

# Is Simulating Casino Environments in Video Games Worse than Gambling with Loot Boxes? The Case of the Removed Pokémon Game Corner

Short paper

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**Abstract.** This study focuses on the effectiveness of video game age ratings to take into account gambling. As a case example, we look at games in the Pokémon franchise where a casino-resembling “game corner” was either completely removed or its features were cut in order to abide by the PEGI (Pan-European Game Information) age rating rules. We argue that the removal of the game corner or its features is tied to an outdated idea of what gambling is, and is focused on removing associations to traditional forms of gambling rather than removing actual modern forms of gambling, such as loot boxes, from games. We address the difficulty of objectively identifying game mechanics that are linked to gambling and discuss the alternative measures game age raters can take to detect and identify gambling in video games. Finally, we discuss the ethical responsibility of game designers in creating gameplay for children that encourages gambling.

**Keywords:** Pokemon, game corner, gambling, loot boxes, PEGI, age rating

## 1 Introduction

*“We cannot define what constitutes gambling. That is the responsibility of a national gambling commission. Our gambling content descriptor is given to games that simulate or teach gambling as it’s done in real life in casinos, racetracks, etc. If a gambling commission would state that loot boxes are a form of gambling, then we would have to adjust our criteria to that.”(Dirk Bosmans OD of PEGI, 2017)*

Recently, academic studies have problematized traditional viewpoints on gambling, with a particular focus on whether loot boxes are a form of gambling or not (Drummond and Sauer, 2018). Loot boxes are purchasable objects in games, which yield

(seemingly) random rewards. As such, a popular real world comparison for them is lottery scratch cards (Macey and Hamari, 2019). Loot boxes and other similar more obfuscated game mechanics are ubiquitously used in currently popular free-to-play games for their effectiveness in getting players to use real world currency in the game (Zendle et al., 2020). The difficulty in regulating loot boxes by law is the myriad of ways such mechanics can be implemented in games, producing a wide variety of grey areas in which decisions whether a particular game mechanic is akin to gambling are subjective.

The magnitude of this problem is huge due to the popularity of video games and their effects on especially young players (Greenfield, 2014; Kovess-Masfety et al., 2016). Video games as a form of free-time activity have grown each year to the point where they are now the second biggest entertainment sector globally measured in the total amount of revenue generated, only being topped by television (McCaffrey, 2019). The popularity of video games have also sparked scholars to observe ethical questions related to games and gaming beyond gambling (e.g. Gotterbarn, 2010; Munoz and El-Hani, 2012; Warner and Raiter, 2005). In addition, video games have been used and developed to support learning as well as other goals (Boyle et al., 2016). It is thus clear video games have impacts on players, whether it be consciously teaching something useful such as mathematics (Bui et al., 2020), used as a tool for exploring ethical and philosophical questions (Webber and Griliopoulos, 2017) or unconsciously and unintentionally encouraging unwanted behaviours (Alomar et al., 2019). Because of this, identifying correlations between game mechanics and behavioural, cognitive and affective outcomes is paramount.

The purpose of this study is to explore the ethical aspects of gambling in video games from the perspective of age ratings. To this end, we select the Pokémon franchise as a case example. We observe nine games altogether: (1) Pokémon Red, released in Europe in 1998; (2) Pokémon Silver, released in Europe in 2001; (3) Pokémon Ruby, released in 2003; (4) Pokémon Pearl, released in 2007; (5) Pokémon Platinum, released in 2009; (6) Pokémon Alpha Ruby, released in 2014; (7) Pokémon GO, released in 2016; (8) Pokémon Let's go Pikachu, released in 2018; and (9) Pokémon Shield, released in 2019. We compare how during the roughly 20-year period the presence of gambling and akin mechanics have changed and evolved, and refer to the PEGI (Pan-European Game Information) rules and how the case games were rated by PEGI. Via our observations we discuss the effectiveness of the current PEGI rating system to take into account actual gambling encouraging game mechanics and discuss what (1) legislators; (2) game developers; and (3) players and their parents can do to alleviate the identified negative consequences of gambling.

## **2 The (Removed) Pokémon game corner**

The Game Corner is an integral part of the original Pokémon Games Red and Blue (released in Japan as Red and Green in, 1996). The game corner is essentially an in-game casino (See Figure 1) where the player can spend a virtual currency (which is not the same as the game's primary virtual currency) to play slot machines. Interacting with

the slot machines invokes a small minigame through which the player can earn or lose coins that can be exchanged for in-game rewards. However, unlike with loot boxes and other more recently discussed forms of gambling (Macey and Hamari, 2019), the game corner has no connection to spending real world money. In Pokémon Red and Blue, the player is free to visit the game corner at will, it is also connected to the main storyline of the game.



**Figure 1.** The game corner in Pokémon Red. Screenshot taken by the author.

The game corner was introduced to the subsequent main branch Pokémon games Silver/Gold, Ruby/Sapphire and Pearl/Diamond until it was first removed from the European version of Pokémon Platinum (released in 2009) and all subsequent games (Towell, 2009). The given reason for its removal was the new PEGI rules that stated that all games which “*simulate or teach gambling as it’s done in real life in casinos, racetracks, etc*” need to be rated at PEGI-12 or higher (Palumbo, 2017). For the Pokémon games to get a more family-friendly PEGI-rating, the game developers simply removed the game corner. The case of the missing game corner was noted again in 2014 when the remakes of old pokémon games: Omega Ruby, Alpha Sapphire did not include the game corner unlike the original games. In the games instead of the game corner, players were displayed a sign stating that the game corner has closed. In a more recent remake Let’s GO Pikachu and Let’s GO Eevee, which retell the story of Pokémon Red and Blue, the game corner is not removed as it serves an important part of the story. However, the player is not able to play the slot machines in the game corner.

In the resulting online discussion concerning the removed game corner several players pointed out that several gambling aspects in the Pokémon games remained untouched. For example, there is a money bet in each pokémon battle in the game. Furthermore, the topic of loot boxes and other similar mechanics were brought into the discussion, as they can be conceptualized as gambling with real money instead of an imaginary in-game currency (Zendle et al., 2020).

We observed the game corner in four Pokémon franchise games: Red, Silver, Ruby and Pearl. In none of the games it was connected to spending real-world money, in all games the player had the option to have better odds to win than the house and some of the game corner minigames (i.e. in Pokémon Silver) were skill-based and not random. Based on this review, the PEGI-guidelines and statements from the PEGI operations director, we conclude that the game corners were classified as mild gambling-encouragement solely based on their appearance and interior design, and perhaps because of the psychological parallels to gambling, not because they would be actual gambling or related to modern forms of gambling such as loot boxes.

### 3 Encouragement towards gambling and actual gambling

The major ethical question that arose from the removal of the game corner was which one is worse: (1) encouragement towards gambling and the simulation of real-world gambling practices; or (2) actual gambling. The PEGI guidelines seem to target both, however, only partially. The game corner example shows evidence that game developers are fully aware of the PEGI guidelines and are figuring ways to circumvent them with game mechanics that have the same psychological rewards and addictive qualities as gambling, but which do not fall under the current objective currently used criteria for assessing gambling in games (Drummond and Sauer, 2018; Palumbo, 2017).

#### 3.1 Encouragement towards gambling and the simulation of real world gambling

The game corners in the Pokémon games were identified as simulating real world gambling by the PEGI guidelines. As evidence, the re-release of Pokémon Red on Nintendo 3DS received a PEGI 12+ rating due to it contains gambling (and a game corner) while the remake of Pokémon Red released almost at the same time (Let's GO Pikachu) received a PEGI 7+ rating and no mention of gambling. Even though Let's GO Pikachu does contain the very same game corner (See Figure 2) the player cannot interact with the slot machines. The fact that Let's GO Pikachu and Let's GO Eevee got a PEGI-7 rating proves that it is not only the mentioning or displaying of a casino-type of a building that is interpreted as gambling, but the player needs to be able to actively be involved in gambling-simulating activities. While the slot machines and interior of the game corner (See Figure 2) closely resembles that of a casino, it does not function as such to the player. On the other hand, inside the game corner the player engages in trainer battles with members of the Team Rocket, where there is a money bet. Winning grants money while losing takes it away. Thus, we conclude that for the PEGI to classify a game to contain gambling, it needs to have both a casino-stimulating

environment and the player needs to be able to participate in gambling-simulating activities in that particular environment, but not only generally, but in the particular fashion that society assumes gambling to take place (i.e. playing slot machines).

While from an ethical standpoint it is good to be cautious with what content to display to kids, there is no empirical evidence that the game corners that were in place in Pokémon games for 10+years caused any of the millions of kids playing the games to participate in real-world gambling. Still, the positive portrayal of casino life can be regarded as potentially harmful. The positive experiences that players are given in the game corner might direct them to seek similar experiences in the real world. Experiences with games have been shown to, in general, influence human perceptions on real world phenomena, for example, with regards to prosocial behavior (Gentile et al., 2009). King et al., (2014) studied simulated gambling in video games and its connection to monetary gambling and included a Pokémon game in their analysis, however, it is not clear which one. They showed a correlation between engaging in simulated gambling and monetary gambling, however, could not establish causality based on their research design. Yet, their study has several interesting implications. While participation in simulated gambling may reinforce existing desires to gamble in the real world, it may also replace monetary gambling with a much more harmless activity. Furthermore, as games, books and art are frequently used to explore inner feelings, and for conceptualizing the world in new ways and learning self-regulation, games simulating gambling may in fact be a safe way to learn to deal with impulses to gamble.



**Figure 2.** The Game Corner in PEGI 7+ rated Let's GO Pikachu from the year 2018. Screenshot taken by the authors.

### 3.2 Loot boxes and actual gambling

Loot boxes have brought into discussion what constitutes gambling, as essentially players are spending money on a random event in hopes of a chance of obtaining high rewards (Zendle et al., 2020). A recent study comparing the psychological impact and responses of gambling and loot boxes found several similarities (Drummond and Sauer, 2018) and empirical studies have even observed purchasing loot boxes to be linked with problematic gambling behavior in adolescents (Zendle et al., 2019; Zendle et al., 2020).

Loot boxes may be masked in ways which make them difficult for game age raters such as PEGI to identify. For example, the popular location-based game Pokémon GO contains eggs which may be hatched by walking. However, in order to incubate the eggs, currency needs to be used to purchase incubators. As the eggs yield random reward i.e. random pokémon, they fit the definition of loot boxes (Zendle et al., 2020). Surprisingly, Pokémon GO is rated PEGI 3+ on Google Play Store, even though according to PEGI guidelines, the presence of gambling would automatically deserve a game to be rated PEGI 12+ or higher. The operations director for PEGI, Dirk Bosmans explains the situation by saying that a specific set of objective criteria is used for rating games and loot boxes are not currently part of the criteria that constitutes gambling (Palumbo, 2017).

Due to the constantly increasing popularity of the internet and the reach of video games, we predict that gambling in the future will not in fact primarily take place in physical casinos. Rather it may be manifest in the form of purchasing loot boxes in video games, online betting and online casinos. The rapidly changing society with new technologies and games emerging also require rapid responses from policy makers and legislators. The PEGI -rating system seems in this regard old-fashioned. But how to respond? Game mechanics offering random rewards in exchange for real money could be classified as gambling, but then games could start adapting ways to circumvent this by, for example, selling in-game currency indirectly. Going further and rating all applications with in-app purchases as PEGI 12+ or higher could result in a large number of unnecessarily high ratings for games where only a single or few in-app purchases are made, and which have no loot boxes or other gambling elements. Because of these issues it is useful to address loot boxes and gambling in video games as an ethical issue.

## 4 Ethical considerations and actions beyond legislation

Because (1) the video game industry is changing fast; (2) laws and regulations rating the games are often blind to psychological tricks (see e.g. Kimppa et al., 2015; Søraker, 2016) invoked by the games to get players to make in-app purchases; and (3) because the encouragement for problematic behaviour in games is often unclear; it is worth also considering what guardians, players themselves and game developers can do to minimize the problematic outcomes of playing games, particularly with regards to gambling.

#### **4.1 Parents', guardians' and players' role in minimizing negative impacts of video games**

For underage players, parental regulation and control of playing is needed. In the case the games contain some questionable behavior, parents may help understand why the behaviour is bad by describing and discussing it with their children (Cantor and Wilson, 2003). There are several studies reporting short-term temperament increases while playing (e.g. Unsworth et al., 2017), drawing conclusions that games would have permanent negative impacts increasing aggression levels on some people. However, such claims have been demonstrated to be far-fetched and unfounded (Kuhn et al., 2019). There is, however, substantial evidence that excessive playing would be connected to addiction and deficient self-regulation (Gong et al., 2019; LaRose et al., 2003; Seay and Kraut, 2007). In addition, concerns arise from the increasing potential of games being used as a way to collect sensitive information from players, either by the developers or 3<sup>rd</sup> parties (Rauti and Laato, 2020). Purchasing loot boxes may act as a gateway for gambling, betting and going to real-world casinos (Zendle et al., 2019) and in addition, loot box purchasing itself may be a harmful form of gambling. As legislators are currently not interfering with the rampant in-app marketing strategies and loot boxes in video games, parents, guardians and players themselves need to take a stand against it. In fact, many studies encourage parents to be mindful of the games their children are playing, especially with regards to the behavioral impact of the games (Serino et al., 2016).

#### **4.2 Video game developers' role in minimizing negative impacts of video games**

The video game developers' role in this discussion is of ethical nature. As in any marketing profession, the video game developers are also driven by the need to make profit. With bodies such as PEGI taking care of game rating for them, can game companies externalize their responsibility to policy makers and law enforcement and focus on making profit by whatever means necessary? Gottenbarn (2010) points out that all in-game actions are not even self-evident to game developers themselves and emergent phenomena are difficult to predict. Following Brey (1999), game designers could identify possible actions in their game and then explore the effects of those actions on players on an ethical level. Straightforward negative behavior can be ethically less problematic than subtle and insinuating behavior. The latter is more difficult for players to pay attention to and thus, analyze, conceptualize and respond to accordingly.

As our focus in the current work is on gambling in video games, it is worth considering the apparent trade-off of including gambling in games and masking it as something else, such as loot boxes. While loot boxes have turned out to be incredibly profitable (Macey and Hamari; 2019; Zendle et al., 2020), they have negative impacts on players such as causing deficient self-regulation and fatigue (McCaffrey, 2019). In the long run, games facilitating positive things including psychological well-being are more likely to maintain popularity among players than those exploiting players with

psychological tricks potentially resulting in addiction, negative affect and an empty bank account (Kimppa et al., 2015). As such, balance between making players feel positive emotion and incentivizing them to pay for the game is needed. Here several ethical questions can be raised, such as should minor struggling game developers be held to the same standard as major game developers with solid income with regards to healthy game mechanics, and should game developers be more transparent about the negative psychological impacts that some of their game mechanics such as loot boxes may have on children despite not receiving a PEGI 12+ or higher rating.

Beyond the gaming industry, for example food producers and car manufacturers hold the primary responsibility for the safety of their product in the eyes of legislation. On the other hand, we are seeing a phenomenon in food production where cheaper and unhealthier ingredients are being added to food produce such as store-brought meals and McDonalds meals (Schröder and McEachern, 2005). Serving unhealthy food is contrasted by the customers' high expectation on responsible business practice by the company (Schröder and McEachern, 2005). A similar phenomenon can be seen in the gaming industry where the game developers want to portray themselves as ethical and responsible and avoid breaking the law, but use opportunities to make extra income regardless of ethics, as evident by the popularity of loot boxes. Because of this, parents, guardians and policy makers need to stay alert about potentially emerging new harmful effects of games and ensure that potentially harmful games are not given to children.

## **5 Conclusion and outlook**

Games can encourage, teach or incentivize all kinds of unwanted behaviors and the PEGI committee only looks at a narrow and superficial set of game content when giving age ratings to games. While the PEGI rating may be useful for adults when filtering out sexual or violent content, it fails to acknowledge certain forms of gambling such as loot boxes, and completely ignores game mechanics scaffolding the birth of certain unwanted traits such as deficient self-regulation. From the Pokémon franchise, we gave the example of the game corner deserving a PEGI 12+ rating and argued it being the result of a superficial view of what constitutes gambling. As a comparison, the popular Pokémon GO contains aggressive marketing, micro-transactions and real world-parallel lottery ticket scratching -type of gambling in the form of hatching eggs, and has a PEGI 3+ rating.

In this study we explored the ethical issues related to gambling in video games. In light of recent academic literature, loot boxes can be regarded as a form of gambling with real money (Drummond and Sauer, 2018; Macey and Hamari, 2019; Zendle et al., 2020) which currently goes unaddressed by age-rating committees such as PEGI. Parents, guardians, players, developers and legislators have a shared responsibility about what kinds of games children play and what behavioral impacts these games have. In this situation the academia as well as policy makers need to be ready to act fast to evolving and rapidly changing technologies and game mechanics. Finally, while games can have negative impacts, they can also have a multitude of positive effects on



players. Games can bring joy and happiness. Furthermore, they can help relieve stress and anxiety and they can even be used as a vessel to explore ethical issues (Zagal, 2009). But to be able to enjoy these positive things, the negative ones need to be filtered out.

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