepts in Need of Discipline*, *Game Design and Meaningful Play*, *Gaming Literacy: Game Design as a Model for Literacy in the Twenty-First Century* and *Manifesto for a Ludic Century*.<sup>6</sup> In the latter, E. Zimmerman develops in the “playfully bombastic” form his argument that “games are a lens for understanding media, art, and culture in the 21st century”.<sup>7</sup>

His new textbook titled *The Rules We Break* is both an exploration and expansion of the same argument. If the *Manifesto* asserts that “[s]ystems, play, design [...] are not just aspects of the Ludic Century, they are also elements of *gaming literacy*” and literacy “is

- 1 PHILIPS MEDIA, R/GA INTERACTIVE: *Gearheads*. [digital game]. Amsterdam : Philips Media, 1996.
- 2 WORD.COM: *Sissyfight 2000*. [digital game]. New York, NY : Word.com, 2000.
- 3 GAMELAB: *Dash Diner*. [digital game]. San Francisco, CA : PlayFirst, 2003.
- 4 *Biography*. [online]. [2023-12-05]. Available at: <<https://www.ericzimmerman.com/>>.
- 5 *Rules of Play: Game Design Fundamentals*. [online]. [2023-12-05]. Available at: <<https://mitpress.mit.edu/9780262240451/>>. See: SALEN, K., ZIMMERMAN, E.: *Rules of Play: Game Design Fundamentals*. Cambridge, MA : The MIT Press, 2003.
- 6 For more information, see: SALEN, K., ZIMMERMAN, E. (eds.): *The Game Design Reader. A Rules of Play Anthology*. Cambridge, MA : The MIT Press, 2006.; ZIMMERMAN, E.: *Narrative, Interactivity, Play, and Games: Four Naughty Concepts in Need of Discipline*. In WARDRIP-FRUIIN, N., HARRIGAN, P. (eds.): *First Person: New Media as Story, Performance, and Game*. Cambridge, MA : The MIT Press, 2004, p. 118-130.; SALEN, K., ZIMMERMAN, E.: *Game Design and Meaningful Play*. In RAESSENS, J., GOLDSTEIN, J. (eds.): *Handbook of Computer Game Studies*. Cambridge, MA : The MIT Press, 2005, 2011, p. 59-79.; ZIMMERMAN, E.: *Gaming Literacy: Game Design as a Model for Literacy in the Twenty-First Century*. In PERRON, B., WOLF, M. J. P. (eds.): *The Video Game Theory Reader 2*. New York, NY, London : Routledge, 2008, p. 45-54.; ZIMMERMAN, E.: *Manifesto for a Ludic Century*. In WALZ, S. P., DETERDING, S. (eds.): *The Gameful World: Approaches, Issues, Applications*. London, Cambridge, MA : The MIT Press, 2014, p. 19-22.
- 7 *Thinking about Play*. [online]. [2023-12-05]. Available at: <<https://www.ericzimmerman.com/>>.

about creating and understanding meaning”,<sup>8</sup> the book is correspondingly divided into three parts: Play, Systems and Design. It is not just game for gaming’s sake nor an *unreal tournament* of thought experiments: in E. Zimmerman’s view “[t]he problems the world faces today requires the kinds of thinking that gaming literacy engenders”,<sup>9</sup> i.e., playful, innovative, interdisciplinary system thinking.

In ‘understanding media’ the author (consciously or not) uses a turn of phrase familiar to contemporary media theorists from M. McLuhan’s work *Understanding Media: The Extensions of Man*, where he coined his famous aphorism “the medium is the message”.<sup>10</sup> The “playfully bombastic”, provocative style and content of the *Manifesto* certainly brings to mind M. McLuhan, seen by some as “more as a poet than a historian, a master of intellectual collage rather than a systematic analyst”.<sup>11</sup> R. Williams described M. McLuhan’s technological determinism as “a particular culmination of an aesthetic theory which became, negatively, a social theory [...] indicating a social and cultural determinism”.<sup>12</sup> Grand metaphors and statements like the ‘ludic century’ run the risk of inventing analogical determinisms and promoting ‘playful’ or ‘design’ thinking as another cure for all, a foregone conclusion discouraging critical analysis. Given how quickly ‘design thinking’ has become a new catchphrase for corporatization of academia (replacing gamification and its derivations), at least some of the milk has already been spilt.

Visually, *The Rules We Break* may even artificially resemble *The Medium Is the Massage: An Inventory of Effects*,<sup>13</sup> M. McLuhan and Q. Fiore’s 1967 best-selling follow-up to *Understanding Media*. B. English’s design implements disproportionately large titles, colours and sometimes turns the text on its head (see the cover) but does not go completely experimental like Q. Fiore did with *The Medium Is the Massage*.

That is perhaps the point where we can stop with looking for similarities. E. Zimmerman does not intend to revolutionize academic theory by turning into a multimedia artifact. His book is first and foremost a ‘textbook’ for students of game design. And since for him “design is about doing, [...] less about knowledge and data and more about experimentation and practice”, the author urges his potential students: “Don’t read this book. Play with it” (p. 10). Naturally, such prompts beg the question how we are supposed to do that. Let us see.

As I have already mentioned, the work is separated into three sections, Play, Systems and Design. Every section consists of eleven short essays. ‘Short’ means that each essay or chapter takes just one page. E. Zimmerman characterizes these essays as “a few ways of thinking about play, or systems, or design” (p. 15). There are some references to theoretical works, but no complete bibliography. Crucially, each of three sections is followed by game design exercises. These exercises require very little in terms of material or setup and no computers, but progressively more of practitioners’ time, from 20-30 minutes in Play sections, through a “couple of hours to tinker with a system” to “a day or more to design a game” (p. 6-7). E. Zimmerman devises them from his lifelong experience in playing and designing games as well as in teaching design. They take considerably more space than his one-page essays and should be considered the main contribution (and attraction) of this truly playful textbook. Lastly, the book is appended with game sheets that can be photocopied to assist with some of the exercises.

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8 ZIMMERMAN, E.: *Manifesto for a Ludic Century*. In WALZ, S. P., DETERDING, S. (eds.): *The Gameful World: Approaches, Issues, Applications*. London, Cambridge, MA : The MIT Press, 2014, p. 21.

9 Ibidem.

10 McLUHAN, M.: *Understanding Media: The Extensions of Man*. New York, NY, Toronto, London : McGraw-Hill, 1964, p. 7.

11 JOSCELYNE, A.: *Revolution in the Revolution*. Released on 1<sup>st</sup> January 1995. [online]. [2023-12-05]. Available at: <<https://www.wired.com/1995/01/debray/>>.

12 WILLIAMS, R.: *Television: Technology and Cultural Form*. New York, NY : Schocken Books, 1975, p. 126-127.

13 See: McLUHAN, M.: *The Medium Is the Massage: An Inventory of Effects*. New York, NY, London, Toronto : Bantam Books, 1967.

To bring the fancy of his *Manifesto* somewhat down to earth, E. Zimmerman admits that 'playful', 'design' or 'system' thinking transformed into game design as culture and/or business, does not only have potential to help solve the world's problems, but also creates some of its own. He considers the destructive environmental impacts of the digital game industry together with "the politics of race, gender, or class [...] in the representations of a game [and] how those politics are reflected (or not) in the [game development] companies and teams" (p. 13). Hopefully, the strong moral appeal to students to become warriors for design culture deeply invested in climate, race and economic justice will recruit some passionate devotees.

## BIBLIOGRAPHY

- Biography*. [online]. [2023-12-05]. Available at: <<https://www.ericzimmerman.com/>>.
- GAMELAB: *Dash Diner*. [digital game]. San Francisco, CA : PlayFirst, 2003.
- JOSCELYNE, A.: *Revolution in the Revolution*. Released on 1<sup>st</sup> January 1995. [online]. [2023-12-05]. Available at: <<https://www.wired.com/1995/01/debray/>>.
- McLUHAN, M.: *The Medium Is the Massage: An Inventory of Effects*. New York, NY, London, Toronto : Bantam Books, 1967.
- McLUHAN, M.: *Understanding Media: The Extensions of Man*. New York, NY, Toronto, London : McGraw-Hill, 1964.
- PHILIPS MEDIA, R/GA INTERACTIVE: *Gearheads*. [digital game]. Amsterdam : Philips Media, 1996.
- Rules of Play: Game Design Fundamentals*. [online]. [2023-12-05]. Available at: <<https://mitpress.mit.edu/9780262240451/>>.
- SALEN, K., ZIMMERMAN, E.: Game Design and Meaningful Play. In RAESSENS, J., GOLDSTEIN, J. (eds.): *Handbook of Computer Game Studies*. Cambridge, MA : The MIT Press, 2005, 2011, p. 59-79.
- SALEN, K., ZIMMERMAN, E.: *Rules of Play: Game Design Fundamentals*. Cambridge, MA : The MIT Press, 2003.
- SALEN, K., ZIMMERMAN, E. (eds.): *The Game Design Reader. A Rules of Play Anthology*. Cambridge, MA : The MIT Press, 2006.
- Thinking about Play*. [online]. [2023-12-05]. Available at: <<https://www.ericzimmerman.com/>>.
- WILLIAMS, R.: *Television: Technology and Cultural Form*. New York, NY : Schocken Books, 1975.
- WORD.COM: *Sissyfight 2000*. [digital game]. New York, NY : Word.com, 2000.
- ZIMMERMAN, E.: Gaming Literacy: Game Design as a Model for Literacy in the Twenty-First Century. In PERRON, B., WOLF, M. J. P. (eds.): *The Video Game Theory Reader 2*. New York, NY, London : Routledge, 2008, p. 45-54.
- ZIMMERMAN, E.: Manifesto for a Ludic Century. In WALZ, S. P., DETERDING, S. (eds.): *The Gameful World: Approaches, Issues, Applications*. London, Cambridge, MA : The MIT Press, 2014, p. 19-22.
- ZIMMERMAN, E.: Narrative, Interactivity, Play, and Games: Four Naughty Concepts in Need of Discipline. In WARDRIP-FRUIIN, N., HARRIGAN, P. (eds.): *First Person: New Media as Story, Performance, and Game*. Cambridge, MA : The MIT Press, 2004, p. 118-130.

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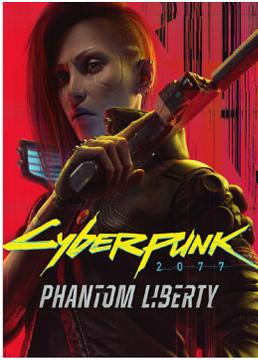
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## CYBERPUNK 2077: PHANTOM LIBERTY

CD PROJEKT RED: *Cyberpunk 2077: Phantom Liberty* (PC version). [digital game]. Warsaw : CD Projekt, 2023.

Mária Dolniaková

Video game developer and publisher CD Projekt Red is responsible for the hugely popular digital game series *The Witcher*<sup>1</sup>, as well as *Cyberpunk 2077*<sup>2</sup>. It is true that the release of the second-mentioned game was marred by countless technical bugs that blighted the experience for many players. However, it seems that those times are long behind us and gamers have forgotten about the initial shortcomings of the title. This is evidenced by the sales that were largely spurred by the release of the anime series *Cyberpunk: Edgerunners*<sup>3</sup> and the recently released downloadable content (DLC) titled *Cyberpunk 2077: Phantom Liberty*. As of October 5, 2023, over 25 million copies of the base game and over three million copies of the DLC have been sold.

The graphics of this work enhance the authenticity of the entire action role-playing game (RPG) from a first-person perspective. Detailed textures on characters' faces and objects such as weapons, clothing and vehicles, including their interiors, encourage immersive gameplay and enhance the player's experience and emotions. Equally impressive is the spectacular ray tracing, teeming with various reflections and highlights that few titles can boast at a similar level. The new expansion also brought a lot of new features including new car missions, airdrops, side quests, skills and abilities. New items have also been added including weapons, cyberware, cars, fashion accessories and missile launchers for vehicles. All of these elements fit into the overall cyberpunk universe concept, adding to the atmosphere. This task was also fulfilled by the soundtrack, which worked very well with the player's feelings and managed to evoke the right mood, whether it was a heated battle with enemies or an emotional conversation.

The most impressive part, which significantly enriched the whole story, was a new geographical area called Dogtown. This setting for the main story of the new DLC showcases a wicked world full of corruption and mobsters shaking hands with politicians and journalists. The aforementioned cyberpunk setting is a stark reminder of the criticism of consumer society that has driven humans – cyborgs – to a constant urge to technically improve their bodies in order to maintain a competitive edge in this declining world. In a similar way, one can think of social media on our mobile phones, which can be seen as extensions of the human body. If individuals do not monitor the content disseminated through the media, they feel as if they are left out or as if they are missing out on something. The digital game – whether basic or DLC – is also criticising the big tech companies, which are able to do almost anything to increase their profits. In a similar vein, we can think, for example, of the relentless development of artificial intelligence, in which

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1 CD PROJEKT RED: *The Witcher (series)*. [digital game]. New York, NY, Warsaw : Atari, CD Projekt, 2007-2015.

2 CD PROJEKT RED: *Cyberpunk 2077*. [digital game]. Warsaw : CD Projekt, 2020.

3 JAKI, R., PONDSMITH, M. (Created by): *Cyberpunk: Edgerunners (series)*. [VOD]. Los Gatos, CA : Netflix, 2022.

companies such as Google, Microsoft and OpenAI are currently investing billions of dollars. Concerns about AI are also reflected in the narrative of the new DLC, which suggests in places that AI is controlling some phenomena in the universe. AI in game also ‘infects’ one of the unplayable characters, which also points to concerns about the implications of artificial intelligence development in the real world.

The main story of Phantom Liberty is spearheaded by the character of Solomon Reed, played by actor Idris Elba, and Johnny Silverhand, portrayed by Keanu Reeves, who has also returned. However, other characters that the player interacts with are also important, such as Songbird, Rosalind Myers or Kurt Hansen. The creators also put a lot of emphasis on dialogue. The way the different characters interact and how they are portrayed also adds to the authenticity of everything that happens on screen. While going through a new story revolving around saving more than one life, the player has the chance to bump into familiar faces from the base game, exchange a few words with them and find out what news they have. As a result, the player builds up a certain relationship with the non-playable characters, gets to know them and decides, for example, whether or not they like them, or identifies with them. Based on that, they can make decisions, which brings us to the third and very important part of the whole DLC.

It is the player who has control over the entire course of the game to a large extent (predetermined, of course, by the creators). As we mentioned, it's the player who decides who to trust and who not to trust, who to help, and how the entire story of the Phantom Liberty DLC will ultimately play out. In doing so, they are often faced with a controversy that could be simplified as follows: will they help the corrupt corporate system or the individual who rebels against it? Will they be a rebel and resist the system, or will they submit to the ‘fat cats’? The answer to this question is sought by the player themselves. Significant in this respect are the aforementioned dialogues and the free choice of replicas that allow for a deep experience of role-play. Compared to Bethesda Game Studios' singleplayer RPG *Starfield*<sup>4</sup>, which offers the player an open world to the point of essentially losing themselves in it, the Phantom Liberty DLC is a truly balanced experience. Its direction is determined by the player, albeit on a much smaller imaginary map of the playable world. On the figurative other pole stands, for example, a game from a slightly different genre, specifically a survival horror game – *Alan Wake 2*<sup>5</sup> by Remedy Entertainment, which could be seen as more of an interactive movie precisely because of the lack of choices.

In general, the DLC Phantom Liberty discusses existential themes and focuses on the search for the meaning of life in a chaotic world. The player, as the main character “V”, is faced with several complex dilemmas that will ultimately affect how the story ends – as the plot has multiple endings. Interestingly, there is no happy medium in the story of the expansion to appease each party depicted in this bittersweet story. In an attempt to please everyone, the freedom the protagonist so desires eventually slips through their fingers like a phantom.

## BIBLIOGRAPHY

BETHESDA GAME STUDIOS: *Starfield*. [digital game]. Rockville, MD : Bethesda Softworks, 2023.

CD PROJEKT RED: *Cyberpunk 2077*. [digital game]. Warsaw : CD Projekt, 2020.

CD PROJEKT RED: *The Witcher (series)*. [digital game]. New York, NY, Warsaw : Atari, CD Projekt, 2007-2015.

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4 BETHESDA GAME STUDIOS: *Starfield*. [digital game]. Rockville, MD : Bethesda Softworks, 2023.

5 REMEDY ENTERTAINMENT: *Alan Wake 2*. [digital game]. Cary, NC : Epic Games Publishing, 2023.

JAKI, R., PONDSMITH, M. (Created by): *Cyberpunk: Edgerunners (series)*. [VOD]. Los Gatos, CA : Netflix, 2022.

REMEDY ENTERTAINMENT: *Alan Wake 2*. [digital game]. Cary, NC : Epic Games Publishing, 2023.

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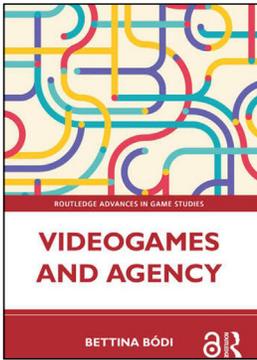
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## VIDEOGAMES AND AGENCY

BÓDI, B.: *Videogames and Agency*. London, New York, NY : Routledge, 2023. 226 p. ISBN 978-1-003-29878-6.

Michal Kabát

B. Bódi's *Videogames and Agency* emerges as a seminal work in the field of game studies, offering a profound exploration of how player actions are both afforded and restricted by game design. Its significance is rooted in a comprehensive approach that melds rigorous academic research with an accessible writing style, catering to a broad spectrum of readers, including scholars, students, and game designers. The book is notable for its synthesis of theoretical perspectives with practical insights from the gaming industry. The exploration of agency as an affordance, a concept deeply ingrained in the game developers' design ethos, bridges theoretical frameworks with real-world game design practices. This approach is pivotal in elucidating the intricate relationship between a game's production context, its design elements, and the resulting player agency.

The book offers a novel perspective on player freedom in digital games, a trend gaining prominence in the industry. It introduces a conceptual framework for understanding how designers articulate this freedom and reflect it in their design principles. B. Bódi delves into the dynamics of player agency, addressing crucial questions about the limitations and possibilities inherent in game design and their impact on the player's experience. Through case studies of both selected game titles, she illustrates a holistic approach that intertwines elements of game design, game studies, and game developer discourse, shedding light on the subtle facets of player agency and digital game aesthetics.

The Introduction sets the stage, underscoring the rapid technological advancements in the gaming industry and their influence on game design and player experiences. It references landmark titles such as *Microsoft Flight Simulator 2020*<sup>1</sup>, *The Legend of Zelda: Breath of the Wild*<sup>2</sup>, and other franchises like *The Witcher*<sup>3</sup>, *Assassin's Creed*<sup>4</sup>, and *Red Dead Redemption*<sup>5</sup>, illustrating the industry's shift toward more player agency. This evolution is also evident in newer iterations of long-established franchises, like *Call of Duty*<sup>6</sup> and *Metal Gear*<sup>7</sup>, which have adopted this paradigm shift. This context is crucial for comprehending the book's exploration of how designers conceive and implement player freedom in their games.

B. Bódi also addresses the interdisciplinary nature of game studies, emphasizing the significance of 'interactional expertise.' This term refers to the capacity to understand and discuss game design without being a practitioner. Leveraging this expertise, she offers

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- 1 ASOBO STUDIO: *Microsoft Flight Simulator 2020*. [digital game]. Redmond, WA : Xbox Game Studios, 2020.
  - 2 NINTENDO EPD: *The Legend of Zelda: Breath of the Wild*. [digital game]. Kyoto : Nintendo, 2017.
  - 3 CD PROJEKT RED: *The Witcher (series)*. [digital game]. Warsaw : CD Projekt, 2007-2016.
  - 4 UBISOFT MONTREAL et al.: *Assassin's Creed (series)*. [digital game]. Saint-Mandé : Ubisoft, 2007-2023.
  - 5 ROCKSTAR SAN DIEGO: *Red Dead Redemption (series)*. [digital game]. New York, NY : Rockstar Games, 2010-2018.
  - 6 INFINITY WARD et al.: *Call of Duty (series)*. [digital game]. Santa Monica, CA : Activision, 2003-2023.
  - 7 KONAMI: *Metal Gear (series)*. [digital game]. Tokyo, Redmond, WA : Konami, Microsoft Game Studios, 1987-2018.

incisive insights into game design from both theoretical and non-practical standpoints, effectively bridging different research clusters within game studies, including education, humanities, social sciences, and computer science. Her methodological approach is two-fold: paratextual analysis to determine game studios' design ethos and textual analysis to scrutinize how games afford and limit player action. This dual strategy is essential for grasping the broader technological, economic, and socio-cultural contexts influencing decisions about player agency. The book's exploration of paratextual materials, such as digital marketing, developer blogs, and official websites, yields a comprehensive understanding of the game design process and its influencing factors.

The first two chapters lay the theoretical foundation. First one surveys game design and game studies literature to articulate a concept of agency, identifying common themes and viewpoints. Second chapter presents author's theoretical approach, delineating the dimensions in which player agency manifests, such as agency in space and time, customization options, and narrative control. This framework is crucial for the subsequent case studies, offering a lens through which practical aspects of game design can be analysed and understood.

The remaining chapters of the book provide in-depth case studies of well-known game studios creating avatar-based digital games. Each case study provides a distinct perspective on agency dimensions and their interplay. An analysis of Naughty Dog's *Uncharted 4: A Thief's End*<sup>8</sup> underscores the significant degree of designer control over player action, challenging traditional notions of player agency. It delves into the studio's design history and the evolution of the platforming genre, offering insights into the constraints and affordances on player action and how cinematic design influences agency.

The exploration of BioWare's *Mass Effect: Andromeda*<sup>9</sup> presents a contrasting example, investigating how shifts in development teams, publishers, production pipelines, and technologies impact player agency. This study demonstrates how changes in a studio's design ethos and brand identity can significantly alter the player's experience and the game's design principles. It also argues that while Andromeda theoretically supports dramatic agency, it struggles to make emergent player stories feel eventful, ultimately failing to afford a high degree of dramatic agency.

The final case study examines System Era's *Astroneer*<sup>10</sup>, showcasing an alternative game design model and production context. As a title developed by former AAA developers who transitioned to independent game development, *Astroneer* represents a departure from the traditional AAA game design approach. This case study sheds light on the implications of independence in game development for player agency, particularly in the context of survival crafting sandbox games. The minimal constraints in such games make *Astroneer* a compelling example to conclude the book's exploration of player agency.

Overall, this book is a great contribution to game studies, offering a rich, multifaceted approach to the study of agency, examining its heuristic framework that distinguishes the spatial-explorative, temporal-ergodic, configurative-constructive, and narrative-dramatic dimensions of player action. B. Bódi's work stands out for its depth, clarity, and relevance, making it a must-read for anyone interested in the intricate relationship between game design, player interaction, and the evolving landscape of digital games. It could serve as starting point for researching a broader scale of titles and genres in order to fully understand the concept of player's freedom in games.

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8 NAUGHTY DOG: *Uncharted 4: A Thief's End*. [digital game]. San Mateo, CA : Sony Computer Entertainment, 2016.

9 BIOWARE: *Mass Effect: Andromeda*. [digital game]. Redwood City, CA : Electronic Arts, 2017.

10 SYSTEM ERA SOFTWARE: *Astroneer*. [digital game]. Seattle, WA : System Era Softworks, 2019.

## BIBLIOGRAPHY

- ASOBO STUDIO: *Microsoft Flight Simulator 2020*. [digital game]. Redmond, WA : Xbox Game Studios, 2020.
- BIOWARE: *Mass Effect: Andromeda*. [digital game]. Redwood City, CA : Electronic Arts, 2017.
- CD PROJEKT RED: *The Witcher (series)*. [digital game]. Warsaw : CD Projekt, 2007-2016.
- INFINITY WARD et al.: *Call of Duty (series)*. [digital game]. Santa Monica, CA : Activision, 2003-2023.
- KONAMI: *Metal Gear (series)*. [digital game]. Tokyo, Redmond, WA : Konami, Microsoft Game Studios, 1987-2018.
- NAUGHTY DOG: *Uncharted 4: A Thief's End*. [digital game]. San Mateo, CA : Sony Computer Entertainment, 2016.
- NINTENDO EPD: *The Legend of Zelda: Breath of the Wild*. [digital game]. Kyoto : Nintendo, 2017.
- ROCKSTAR SAN DIEGO: *Red Dead Redemption (series)*. [digital game]. New York, NY : Rockstar Games, 2010-2018.
- SYSTEM ERA SOFTWARES: *Astroneer*. [digital game]. Seattle, WA : System Era Softworks, 2019.
- UBISOFT MONTREAL et al.: *Assassin's Creed (series)*. [digital game]. Saint-Mandé : Ubisoft, 2007-2023.

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# Playing with Our Values: Using Digital Games to Undertake Ethical Examinations in the Classroom

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Matthew Kelly is an Associate Professor of English at the University of Texas at Tyler. His research focuses on the pedagogical dimensions of digital games and using game-based learning activities to help students engage in critical ethical inquiry. He also directs the Interactive Storytelling and Narrative Design program at his university, which is an interdisciplinary concentration that connects literature, creative writing, visual rhetoric, and computer science through the use of digital game design. He has published articles in journals such as *Simulation and Gaming*, *Games and Culture*, *Composition Forum*, and *College English*.

Scholars have praised digital games for their educational potential, noting games' ability to teach players multivalent problem-solving skills in a variety of disciplines.<sup>1</sup> Such research emphasizes the dynamic elements of gameplay experiences. For example, games can gradually increase levels of difficulty for players, which encourages them to progressively refine their gameplay strategies.<sup>2</sup> Additionally, the satisfaction of solving increasingly-complex problems provides intrinsic motivation to players, thereby inciting them to continue revising how they navigate in-game obstacles.<sup>3</sup> Experimenting with different ways to solve problems also shapes players' relationships to learning, allowing them to see failures as opportunities for exploring new ideas rather than seeing failures as indications of one's intellectual shortcomings.<sup>4</sup>

This research rests upon games' ability to habituate players into acting and thinking in deliberate ways.<sup>5</sup> In short, games create rules that prioritize certain actions and outcomes over others. Games then use feedback mechanisms to reinforce these rules and guide players towards ideal outcomes.<sup>6</sup> In doing so, games condition players to view gameplay scenarios through the perspective of a particular value system. Put differently, learning a game means learning to interpret situations through the values prioritized by a game's rules and, furthermore, learning which actions move one closer to the optimal results dictated by said values.<sup>7</sup> Scholars use a discourse of 'ethics' to unpack the significance of internalizing the values embedded within a game's rules.<sup>8</sup> In this work, 'ethics' denotes an interpretive framework that examines how individuals' lived experiences shape their worldview and inform the logic they use to rationalize their actions as personally beneficial and/or socially appropriate.<sup>9</sup> In applying this notion of ethics to games, we can say that analyzing the ethics of digital games means analyzing the ways in which games foster experiences that encourage players to uphold specific value systems (systems which govern the logic informing one's gameplay decisions) and inhabit unique perspectives within a virtual arena.<sup>10</sup>

Educators can design learning activities around games' ethical dimensions to help students explore the process through which individuals arrive at their respective worldviews and, furthermore, engage in productive forms of critical self-reflection.<sup>11</sup> For example,

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- 1 SQUIRE, K.: *Video Games and Learning: Teaching Participatory Culture in the Digital Age*. New York, NY : Teachers College Press, 2011, p. 15.
  - 2 HAMARI, J. et al.: Challenging Games Help Students Learn: An Empirical Study on Engagement, Flow and Immersion in Game-Based Learning. In *Computers in Human Behavior*, 2016, Vol. 54, No. 1, p. 172.
  - 3 ERHEL, S., JAMET, E.: Improving Instructions in Educational Computer Games: Exploring the Relations Between Goal Specificity, Flow Experience and Learning Outcomes. In *Computers in Human Behavior*, 2019, Vol. 91, No. 1, p. 108.; MARTI-PARRENO, J. et al.: Students' Attitude Towards the Use of Educational Video Games to Develop Competencies. In *Computers in Human Behavior*, 2018, Vol. 81, No. 1, p. 372.
  - 4 GEE, J.: *What Video Games Have to Teach Us about Learning and Literacy*. New York, NY : Palgrave MacMillan, 2004, p. 59.
  - 5 HOLMES, S.: *The Rhetoric of Video Games as Embodied Practice: Procedural Habits*. Philadelphia, PA : Routledge, 2017, p. 66.
  - 6 BOGOST, I.: *Persuasive Games: The Expressive Power of Video Games*. Cambridge, MA : The MIT Press, 2010, p. 47.
  - 7 KIRKPATRICK, G.: *Computer Games and the Social Imaginary*. Malden, MA : Polity Press, 2013, p. 28.
  - 8 SICART, M.: *The Ethics of Computer Games*. Cambridge, MA : The MIT Press, 2009, p. 4.; See also: COLBY, R., JOHNSON, M. S. S., COLBY, R. S. (eds.): *The Ethics of Playing, Researching, and Teaching Games in the Writing Classroom*. London : Palgrave Macmillan, 2021.
  - 9 SCHRIER, K.: Designing Role-Playing Video Games for Ethical Thinking. In *Education Technology Research and Development*, 2017, Vol. 65, No. 4, p. 832.; DECHERING, A., BAKKES, S.: Moral Engagement in Interactive Narrative Games: An Exploratory Study on Ethical Agency in the Walking Dead and Life Is Strange. In DAHLKOG, S. (ed.): *Proceedings of the 13th International Conference on the Foundations of Digital Games*. New York, NY : ACM, 2018, p. 3.
  - 10 SCHRIER, K.: Designing Games for Moral Learning and Knowledge-Building. In *Games and Culture*, 2019, Vol. 14, No. 4, p. 313.
  - 11 RYAN, M. et al.: Focus, Sensitivity, Judgement, Action: Four Lenses for Designing Morally Engaging Games. In *Transactions of the Digital Games Research Association*, 2017, Vol. 3, No. 2, p. 145.

students can play role-playing games and explain the rationale used when navigating morally-complex gameplay scenarios.<sup>12</sup> Students can then examine the overlap or fissures between their in-game reasoning and the logic they use when engaging with moral issues in the real world.<sup>13</sup> Such activities accomplish two goals: first, students can consider how personal experiences and external circumstances lead individuals to uphold value systems that may differ from their own.<sup>14</sup> Second, students can use their participation in alternative value systems to reflect upon and refine the logic underlying their real-world ethical obligations.<sup>15</sup> That is to say, engaging in a comparative analysis between one's in-game and real-world values provides an opportunity to identify latent priorities or biases in students' daily undertakings that may otherwise go unnoticed. Ultimately, game-based learning activities should encourage students to contemplate the experiences and circumstances that shape their personal value systems in hopes of refining the ethical logic they deploy when responding to difficult issues in their everyday lives.

## BIBLIOGRAPHY

BOGOST, I.: *Persuasive Games: The Expressive Power of Video Games*. Cambridge, MA : The MIT Press, 2010.

COLBY, R., JOHNSON, M. S. S., COLBY, R. S. (eds.): *The Ethics of Playing, Researching, and Teaching Games in the Writing Classroom*. London : Palgrave Macmillan, 2021.

CONSALVO, M. et al.: Playing a Better Me: How Players Rehearse Their Ethos via Moral Choices. In *Games and Culture*, 2019, Vol. 14, No. 3, p. 216-235. ISSN 1555-4120.

DECHERING, A., BAKKES, S.: Moral Engagement in Interactive Narrative Games: An Exploratory Study on Ethical Agency in the Walking Dead and Life Is Strange. In DAHLISKOG, S. (ed.): *Proceedings of the 13th International Conference on the Foundations of Digital Games*. New York, NY : ACM, 2018, p. 1-10.

ERHEL, S., JAMET, E.: Improving Instructions in Educational Computer Games: Exploring the Relations Between Goal Specificity, Flow Experience and Learning Outcomes. In *Computers in Human Behavior*, 2019, Vol. 91, No. 1, p. 106-114. ISSN 0747-5632.

GEE, J.: *What Video Games Have to Teach Us about Learning and Literacy*. New York, NY : Palgrave MacMillan, 2004.

HAMARI, J. et al.: Challenging Games Help Students Learn: An Empirical Study on Engagement, Flow and Immersion in Game-Based Learning. In *Computers in Human Behavior*, 2016, Vol. 54, No. 1, p. 170-179. ISSN 0747-5632.

HOLMES, S.: *The Rhetoric of Video Games as Embodied Practice: Procedural Habits*. Philadelphia, PA : Routledge, 2017.

ISBISTER, K.: *How Games Move Us: Emotion by Design*. Cambridge, MA : The MIT Press, 2016.

KELLY, M.: Playing with Perspective: Examining the Role of Ethos, Empathy, and Environmental Storytelling in Video Game-Based Writing Projects. In *College English*, 2022, Vol. 85, No. 2, p. 133-154. ISSN 0010-0994.

KIRKPATRICK, G.: *Computer Games and the Social Imaginary*. Malden, MA : Polity Press, 2013.

MARTI-PARRENO, J. et al.: Students' Attitude Towards the Use of Educational Video Games to Develop Competencies. In *Computers in Human Behavior*, 2018, Vol. 81, No. 1, p. 366-377. ISSN 0747-5632.

---

12 STEINKUEHLER, S., SIMKINS, D.: Critical Ethical Reasoning and Role-Play. In *Games and Culture*, 2008, Vol. 3, No. 3-4, p. 341.

13 KELLY, M.: Playing with Perspective: Examining the Role of Ethos, Empathy, and Environmental Storytelling in Video Game-Based Writing Projects. In *College English*, 2022, Vol. 85, No. 2, p. 139.

14 ISBISTER, K.: *How Games Move Us: Emotion by Design*. Cambridge, MA : The MIT Press, 2016, p. 28.

15 CONSALVO, M. et al.: Playing a Better Me: How Players Rehearse Their Ethos via Moral Choices. In *Games and Culture*, 2019, Vol. 14, No. 3, p. 228.

- RYAN, M. et al.: Focus, Sensitivity, Judgement, Action: Four Lenses for Designing Morally Engaging Games. In *Transactions of the Digital Games Research Association*, 2017, Vol. 3, No. 2, p. 143-173. ISSN 2328-9414.
- SCHRIER, K.: Designing Games for Moral Learning and Knowledge-Building. In *Games and Culture*, 2019, Vol. 14, No. 4, p. 306-343. ISSN 1555-4120.
- SCHRIER, K.: Designing Role-Playing Video Games for Ethical Thinking. In *Education Technology Research and Development*, 2017, Vol. 65, No. 4, p. 831-868. ISSN 1042-1629.
- SICART, M.: *The Ethics of Computer Games*. Cambridge, MA : The MIT Press, 2009.
- SQUIRE, K.: *Video Games and Learning: Teaching Participatory Culture in the Digital Age*. New York, NY : Teachers College Press, 2011.
- STEINKUEHLER, S., SIMKINS, D.: Critical Ethical Reasoning and Role-Play. In *Games and Culture*, 2008, Vol. 3, No. 3-4, p. 333-355. ISSN 1555-4120.

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Any fundamental changes to authorship of already submitted final texts (e.g. amendment of co-authors, change in the order of authors, copyright interests in the text) are liable to the prior consent of the Editorial Board. The authors or co-authors who have submitted the text for publication must ask for a change in the copyright data or modification of their order by sending a formal, written request to the following e-mail address: [actaludologica@fmk.sk](mailto:actaludologica@fmk.sk)

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# Guidelines

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Acta Ludologica accepts various kinds of academic writings – theoretical articles, theoretical articles combined with presentations of research results or research results including their implementation into practice as well as reviews of monographs or other publications, shorter news articles, essays and interviews with renowned game theorists, scholars and professionals., which have not been publicly published yet. Each received study will undergo a double-blind peer review process and the editorial board will decide whether to accept or reject the text for publication on the basis of the elaborated reviews. The Editorial Board may accept the text conditionally and require correction of the text by the author(s) according to the remarks or suggestions of the reviewers. All manuscripts must be written in **English**. The journal consists of the following sections:

- **Game Studies:** theoretical articles in the extent of 21,600-54,000 characters (12-30 author pages); research results and their practical implementation in the extent of 12,600-54,000 characters (7-30 author pages);
- **Interview:** interviews with people, whose contribution is important to the development of game studies and the digital game sector (scholars and scientists of games studies and related fields, game developers, professionals of the gaming sector, game events organizers, etc.), to the extent of 5,400-18,000 characters (3-10 author pages);
- **Reviews:** reviews of monographs and textbooks from the fields of digital games and game studies, which are not older than one year, in the extent of 5,400-9,000 characters (3-5 author pages); reviews of digital games based on specific context of theoretical or research framework, in the extent of 5,400-9,000 characters (3-5 author pages);
- **Add-ons:** short-ranged scientific, philosophical and artistic reflections on phenomena of the comprehensive game world in the extent of 3,600 characters (1-2 author pages).

**Text format** (unless specified otherwise in brackets below):

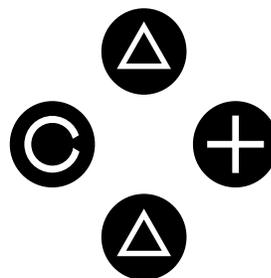
- Microsoft Word text editor;
- Font type: Times New Roman;
- Font size: 12 pt;
- Alignment: justified;
- Spacing: 1;
- All margins: 2.5 cm;
- Do not divide words;
- Quotations and referenced passages: use numbered footnotes on the relevant page (not at the end of the manuscript).

**Content arrangement of the manuscript:**

- Title of the text in English (16 pt, **bold**, align centre);
- Name(s) and surname(s) of the author(s) (14 pt, align centre);
- Abstract in English – from 150 to 200 words (10 pt);
- Key words in English (10 pt);
- Titles of individual chapters (14 pt, **bold**);
- For Bibliography format, see the citation rules on the journal's web page;
- Contact data (name(s) and surname(s) of the author(s) with full academic degrees, full address of the affiliated institution, e-mail, short bio and portrait photo of the author(s).

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