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Monetized Gameplay: Analyzing Commodification in Rainbow Six Siege

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Monetized Gameplay: Analyzing Commodification in *Rainbow Six Siege*

by

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Abstract

Game studies scholars have had growing concerns over the last decade about monetization strategies in video games. This major research paper expands on this conversation by analyzing monetization in the case of Ubisoft's *Rainbow Six*. The paper explores different commodification strategies such as platformization, assetization, gambification, and data extraction as well as monetization devices such as the battle pass and loot box. By applying elements of the app-walkthrough method to *Rainbow Six Siege*, this project concludes that previous efforts to regulate monetization in video games ought to recognize monetization systems' deep integration with gameplay. Monetization strategies, I argue, overlap with and shape gameplay. Moreover, rather than approach them as separate, I suggest that monetization and gameplay are mutually constituted. The paper draws on game news sources to support the analysis of monetization systems. Ultimately, this MRP reveals: 1) that gambification is not a discrete practice that only exists in the *Rainbow Six Siege*'s menus, but is embedded throughout the game; 2) that keeping the player engaged allows for data capital to keep being extracted; and 3) that *Rainbow Six Siege* places the onus of responsibility on the player and makes monetization seem as if it is a gift.

Keywords: monetization, battle pass, loot boxes, gambification, platformization, data capital, video games

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Finally, I want to thank those close to me in my life. I'd like to thank my mother for her never-ending support and my father who made the same joke about communications every time I mispronounced a word. I'd like to thank my master's cohort for sticking together throughout the year. And of course, I'd like to thank my partner Jenna who was always there for me and provided me with endless emotional support.

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Introduction

In 2022, game developer and publisher Blizzard released *Diablo Immortal* for mobile devices. The game generated controversy because of its predatory monetization, its failure to meet the standards of its predecessors, and the fact that it was a mobile game rather than a PC/console release, leading the game to having the lowest user score of the year on Metacritic (Jiang, 2022). Journalist Kazuma Hashimoto (2022) described the game's monetization strategies as a "sinister take on some of the most predatory practices within the industry". Its monetization methods were criticized for making the game feel less fun as progress was tied to how much money a player was willing to spend (Welsh, 2022). Distaste for monetization is not new. Consider for example, critiques of loot boxes in games (Alexandra, 2017; Burns, 2017; Miller, 2017) or, of endless grinding to unlock content (Beckhelling, 2021; McWhertor, 2022). Despite these criticisms, *Diablo Immortal* ended up making around \$50 million in its first month, with over ten million downloads (Zwiezen, 2022). How is it that games critiqued for having unlikeable monetization systems continue to be commercially successful? What is the relationship between gameplay and a game's monetization techniques?

This paper explores these questions by applying elements of the app-walkthrough approach to Ubisoft's competitive first-person shooter *Rainbow Six Siege*. *Rainbow Six Siege* is an exemplar case because it contains many different methods of monetization. This paper's main argument is that we should not separate the discussion of monetization systems and gameplay: monetization not only shapes gameplay – the two dimensions are intertwined, coextensive, and designed together. This MRP concludes that efforts to regulate in-game monetization need to be based on a recognition of monetization as not a discrete component of a game but thoroughly embedded in game design and gameplay. My research reveals how monetization operates in

Rainbow Six Siege by walking through *Siege*'s menus, gameplay, and Terms of Service (TOS), among other game elements. Guiding my walkthrough is this overarching question: How do monetization strategies merge with and shape gameplay in live-service games such as *Rainbow Six Siege*?

This paper expands upon previous game studies scholarship on monetization through a case study of multiple monetization strategies in *Rainbow Six Siege*. The paper looks at commodification devices such as loot boxes or battle passes and analyzes them using with the support of game scholarship, game news journalism, and the data generated by my app-walkthrough. This major research paper has implications for the regulation of monetization in video games.

The MRP is organized in four main sections. My literature review outlines monetization strategies such as platformization, assestization, gambification, and data capital. The literature review also addresses the design of microtransactions. Next, I outline my methodology, which is a partial and modified app-walkthrough (Light et al., 2018) that also integrates elements of Consalvo and Dutton's (2006) game analysis framework to provide a game-focused version of the app-walkthrough. The methods section also outlines how I gathered game news sources. In the next section, the environment of expected use is discussed to build a basis for what Ubisoft's intentions for *Siege* are. I go on to show how data capital is used in *Rainbow Six Siege*, the implications of loot boxes being intertwined with gameplay, and how Ubisoft creates a particular relationship with the player to further commodification. It analyzes some of the specific systems in place such as *Siege*'s store, the battle pass, and loot boxes. This paper concludes by arguing that regulating in-game monetization requires understanding monetization not as a discrete game component but thoroughly intertwined with gameplay and game design.

Literature Review

In the field of game studies, one of the recent areas of interest is monetization within “live service” games (Bernevega and Gekker, 2021; Nieborg, 2014 Zanesco et al., 2020). Broadly, monetization can be understood as “how developers generate revenue from its users” (Perks, 2021, p. 218). Game studies scholars are concerned with the many ways that monetization is realized and what its implications are for gaming culture. The literature that I reviewed outlines what makes a game “live service” and identifies three specific monetization strategies within such games: platformization, assetization, and gambification. In addition to helping us understand how these strategies function, the literature that I reviewed connects monetization to the concept of capital. Research on monetization in game development is also explored, focusing on the production and consumption of monetization techniques. While enjoyment can be found in live service games, it is necessary to analyze monetization strategies to understand why they exist and what their implications are. This paper will mobilize the concepts discussed in my literature review to analyze the monetization strategies present in *Rainbow Six Siege* and where these strategies merge with and shape gameplay.

Platformization

Platformization is one of the main commodification strategies featured in the reviewed literature. In their article “The platformization of cultural production”, David Nieborg and Thomas Poell (2018) outline what platformization is by combining methods from business studies, political economy, and software studies to create a compact definition. They define platformization as “the penetration of economic, governmental, and infrastructural extensions of digital platforms into the web and app ecosystems, fundamentally affecting the operations of the cultural industries” (Nieborg and Poell, 2018, p. 4276). In simpler terms, platformization is a process

through which companies have begun to use their technological infrastructure and online services to generate and organize a digital marketplace. Examples of platformization in the games industry include game consoles' dominance in the game market, and free-to-play games that provide constantly updated content to sustain monetization (Nieborg and Poell, 2018). This ultimately leads to companies profiting which allows them to reinvest that profit to expand the governmental systems and infrastructure that controls said platform.

Platformization is used to analyze games in Daniel Joseph's work on Electronic Arts' (EA's) video game *Apex Legends*. Joseph (2021) focuses on the "battle pass" which is a monetization technique that has players pay a small fee (usually around \$10) to unlock in-game rewards as they play through a game's season (Joseph, 2021; Macey and Hamari, 2022; Zanescuand et al., 2021). This form of "microtransaction" differs from previous monetization models as players no longer purchase individual items or packs (Nieborg, 2014). Instead, players purchase the right to unlock items through playing the game. When players purchase this right-to-play, they are not purchasing a product. As Joseph (2021) reveals, the TOS for *Apex Legends* classifies each purchase as a form of a service, meaning that one does not truly purchase any digital product, in the sense of a transfer of ownership, when you buy a skin (p. 77). The TOS makes it so one does not own anything in the game, or the game itself. This establishes *Apex Legends* as a platform which allows users to access a variety of services and features such as cosmetics, multiple game modes, support from employees, and communication methods (Joseph, 2021; Nieborg and Poell, 2018). This also means that the service is not free for someone to modify and can only be used under EA's and (in the case of Joseph's article since their platform of choice was the PlayStation 4) Sony's controls. The lack of ability to modify is a consequence of platformization as companies retain control over the digital markets they create. The game is

designed around this premise of the game serving as a hub for commodification, and this can be seen in the fact that every menu screen is a screen to buy cosmetics. As Joseph remarks, “*if you are not playing Apex Legends, you are shopping in Apex Legends*” (p. 80). An in-game microtransaction thus is not as simple as buying an item from a store; it is interconnected with TOS agreements and platform design which complicates what it means to sell a product (Joseph, 2021; Nieborg and Poell, 2018). For Joseph (2021) the battle pass is designed to keep players interacting with the many game menus to sell more items to players (p. 81). This shows how platformization transforms games into a service with monetization systems, like the battle pass used to make players look at other services (i.e., the many menus selling different items in the game) to buy more services (i.e., cosmetics).

Several consequences arise in producing games that function as a service. Thomas Poell, David Nieborg, and Brooke Erin Duffy (2022) examine platformization as they outline how platforms have changed internal corporate organization, which can lead to precarity for platform-based labour. For example, the authors explain that when video streaming service Vine “shut down abruptly in 2017, legions of Vine stars struggled to transition their audience and migrate to new platforms; others seemed to simply perish” (p. 126). Many who make a living creating content on a specific platform can abruptly find themselves out of a job if the platform shuts down. Whether it is through e-sports, streaming, or video production, there are many people who depend on creating content for platform-based games. At any given second that could disappear.

It is difficult to resist the companies that exercise control over platforms. As Poell et al. (2022) point out:

By controlling access to the means of distribution, platform companies have largely replaced legacy gatekeepers such as physical retailers ... This points to the infrastructural and governmental affordances of platforms, which not only enable

platform-based cultural production, but also steer creative expression in accordance with the techno commercial objectives of platforms. (p. 138)

What Poell et al. (2022) argue here is that one of the byproducts of platformization is the control companies get over these markets. These companies get to not just sell their services, but also create systems around these services which lead users to interact with them in the ways developers intend them to. The data that is created during governance allows for these platforms to expand which leads to governance of a larger scale (Joseph, 2021; Poell et al., 2022).

An example of governance strategies in platformization is represented in Sian Tomkinson and Benn Van Den Ende's (2022) article discussing 2016's team-based first-person shooter *Overwatch*, which focuses on the governance systems in place to compel players to "act nice". The game contains an anti-toxicity system that is used to regulate players into interacting with other gamers in what the development team considers a respectful manner. One way this occurs in game is after a match finishes, players are encouraged to give awards to fellow teammates if they showed "sportsmanship", were a "good teammate", or a "shot caller". However, as pointed out in Tomkinson and Van Den Ende's (2022) Foucauldian analysis, a player can also be reported which can lead to punishment based on what the data collection suggests a player has done (punishment could be something small like a temporary chat ban, or large, such as a permanent ban). Ultimately, "the endorsement system is a way of establishing and enforcing the norms laid out in the code of conduct document" (Tomkinson and Van Den Ende, 2022, p.210). Similar to what Poell et al. (2022) argue, platformization is coextensive with governance strategies which lead users to act in developer-intended ways or risk punishment from the service provider.

Assetization

The assetization of games is another monetization strategy explored in the literature. Assetization is defined by Birch (2015) as “the transformation of things into resources which generate income without a sale” (p. 122). In the context of games, this means that the service itself is profitable even without microtransactions like the battle pass. For Sadowski (2020), assetization can be understood as a form of digital renting from a digital landlord. He writes:

The rapid rise of the “X-as-a-service” business model across nearly all sectors of the economy is creating rentier relations by another name. This model relies on the platform latching onto and inserting itself into the production, circulation, or consumption process, thus becoming a (necessary) intermediary. The platform, due to its control over access to the “condition or means of production”, can then capture rents from all economic activity it mediates (Harvey 2006:73). However, rather than seeing the operations of these platforms as a disruption of what exists (as techno-boosters frame it) or regression to a feudal era (as critics frame it), they should be understood more as an evolution and expansion of rentier capitalism. (p. 575-576)

Sadowski outlines three mechanisms of platform rentierism. First is data extraction, which occurs through both data rent and monetary rent. Data rent is the transformation of data into capital. The systems to accumulate data in live service games are there from day one of a game’s launch; no further purchases or modifications need to be made to this system (Sadowski, 2020, p. 576). Monetary rent is created from purchases from within the app/game. What occurs in both cases is that players in games are paying a fee (whether that fee is monetary or through data) to continue using the services internet landlords provide (Sadowski, 2020, p. 564). In the context of games, this could be something such as the battle pass, which “can be viewed as a form of economic rent because it is purchased regularly to access the fuller or quicker game experience, consisting of a stream of additional reward” (Bernevega and Gekker, 2021, p. 56).

Sadowski’s (2020) second mechanic is digital enclosure, which can be understood as the software licensing of services “which allows the new rentiers to claim ownership over the

software embedded in, and data emanating from, increasingly more physical things that we use in our daily lives” (p. 572). Within games this refers to the TOS that must be signed before playing any game as a service style game. This can have implications such as control over one being allowed to play (Tomkinson and Van Den Ende, 2022), not owning anything one purchases (Joseph, 2021), and forfeiting one’s data to use the service (Bernevega and Gekker, 2021). Ultimately, the lack of ownership furthers the idea that players are renting when they play a “live service game”.

Finally, Sadowski (2020) outlines capital convergence in which “digital platforms and real estate are combining in ways that have major implications for the exchange and management of property” (p. 576). Examples of this include the “automated landlord” in which rent is accumulated without input from the landlord ever needing to be accomplished (p. 574). In terms of games, Alexander Bernevega and Alex Gekker (2021) apply the works of Sadowski to show that the accumulation of data has created a system in which games can continually profit while no work is done on creating the product itself: “even players who do not spend a dime in those games pay the rent for accessing them with their quantifiable traits and/or actions” (p. 63). By continuing to play the game, rent accumulation still occurs without the gamer having to spend a penny.

Gamblification

Gamblification is the third monetization strategy discussed in the literature. Joseph Macey and Juho Hamari (2022) define gamblification as:

The (increased) presence of gambling (or gambling-related content) in non-gambling contexts to realise desired outcomes. It incorporates two main aspects: affective (employing cultural values/signifiers of gambling); and effective, (employing gambling games and activities). (p 10)

In free-to-play games, gamblification can function in a multitude of ways. In some cases, gamblification bluntly resembles gambling, such as the *Grand Theft Auto Online* casino, which offer players no way to cash out their chips, thus creating a gamified version of gambling (Macey and Hamari, 2022, p. 12).

In other cases, gamblification is more subtle. For example, Andrei Zanescu et al. (2020) analyze Valve's MOBA (multiplayer online battle arena) game *Dota 2*, which allows for players to gamble in a variety of ways (i.e., fantasy brackets and match-betting) once they have purchased the battle pass. However, their betting only generates battle pass points. These points can be used to purchase some cosmetics directly, but if players want "marketable skins", they must either play roulette or purchase a randomized "treasure" which contains one of many cosmetics. This treasure system is referred to in other games as the "loot box" system. After gambling on fantasy brackets and unlocking treasures to earn a cosmetic, these cosmetics can be sold on the Steam Market (or through secondary markets) to turn the skins into real money – a new layer of commodification. Zanescu et al. (2020) show that gamblification systems exist to complicate or blur when one is gaming and when one is gambling: "*DOTA 2* should be thought of as a hypercomplex rhetoric-laden, hybrid gambling, labor and play system that hails players toward ubiquitous and habituated consumption" (p. 2898). From this perspective, gambling in *Dota 2* is more than gambling with loot boxes; it is a complicated system intertwined with the game's mechanics (Thorhauge, and Nielsen, 2021; Zanescu and et al., 2020). For example, by intertwining *The International* (*Dota 2*'s biggest competitive event of the year) with the battle pass it creates a game mechanic out of gambling on *The International*. This serves to get players involved by allowing them to bet in-game, watch events, and keep track of player brackets (Zanescu, French, and Lajeunesse, 2020, p. 2893).

A similar system to *Dota 2*'s is explored by Anne Thorhauge, and Rune Nielsen (2021) in their comparison of the games *Fortnite* and *Counter Strike: Global Offensive*, online shooters with a myriad of microtransactions. They compare each game's gamblification systems; In *Fortnite* "skins exist only in the game and cannot be accessed through Epic Launcher or Epic Store" (Thorhauge, and Nielsen, 2021, p. 59), whereas *Counter Strike*'s "skins exist both in the inventory in the game and in the inventory of the Steam platform. In the game, skins only have cosmetic use value, but on Steam, they have trade and selling value" (p. 59). For *Counter Strike*, this means the game creates a near unregulated market from which Valve directly profits because the company takes a fraction of each sale (Thorhauge, and Nielsen, 2021, p. 63). *Counter Strike*'s systems turns users into "micro-entrepreneurs" as they speculate on and invest in certain skins (Thorhauge and Nielsen, 2021, p. 64). In contrast, *Fortnite*'s system creates a market controlled by the developers which no one can interact with or legally profit from. Epic is the only party allowed to sell items on the marketplace and once an item is purchased, it cannot be traded.

A theme in the reviewed literature is the blurriness of what counts as gambling (Macey and Hamari, 2022; Perks, 2021; Whitson and French, 2021; Zanescuand et al., 2020). Jennifer Whitson and Martin French (2021) delve into the ways game publishers circumvent gambling regulation through gamblification strategies. According to Whitson and French, one of the ways companies do this is by arguing that earning random rewards in gamblified games is ultimately skill based. At the same time, developers will hide aspects of gambling within the game's design such as not revealing the odds of win-percentages for items such as loot boxes: "the (re)introduction of chance and wagering into games of all kinds has been smoothed by informational infrastructures where time-on-device = data =profit, allowing players to

disassociate from spending ‘real’ currency” (Whitson and French, 2021, p. 27). This blurriness has led free-to-play games to not be classified as gambling due to how loot boxes and other gamblified systems have been labeled. This grey area is achieved “as all kinds of play become ‘gamblified’ and online gambling spaces are increasingly operated by corporate, rather than state, actors” (Whitson and French, 2021, p. 27). Without any proper regulation, this ultimately leads to the coercion of players via the data that is created (Perks, 2021; Whitson and French, 2021). Play data can be used to make any given game’s gambling systems more efficient (Whitson and French, 2021).

Whitson and French (2021) argue that online games function as a form of biopower, describing “the numerous and myriad techniques through which games shape individual bodies and control aggregated populations in ways oriented toward productivity” (p. 22). Games like *Pokémon Go* create productive play out of gamblification to increase the app time of users and thus create more data and more monetary potential (Whitson and French, 2021, p. 26-27).

Matthew Perks (2021) focuses on the regulation of loot boxes and other monetization strategies. Regulation of gamblification is rarely implemented by law makers and instead is blamed on consumers, journalists, and lack of company self-regulation (Perk, 2021). However, while state regulation can prove useful, Perks (2021) finds that “other forms of regulation may be more successful, and arguably have been when examining how video game companies continue to respond to pressure, resulting in transformation within industries” (p. 228). Other scholars argue that there is insufficient state regulation of gambling elements in games (Macey and Hamari, 2022; Whitson and French, 2021; Zanescu et al.,2020). Whitson and French (2022) argue that we should start “decentering individually focused responsabilization initiatives, which are deeply problematic due to their medicolegal framing of addiction as a disease” (p.28).

Zanescu et al. (2020) argue that loot boxes are like slot machines, yet they avoid regulation due to their categorization (p. 2888-2889). This leads to consumers being blamed for gambling habits because there are no government actors regulating loot boxes.

Data/Game Capital

So far this literature review has focused on three commodification strategies: platformization, assetization, and gamblification. This subsection builds on the previous discussion by considering contributions to the literature that address other intersections of games and capital. By capital, I broadly follow Marx's account: "The value [of money] originally advanced, therefore, not only remains intact while in circulation but increases its magnitude, adds to itself a surplus-value, or is valorised. And this movement converts it into capital" (Marx, 1990, p. 252). Capital is a key feature of the three aforementioned commodification strategies as their goal is to create surplus value or profit (Joseph, 2021; Nieborg and Poell, 2018). While less obvious than some of the previously discussed monetization methods, the reviewed literature also addresses the concept of "data capital" (Sadowski, 2019).

Several authors have pointed to data as a key site of capital accumulation, as information about users and their digital activity is turned into data (Fuchs, 2014). In the article "When Data is Capital," Sadowski (2019) applies the work of Pierre Bourdieu to understand capital has multiple interlocking dimensions. Bourdieu (1986) expanded upon Marx's theory of capital by arguing that two other ostensibly non-economic forms of capital exist. Firstly, "cultural capital" (Bourdieu, 1986). Cultural capital is based on in and expressed through education level, taste in visual art, or collection of records, for example. Secondly, Bourdieu (1986) argued that one could gain social capital, which encompasses institutional relationships and networks formed

through groups such as fraternities or exclusive clubs through which advantages may be obtained.

Sadowski (2019) views data as another form of capital as it is not just a way to increase economic capital (although that is also important for Sadowski) but also is a way to expand relations, infrastructure, and governance: “Data capital is institutionalized in the information infrastructure of collecting, storing, and processing data; that is, the smart devices, online platforms, data analytics, network cables, and server farms” (p. 4). Sadowski outlines six different ways value is created through data production. Firstly, they argue that data is used to target individuals to gain specific data from them and to categorize them in a variety of ways, such as their economic status or to see what types of people are susceptible to different political messages (Sadowski, 2019). This feature of data capital can be seen in games as data is used to target individuals in specific ways whether that is to increase app time of certain individuals (Whitson and French, 2021) or figuring out what cosmetics will appeal to certain individuals (Joseph, 2021).

Sadowski (2019) also argues that “data is used to optimise systems. Processes can become more efficient by analysing data that reveals how to eliminate waste, improve productivity, and do more with less” (p. 5). Data is also used as a form of governance (Sadowski, 2019). An example discussed in the literature includes *Overwatch*'s endorsement system which “is a way of establishing and enforcing the norms laid out in the code of conduct document” (Tomkinson and Van Den Ende, 2022, p.210). Data is also used to create “probabilities” to estimate the likelihood of certain events (Sadowski, 2019, p. 6). In short, developers will “use collected data to profile and channel player behavior toward consumption” (Whitson and French, 2021, p. 28).

Furthermore, data is used to “build stuff” which will create more data. As Sadowski (2019) writes: “Digital systems and services are often built on data. They require data to operate, they use existing stores of data, and they collect new streams of data” (p. 6). Finally, the last way data capital is accumulated, according to Sadowski (2019) is through the value of assets as smart technologies keep accumulating data even after the physical asset has lost value. For Sadowski (2019), once data is collected it can be sold any number of times. In the context of games, nothing new needs to be created as the game keeps generating data (Bernevega and Gekker, 2021; Sadowski, 2020).

When talking about capital and games, it is also important to bring up Mia Consalvo’s (2007) work *Cheating: Gaining Advantage in Video Games*. Consalvo (2007) defines a different type of capital, gaming capital:

As a form of currency gaming capital is highly flexible, able to adapt to different types of gameplay, various games, and changing notions of what’s important to know about games. Players can accumulate various forms of gaming capital not only from playing games but also from the paratextual industries that support them. And depending on a player’s social circle, that capital can be quite valuable in building a reputation. (p. 184)

Gaming capital is a combination of both economic and gaming knowledge. Importantly for this paper, gaming capital has a direct connection to economic capital. Consalvo (2007) points out that when real-world money coexists with in-game currencies, tensions arise surrounding the legitimacy of one’s gaming status. However, a player’s legitimacy towards earning game capital is not questioned because it is not connected to game progress; “the use of economic means to progress ultimately only impacts the player themselves rather than potentially adversely affecting the progress of other players around them” (Evans, 2016, p. 574).

Another way of reading gaming capital is through a Foucauldian lens which views gaming capital as an offshoot of biopower. Whitson and French (2021) argue that in developing gaming capital for oneself through participation in gaming communities, developers feed on this gaming capital which help creates systems which can “shape individual bodies and control aggregated populations in ways oriented toward productivity” (Whitson and French, 2021, p. 22). An example of this is the consumption of in-game cosmetics which can function “as a symbolic form of gaming capital” (Jarrett, 2021, p. 113) since cosmetics hold meaning amongst gamers.

The Production of Microtransactions

In these final two subsections, I hope to shed light on two areas of tension in game studies surrounding monetization. The first is the production of microtransactions and the questions that arise from creating a microtransaction. The second is how gamers consume microtransactions, particularly how they are guided to make in-game purchases.

One under-researched area of game studies is the production of video games themselves (Roessel and Švelch, 2021). Specifically, there is a lack of research surrounding how microtransactions are created/negotiated within the game development process. Scholars Lies van Roessel and Jan Švelch outline why this gap exists, as well as the roles of those who create microtransactions. Roessel and Švelch (2021) point out how microtransaction production is hidden within the industry and is often an uncredited part of a developer’s role that is simply “accepted” (p. 209). However, sometimes “data suggests that monetization experts as a specific role more often appear in larger studios, such as Electronic Arts, Ubisoft, or Goodgame Studios” (Roessel and Švelch, 2021, p. 206). This means that while monetization is important for any

free-to-play game, being able to afford someone who governs monetization is often limited to studios with larger budgets.

Those in these positions not only need to be game developers, but also are required to understand microtransaction trends, as well as have general data analytics skills (Roessel and Švelch, 2021, p. 208). What is interesting however is that in the context of the games themselves (as opposed to the job boards Roessel and Švelch's data came from), "only 2 out of the 57 (4 per cent) of freemium games provide any information about roles directly related to monetization expertise" (Roessel and Švelch, 2021, p. 209). Many freemium games do not include credits, although some do and still exclude this position from their credits. In comparison, premium games featured about half of the monetization roles listed in their credits (Roessel and Švelch, 2021, p. 209). While it is a lot more visible in premium games, it is still unknown why such an important position is so hidden amongst those who are credited.

Karlsen (2021) interviewed freemium, indie, and premium game developers about the ethics of game development and microtransactions. Despite how commercially successful companies such as Electronic Arts have been, smaller companies have had to worry if they could compete in this market. Freemium and indie companies both are concerned about how they might compete in the current market against thousands of other titles, and without the same monetization systems a free-to-play game might have (Karlsen, 2021, p. 645-646). There is constant pressure from the industry to conform to industry norms to increase profit, but the developers have moral obligations against (certain) microtransactions that prevents that. There is also a tension between artistic freedom and commodification as these developers put game quality first and foremost before everything else (Karlsen, 2021).

On the other hand, the freemium company may not ethically care about microtransactions in the same way but have similar struggles in terms of not creating as much income as would be expected from the freemium business (Karlsen, 2021, p. 646). Having a game be free-to-play with these monetized systems does not mean it is set to succeed. Unlike the indie and premium companies, artistic freedom is not as important as creating “production quality” for the freemium company (Karlsen, 2021, p. 647). This means creating a sound and functional product, rather than an expressive one. This relates to the themes of embracing microtransactions with a lack of ethical concern.

This leads to the idea that the production of microtransactions ultimately affects how one plays a game. Whitson (2019) argues that game production has not been democratized during the “indie” era but has instead served to make work unsustainable for many developers (p. 797). This is because while more people can make a game with the tools available, key resources can remain scarce in smaller studios. This can include financial resources such as software fees or data itself, or it can be human resources and development teams. There are also many inequalities that stem from working within the tech industry: “Access to financial resources is limited to those who are already privileged and, in a position, to leverage personal contacts and business acumen to access ‘boys’ club’ insider funding networks” (Whitson, 2019, p. 795). There’s also risk in distributing free-to-play games. Since they are free, while thousands might play it, there is the risk of not much money coming in as the right market has not been targeted, in which case developers may only “see-pennies” coming in (Whitson, 2019, p. 796). This can lead to games being designed in a certain way, as free-to-play systems set limits on how a game can be designed.

The Consumption of Microtransactions

It is important to also consider how individuals and groups consume video games, specifically, how they enter microtransactions. As Johnson (2019) argues, “in most writing about video games, whether within or beyond the academy, the *availability* of gaming media is implicitly taken for granted” (p. 869). This means that how games are consumed and the relation we have to them as a commodity is often undervalued in the study of games. Johnson (2019) claims that games have two forms of value, a “gaming-value” (gameplay) and a “culture-value,” where the latter is “the extrinsic meanings and associations related to the game, such as preferences for that particular series, game developer or designer or studio” (p. 870). It is not just how one plays the game itself, but how one aligns themselves with the purchase of said game, whether that is the game itself or the microtransactions within it. Often gamers will make different rationalizations of spending money on games such as the bonuses that might come with a certain purchase or the amount of time one might spend with a game to justify the purchase (Evans, 2016; Johnson, 2019). This is the act of players making their own culture-value.

Another way microtransaction consumption creates meaning for consumers is through its comparison to other perceived “less fair” systems. Jarret (2021) outlines how Riot Games’ MOBA *League of Legends* has been able to frame its free to play economy as “fair” through an affective approach which makes the game seem as if it is a gift to the player (p. 113-114).

League of Legends players are described by Jarret as if they are donating to Riot Games and that cosmetics exist out of the developers’ kindness. This, and the fact this system can be compared to other “less fair” free-to-play systems, means that *League of Legends* will receive praise with an equally heavily monetized game system. As Joseph (2021) writes, “it is not uncommon for developers to spend quite a lot of time in their community communications reassuring players

that in-game content will not be ‘pay-to-win’” (p. 74). By building relationships with the community, developers can change how a microtransaction sale is perceived.

Another important way gamers choose to make in-game purchases is through the opportunity to express themselves. Harvey (2018) proposes the “invest/express” genre framework in an article on *Kim Kardashian: Hollywood*: “In this type of game, play is premised on player customization and personalization of the game world (the Express element) through successful management of time both within and outside this game world as well as strategic investment of attentional and financial capital (the Invest element)” (p. 654). It is free-to-play systems such as gatekeeping content and cosmetics via microtransactions that allows for this framework. Players are asked to customize their character and game world which is done through a balance of investing time into the game, as well as investing money into the game (to save time). One’s consumption is based on a tension surrounding how much players are willing to invest in the game. These elements help shape the narrative of the game, which in the case of *Kim Kardashian: Hollywood*, is a world “where women face no barriers to reaching the top should they work hard enough” (p. 666) so long as one has the capital. Players shape their own narrative as they either invest into the game and rise to the top or grind their way without spending money on the game.

The goal of this literature review was to outline ways in which commodification is facilitated and expanded within live-service systems, and the production and consumption of microtransactions. By examining monetization systems, the literature review has revealed how revenue is generated in unexpected ways. The section on capital exposes how capital is not only economic, but also consists of data and cultural knowledge. Focusing on the production and consumption of games also shows that monetization is not simply added to the game, but is

carefully considered to mobilize affective responses. In dealing with this literature, some gaps need to be addressed. Firstly, some microtransaction techniques lack sufficient research. Specifically, the battle pass system is relatively new and has received limited research attention. Secondly, *Rainbow Six Siege* is an under-researched game. Despite being one of the most popular games on Steam¹, there is a dearth of research on this game in game studies. The next section will discuss this paper's methods for analyzing monetization in *Rainbow Six Siege*.

Research Methods

This paper will investigate how *Rainbow Six Siege*'s commodification strategies manifest and function within gameplay. Through this case study, I will reveal monetization techniques which are either normalized or are often not interpreted as related to monetization. To substantiate the claims about commodification with *Rainbow Six Siege*, the main method of this paper is the app-walkthrough. I collected 15 hours of footage of my game time, which includes gameplay footage, menu walkthroughs, store analysis, and reading the TOS. My secondary source is gaming news articles, which will be drawn upon to support the claims made in the app-walkthrough section. Seventy relevant articles were collected.

Rainbow Six Siege

Rainbow Six Siege is a popular competitive multiplayer first-person shooter akin to *Counter Strike: Global Offensive* or *Valorant*. The game was developed by Ubisoft's Montreal studio, and it has been getting seasonal updates for almost eight years now (Ubisoft, 2022). The game is segmented into four-nine rounds (first to win four unless the score becomes three-three in which it is first to win five) in which players have about three minutes to complete their objective. In

¹ According to Steam (2022) *Rainbow Six Siege* is the 34th most popular game on Steam with 38070 active players. However, these numbers fluctuate as the game becomes more popular during new seasons and lessens in popularity when new games come out. At its peak, it saw 199,830 players on Steam alone.

Rainbow Six Siege's main mode, one plays as one of 66 (and counting) characters - operators - as players either try to plant a diffuser on the defense's bomb or prevent the attacking team from planting the bomb in the first place. Each of these operators have unique guns, gadgets, and abilities such as being able to track other players or place traps down to stop attackers. *Siege* has a variety of different maps to play on, all centered around one building to defend or attack such as a bank, a café, or a house. One of *Siege*'s key features is its destructibility in which the game's walls, ceilings, and floors can be shot through, blown up, or interacted with by many of *Siege*'s gadgets (e.g., grenades can be thrown through an open hole). This level of interactivity (as well as the game's 66 unique operator abilities) means that *Siege* is a complex game that requires players to have strong map knowledge, an understanding of each operator's toolkits, and the need to work as a team. *Siege* also has a variety of other modes such as a team death match mode in which the only objective is to kill the enemy team, and a shooting range mode in which players can practice controlling their gun's recoil.

Rainbow Six Siege also features a lot of customizability for one's player models with thousands of different in-game cosmetics. This includes skins for characters, skins for guns, gun charms, weapon attachment skins, backgrounds, and player icons. These can be earned through gameplay in which players have a chance at getting a loot box, or they can be bought from the store. The rate at which one gets rewards can also be boosted as one can purchase experience points boosters to earn more in-game cash. The game also features a seasonal battle pass which contains everything just listed. The battle pass includes the newest operator as an instant (early) unlock, otherwise players must save up enough credits to earn characters. *Siege*'s base game starts the player off with only one operator, and they are forced to slowly unlock the rest of its cast unless they want to pay for the non-base game.

There is a plethora of live-service games to analyze, but *Rainbow Six Siege* has features that make it a particularly rich case for investigating monetization. Chief among these is *Siege* uses many different monetization techniques. Exploring how these techniques could lead to unique research insights. *Siege* also is a game with which I am familiar, so less time was required to learn how to play the game for research purposes.

The App-Walkthrough Method

The app-walkthrough method is a research method designed by Ben Light, Jean Burgess, and Stefanie Duguay (2018). Their article will serve as a guide for this paper's approach to *Rainbow Six Siege*. Their method is partially applied and slightly modified to analyze some aspects of game design that the app-walkthrough method might miss. According to Light et al. (2018), the app walkthrough

method involves establishing an app's environment of expected use by identifying and describing its vision, operating model and modes of governance. It then deploys a walkthrough technique to systematically and forensically step through the various stages of app registration and entry, everyday use and discontinuation of use. The walkthrough method establishes a foundational corpus of data upon which can be built a more detailed analysis of an app's intended purpose, embedded cultural meanings and implied ideal users and uses. (p. 881)

In this paper, elements of Light et al.'s (2018) app-walkthrough approach will be used to analyze how someone may play *Rainbow Six Siege*, as well as unintended ways of playing it. It also helps us investigate the parts of the game which are more app-like such as the menus and the store. Below I will outline each of the app-walkthrough's steps, and then outline how the walkthrough may be complemented by other approaches to game analysis.

The first step of the app-walkthrough method is looking at the "environment of expected use". First, we must look at an app's vision. This means outlining the developer's intent with the

app (Light et al., 2018, p. 889). It also encompasses outlining ways the developer expects one to use the app, including the framing of an app's purpose. Following looking at an app's vision, we can look at an app's operating model. This means looking at its "business strategy and revenue sources, which indicate underlying political and economic interests" (Light et al., 2018, p. 890). We accomplish this by analyzing how one may purchase something, as well as the ways data is collected. The last step of analyzing the environment of expected use is to see how an app is governed. This involves analyzing the rules laid out in the app's TOS (Light et al., 2018, p. 891).

With the environment of expected use outlined, the technical walkthrough can now be approached. The technical walkthrough reveals "mediator characteristics, which provide indications of how the app seeks to configure relations among actors, such as how it guides users to interact (or not) and how these actors construct or transfer meaning" (Light et al., 2018, p. 891). Examples of mediator characteristics include "user interface arrangement", "functions and features", "textual content and tone", and "symbolic representation" (Light et al., 2018, p. 891-892). This paper will outline some game-specific mediator characteristics of monetization strategies. Using these mediator characteristics, we will focus on specific aspects of the app. First is the registration and entry process. This includes booting up an app, signing up for it, and accessing any other platforms/infrastructure the app is enclosed in. Following that is the app's everyday use to not just do all the basic activities it affords but also "the flow of activity" within it (p. 893). Finally, a technical walkthrough addresses app suspension, closure, and leaving. A technical walkthrough also surfaces unexpected uses of the app.

While the app walkthrough is a useful method to apply to live service games, there are some necessary adjustments due to the specific nature of video games. For starters, *Rainbow Six Siege* is a game which requires more engagement than many mobile applications. While this

paper will explore *Rainbow Six Siege*'s in-game monetization systems, the complexity of what there is to analyze extends past a typical app due to the amount of content and decision making the game has. I have found it necessary to modify the app-walkthrough method so that it is more suitable for a game such as *Rainbow Six Siege*. Modifying the app-walkthrough method by drawing insights from other game scholars can open unique avenues for research. For example, Joseph (2021) uses the app-walkthrough method in conjunction Latour's actor-network theory and Stuart Hall's semiotic theories to analyze the Battle Royale *Apex Legends*, which leads to a unique analysis surrounding the framing of when an item is being sold.

This paper combines elements of the app-walkthrough with components of the work of Mia Consalvo and Nathan Dutton (2006) on how to approach the study of individual games. They outline ways to study specific aspects of games. While this method can work on its own, by making Consalvo and Dutton's analysis a part of the walkthrough method allows us to analyze aspects of games which would be missed if only one method was chosen. This helps shape how I engage with my research question, which asks where gameplay and monetization strategies intersect as the app walkthrough helps analyze monetization, and Consalvo and Dutton's work helps understand gameplay. The way we can combine them is by applying Consalvo and Dutton's analysis methods as ways to search for mediator characteristics. The first way to search for mediator characteristics is the analysis of "object inventory". This means analyzing items picked up during gameplay and analyzing their purpose in gameplay (2006). When combined with the walkthrough method, this allows us to see how items interact on different levels of the app (e.g., menus, gameplay, loading screens).

Consalvo and Dutton's approach to game analysis also encompasses the "interface study". This means specifically addressing the menus which are shown on a screen such as

health bars, experience meters, and ammo count (2006). These interface elements are useful to track to understand the connection between in-game status and cosmetics. The authors' approach also covers they call the "interaction map" which can be understood as "examining the choices that the player is offered in regard to interaction-not with objects, but with other player characters, and/ or with Non-Player Characters (NPCs)" (Consalvo and Dutton, 2006). *Rainbow Six Siege's* main mode does not have NPCs, but it does have other player characters to interact with and analyze their connection between the app, my actions, and cosmetics. To clarify, the interaction map will prove useful in seeing how other players cosmetic use affects me. Finally, Consalvo and Dutton outline the "gameplay log" which can help document a game's unexpected uses. The latter is an aspect of the app-walkthrough method too.

In terms of recording the app-walkthrough, my research made use of multiple techniques. When I was browsing *Siege's* menus or looking through the TOS, I took detailed notes. However, when I played *Siege's* main mode, I recorded my gameplay along with voice memos – narrating my playthrough. I took this approach because it is difficult to take notes mid-gameplay, as well as to create data in the form of gameplay footage I could evaluate post-game. I recorded approximately 15 hours of footage. The app-walkthrough method is a valuable method to analyze software, but it does lend itself to a level of bias. To counteract this, secondary sources are required to support, or challenge, the researcher's gameplay experiences and interpretations.

Secondary Sources

To verify my experience with *Siege*, my research also involved collecting game news media stories on monetization. My first step was choosing sources. This included assessing the credibility of publications, as well as identifying some of the prominent gaming journalists and the websites they write for. This also includes looking at social media to see how large of an

audience these websites have. While the latter is not necessarily a measure of quality, it is an indicator of a popular sources. As a longtime gamer and reader of game journalism, I also have experience to make choices as to the credibility of these publications.

My game news research was geographically limited due to my lack of understanding of the languages of some leading international publications (e.g., Japanese). I also needed websites with good search engines, as otherwise locating articles could be troublesome. For example, despite IGN being an important news source, I was unable to conduct proper research due to the lack of a search engine. With all these considerations in mind, nine publications were chosen: Rock Paper Shotgun, Kotaku, Polygon, PCGamer, Game Informer, Eurogamer, Destructoid, VG247, and Gamespot.

The game news research process was restricted to a limited time frame using specific keywords. I searched for articles from 2016 forward. This date was chosen because this is the approximate start of the loot box/battle pass craze as games such as *Overwatch*, *PUBG*, *Rainbow Six Siege*, *Dead by Daylight*, and *Fortnite* all began to come out, as well as controversies surrounding *Star Wars Battlefront II*'s (2017) loot boxes – for example.

In terms of article searches, the first keywords were “microtransaction”, “loot box”, and “battle pass”. New keywords began to emerge from reviewing the initial search results. “Regulation”, for example, is a topic of strong interest in popular game media, especially regarding loot boxes and other gambling-like mechanics. The second keyword was “justification”. There is a plethora of articles in which game journalists seem to feel the need to defend how they spend their money (connecting to the themes of Joseph (2021)). The third keyword was “gambling”. This is in a similar vein to the loot box keyword, but its focus is on the many arguments debating if loot boxes are gambling or not.

In total seventy articles were gathered. These new sources help verify my walkthrough as more than personal experience.

Walking-Through *Rainbow Six Siege*

The Environment of Expected-Use

To begin the walkthrough of *Rainbow Six Siege*, this section of the paper considers the game's environment of expected use. The first subsection will look at the *Siege*'s vision by analyzing the Steam store page and *Siege*'s official website to see how the developer frames the game. Secondly, we will examine *Siege*'s operating model to gain an understanding of the game's monetization underpinnings. Finally, *Siege*'s governance strategies will be studied by reviewing its terms of service (TOS). By examining these aspects of the environment of expected use, we will be able to see how these systems enforce monetization and how Ubisoft accomplishes this during gameplay when we do the technical walkthrough.

Vision

Rainbow Six Siege is one of many military-themed first-person shooters that normalize terrorist-focused military narratives and functions as what McKenzie Wark, among others, describes as the "military-entertainment complex" (2007, p. 15). Military narratives in games can help to serve these narratives and interests in the real world. Contributing to the normalization of military narratives, *Rainbow Six Siege* creates a romanticized version of terrorist situations. *Siege* presents itself as realistic and tactical: "Face intense close quarters combat, high lethality, tactical decision making, team play and explosive action within every moment" (Steam, 2022). Part of *Siege*'s intended vision is to turn the horrors of war into a power fantasy for the player that functions closer to a puzzle game with fast reaction times. The store page boasts about having "Special Forces operators from around the world" (Steam, 2022), which frames real-life special

forces operators, such as the FBI or GIGN, as teams in a game. The game is presented with an emphasis on destruction and the player's ability to change the game world around them:

“Employ every weapon and gadget from your deadly arsenal to locate, manipulate and destroy your enemies and the environment around them” (Steam, 2022). *Siege*'s store frames players as autonomous and highlights the uniqueness of each round. This means that players get the chance to come up with their own strategies for dealing with the opponent. The store page also promotes the autonomy of the player by framing the e-sports scene as something anyone can get involved in. It emphasizes that you, the player, can get involved in Ranked play, join tournaments, and get involved in the “*Rainbow Six Siege* Pro League” (Steam, 2022). Again, there is a narrative being created here that the player has the chance to make it big and play with the greats if they are up to the challenge. Ultimately, *Siege* presents itself as a realistic military game which puts the player in charge of overcoming any challenge.

Operating Model

Rainbow Six Siege is a unique game as it contains an abundance of monetization systems. The first form of monetization is the purchase of *Rainbow Six Siege*, which consists of a variety of versions. This includes the standard edition for \$30, deluxe edition for \$40, operator edition for \$100, and the ultimate edition for \$140. Each upgrade unlocks more operators for the player, excluding the ultimate edition which is the same as the operator edition but with additional cosmetics. Once the game is purchased, the operating model reveals itself to the player as they are shown all the different cosmetic options they can purchase. These cosmetics include skins for operators, skins for weapons, weapon attachment skins, “charms” which appear on the side of your weapon, different character models, backgrounds for the player's operator card, and victory poses. The only non-cosmetic based item players can purchase are the game's operators.

Purchasing cosmetics is a more complicated process. The most direct way to earn cosmetics is by purchasing them in the store, although they are limited to a small selection of rotating cosmetics. To purchase anything, players must purchase credits from the store to then spend on the game. Players are not forced to buy these credits to unlock new characters, as some products can be earned by spending the other in-game currency renown (which cannot be purchased – it is only earned through play), but premium skins are only purchasable with credits. Occasionally, cosmetics are bundled together and sold at a discounted rate. Cosmetics can also be earned by purchasing alpha or bravo packs, which are *Rainbow Six Siege*'s equivalent of a loot box. Alpha packs contain a chance at unlocking most of *Siege*'s items. Bravo packs contain a selection of new cosmetics, as well as protection from opening the same item again, or duplicate protection.

Cosmetics can also be purchased by spending money on the battle pass. While there is a free version of the battle pass, it contains substantially fewer items. Once unlocked, players gain experience points which unlock unique cosmetic items only available in the battle pass. Players are encouraged to buy the battle pass early as they earn extra experience points with the pass unlocked. The last item players can buy are one of two types of boosters, which allow gamers to accumulate resources faster. The first booster allows players to earn renown at a faster rate, while the other booster allows for one to work through the battle pass at a faster rate. These can be purchased with credits or earned in the battle pass. Ultimately, *Siege*'s cosmetics show that the game's environment of expected use is that players spend money on cosmetics in a way that gives players a sense of autonomy as they get to buy cosmetics that cater towards themselves. This allows players to feel as if they are getting a good deal (Jarrett, 2021).

The last element of *Rainbow Six Siege*'s operating model that I want to highlight is the harvesting and selling of player data. According to the Ubisoft privacy policy (2022), Ubisoft shares player data with a variety of companies that are partnered with Ubisoft. This data is collected through every game/cosmetic purchase, account creation, time spent in-game, time spent with the Ubisoft Connect app open, and interactions with other players. It is in the developers' economic interest to keep players on the app to continue extracting data from players.

Governance

To examine *Rainbow Six Siege*'s governance, we must look at its TOS. This is complicated by how these TOS are split amongst four unique contracts: the Steam TOS, the Ubisoft terms of use, the *Rainbow Six Siege* code of conduct, and the Ubisoft privacy policy. Players are unable to play *Rainbow Six Siege* without signing each of the TOS.² By signing these, players agree to follow multiple sets of rules or risk punishment. Punishment can be minor, such as a temporary text chat ban in-game, or it can be a full suspension from Ubisoft Connect services. These are enforced through a mixture of player-oriented reporting and *Rainbow Six Siege*'s anti-cheat mechanisms.

Siege's Code of Conduct outlines encouraged behaviour and what should be reported. Firstly, *Siege* condemns any sort of illegal behaviour based on local law. It encourages players to report anything that might be illegal. Secondly, *Siege* encourages players not to be toxic, which they define as "any form of bullying, harassment, or hateful language to target other [players]" (Ubisoft, 2022) whether online or offline. Finally, the code of conduct asks players to call out

² The Steam TOS is interchangeable with other platforms *Siege* is playable on such as the PlayStation network TOS.

cheating and lists what is considered cheating. This includes hacking (whether you are distributing or using), purposely using glitches, editing game code, having others use your account to artificially boost your rank, buying cosmetics on a third-party market, or viewing a broadcast to take advantage of what the enemy team is doing (Ubisoft, 2022). While some of the code of conduct may be enforced by Ubisoft (cheating can be detected by the in-game anti-cheat), the onus is on the player to report any activity so the game functions as Ubisoft intends. Therefore, Ubisoft hopes to create a community that is enforced by the players, with only light moderation required by Ubisoft.

Ubisoft's TOS outlines some of the economic policies surrounding their games. Ubisoft (2022) claims that any purchase made on their platform is not a product but a service, which is like other live-service games (Bernevega and Gekker, 2021; Joseph, 2021). One of the services that Ubisoft (2022) specifies is one's electronic wallet, which they claim "(i) ... does not constitute a personal property right, (ii) can only be used to purchase Services from us, have no value outside of our Services, (iii) are not exchangeable for cash, and (iv) are, unless required by law, non-refundable and non-transferable". Any money spent on the platform, whether this is credits in *Siege* or money in one's Ubisoft Connect wallet is not "real" currency. Ubisoft (2022) further specifies that any points accumulated on their platform has no monetary value. This reveals that players do not own *Rainbow Six Siege* (or any game on the Ubisoft Connect platform) but instead rent it as a service.

The Technical Walkthrough

My walkthrough of *Rainbow Six Siege* identified certain mediator characteristics which stood out as significant in relation to monetization. This section describes those characteristics, connects

them to the literature, and analyzes the nature of the monetization process. I set out to illustrate how monetization strategies are deeply integrated with gameplay.

Ubisoft Connect and Platformization

Rainbow Six Siege must be played through the Ubisoft Connect platform. Ubisoft Connect is Ubisoft's digital service which allows players to buy games, connect with other games, and read up on Ubisoft-related news. For this walkthrough, Ubisoft Connect is important to look at as it serves as the mediator for playing *Siege*. To play *Rainbow Six Siege*, the player must sign four TOS policies. Only one of these agreements is specifically for *Siege*. Ubisoft Connect's TOS are the Ubisoft TOS and the privacy policy TOS. These TOS do not just overview *Rainbow Six Siege*, but every game and feature accessible on the platform. As stated in the Ubisoft TOS, everything purchased on the Ubisoft Connect platform is a service, and each services connects back to Ubisoft Connect. As a platform, Ubisoft Connect is integrated within the game. At any given time, a player can press Shift+F2 and open the Ubisoft Connect overlay (Appendix A). This overlay oversees many features in *Rainbow Six Siege*, such as the ability to communicate and play with friends, track achievements, and view in-game statistics. By integrating these services into the platform, the company oversees all their games. Platforms can be created which govern a variety of other platforms and interact with each other to streamline platformization.

An example of this streamlining of platformization is revealed when requesting to view one's Ubisoft Connect data. Ubisoft's data policy allows for one to request the data that Ubisoft has collected. If the request is accepted, users have a limited amount of time to download their data files. Once downloaded, users are presented with eleven spreadsheets, which encompass different data points extracted from the player. This data includes such information as purchases, length of play sessions, friends list, where someone plays from, and products claimed on one's

account. By keeping this data connected to the platform rather than the game, Ubisoft can use this data to streamline their games instead of only streamlining *Siege*. Furthermore, this is a clear example of platformization's ability to integrate itself into other apps' ecosystems (Nieborg and Poell, 2018). For Nieborg and Poell (2018), platforms are not just discrete governmental systems, but a complex network of systems in which data is transferred between multiple points (p. 4282). This changes the functionality of data as it is not the data from one game, but from every service utilized on Ubisoft Connect.

In my case, Ubisoft can connect my interest in other Ubisoft titles, such as *For Honor* and *Splinter Cell: Chaos Theory*, to my interest in *Rainbow Six Siege*. This data, in conjunction with everyone else's data on Ubisoft Connect, allows Ubisoft to adapt their monetization model for each game based on data from other services. One's time in *Rainbow Six Siege* can affect the monetization strategies in *For Honor*, and vice versa. Players are encouraged to play other games and spread the data. *Siege*'s Ubisoft Connect pop-up includes a rewards page in which players can spend currency earned from getting achievements to unlock in-game cosmetics. However, some cosmetics can only be unlocked if a player has played other Ubisoft games. For example, I had a unique charm unlocked due to playing *For Honor*. Despite being two separate games, cosmetics and data can collide in each game world due to the platformization practices of Ubisoft Connect – platformization facilitates the integration of monetization across games.

The Battle Pass

When the player is brought to the main menu of *Rainbow Six Siege* (Appendix B), the first widget the player will likely notice is the large box for the current season's battle pass. Looking at the user interface arrangement is essential to the app walkthrough, so analyzing the battle pass was one of my first tasks when I opened *Siege*. When this box is clicked on, players are brought

to the battle pass progression, which reveals all the potential items a player can unlock and tempts the player to purchase the battle pass for 1200 credits (\$13.49). If one completes the purchased battle pass, they are awarded with a substantial number of cosmetics in comparison to buying similar cosmetics from the store. For example, the Azami glade bundle costs the same as the battle pass and only contains four cosmetics, while the Year Seven, Season Three battle pass contains 105 cosmetics, 15 boosters, 600 credits, and an alpha pack every five levels after 100. As Bernevega and Gekker (2021) point out, the reason for this is that it keeps gamers playing the game to create more data. Data can only be extracted when the player has the app open, so it is within the company's best interest to keep players in the game (Bernevega and Gekker, 2021). In my 12 hours playing Year Seven, Season Three of *Rainbow Six Siege*, I made it to tier 26 of 100 of the battle passes. By this logic, *Rainbow Six Siege*'s battle pass could take anywhere from 30-60 hours to complete.³ Thus, the battle pass functions to keep players engaged with the game's content to increase the chance that gamers stay invested in the game, monetizing players as they are working their way through the battle pass. This means that players engaging in completing the battle pass are participating in monetization, whether they are paying for it or not. Ultimately, this is one of the ways gameplay is integrated into monetization.

As companies have explained, the purpose of the battle pass is to increase the longevity of a game (Wheeler, 2022). Since *Siege* has four battle passes a year, it gives players a reason to come back next season and see what has changed. While a large part of this appeal is the gameplay changes, such as rebalancing characters or new maps, some of it is the appeal of

³ I arrived at this conclusion based on a few factors. The obvious math is that I'm about one-quarter through the battle pass and that took 12 hours. By that logic, it should take 48 hours. However, this does not consider that wins get players more renown, and I happened to be on a winning streak during this process. The other factor is what modes someone plays. I spent a significant amount of time analyzing menus and other modes, like custom games, which do not provide battle pass points. I also did not use any battle pass boosters.

cosmetics in the battle pass, as well as instantly unlocking the newest operator. The battle pass serves to give players a reason to engage with monetization repeatedly. Looking at *Siege*'s player count on SteamCharts (2022) (Appendix C), we can see that *Siege* had a significant player count increase of approximately twenty thousand players at the start of Year Seven. While the size of returning/new players may be smaller or larger depending on the season, there is always a substantial increase of players at the start of every season. Even if players are returning for non-cosmetic reasons, *Siege*'s seasonal updates being centered around the battle pass means that even those who do not engage with the battle pass are monetized. Updates to gameplay exist to monetize players in new ways.

In trying to engage with the battle pass, I experienced what the gaming community often refers to as the grind or the act of grinding (McWhertor, 2022). Grinding can be understood as when playing a game feels like going through the motions as one plays round after round to either rank-up on the leaderboard or get further in the battle pass. The battle-pass grind leads players to do battle pass-specific challenges to make sure one gets to the end of the battle pass. Not knowing how far I could get in the battle pass during my gameplay sessions,⁴ I focused on the in-game battle pass challenges to see how far I could make it. Some of *Siege*'s tasks included getting enough kills with a specific weapon type or winning a certain number of games. By optimizing my playstyle to play in a certain way, it took some of the enjoyment out of the game as it felt like I was playing for the cosmetics, rather than the gameplay itself. This is a common notion amongst gamers, which McWhertor (2022) identifies in his critique of *Overwatch 2*'s new monetization systems: “the looming obligation of daily check-ins and weekly in-game goals

⁴ Despite having experience in *Rainbow Six Siege* beforehand, the battle pass has gone through substantial changes since I last played.

already feels stressful”. Despite these critiques, McWhertor continued to play *Overwatch 2*, and I continue to play *Rainbow Six Siege*. While there is a level of fatigue that exists in doing tasks for the battle pass, there is also a level of satisfaction that exists that keeps players engaged. As D’Anastasio (2018) argues, the battle pass gives a game purpose that it might otherwise be lacking. D’Anastasio (2018) argues that the reason for the battle pass’ success is the fact that it combines progression/monetization with gameplay. Giving the player challenges can now be a way of commodifying them. By tying “purpose” to the cosmetic aspect of the game, the battle pass makes monetization seem fun.

As a monetization strategy, the battle pass serves to create a balance between grind and fun. Recently, some games such as *Halo Infinite* (Beckhelling, 2021; Savage, 2020) and *Overwatch 2* (McWhertor, 2022; Peppiatt, 2022; Wheeler, 2022) have received criticism for engaging with battle passes due to the grindy nature of them. However, when battle passes are done in a way that avoids this criticism, they are often praised for not seeming scummy. While I went into this app-walkthrough with the intention of analyzing the battle pass, one of my initial observations regarding the battle pass was how avoidable it was. This is because similarly to the *League of Legends*’ cosmetic systems (Jarret, 2021), *Siege* makes sure that its battle pass is seen as a good deal. By not being too overt, monetization can seem as a gift from the developers which leads players to not consider “the substantial differences of scale, motivation and power as a barrier to engaging in a reciprocal relationship with the developers” (Jarret, 2021, p. 115). Most importantly for Jarret (2021), this means that developers can leverage this relationship to further monetization. *Rainbow Six Siege*’s battle pass is an example of this in action. As mentioned, *Siege*’s battle pass contains 105 cosmetics, plus the newest operator. When compared to other battle passes such as *Overwatch 2*’s, the battle pass can seem like a generous gesture from the

developers. The battle pass also seems like a good deal compared to the other cosmetic items that can be purchased in the *Rainbow Six Siege* store. This allows the player to ignore the fact that they are ultimately dealing with a monetization system, since it is framed to appear as a kind gesture, which leads to the blurring of monetization and gameplay.

Another way we can analyze the battle pass is through its evolution. A deliberate choice I made during my research was to return to *Siege* a week later when the new season of *Rainbow Six Siege* had come out. The purpose of this was to view any substantial changes that might have been made in the update, which allowed me to expand upon the app walkthrough's ability to see how patterns of use change with the app over a period of time. While there were many large changes such as new cosmetics, an update to the ranked system, the character Solis, and multiple gameplay changes, the largest addition was the update to the battle pass system (Appendix D; Appendix E). *Siege* now made it so that one has choices in how they unlock items in the battle pass. Players can prioritize what items they want in which order, laying out the path to get there. This means if someone "mains"⁵ a character, they can go down their path of choice to unlock those cosmetics as fast as possible. This implies that the process of unlocking the battle pass has turned into a game itself, deepening the affective experience discussed previously (Jarret, 2021). The battle pass itself even reuses the in-game barricade texture to signify a "free-space" on the battle pass, connecting gameplay to the battle pass. This new battle pass is also an example of platformization's ability to use data capital to optimize systems (Sadowski, 2019). Using previous information of the battle pass, the developers can redesign the next battle pass using any

⁵ Having a main or "maining" is the act of having a character someone specializes in and plays the most.

information they extracted from gamers play time. Each battle pass gets more refined to increase profits, or more data capital.

Alpha/Bravo Packs, Gambification, and Ranked Systems

Rainbow Six Siege's loot box system integrates itself into multiple parts of the game. While alpha and bravo packs can be purchased in the store, they can also be unlocked in the battle pass, and earned through winning games. While earning them may not seem like part of the monetization process, it only serves to expand monetization. For every game of *Rainbow Six Siege* won, players get a chance at spinning a wheel which determines if you unlock a loot box. The player starts with a three percent chance at getting an alpha pack, and they get an additional three percent for every game of *Siege* played. Once a player gets their alpha pack, the wheel resets back to three percent. By doing this, players who are better at the game have a higher chance at earning alpha packs since they win more often. As Whitson and French (2021) argue, this blurs the lines between when gameplay happens and when gambling begins. When I won a game and the wheel started spinning, my first thought was that I earned this wheel spin. I sidetracked away from the fact that I was participating in the process of gambification. By introducing gambling elements when a match ends, it reinforces that players should return to have another chance to spin the wheel. At one point, I felt I would play another game because my wheel was getting to around 30 percent, and I had not gotten my alpha pack yet. This serves to keep players in the game and Ubisoft profiting from the data being created during gameplay. Using Whitson and French's (2021) concept that "time-on-device = data = profit" (p. 27), we begin to understand that *Siege*'s implementation of alpha packs helps increase one's time-on-device. *Siege* creates the impression that if you play one more game, you'll get a pack. The odds get better and better each game, which encourages the player to believe they'll be rewarded next

game. This helps increase the time spent on *Siege*, which leads to the accumulation of data capital. Once again, this is a way in which gameplay is mutually shaped by monetization.

It is also through the scarcity of packs gained that leads to alpha packs being purchased. In my 15 hours playing *Siege*, I earned five alpha/bravo packs, which is slightly above average given my high win-rate during my play session. This drip feed of cosmetics is something which is purposefully done to encourage players to spend money on loot boxes. It is also something integrated with the game's difficulty. Ruppert (2020) outlines a case in which the game publisher Electronic Arts were brought to court for "utilizing 'deceptive practices' and 'false advertising' specifically to drum up more revenue," by tampering with skill-based gameplay in *FIFA 21*. *FIFA 21*'s difficulty would adapt to influence a win or a loss, which the prosecutors argued is a way to keep players spending money. While *Siege* does not have adaptive difficulty, its ranked system serves a similar purpose. Its ranked system tries to match players up with the closest players of their skill level. It gives the player a "matchmaking ranking" (MMR), which is a number that indicates your skill level. You gain and lose MMR based on every win or loss. The amount one's MMR can fluctuate becomes smaller as they start playing with the people of a similar skill level. While this is favourable for players as it creates evenly matched games, it also helps serve monetization by finding the perfect balance for a player's win/loss record. If a player is winning (and we can assume they are not the best player in the world), a player will eventually hit a point where the algorithm has them winning and losing a similar number of games. This means that the rate in which one can earn loot boxes is within a fixed range despite the randomness of loot boxes. Due to the combination of skillful and gamblified play, "loot boxes encourage real life sales by providing rewards that are rare and yet seemingly always attainable if frequently tantalizingly out of reach" (Alexandra, 2017). *Siege*'s ranking system accomplishes

just that by telling the player that if they win, they get a chance at getting the reward. This exemplifies how gamblification is part of gameplay rather than a separate or discrete element of the game.

There have been many critics of loot boxes (Macey and Hamari, 2022; Perks, 2021; Whitson and French, 2021; Zanescuand et al., 2020) and these critiques apply to *Siege*'s alpha/bravo packs. However, something missing from these critiques is how loot boxes are differentiated game-to-game. One of the unique features of *Siege*'s loot boxes is duplicate protection (or lack thereof). When opening an alpha pack, there is a chance a player opens an item they already have, in which case they are awarded renown for the item they own. The lack of duplicate protection is not unique to *Siege* as it exists in other games such as *Overwatch* and *Magic Arena*.⁶ However, *Siege*'s bravo packs do have duplicate protection. This implies that alpha packs are intentionally designed not to have duplicate protection. There is no reason for this to be the case outside of monetization. This makes it near-impossible to collect every item (or even all desired items) in the game. The lack of duplicate protection means that even if *Siege* was to stop putting out content, players would still have a reason to keep spending money on alpha packs.

Furthermore, *Rainbow Six Siege* does not disclose the odds of opening a common, uncommon, rare, epic, or legendary cosmetic. Whitson and French (2021) outline that developers often do this to hide the fact that one is gambling. *Siege* accomplishes this by turning it into a gameplay mechanic. When one opens an alpha/bravo pack, the colour on the screen changes to reflect the rarity, a zipping sound can be heard until one opens the pack in which a triumphant

⁶ *Overwatch* has become *Overwatch 2* and no longer has loot boxes and *Magic Arena* has implemented a light duplicate protection system.

“boom” is heard, and the item appears. Even while trying to consciously think about these packs from a critical perspective, I was excited when I opened a legendary item. This is a feeling that developers seek to create as it makes opening a loot box “feel like Christmas” (D’Anastasio, 2017). Cosmetics are not just integrated into the game when one plays, but it is a whole game by itself. Of course, the two games are intertwined, but the act of opening box after box, looking for that one item, is a kind of game. While I may have not spent a penny on alpha packs, others have spent hundreds (Jackson, 2019) or thousands (Walker, 2019) on loot boxes. Cases like this emphasize the impact of gamblification in games, with players potentially spending thousands on digital items they do not own.

Showing off your Cosmetics

What good are cosmetics if you cannot show them off? *Siege* places a heavy emphasis on featuring cosmetics in its game design. Drawing from Consalvo and Dutton (2006), this subsection uses their idea of the object inventory to examine *Siege*’s cosmetics in a different light. The first place I noticed *Siege* advertising a skin was on the cosmetic selection screen itself (Appendix F). When clicking on a character, the player is presented with what their character looks like and what their gun looks like. This makes sense in terms of game design, as it allows the player to visualize how they look without needing to go into another menu/in-game. However, it is the first instance of cosmetic design existing in places outside of the main game. The intended purpose of a cosmetic is to show it off in-game, but as Joseph (2021) points out, one is always reminded when they are not in-game to purchase cosmetics. The second the player is not engaged in gameplay, many aspects of the game which look like they serve a utility like character selection is ultimately a way to shop (Joseph, 2021, p. 80). Even in-game players are subtly reminded to buy cosmetics. When one loads into a match, they are presented with a

loading screen which shows the characters that are being chosen (Appendix G). If the player presses the spacebar, they are also presented with what guns and gadgets the players are bringing (Appendix H). Both instances advertise different cosmetic items. The loading screen displays character cards and elite skins to show off one's "game capital" (Consalvo, 2007) to other players. Similarly, once the spacebar is pressed one can see a detailed model of everyone's guns and the skins being used on them. When game capital is used to show off Ubisoft's customization options, this means that players become advertisements for cosmetics as they accumulate game capital. The act of using cosmetics functions as an endorsement for this monetization method.

Players becoming an in-game advertisement is best represented during a match's victory/defeat screen (Appendix I). When a match ends, the game shows the winning team standing victoriously in the team's chosen cosmetics. The player with the best score gets to stand front and center as their cosmetics are featured. This is another example of game capital being purposely designed into the game. The game promotes the boasting of one's cosmetics as it features a screen for everyone to behold said cosmetic. Furthermore, if a player has one of the premium "elite" skins, they are also rewarded with their character doing an exclusive victory pose, which is unique for each individual elite skin. Each elite design is tied to the character's personality. For example, the character Dokkabei, a young quirky millennial hacker, does a dance when her elite skin is equipped. What is interesting about this is there is no way to do this dance in-game. The victory pose only serves once gameplay has finished. This implies that the victory pose's main purpose is to communicate game capital. When a victory pose occurs, not only did the player do the best on the team, but they also possess gaming capital, which is the

premium skin. The victory/defeat screen serves no purpose other than to use players as advertisements for cosmetics.

There is an argument to be made that these cosmetics serve an aesthetic purpose to enhance the game. However, this does not seem to be the case because cosmetics are largely ignored during gameplay. Once a player loads in, the only time I felt I noticed my cosmetics was during the start of a match when the main point of focus was my gun. Past this, I almost never noticed cosmetics in-game. *Rainbow Six Siege*'s fast paced gameplay leaves little time to focus on what someone looks like. Furthermore, when one begins to run or aims down the sights (both actions which commonly occur), any gun-related cosmetics are obscured. Players also never get the chance to visualize what they are wearing except during the victory screen. However, the second a player dies, cosmetics are brought back into focus. The player gets to see the character card of who killed them followed by a kill cam which lets you view the opponents' actions in killing you. Once that is over, the player gets to spectate through the various cameras around the map or view the game through a different player's eyes. If the first choice is chosen, there are no cosmetics seen, as the player remains a participant in gameplay as they use cameras to track opponents. If the player chooses to view another player, their character card pops up, which only serves a cosmetic purpose. This is interesting because, as Joseph (2021) argues, live-service games serve as a hub for commodification, allowing players to purchase something or be reminded to purchase something on nearly every screen. Yet, in the case of *Rainbow Six Siege*, this process of commodification is nearly invisible to the player in the heat of the moment. Miller (2017) argues that this separation of cosmetics (specifically the loot box) and gameplay is a game design failure, as it interrupts the pacing of what is going on in-game. Systems like the loot box are an inferior experience than previously tailored progression systems. This separation may

not serve the enjoyability of gameplay, but it does foster affective responses from players due to cosmetics not interacting with the game itself (Neely, 2021; Jarrett, 2021).

In analyzing cosmetics, the app walkthrough process led me to reflect on my own experience with player customization, specifically how microtransaction-based cosmetics compare to mods created by players. It is important to note that Ubisoft's TOS forbids the use of modifications, which includes cosmetic changes. What this means is that Ubisoft has complete creative control over the cosmetic market, like *Fortnite*'s market (Thorhauge and Nielsen, 2021). Players do not have the choice to create their own skins or use other creations. This allows for Ubisoft to have a monopoly over skins. If no one else can create skins for the platform, then Ubisoft gets control over the creation and distribution of cosmetics. This is another facet of platformization, as *Rainbow Six Siege* status as a "service" also means that Ubisoft can have complete control over the market. This is not to say that independent modding is not without its faults. Kücklich (2005) makes the argument that the modding community participates in what he calls "playbour," which is unpaid labour disguised as play. Playbour also helps extend the life of a game by producing content for it well after the game's initial launch (Kücklich, 2005). In this sense, cosmetics in *Siege* can be understood as paid mods, as they serve a similar role.

Even with the issues modding presents, it still has one significant advantage over Ubisoft selling mods. Modding allows for players to create anything they can dream of. A player can create something based on a favourite character, their own creation, or even something that defies the nature of the game itself (e.g., turning the player model into a tree). By preventing the production of modifications, Ubisoft has removed the creativity of modding from the player and commodified cosmetics. The consequences of this means that Ubisoft exercises control over both the market and creativity. This is a similar sentiment to what Adorno and Horkheimer (2020)

argue with their concept of the culture industry which claims that under capitalism one can only express themselves to the extent capitalism permits them. Looking at *Siege*'s store (Appendix J), we can see the various options *Siege* offers its players. This instance shows crossover skins with the *Nier* series, alternate colour schemes for characters, a welcome pack for new players, and specific customization with Ubisoft's *Rainbow Six Siege* pro league. While the game contains thousands of cosmetics, there is no opportunity for someone to express themselves outside of this. Thus, when one monetizes cosmetics, the creativity of cosmetics is restricted.

One of the more recent changes to *Siege*'s monetization strategies is the inclusion of crossover cosmetics which feature skins that reference existing IP such as *Rick and Morty*, *Yakuza*, *Nier*, and *Resident Evil*. These crossovers exist in the form as an elite skin, which for \$20 includes a character-specific skin, along with a gun skin, character card customization, and a unique end-of-game animation. None of the crossover skins are purchasable with renown, which categorizes these crossover cosmetics as premium. This is like the techniques Evans (2016) outlines in his analysis of branding in live-service games. For example, in *Snoopy Street Fair* (a game based on the *Peanuts* franchise), "(t)he most expensive stalls, which equally pay out the most in-game money, feature characters from the original comic strips and spin-off television specials. Each of these stalls feature short animations when they are collected, animations that do not occur on standard stalls" (Evans, 2016, p. 571). In this example, the *Peanuts* IP is used to tug on one's emotional strings to lead users to rationalize the purchase. Similarly, the use of crossovers in *Siege* is useful for Ubisoft to tug on players' emotions to spend extra on a skin because it is connected to another IP: "It's a goofy and enjoyable crossover though, and one that made me fondly reminisce on series director Yoko Taro" (Allen, 2022). One's emotional response to the combination of franchises means more monetary opportunity. It also serves to

potentially expand *Siege*'s reach as the crossovers might get gamers from other fandoms to purchase *Siege* and the crossover skin.

The Environment of Unexpected Use and How it is Limited

In performing an app walkthrough, Light et al. (2018) suggest that there is anti-monetization potential when one uses an app in unexpected ways:

Since acts of technology appropriation can shift power from designers to users (Eglash, 2004), these unexpected uses can re-allocate some control of the app experience to users, creating new purposes for apps, thwarting profit-making strategies and circumventing governance tactics (p. 895).

While some apps have this potential, *Siege*'s design prevents this in every conceivable way. As *Siege* is updated, it is not just new content that is created but new governance strategies which enforce the intended way to play the game. For example, players can do damage to themselves if they kill a teammate (Grayson, 2018). Players can also have temporary account restrictions if they have a history of toxicity (Park, 2022). These are both systems that were put into place well into *Siege*'s existence and serve to force players to play the game in a certain way. By participating in Ubisoft's intended design, methods at earning currency at a faster rate are thwarted except through exceptional play only achievable by the best players. In my time with *Rainbow Six Siege*, almost everything went as designed in my games. If a player was toxic, I could report them, which could lead to them being suspended from play. If a player also does not try to follow the suggested objective (usually defending or attacking an objective), then a player can be reported as well since this is considered "griefing". This leads players to act according to the game's code of conduct (Tomkinson and Van Den Ende, 2022). Player behaviour is shaped by the rules around them, encouraging them to act in the intended way. Since players act in the intended way, monetization can be enforced based on the understanding that most players are not

rule breakers. This is an example of gameplay and monetization reinforcing each other, showing how they are deeply interlinked.

While it is difficult to challenge this environment of expected use, cheating is a prevalent issue in *Siege*. Cheating in *Siege* almost guarantees a higher win-rate and thus disrupts the rate at which content is earned. However, cheating is disrupted by *Rainbow Six Siege*'s anti-cheat system which detects modifications made to the game. Furthermore, players can report players that the system does not detect. Ubisoft employees will then analyze this footage (Tarason, 2018) to determine if the player was cheating or not. During my walkthrough of *Siege*, I ran into one player who was certainly cheating, as well as a few players who were accused of cheating. In the cases where the players were accused of cheating, the text chat included rumblings from multiple players to report the accused gamer. Players doing this help keep *Rainbow Six Siege* from being played in unintended ways.

When *Siege*'s anti-cheat system catches a player, the game reveals its governance strategies. Most importantly is that it reveals that *Siege*'s anti-cheat functions as a governing body which controls who can and cannot have access to *Siege*'s services. In one eventful match of *Rainbow Six Siege*, I queued into a game with a cheater on my team (unbeknownst to me). During the first round, the cheater killed four players on the enemy team in about 25 seconds (something which is certainly possible, but rare and suspicious). Before we finished the round, our cheating teammate was booted from the game, and we saw their name appear in the banned list, which appears in the top-right corner of the screen when *Siege*'s anti-cheat catches cheaters. While I have no idea if this was a first-time cheater getting caught, or someone whose time evading the anti-cheat had finally caught up to them, the act of banning is instantaneous once the anti-cheat figures it out. Since doing my research, *Siege* has improved its anti-cheat to make it

near impossible to get away with cheating (Wilde, 2022). It is a combination of player-oriented reporting and platform-oriented governance designs, which make sure that players cannot get away with cheating.

After the cheater was banned, my team was forced to engage in a 4v5 with no opportunity to leave as we would still receive penalties. Despite the odds, we still won the game. That felt like a good point to conclude research that day, so I logged off with the intent to hop back on the next day. When I did hop on the next day, I was greeted with a message referring to the last game I played. The message claimed that since we played with a cheater, we would lose the MMR we gained through our win, despite the cheater being banned in less than a minute. The enemy team would also receive their MMR back. While what happened is a rare circumstance (usually a cheater would be banned after the match), it meant that Ubisoft's attempt to create a rational governance system led to a case in which I fairly earned MMR and lost it all due to a player who had minimal effect on the game. This reveals that *Rainbow Six Siege* prioritizes governance over player enjoyment, as it counts a disadvantaged win as a game with a cheater due to a technicality.

Playing *Siege* as intended is also tied to the sense of monetization being earned. While *Siege* has a multitude of modes, such as ranked, unranked, quick match, training grounds, custom match, a shooting range, and a small number of single player missions, they are monetized in different ways. Quick matches, for example, only earn players two percent on the end-of-game wheel instead of three percent, since they are shorter games than ranked/unranked. Some modes such as training grounds, custom match, and the single-player missions offer no spinning of the wheel at all. Similarly, each mode offers a different amount of renown at the end of a game, with ranked/unranked (the longest mode) offering the most renown, and training grounds rewarding

next to nothing since it is both short and a non-competitive experience. Training grounds rewarding almost no renown reveals that *Siege*'s monetization systems is tied to the length of a match. However, quick play, which takes about the same amount of time as a match of training grounds, earns significantly more renown than a terrorist hunt, which means that time is not the only factor. *Siege* prioritizes its multiplayer modes for players to play as well, since those games can be regulated better than those played against AI which are significantly worse than a human player. This leads to players playing in Ubisoft's intended ways, enforcing monetization methods. This is another example of how monetization strategies are mutually shaped by gameplay.

Of all of *Siege*'s game modes, the only one which offers no rewards at all are custom matches. When setting up or joining a custom game, *Rainbow Six Siege* reminds players that "Because these are unofficial version of the game, players don't receive any XP, renown, or battle points" (Ubisoft, 2022). In other words, because players could potentially exploit the game and earn rewards at a faster pace, rewards are disabled. A lack of rewards leads to players not caring about the game (Beckhelling, 2021; McWhertor, 2022), with players disincentivized to play custom games outside of tournament play. *Siege* allows for the option of custom play, but since players have control over the game's rules, monetization is removed since it cannot be regulated.

Trying to quit a game of *Siege* also reveals the developer's intentions to keep players from quitting and make the player liable for how they are monetized. It is clearly bad for Ubisoft when a player quits a game. Ubisoft stops collecting data when a player is not playing, and if it is a ranked/unranked game, your teammates are permanently down a player for that game, which affects player enjoyment. Ubisoft has multiple strategies to counteract this. The first one is the

message received when a player quits a quick match (Appendix K). By framing a player quitting decision as “leaving your teammates behind”, Ubisoft places the burden of responsibility on the player. The player is letting down their team. This is a common theme in *Siege*’s menus, which emphasize that what is happening is due to the player’s actions. By establishing that the player is the cause of responsibility for actions in multiple circumstances, it makes it seem like monetization systems such as loot boxes are within the player’s control (Whitson and French, 2021).

Players are greeted with a different message if they try to leave a ranked/unranked game (Appendix L). Not only is the player reprimanded for leaving the game, but they are actively punished. This serves three purposes. Firstly, it keeps players in-game, allowing for them to be monetized. Secondly, it creates a competitive environment for players to express themselves. Finally, it allows the player to be blamed. I played one ranked game where one of my teammates was from somewhere in Europe. They did not mean to join North American servers but ended up there due to a glitch. My teammate had a horrible connection, which put them at a significant disadvantage. Despite this error, the player must have suffered the consequences, even if the terrible game experience was not their fault. Others have complained about *Siege*’s glitches, which feel like they hurt the player rather than Ubisoft (Doster, 2020). In any case, where something can go wrong, the player is hurt, but Ubisoft’s monetization practices remain intact.

The goal of this section was to illuminate some of the ways gameplay is linked with monetization systems. While some of these ways are obvious, such as progression systems slowing the flow of content, small choices, such as the game’s ranked system balancing monetization, the way data is extracted, and governance enforcing players to act in Ubisoft’s

intended way are all ways that monetization practices and game design and play are combined in *Rainbow Six Siege*.

Conclusion

By using elements of the app-walkthrough method and combining it with elements of Consalvo and Dutton's approach to game analysis, I have revealed how monetization strategies are intertwined with gameplay in *Rainbow Six Siege*. Going into my research, I was aware of some of the tensions surrounding monetization systems such as the battle pass or loot boxes. However, my research has unveiled the extent to which the game itself is designed around monetization. While this is obvious in some cases, such as the odds of opening a legendary alpha pack, sometimes it is subtly implemented into the game, such as the game's ranking system. The app-walkthrough method was useful in exposing connections between gameplay and monetization, by drawing attention to details that may otherwise be overlooked. This approach was also useful to connect *Siege*'s gameplay with *Siege*'s microtransactions. Moreover, it helped reveal how data is extracted from players of *Rainbow Six Siege* and what that means for commodification. When I received my own player data, I had a firsthand look at how – and how much – Ubisoft extracts data from *Siege* players, which in turn enabled me to make critical arguments that would not have been possible otherwise. My gameplay and data research were combined with video game news sources to mitigate subjective biases which may occur when studying a game.

In summary, the goal of this paper was to analyze how monetization is implemented in and intertwined with game design in the case of *Rainbow Six Siege*. By way of conclusion, I want to identify what in my view are the three most prominent ways in which monetization was implemented in the game.

Gamblification is not a discrete activity that only exists in the game's menus; it is inextricably implemented into virtually every aspect of the game.

While previous research has outlined gamblification and the issues with monetization devices such as loot boxes (Macey and Hamari ,2022; Perks, 2021; Whitson and French, 2021; Zanesco, French, and Lajeunesse, 2020), there is a need for greater attention to how these systems are integrated beyond the act of opening a loot box. My research reveals that the loot box is not a discrete game element system which enables monetization. Rather, it is entwined with the game's other systems. This blurs the line between *Siege*'s gambling systems and skill-based gameplay. As Whitson and French (2021) point out, integrating skill-based gameplay integrated has protected loot boxes from being classified as unregulated gambling. Simply revealing the odds of a loot box is not enough. Regulators of gamblified games need to examine video games like *Siege* more thoroughly and analyze not just loot boxes odds, for example, but how the loot box is a monetization device widely distributed in a game and deeply integrated with gameplay.

Keeping the player engaged allows for the continual extraction of data as capital extracted.

A common theme that emerged during my research was the feeling that something was always trying to pull me in for more. Whether it was one more game to get an alpha pack, or the need to finish one of my weekly challenges, *Rainbow Six Siege* felt as if it was persistently beckoning me to play more. This is used to keep extracting my data capital. Downloading my data from Ubisoft Connect allowed me to see what personal player data was being mined and potentially sold, enabling me to better understand data capture and use in live-service games. My data revealed the length and location of playtimes, which is likely an object of optimization efforts. Such optimization efforts can be seen when the new season of *Siege* is released with new content, rebalanced characters, and, most importantly, a new battle pass. This gives the player a

reason to keep playing. This is another area where regulators need to pay careful attention. While I was able to see my data for Ubisoft Connect, it did not reveal the data that was being collected specifically by *Rainbow Six Siege*. Given that data capital is created through free labour, players should have access to their data and how that data is used. By making this information known, it can help counteract gamblified game design that targets players' impulses and channels them to spending.

Rainbow Six Siege places the onus of responsibility on the player and makes monetization seem as if it is a gift.

One of the most interesting trends I noticed throughout my gameplay was the phrasing of sentences on *Siege*'s menu. *Siege*'s menu places responsibility on the player instead of the game taking responsibility for the code it is executing. The player is reminded that when they quit a game, penalties might occur. The player might be encouraged to spend their currency however they like – so long as it is in the store. The player feels free to spend how they want and are rewarded with deals from the store and the battle pass, which provides several cosmetics for the price of three skins. As Jarret (2021) argues, this messaging helps build a relationship between the developer and consumer which leads to the consumer feeling rewarded and empowered. At the same time, *Siege*'s operating model encourages freedom of gameplay – so long as the player follows the rules. *Siege*'s theme of freedom during gameplay helps contribute to feeling an emotional response to purchasing items in the store. What is often ignored is that these microtransactions and gameplay rules are a commodified version of modifications. Companies like Ubisoft have taken control of cosmetics out of players' hands and have started selling what is essentially the same thing. This leads to less freedom and diversity in designs, as well as the commodification of something which was previously free.

Ultimately, this paper has illuminated key monetization strategies that Ubisoft uses in *Rainbow Six Siege*. By using these strategies, Ubisoft creates capital through unregulated means and commodifies previously uncommodified services. Regulators have failed to regulate in-game services (Perk, 2021; Sadowski, 2020; Whitson and French, 2021). I suggest that in the effort to improve regulation of in-game monetization and especially gamblification, a game as a whole must be analyzed, not just loot boxes and other gamblified systems. Gamblified systems function together with the data that is collected as this data helps further the game's monetization systems. Regulators must treat video games with microtransactions and data gathering more seriously and work to implement regulations which are based on a more comprehensive analysis of a game's monetization strategies rather than just listing what they are on a game's store page.

While this paper outlines Ubisoft's monetization strategies in *Rainbow Six Siege*, applying the app-walkthrough method to other popular live-service games such as *Genshin Impact*, *Overwatch 2*, or *Magic Arena* could enable comparative analysis of monetization. My research could also be expanded upon by analyzing non-English video game news sources such as Famitsu. Future scholars can also expand this work by focusing on different commodification systems. While my research focused on devices such as the battle pass and loot boxes, other games utilize monetization techniques that are not present in *Rainbow Six Siege*, such as subscriptions or "gacha" systems. Another possibility is to approach the intermeshing of monetization and gameplay from different critical lenses. For example, a feminist lens could interrogate the gendered politics of monetized play in *Rainbow Six Siege*, while analyzing *Rainbow Six Siege* through a game design or production studies lens could shed further light on how monetization systems are developed and the specific decisions and objectives that guide

their implementation. Ultimately, alternative lenses could reveal further critical insight into the mutual constitution of gameplay and monetization.

Appendices

Appendix A

Image removed due to copyright, please contact author at lucasgiulekas@gmail.com for copy of the MRP with images intact.

Figure A: When a player hits Shift+F2, the tab seen on the left hand of the screen pops up.

Appendix B

Image removed due to copyright.

Figure B: Siege's main menu during Year Seven, Season 3.

Appendix C

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Figure C: Steam Charts data keeping track of *Siege*'s player count.

Appendix D

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Figure D: The updated battle pass which allows players to earn in the order their choosing.

Appendix E

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Figure E: A close-up of the battle pass which features unique pathing and the in-games boards being reused.

Appendix F

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Figure F: The character menu which allows players to equip cosmetics.

Appendix G

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Figure G: Loading into a match, of note the Amaru and Twitch have unique character cards.

Appendix H

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Figure H: Pressing space on the same screen as the previous image presents us with what tools are being brought into the next round, as well as showcasing gun cosmetics.

Appendix I

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Figure I: My team posing after we won a round. The MVP is in the middle (Sledge), and currently part way through an elite skin animation in which he swings his hammer around.

Appendix J

Image removed due to copyright.

Figure J: A screenshot of the *Siege* in-game store.

Appendix K

Image removed due to copyright.

Figure K: The pop-up that appears when one tries to quit a quick match.

Appendix L

Image removed due to copyright.

Figure L: The pop-up which appears when one tries to quit a ranked game.

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