Don't Tell Me How to Play: When Gamers Resist Attempts to Control the Platform Ecosystem

Short Paper

Introduction

The video game market is a major entertainment segment, alongside the film and music industries. PC games alone, were estimated to generate 26 billion dollars in 2016[1], while the overall value of the video game market was 92 billion dollars[2]. In recent years, new platforms and business models have emerged, enhancing, evolving and complementing gamers' experience. The result is a uniquely complex ecosystem of multi-sided platforms, in which communities of gamers play a key role in innovating the game product (Hagiu 2007, Hagiu and Wright 2015). Namely, game-producers' own platforms are now complemented by (I) "modding" platforms that allow users to create programmed modifications (i.e. "mods") for the base game, as well as for gamers to freely download these mods and append them to the purchased game (notable examples include: Nexus Mods, Steam Workshop, and ModDB); (II) distribution platforms, such as Steam, which allow consumers to purchase games from multiple producers ant to enhance their game experiences (e.g. keeping scores, interacting with fellow players); and (III) streaming platforms that allow gamers to broadcast real-time gaming streams or to play pre-recorded sessions, thus offering other consumers the option of learning about the game, its advantages and limitations.

These new platforms, which we refer to here as community based-platforms, extend to beyond the mere provision of complementary products (as common in industries such as game consoles and smartphone software, Hagiu and Wright 2015) to community-related open innovation activities. Namely, these community-based platforms allow gamers to vocalize, socialize and collaboratively innovate and create new game experiences, thus providing substantial value beyond that which is offered on the game producers' websites. Gamers active in these community platforms benefit from social gains (credit and status in the community) and monetary rewards (e.g. donations to the creators of mods, advertisement revenues to game streamers) (Arakji & Lang 2007, Marchand & Hennig-Thurau 2013). The value gamers generate from these multi-sided platforms participation is, therefore, integrative, combining both a rich gaming experience and a rewarding social interaction.

Notwithstanding the benefits to game consumers, the emergence of community based-platforms pose a threat to firms engaged in game production. These complementary platforms may limit a producer's control over the game's distribution and/or gamers' experience. For example, distribution platforms such as Steam regularly conduct flash and seasonal sales, significantly lowering games' price, potentially hurting the producers' short-term revenue. Modding platforms may curtail producers' ability to monetize on their own for-sale add-ons, as well as limit their ability to determine the overall game's design and consequently the gameplay[3]. Streaming and broadcasting platforms, which allow viewers to watch other gamers play, may lower the chance that the viewers will subsequently purchase the game, as they may decide that the game feel that they have already experienced the game. Game producers who face these potential threats need to develop strategies that would on one hand offer consumers a rich gaming experience and on the other hand curtail uncoordinated action by complementary platforms.

The context for our study are game producers' strategic moves, attempting to control the video game platform ecosystem, for example by limiting co-creation and open innovation around the base product, and

[1] https://www.superdataresearch.com/market-data/market-brief-year-in-review/
[2] https://www.pcgamer.com/pc-gaming-market-worth-36-billion-in-2016/
[3] Free modifications may directly compete with the developer's paid game extensions. In addition, modifications may introduce content that is incompatible with the developer's vision for a game.

social features on these external platforms. These strategic moves - as will be detailed in the subsequent sub-chapters – had created uproars within gamers' communities, upsetting gamers who perceive such moves as constraining their ability to freely collaborate and construct integrative gaming experiences. Our analysis focuses on gamers' reaction, as they are manifested in various community online forums and consumption statistics.

In this research-in-progress, we have observed gamers' reactions, both in terms of rhetoric and actions, in response to game producer's strategic moves which they perceive as threatening to curtail their freedoms. Our qualitative content analysis investigates gamers' expressed concerns, seeking to understand the reasoning for those expressed emotions, and our quantitative analysis explores how these responses affect the game producer business performance. We briefly discuss how our preliminary findings inform extant knowledge on community's behavior and platform strategy in open innovation environments.

Literature Survey and Research Questions

Platform Ecosystems

Relevant to our investigation is the literature on platform openness and synergies. Eisenmann et al. (2009) and Parker and Van Alystne (2018) explain that platforms are "open" to the extent that they have fewer restrictions on participation, development, or use for either developers or end users. In the last decade, it became evident that firms who operate in a networked and a service-oriented environment (including gaming industry) should form a clear strategy regarding their relationships and interfaces with complementary services on the network. Research has shown that a producers' success often depends on external platforms that complement and enhance products' value (Kapoor and Agarwal 2017). An open innovation model offers distinct economic advantages, because it allows a producer to harness external innovation as a complement to internal innovation (Chesbrough 2003). Such added services could lead to an improved product at lower costs. At the same time, the ecosystem of complementors that emerges around a core product may threaten the producer's position in the market, by introducing risks, such as: attrition due to reduced switching costs and the producer's lowered ability to control the consumption experience and capture rents (Gawer and Cusamano, 2002, Gawer and Henderson, 2007, Parker and Van Alystne, 2017), IP theft and increased dependency on complementary platforms (Tiwana 2013, Iansiti and Levien, 2004; Parker, Van Alstyne, and Choudary, 2016). These tensions force firms to make tough strategic choices. To the best of our knowledge, our study is the first to investigate consumers' responses to a firm's strategic decision to attempt and "close" what was once an open and collaborative platform ecosystem.

Open Innovation in the Video Game Industry

The context for our study is the video game industry, which provides an especially interesting case for studying the consequences of producers' strategic moves in community-based open innovation. Playing video games is a particularly engaging activity. Gamers, thus exhibit high levels of emotional involvement and active participation in their online communities (Arakji & Lang 2007). These unique characteristics accentuate consumers' responses for producers' attempt to curtail the game experience.

In recent years, leading firm that produce games have begun involving external agents – namely online communities of game-fan programmers – in games' design and production. These user/developer communities of voluntary contributors are similar to those of open source software (OSS) development (Scacchi 2004, Scacchi 2011). In the context of game industry, contributors' outputs are referred to as 'mods' (short for *modification*) (Postigo 2003), including: new game models, textures, sounds, game mechanics, or even complete overhauls of the commercial base product. Contributors are called 'modders' and the group is referred to as a 'modding' community.

In addition, game producers are actively encouraging groups and individual influencers to promote their products in an attempt to encourage consumption, increase brand-awareness, and establish fan-based

activity around their brands. Typically, these influencers produce video content in a form of real-time streams (Kaytouh et al. 2012, Nascimento et al. 2014, Smith et al. 2015) and pre-recorded "letsplays" and game walkthroughs (Glas 2015, Nylund 2015). Game reviews and video essays are also a frequent form of video content produced by the online media influencers.

Another form of communal involvement in the gaming industry involves gamers' willingness to voluntarily test and improve the quality of a game, practically extending the producers' quality assurance procedures and beta-testing efforts. The "early-access" distribution model offers gamers to opportunity to purchase an unfinished beta game - or even alpha-version of the game product - for reduced price, thus engage in the beta-testing process (Davidovici-Nora 2014, Lin et al. 2018), . Gamers are often eager to engage with the game in the early stages of its development, provide their feedback and creative ideas, and thus influence the game's design. The firm producer benefits by harnessing the efforts (and wisdom) of the crowd, directing the energy of their internal staff at addressing gamers' feedback and further enhancing the product. For example, one of the most popular games currently, *Playerunknown's Battlegrounds*, employs the early-access distribution model[4].

These various forms of community engagement have altered the relationships between game producers and consumers, turning the latter into "prosumers". Namely, gamers are now co-producing their game experiences in a variety of ways (sometimes independent of the firm-producer's original intentions), by mashing together experiences from various complementary platforms.

The underlying theme of extant research in the area emphasizes the firm-producers' potential to exploit the free labor of user-developers and reap their labor-intensive creativity without giving back (Hong and Chen 2013, Kuklich, 2005, Terranova 2000). Kuklich (2005) defines the work of modders as a "precarious labor", or "playbor" that firms often seek to exploit in an effort to enhance their offerings at little or no cost. Firms also look to attract popular video game streamers to promote and play their product, often treating streaming as a full-time activity resembling traditional job models. However, the firm can unilaterally terminate streamers' engagement at any time, as well as can decide what the streamer can and cannot broadcast (Larkey et al. 2015). One study has found that modders are not naïve to firm's attempt to leverage on their voluntary contributions and recognize the value they create for the firm-producer (Banks & Humphreys 2008) Moreover, modders are able to influence the game production process by threatening the firm to limit their contributions to the game (Banks and Humphreys 2008).

Research on the relationship between these new prosumers and the emergent platforms is still scarce. From a theoretical perspective, it is not clear how the emergence of novel platform ecosystems change the strategic balance between various entities in the gaming industry. In particular, little is known about the ways in which platform-based strategic dynamics affect gamers' attitudes and their modes of participation, and consequently consumers' retention and the success of novel business models. In our research we investigate the way in which gamers - which are active on the various community-based platforms - respond to strategic moves initiated by the firm-producers, and we attempt to address two research questions: (**RQ1**) What are gamers' expressed concerns upon an attempt of a game producer to limit gaming experience on community-based platforms? and (**RQ2**): how are these concerns reflected in the firm's economic performance?

Methodology

Case Selection and Description

We analyze three comparative case studies that illustrate the complex dynamics platform ecosystems in the game industry. Our choices were informed by the extreme case selection technique (Gerring 2007). Extreme cases are particularly useful when the ambition is to generate new theory, because they are paradigmatic of the phenomena under consideration. In our context, gamers' responses to game producers attempt of limiting the power of community-based platforms. To select these extreme cases, we have investigated the

[4] https://www.wsj.com/articles/the-hottest-videogame-of-2017-isnt-finished-yet-1506855614

three most prominent types of community platforms in the gaming industry and selected the most popular platform in each category:

- Modding platforms: NexusMods, where community-chosen personnel are responsible for the moderation and curation of content, with more that 14 million members and 250,000 active mods for 535 games.
- Distribution platform: Steam by game-developer company Valve, with more than 15,000 games for sale, and 67 million monthly consumers. In comparison, the numbers for Steam's closest rival distribution platform - EA Origin, hosted by the game producer Electronic Arts - were roughly a fifth (less than 10 million users and 360 titles).
- Streaming platforms: Twitch by Twitch Interactive, with almost 4 million unique broadcasters and 100+ millions active viewers. Twitch is ranked 31 worldwide and 13 in the US in Alexa's rating of web traffic.

We then searched in each platform's history for a prominent case in which a leading game producer has decided to prohibit/restrict the use of its games on that platform, or openly compete with the community-based platform leveraging on its power as the legal game owner. Prominent cases were characterized by extensive coverage in the general press (gaming websites, blogs) and substantial amounts of discussions in public gaming forums. We have identified three such prominent cases – one for each platform type - each with at least 100,000 comments and more than 1000 threads in the public gaming forums of Reddit and Neogaf. We describe these cases in table 1.

In the first case, Electronic Arts (EA), one of the largest game publishers, which are responsible for successful game series' such as "Sims", "FIFA", and "Battlefield", has created their own digital distribution platform - *EA Origin* - in 2011. To purchase and play the EA's games, gamers now had to download and install the additional desktop software client that included both the EA game store and the proprietary Distribution Rights Management (DRM) software that restricted the game's use. Simultaneously, the company withdrew their games from the popular Steam platform.

In the second case, Bethesda, the developer of the successful "The elder Scrolls" and "Fallout" game series, has opened their own modding platform - *Creation Club* - intended to host paid and free mods from both the firm and volunteer modders. By managing such a modding platform the firm would have full control over the type and quality of the content hosted on their site. This strategic move placed the firm in a direct competition with existing community-based modding platforms such as Nexus Mods.

In the third case, the Japanese game developer Atlus, has attempted to restrict the "Persona 5" game from being broadcasted on streaming platforms (for a limited time) by threatening to pursue those infringing their copyrights and banning their PlayStation accounts. The official justification for this restriction was the concern over game-story spoilers that could potentially aggravate the unsuspecting Stream viewer[5].

Data Sources

Our analyses aim to capture the effects of firm-developers' strategic moves as they are reflected in gamers' responses. To do so, we focus on two types of data :(a) the contents of comments published on various game-related discussion forums (Reddit, Neogaf) covering 6 months after the event, and (b) changes in game sales and firm's stock prices up to a year after the event. Overall, we have collected approximately to 3,000 threads on Reddit and Neogaf pertaining to our three cases, resulting in a total of 500000 comments. Quantitative performance indicators were collected from public sources: the Steam tracker web-site SteamSpy, web sites of modding platforms (*Nexus Mods* and *Bethesda Creation Club*), and stock market analyzers.

[5] See https://atlus.com/note-persona-5-streaming/

Table 1 – Summary of Cases			
Firm/Publisher	Platform	Famous games	Controversy
Electronic Arts (EA)	Origins	"Battlefield", "FIFA", "SW Battlefront"	Open their own distribution platform and pulling their games off Steam
Bethesda	Creation Club	"The Elder Scrolls", "Fallout"	Open their own Modding platform, thus competing with Nexus Mods
Atlus	Twitch	"Persona" game series	Attempts to restrict streaming on Twitch

Preliminary Results

Our preliminary results suggest that game producers' attempts to establish control over their products and services through disintermediation of community-based platforms are being perceived by the gamers as a direct threat to their game experience, often resulting in a substantive backlash from the gamers' community. Our findings in regards to RQ1 show that gamers fear that producers' moves will jeopardize the production activity and the viability of communities of fellow players, modders and streamers, which have become central to their gaming experience. In our initial coding of the texts, we found that gamers primary concerns relate to: (1) the potential for producers' aggressive monetization of the game, (2) limited co-creation opportunities, (3) suppression of the gaming social networks, and (4) a fear related to the firm's control of information flow around the product. In Table 2, we illustrate gamers' concerns around the three cases in question through a few representative quotes.

Table 2 – Gamers Concerns			
Concerns	Explanation	Illustrative Quote (All quotes taken from Reddit)	Case and Platform
The potential for producers' aggressive monetization of the game	Gamers are worried that producers' intent is to charge more and "lock in" the gamers to make them pay (more).	"[EA] is trying to sell a product at a higher price point and to convince people that it's worth the price. But if it's not, your customers will be even less likely to buy next time."	Steam/EA Origin
Limited co-creation opportunities	Gamers are worried that producers' strategy will limit the possibility to create new or free modifications for their games.	"If Bethesda starts making money off mods, then every other company is going to want to make money off mods. Just don't buy them. Paid mods for Skyrim a few years ago lasted a week or 2 until community backlash destroyed them. This might take a bit longer, but soon enough they'll be made free."	Bethesda/ Nexus Mods

Suppression of the gaming social networks	Gamers are worried that prohibiting access to different community platforms will alter their social connections and limit their interaction with fellow gamers	"At that point the real problem is that half of your favorite games will be tied to one account that uses one client with one set of friends, and the other half will be tied to another account on another client with another set of friends."	Steam/EA Origin
Fears related to the firm's control of information flow around the product	Gamers are worried that producers will attempt to control when and how information about games including gameplay, narrative, level details, cheats, etc.	"Oooohhh Atlas.... what have you done... Asking us to limit content under the pretense of protecting viewers from spoilers (who know DAMN WELL what they're doing) strikes me as disingenuous at best."	Atlas/Persona 5 streaming restrictions

Thus, it seems that gamers side with the complementary platforms' financial interests and against the game producers': the latter appear as "greedy" and fortune driven, whereas the former being perceived as the "guardians of the game community". Such attitudes are reflected in the sample of quotes presented below.

> [EA case] "I deleted my Origin account and associated library of EA games. There are far too many quality games on the PC platform for me to ever catch up. Pretending that one developer doesn't exist won't impact me. My money will go where it should, to developers who don't engage in such shenanigans".
>
> [Bethesda case] "Creation Club had the potential to be more than just paid mods, becoming more of a paid, community-made expansion pack system that encourages creators to actually create. As it stands now, it's nothing more than a low quality paid nexus mods where Bethesda gets a cut."
>
> [Atlas case] "God, I can't wait for that spoilercast for Persona 5. Like I honestly hope it's the entire goddamn episode." (All quotes are taken from Reddit gaming forum)

Moreover, our initial quantitative analysis for RQ2 shows that producers' actions have negatively impacted economic performance. For example, EA stock lost almost 25% of their value in the 3 months subsequent to the release of their *Origin* distribution platform. Similarly, a month after the announcement of Bethesda's *Creation Club* modding platform, the producers' 8-month consecutive sales increase ended with a decrease in sales for every one of their games. Interestingly, the reduction in monthly sales extended beyond the games that were featured on *Creation Club* to all of the games marketed by Bethesda.

Table 3 – Consequences of Attempts to Control Access to Games

Case	Consequence for the firm	Numbers/Details
Electronic Arts	Drops in shares after Origin platform is announced	From 24,19 USD on Jul 1 2011(date of announcement) to 20 USD on Aug 5 2011. This has been the start of the most difficult year for EA with share price which continued to drop to 11 USD (July 2012).
Bethesda	Drop in games sales in concurrent months	Sales in the month following the announcement (Sep 2017)_dropped 10% - 50% across multiple Bethesda-published games (The Elder Scrolls and Fallout game series).
Atlus	Damage in reputation	Hundreds of users ridiculing the company's decisions on Reddit and Neogaf.

Discussion

Our preliminary findings show consumers' attitudes towards the various platforms from which they derive value and highlight the complex strategic decision faced by firm-producers who try to manage interactions with collaborators-consumers in the face of multiple forms of platform mediation. Our study is situated in a uniquely complex platform ecosystem where consumption, co-creation and social experiences across the multiple platforms together shape the value derived from the product – the game offering.

Our research, even in this early stage, has contributions to the fields of IS and strategy. The first contribution of our study is in exposing communities' reactions to tensions between a firm-hosted platform (in our case, the game producer) and complementary community platforms. Previous literature has documented cases in which consumers are protesting against intermediaries, wishing to make a direct interaction with the content producer (Andal-Ancion et al. 2003, Waldfogel and Reimers 2016). However, in the game industry, we observe an opposite phenomenon where intermediaries who play a community role for the gamers are instead winning the appreciation and support of their users while the original content producers, the people who invented the game in the first place are being opposed to and accused of misconduct.

A second contribution of our study is in shedding light on platforms' strategic choices regarding open innovation and community collaboration. Whereas platform scholars have argued that complementary platforms may pose a threat by limiting the producer control over usage of its products and services (Parker and Van Alystne, 2017; Tiwana 2013, Gawer and Cusamano, 2002; Iansiti and Levien, 2004; Gawer and Henderson, 2007; Parker, Van Alstyne, and Choudary, 2016), our findings indicate that a substantial risk is associated with actions that curtail complementary platforms, thus suggesting that a cooperative strategy may be more effective (Kapoor and Agarwal 2017). In particular, we propose that in the complex ecosystem of platforms that characterizes the gaming industry, a game producer may not be able to manipulate the platforms of complementaries. Instead, video game producers may need to realize that the success in selling their games depends on the value gamers derive from the "bundle of platforms". Hence, the more consumers' experiences - from the combination of platforms - are fulfilling, the higher the sales for the producers' base product (Poretski & Arazy, 2017). In fact, some firms have adopted this view, for example by supporting modding platforms (providing a mod development toolkit and other supporting tools).

Looking forward, we aim to employ the extreme case of the gaming industry for developing a nuanced theoretical understanding of producer-consumer relationships in platform ecosystems.

References

Andal-Ancion, A., Cartwright, P. A., and Yip, G. S. 2003. "The Digital Transformation of Traditional Business," *MIT Sloan Management Review* (44:4), pp. 34-41.

Arakji, R. Y., and Lang, K. R. 2007. "Digital Consumer Networks and Producer-Consumer Collaboration: Innovation and Product Development in the Video Game Industry," *Journal of Management Information Systems* (24:2), pp. 195-219.

Banks, J. A., and Humphreys, M. S. 2008. "The Labour of User Co-Creators: Emergent Social Network Markets?," *Convergence: The International Journal of Research into New Media Technologies* (14: 4), pp. 401–418.

Davidovici-Nora, M. 2014. "Paid and Free Digital Business Models Innovations in the Video Game Industry," *Communications & Strategies* (94), pp. 83–102.

Gawer, A., and Cusumano, M. A. 2002. *Platform Leadership: How Intel, Microsoft, and Cisco Drive Industry Innovation*, Boston: Harvard Business School Press.

Gawer, A., and Henderson, R. 2007. "Platform Owner Entry and Innovation in Complementary Markets: Evidence from Intel," *Journal of Economics & Management Strategy* (16:1), pp. 1-34.

Glas, R. 2015. "Vicarious Play: Engaging the Viewer in Let's Play Videos," *Empedocles: European Journal for the Philosophy of Communication* (5: 1–2), pp. 81–86.

Hagiu, A. 2007. "Merchant or Two-Sided Platform?," *Review of Network Economics* (6:2).

Hagiu, A., and Wright, J. 2015. "Multi-sided Platforms," *International Journal of Industrial Organization* (43), pp. 162-174.

Hong, R. and Chen, V. H. 2013. "Becoming an Ideal Co-creator: Web Materiality and Intensive Laboring Practices in Game Modding," *New Media & Society* (16:2), pp. 290–305.
Iansiti, M., and Levien, R. 2004. "*Strategy as Ecology*," Harvard business review, 82(3), pp. 68-81.
Kaytoue, M., Silva, A., Cerf, L., Meira, W., and Raïssi, C. 2012. "Watch Me Playing, I am a Professional," in *the Proceedings of the 21st international conference companion on World Wide Web - WWW '12 Companion*.
Kuklich, J. 2005. "Precarious Playbour: Modders and the Digital Games Industry," *The Fibreculture Journal* (5:5).
Lin, D, Bezemer, C. P., and Hassan, A. E. 2018. "An empirical Study of Early Access Games on the Steam Platform," *Empirical Software Engineering*. (23,2), pp. 771–799.
Marchand, A., and Hennig-Thurau, T. 2013. "Value Creation in the Video Game Industry: Industry Economics, Consumer Benefits, and Research Opportunities," *Journal of Interactive Marketing* (27:3), pp. 141-157.
Nascimento, G., Ribeiro, M., Cerf, L., Cesario, N., Kaytoue, M., Raissi, C., Vasconcelos, T., and Meira, W. 2014. "Modeling and Analyzing the Video Game Live-Streaming Community," in *Proceedings - 9th Latin American Web Congress, LA-WEB 2014*.
Nylund, N. 2015. "Walkthrough and Let's Play: Evaluating Preservation Methods for Digital Games, In *Proceedings of the 19th International Academic Mindtrek Conference (AcademicMindTrek '15)*, 55–62
Parker, G., and Van Alstyne, M. 2017. "Innovation, Openness, and Platform Control," Management Science.
Parker, G. G., Van Alstyne, M. W., and Choudary, S. P. 2016. *Platform Revolution: How Networked Markets Are Transforming the Economy and How to Make Them Work for You*. WW Norton & Company.
Poretski, L., and Arazy, O. 2017. "Placing Value on Community Co-creations: A Study of a Video Game' Modding Community," In *CSCW*, pp. 480-491.
Postigo, H. 2003. "From Pong to Planet Quake: Post-Industrial Transitions from Leisure to Work," *Information, Communication & Society* (6:4), pp. 593–607.
Scacchi, W. 2004. "Free and Open Source Development Practices in the Game Community," *Software, IEEE*, pp. 59–66.
Scacchi, W. 2011. Modding as an Open Source Approach to Extending Computer Game Systems. International Journal of Open Source Software & Processes 3, 3: 36–47.
Smith, T., Obrist, M., and Wright, P. 2013. "Live-streaming Changes the (Video) game," In *Proceedings of the 11th european conference on Interactive TV and video - EuroITV '13*.
Terranova, T. 2000. "Free Labor: Producing Culture for the Digital Economy," *Social Text* (18:2 63), pp. 33–58.
Tiwana, A. 2013. *Platform Ecosystems: Aligning Architecture, Governance, and Strategy*, Newnes.
Waldfogel, J., and Reimers, I. 2015. "Storming the Gatekeepers: Digital Disintermediation in the Market for Books," *Information Economics and Policy* (31), pp. 47-58.