

An Exploration of Monetization in Free-to-Play Games

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Abstract

Free-to-Play (F2P) Games are an explosive sector of the already growing games industry. The emergence and success seen with this model has spurred much debate on game design, ethics, and the inner workings of the F2P model. In this thesis I explore the F2P model from the bottom up, with a focus on monetization. To conduct this analysis, I first look at concepts that are related to the F2P model (e.g., agile methodologies and digital business models) and the F2P model itself.

The primary goal of this thesis is to explore how consumers feel towards monetization in F2P games and help provide foundational concepts/principles for F2P games. Due to the F2P model still being young, I started my primary research by interviewing professionals in the industry that are in the F2P sector. These interviews gave me insights to the F2P model and how to approach monetization in general. These interviews also led to developing a framework called the Games as a Service Triangle, which looks to show the importance of the relationship between the game design, monetization design, and marketing of a F2P game. With the insights gained in these interviews I then moved on to conduct a survey to explore how consumers feel about F2P games (respondents were primarily casual gamers). Results were mixed with respondents having both positive and negative feelings towards F2P games.

Introduction

Free-to-Play (F2P) is a developing sector in the video game industry. Simply, this model is where a company allows consumers to play its game for free and gives players the option to make in-game purchases. The Free-to-Play model originated in Asia in 2001, where it was used as an alternative to the subscription model and to combat piracy. The growth and acceptance of this model can be seen in a survey conducted by PlaySpan and Magid Associates (2013), where it was found that the majority of gamers play F2P games (estimated to be 100 million). As of now, F2P games are primarily seen on PC and mobile devices (Smartphones and tablets), but with the launch of the PlayStation 4 and Xbox One more F2P games will be seen on gaming consoles.

The F2P model changes the dynamic of the business and development of games. For starters, it presents its own design challenges since the game and monetization design must flow/work together. Also, developers and business people must work closer together, particularly developers and marketers due to the fact of the importance of customer relationship in F2P games (and entering the realms of services marketing). As Will Luton author of, *Free 2 Play: Making Money From Games You Give Away*, puts it, “F2P intrinsically links design and business” (pg. 72). This all ties in, with the fact, that F2P games intrinsically are agile. And one of the core principles of the agile methodologies is collaboration through cross-functional teams. Lastly, due to being a ongoing service, F2P games are updated and have content added to them on a regular basis.

One question that is asked is, why use this model? Why give a game for free rather than having the consumer pay first? Well, F2P games have the potential to generate large revenues and get immense amount of players in a game. One market that F2P games are in are the virtual goods market, which projected to grow, according to ThinkEquity LLC, “We expect the virtual goods markets to grow at a 21% CAGR to \$20 billion by the year 2014” (Games as a Service, 2011). The revenue potential of this model can be seen with *GungHo Entertainment’s, Puzzles & Dragons*, which in February reported of grossing \$2 million a day on average (Gamasutra, 2013). F2P games also have the potential to reach many more consumers. An example of this reach is *Riot Game’s, League of Legends*, which in 2012 developer, *Riot Games*, reported of having 32 million monthly active users (*Riot Games*, 2012). These examples exemplify that F2P games can be big revenue generators for companies, but also lets more players into your game, hence giving a company the opportunity to create a very loyal player base.

With its success, there is also much debate among professionals and even consumers about F2P games. These arguments usually cover the ethics, design, and monetization strategies of F2P games. Articles and forum posts that are about F2P will usually have comments of people in favor and not in favor of the model. The gaming industry is still very young and this model is even younger, thus there is still much to learn about this model.

This thesis looks to analyze F2P games from the bottom up for the very fact that there is still much to learn about this model. Below are the primary goals of the thesis as well as a breakdown of how this thesis is divided up:

The primary goals of this thesis is to gain insights to consumers' perceptions and attitudes towards the Free-to-Play games, the monetization strategies implemented in them, and F2P model itself.

This thesis is divided into 5 sections. The first section will explore key concepts that are important and relevant to the F2P model like the concept of free, digital business models, impulse purchases, and agile software development and marketing. Section 2 will go over F2P in general covering Games as a Service, the ARM (acquisition, retention, and monetization) framework, and the arguments against F2P. Section 3 covers monetization in F2P, in this section I go over the concept of monetization, games monetization, real money transfer, virtual goods/currency, current strategies employed, whales, and the Games as a Service Triangle. Also in section 3 I will be using primary data (along with secondary data) gathered from interviews conducted with 9 professionals in the industry. Section 4 will review the results of an online survey I conducted with gamers on the topic of F2P and monetization. Lastly, section 5 will return to the interviews, where I will share the results of the question, "Where do you see F2P games in 5 years?"

Key Concepts

The concepts I will be reviewing are essential to the F2P games and serve as fundamental principles for the model.

The concepts I will be exploring are:

- Free
- Digital Business Models
- Impulse Purchases
- Agile Software Development and Marketing

Free

Free is probably the most important word in F2P. Let's first explore why these games are free. In his book, *Free*, Chris Anderson talks about two economies: the atoms economy (physical goods) and the bits economy (digital goods). "The atoms economy is inflationary, while the bits economy is deflationary" (Anderson, pg.12). Once games were able to be distributed digitally, it was only a matter of time before we would see games with price tags of zero. One of the primary reasons products in the bits economy can have a price of zero is that the price to reproduce them (or their marginal cost) is practically zero. Since these games are free, it allows game companies to better compete with piracy (more on this later).

Anderson also states the power of the word, "Free is a word with an extraordinary ability to reset customers' psychology, create new markets, break old ones, and make almost any product look more attractive" (Anderson, pg.10). The free we are talking about here is not the tactics of: "Buy two get one free" or "Free shipping," the free we are talking about is an economic force: "Free is not a gimmick, a trick to shift money from one pocket to another. Instead it's driven by an extraordinary new ability to lower the costs of goods and services close to zero" (Anderson, pg. 12). Free grants consumers access to a company's product at no expense, and looks to generate revenue elsewhere. Consumers look at zero priced products differently compared to positive priced products.

According to Wharton professor Kartik Hosangar, "The demand you get at a price of zero is many times higher than the demand you get at a very low price. Suddenly, the demand shoots up in a nonlinear fashion" (Anderson, pg. 62). Examples of this demand spike can be seen in the gaming industry through subscription based MMORPGs (Mass-Multiplayer Online Role Playing Games) went F2P:

"DC Universe picks up 120,000 new users" (GameIndustry International, 2011)

"EverQuest Sees Usage up 40 Percent After Free-to-Play" ([a]list daily, 2012)

There are several reasons for free increasing demand in products. For starters, free isn't just a price, it's an emotional trigger (Anderson, pg. 63). Consumers evaluate a zero priced product differently compared to a positive priced one. According to Shampah'er and Ariely (2007) evaluating demand for a Hershey's chocolate in relation to price:

“Experiment 1 demonstrates that a 1¢ difference in price has an enormous influence on demands if it represents a difference between a positive and zero prices but not when it is a difference between two positive prices. Participants reacted as if a free Hershey's had more intrinsic value than a positively priced Hershey's.”

Consumers add value to free products due to virtually no costs being associated to it. Also costs called, “Mental transaction costs” are lowered as well. These costs are simply the mental tolls of thinking while purchasing something. Consumers also do not associate risk with free, the reason being according to Dan Ariely, “There's no visible possibility of loss when we choose free” (Anderson, 64). Free also doesn't cause customers to enter a decision making process to the same extent as something that has a price tag (no matter the amount). It should be noted that even with micro-transactions consumers will enter a decision making process and evaluate what they are buying (i.e., What is the risk? Is it really worth this much?). Lastly, due to its benefits, free leads to faster product diffusion. “The greater the cost of adopting the new service the more cautious consumers are; and conversely, the greater the benefits from adoption, the quicker consumers are at adopting the new service” (Cabral, 2012).

Free is a powerful weapon, and is one of the main drivers of acquiring players in F2P games. Players evaluate these games differently and add value to them due to the fact that they do not see costs and associate less risk with F2P games. In essence, F2P combines the advantages of the power of free and combines it with paid, as Chris Anderson states, “Free plus Paid can span the full psychology of consumerism” (Anderson, pg. 70).

Digital Business Models

Seeing F2P as a business model, it would be considered a digital business model. There are several definitions of a business model out there, but I will use the one stated by Alexander Osterwalder and Yves Pigneur, authors of *Business Model Generation*, “A business model describes the rationale of how an organization creates, delivers, and captures value” (*Business Model Generation*, 2010). Thus, a digital business model describes how an organization creates, delivers, and captures value on a digital platform. Going further, according to a study by IBM, digital business models are an evolution of digital transformation that started with digital products/infrastructure, then digital distribution/web strategy, and finally, digital business models.

Digital business models follow the same theme stated in the last section, they have a zero marginal cost, “With the arrival of the last generation of Information Technology (IT), symbolized by the Internet, information goods and services are characterized by significant network externalities, high fixed costs and variable costs (of reproduction) trending towards zero” (Brousseau, 2007). Obviously, the digital business models I will be exploring revolve around free.

Overview of Digital Business Models

The book *Business Modeling in the Dynamic Digital Space: An Ecosystem Approach*, explores what the business model in the year 2020 might be like, primarily focusing on digital business models. Seeing how digital business models are described in this book, the business model of a F2P game is definitely described. Take for example these characteristics described in a digital business model: The business model is always evolving and changing, collection of data will allow companies to respond to changes, and engage in continual online experimentation (El Sawy & Pereira, 2012). All these characteristics are seen in F2P games. Customer experience is also another big factor in digital business models:

“In 2020, the customer experience becomes primate as value is primarily created through the process of consumption and the experience which it creates. Designing more effective customer experiences around services provided through digital platforms will take center stage in designing new digital business models” (El Sawy & Pereira 50).

The experience created in digital business models is co-created, primarily between company and customer (there could be a 3rd party involved as well). An example of this co-creation is seen through UGC in games like *Team Fortress 2* and *PlanetSide 2*, where players can create and sell items in the game store. When these items are sold, the item creator and game company share the profits with the service providers (in this case Valve and SOE). Another way we are seeing this experience in digital business models is that F2P games are constantly being tweaked based on player feedback (which correlates with the agile methodology).

Lastly, in the core of digital business models is service, which could be one explanation why the term *Games as a Service* is popping up more. This is where the concept of service dominant

logic (SDL) comes in. SDL is, “The application of specialized competences (skills and knowledge, through deeds, processes, and performances for the benefit of another entity or the entity itself (self-service)” (Vargo & Lusch, 2004). Many of the themes in SDL are in digital business models. The goal of SDL is to, “Customize offerings, to recognize that the consumer is always a coproducer, and to strive to maximize consumer involvement in the customization to better fit his or her needs” (Vargo & Lusch, 2004). The F2P model embraces SDL by simply allowing the customer help shape the game. An example of this player focus can be seen in the roadmap feature in *PlanetSide 2*. This feature allows players to interact with the development team and help decide future updates and content of the game.

Now let us review the types of digital business models out there, seen below (Vindicia, 2012):

- Freemium
- Virtual Economy
- Micro-transactions
- Ad-Revenue
- Digital Hybrid model

Freemium

Freemium combines the words of free and premium. This term is usually used to describe F2P games. The core of freemium is, “Give a core product away for free and sell a premium product; like the way Skype gives away free computer calls and sells voicemail calls to landlines and other products” (Freemium 101). An example of freemium in F2P games would be the subscription for *DC Universe Online*. The, “Legendary Subscription,” in the game can be seen as a premium version of the game, letting players form Leagues (guilds), unlimited in-game currency can be stored, more inventory/character slots are available, and monthly station cash to name a few added features. Does this mean you need the premium version to enjoy the game? Of course not, you can stick to playing for free and still enjoy the game. Enjoying a F2P game without paying is a core value of F2P (more on this later). Freemium can be seen as the base of F2P or what F2P is based off of (the terms are usually used interchangeably).

Virtual Economy

According to Wikipedia a virtual economy is, “An emergent economy existing in a virtual persistent world, usually exchanging virtual goods in the context of an Internet game” (Wikipedia 2012). A virtual economy is where virtual goods and currencies reside; it is the market of a F2P game. “When demand interacts with supply on a market, a price is formed – measured either in time that participants must invest to obtain the good, or increasingly, in real money” (Huotari & Lehdonvirta, 2010). What is described here is the two virtual currencies in a F2P game, premium and earned currency (also known as hard and soft currency respectively). Premium currency is gained through exchanging real currency for virtual currency to purchase

items, while soft currency is the currency earned through playing the game (completing missions, achievements, etc).

Being able to collect data in real time adds to the use and functionality of employing a virtual economy. Since this is an economy, forms of economic analysis can be employed, “Microeconomic analysis is perhaps the most advanced area of virtual economics, while macroeconomic models are in their infancy” (Lehdonvirta, 2005). An example of what microeconomic analysis can lead to is “perfect price discrimination,” which is being able to provide a different price (and item) for each user that represents the value the said user sees in the game.

Micro-transaction

Micro-transactions are small purchases that are usually priced from any amount of cents to \$5 (it can go past this too). The purchases of virtual items in F2P games are usually categorized as micro-transactions; the price is justified by the fact that the marginal cost to reproduce these items is essentially \$0. The idea here is to have a large amount of these transactions through having several players in a game (since it’s free), that can aggregate into a substantial profit.

Ad Revenue

The Ad revenue model is the classic digital model that is seen in several places (e.g., Facebook and YouTube). This model can be used as a means to monetize the free users in the game. Just like anywhere that shows ads, these ads should be relevant to the player base of a game.

Digital Hybrid Model

I propose that the business model of a F2P game is a digital hybrid model. Simply put, this model is a combination of other digital business models. You see this in games like *Offensive Combat* that has a dual currency system, but has in game advertisements and *DC Universe Online* that uses a dual currency system and offers a subscription.

Advantages of using a hybrid model include (Vindicia, 2012):

- “Casual and infrequent users can play without purchasing and spend incrementally if they choose to do so – in essence setting their own prices,
- “the most dedicated users are free to purchase as much as they want with no spending limits,”
- “A mid-tiered subscription offering that allows exclusive access and content provides an outlet for serious users without requiring multiple purchases,” and
- “Layering advertising for nonsubscribers adds revenue and might attract users to upgrade to a paid subscription.”

Digital hybrid models are highly flexible and can generate revenue through multiple channels, but the challenge is the execution and implementation of them (*Vindicia*, 2012). Out of all the digital models, F2P best is represented by this type of model.

Impulse Purchases

Due to the nature of purchasing virtual goods I propose that a good amount of them are impulse based. The assumption is that most purchases in these stores are not planned and that users most likely have an urge to purchase an item. According to Spool (2001), impulse purchases account for 40% of all online expenditures. While this data is not recent, it is mainly based on e-commerce, which I would think would yield similar results in a F2P game (future research can answer this). Here are two definitions of impulse purchases:

“A buying action undertaken without a problem having been previously recognized or a buying intention formed prior entering the store (Engel, Kollat & Blackweel, 1968).

“When a consumer experiences a sudden often powerful and persistent urge to buy something immediately” (Rock, 1987).

The first definition describes the unplanned part of an impulse purchase, while the second describes the feelings that usually occur once a consumer is exposed to a product. Exposure is one of the biggest causes of an impulse purchase. It could be one explanation of why in *Team Fortress 2* every time you are killed you are shown the weapon your opponent killed you with and it even shows the stats of it.

There are four types of impulse purchases (Kaarbasivar & Yarahmadi, 2011):

- Pure: Where an emotional appeal triggers the impulse buy.
- Suggested: When a shopper sees an item for the first time and the desire to buy is formed without prior product knowledge.
- Planned: Occurs when a shopper has some specific purchase in her/his mind, but the purchase depends on offers, price, etc.
- Reminder: Results from a predetermined need that is promoted upon encountering the item while shopping.

Any of these types of impulse purchases can be relevant to F2P games, but I believe the first two, pure and suggested, are the most relevant. Pure impulse purchases in the sense that an urge to purchase can occur while playing a game, but suggested is most likely the most relevant since players will be constantly exposed to items while playing a F2P game and even outside a game (e.g., emails, other players, etc.).

Impulse buying is an urge the consumer feels, but there is still much to learn about it, especially since it seems to occur on a sub conscience level. One possible cause of this feeling is to reach your ideal self. “A propensity to impulse buy will be at its strongest when there is a perceived self-discrepancy between the actual self and the ideal self on the most important attributes to that person” (Bayley & Nancarrow, 1998). My question related to this is, can an in-game avatar

be a representation of our ideal selves? I would think so on some level, especially based on the fact that vanity items are popular, since they allow players to personalize their characters to show off their style/personality.

There are negatives that developers and marketers should be worried about when it comes to impulse purchases, which is one of the main reasons I bring this concept up. These negatives are buyers' remorse and guilt. Customers feeling this can negatively affect customer's views of a company. According to Yunlai & Fengjuan (2011) in a survey they conducted regarding impulse purchases:

“Disappointment negatively impacts loyalty to producer and retailer both, and the former is bigger than the latter; the more regretful consumers feel towards time and place, the lower their loyalty to retailer; the more regretful consumers feel towards product, the lower their loyalty to producer. If consumers attribute the locus of disappointment to producer/retailer, it's effect on loyalty to producer/retailer is more influential than to other factors; If consumers attribute the locus of regret to time and place to retailer, their effect on loyalty to retailer are more influential than to other factors (such as themselves).”

Loss of customer loyalty can be detrimental to a F2P game, since it is a service and relies on having several players playing. Here are possible ways to deter these two negative outcomes:

- Rentals: If players experience buyer's remorse, it won't be as bad since they are stuck with their purchase for a limited amount of time. The game *Offensive Combat* actually takes this a step further and allows players to rent weapons for soft currency, in a way players can treat this as a trial period (players can also purchase weapons permanently for soft currency as well).
- Try Before you buy: Rentals touch on this, and this tactic might only work in select F2P games (e.g., first-person-shooters). The idea here would be to have players enter a practice stage to try out an item. This could help them make a more informed decision if they feel the urge to purchase something.
- Reviews/Ratings: Research has shown consumers look at what others consumers say about item, implementing a rating system or review system can use the power of social proof to help consumers make a purchase decision.
- Money back Guarantee: While it might be best to reserve this for large purchases, it is something that is not used very much in F2P games. This usually lowers the perceived risk of a purchase.

Creating a safer environment for impulse purchases can drive customer loyalty and possibly increase sales. In the end it comes down to providing true value to customers who make purchases in F2P games.

Agile Software Development & Agile Marketing

The very nature of a F2P game is agile. The themes of experimenting, collecting feedback, and constant updating seen in F2P games scream agile. Let's explore agile and its relation to F2P games.

The origins of agile come from software development. The story goes that seventeen software developers met in the Wasatch Mountains of Utah, members of this group had backgrounds in SCRUM, Extreme Programming, and other development methodologies. This group would call themselves, "The Agile Alliance" (The Agile Manifesto). This alliance met for two days to find common ground in the methodologies they practiced. What emerged from this meeting was the *Manifesto for Agile Software Development* (The Agile Manifesto). This document contains the values and principles of the approach to software development projects. It stresses that there should be more communication within teams (especially between managers and engineers), not to have hundreds of pages of documentation, and be more customer focused by getting a product out faster. According to the history of the manifesto, the agile approach was needed to adapt to the new markets developing online at the time (e-commerce).

Agile is an iterative process, using this approach means that teams are constantly testing builds, collecting feedback, and refining what is being worked on. Probably the biggest advantage of agile is being able to react to change. This flexibility allows teams to concentrate on evolving the product. The opposite of agile is called the "waterfall" approach, where there is heavy planning/documentation and the product is developed in one fell swoop, with little flexibility and adaptation. The waterfall approach can cause problems if there needs to be changes late in the project life cycle, but late changes would be acceptable and expected in the agile approach.

There are two agile methodologies that should be employed in F2P games: agile software development and agile marketing. Both are very similar, not just for being agile, but due to the fact that agile marketing was inspired by agile software development. Both methodologies look to be able to react to change and get away from their waterfall approaches. The nature of F2P is adaptive with weekly updates, constant communication with the community, identifying your core audience, and constant testing. According to Unde (2008), "The nature of agile methodology is adaptive and not predictive."

Agile Software Development

Agile Software Development is, “A group of software development methods based on iterative and incremental development, where requirements and solutions evolve through collaboration between self-organizing, cross-functional teams” (Wikipedia, 2012).

The Agile Alliance came up with the values of agile development seen below (Agile Manifesto):

- Individuals and interactions over processes and tools
- Working software over comprehensive documentation
- Customer collaboration over contract negotiation
- Responding to change over following a plan

Agile development is very people oriented. The manifesto stresses that business people and developers must work together on a daily basis to be successful and that the main focus should be on the customer (Agile Manifesto). The development process is iterative with short cycles, enabling for fast verifications and corrections (AGILE, 2002). These short cycles enable teams to be able to make changes and shape a product more to the customers’ wants and needs through multiple builds, rather than risking it all on one build. Agile development is usually described as “light weight,” the reason for this is that by focusing more on building the product as opposed to excessive planning and documentation allows teams to have more maneuverability and flexibility. This maneuverability allows teams to make late changes despite being far into development (AGILE, 2002).

There are no one size fits all approach to agile development, which is why there are several approaches. It’s up to the team to figure out which approach would be best. Here is a simple description of Scrum (I describe Scrum due to the fact that examples of agile marketing are described using Scrum):

Scrum – Scrum revolves around develop cycles that are called sprints. These sprints are iterations of the project that usually last 1-4 weeks and are meant to complete certain requirements of the project that were listed before the sprint began. The team meets on a daily basis so team members are all on the same page regarding how the project is coming along and to provide feedback to each other. There are three roles in scrum: the product owner, the team, and the scrum master. The product owner is responsible for achieving the maximum business value of the project and creates the list of what should be completed during each sprint. The team are the developers who create the product, the team is usually self-managing and cross-functional. Typically, a team is 5-10 people, but it’s ok to have multiple teams. Lastly the scrum master assists the team, by making sure the team is following scrum correctly. (Deemer & Benefield, 2007).

An example of agile development being used in a F2P game would be *Offensive Combat* by U4iA Games. When the beta first launched for the game, it just had the basics of a multiplayer FPS: the gameplay itself, basic menu UI, a level system, and a store. After several updates to the game over the course of a few months, the game is much improved, the core gameplay is still there, but now there is a tutorial, more items in the shop, more maps, an achievement system, constant balance patching, and an updated UI (you can see a comparison of the menu screen below). U4ia constantly collects feedback from players during its developer stream, and on forums, and on its Facebook page.

Agile Marketing

Agile Marketing is a, “High-communication, low documentation, rapid iteration process designed to provide more frequent, more relevant and highly measurable marketing programs” (IDC Agile Principles and Practices, 2010).

Agile marketing values (Agile Marketing Manifesto)

- Validated learning over opinions and conventions,
- Customer focused collaboration over silos and hierarchy,
- Adaptive and iterative campaigns over Big-Bang campaigns,
- The process of customer discovery over static prediction,
- Flexible vs. rigid planning,
- Responding to change over following a plan, and
- Many small experiments over a few large bets

Never before have marketers had the ability to connect with consumers so directly and at the same time it’s never been so hard to engage them since everyone is trying to get their attention. There are several channels marketers must manage like, social, online, mobile, T.V. print, to name a few. Just like how developers needed a response to the new economies and uses of software, marketers need a response to be able to manage/adapt to the channels consumers are on, and, just like software development, agile is that answer. Agile marketing is more based in the realms of digital marketing (earned, owned, paid media). “Agile marketing is rooted in hyper detailed customer data collected through analytics tools that enable marketers to target each and every consumer based on her individual interactions with the brand (Valtech, 2012). Knowing these details on consumers gives marketers the ability to give a more personal experience to consumers. This personalization is important since attention and interest are very scarce resources these days.

Just like in software development, testing and iteration are stressed in agile marketing. It also looks to get away from the waterfall approach of marketing of creating a detailed plan and then executing it. The reason to focus less on long-term planning is that the message marketers want

to deliver might not be relevant by the time the plan is actually implemented. Lastly, agile marketing takes more of a scrum approach as of now, emphasizing the use of sprints.

What does this have to do with F2P?

According to Jim Ewel who runs the blog, agilemarketing.net:

“Agile marketing works best when the development team is using agile development techniques. Both teams use the same or similar tools, they have visibility into each other’s work and their work can be mutually reinforcing. Early and frequent releases encourage greater engagement with customers and give the marketing group opportunities to communicate both to existing customers to drive upsells or renewals, and to communicate prospects to drive purchases.”

Both of these agile forms are meant to work together. As I stated F2P screams agile, it relies on collecting large amounts of data, testing, and iteration. Players play a very important part in F2P games (they are co-producers after all); they are the clients who the game company is serving. Being able to adapt to changes is necessary. One of the most important principles in F2P is that the game is a service not a product.

By combining agile software development and marketing, developers and marketers must work closer together, after all two core values of agile are cross-functionality and face-to-face collaboration.

Free-to-Play

The term Free-to-Play (F2P) is heard constantly in the gaming industry today. According to Newzoo (2013), 66% of money spent on mobile devices (Smartphones and Tablets) is spent on games, 80% of which are F2P and 95% of MMO gamers played F2P games in 2012. F2P games are now showing up on the majority, if not, all gaming platforms. In this section I will be exploring the actual term and general themes of F2P, Games as a Service, acquisition retention & monetization (ARM), and the arguments against Free-to-Play.

The Term Free-to-Play

The term, obviously, has three parts, free, to, play, more specifically free and play, but before even going through this we should look at the origin of the word that is used interchangeably with F2P, Freemium. The origins of freemium can be found in something called crippleware. The term crippleware is from the 1980s and according to the *PC Magazine Encyclopedia* is defined as, “Software used to demonstrate how a program works, but severely limited in functionality” (pcmag.com). Another term of crippleware is “lite,” which is seen for paid mobile games that usually have free “lite” versions, which serve as demos. The actual term freemium was coined by Jarid Lukin who, at the time, was Director of e-commerce at the information solutions firm *Alacra*. He simply commented on the blog of venture capitalist Fred Wilson who was describing the model, but was trying to figure out what it should be called (avc.com, 2006). The actual comment was simply, “Free + Premium = Freemium?” The way Fred Wilson described it on the post was:

“Give your service away for free, possibly ad supported but maybe not, acquire a lot of customers very efficiently through word of mouth, referral networks, organic search marketing, etc., then offer premium priced value added services or an enhanced version of your service to your customer base” (avc.com, 2006).

So does this mean that freemium = F2P? The terms are always used interchangeably. I would say yes for the most part. There are elements of freemium in F2P, like value added services (e.g., extra inventory slots, pets to go to town to purchase/sell items, or microsubscriptions). Other similarities are obviously attracting several players to the game, one of the primary forms of acquisition for a F2P game is through word of mouth/referrals. Though very similar, I do see F2P going a step further compared to freemium, since there can be a whole economy backing the game, there are several monetization methods that are/will be used. In the end when discussing the terms, F2P is really just the gaming version of freemium.

There are some out there who have a problem with the term, F2P, because it can be seen as misleading. Free-to-Play implies that a game costs no money to play at all, but some games out there are pay-to-win (where you pay for advantages) or have paywalls, which requires players to pay at some point in the game to continue playing. Ideally, the purchases should be an option

and a F2P game should be able to be played for free forever (as the name implies). According to the book, *Design Rules for Free-to-Play Games*, “Allow players to enjoy your game forever without paying. Slamming down a paywall at an arbitrary point just means kicking out potential customers” (Lovell & Fahey, 2012). There are countless examples of games that can be played forever free; two of them are *League of Legends* and *Path of Exile*.

The key advantage of this model is that it lowers player’s barrier to entry (remember free) and it empowers players by letting them decide the value of the game itself as opposed to having a company making a decision and hoping consumers will agree. In an interview with *Pocket Gamer*, consultant Nicholas Lovell who runs the site *Gamesbrief* said, “F2P design is about choice. It is about allowing users to experience the game in their way, whether that be a time choice, a money choice or a gameplay choice” (pocketgamer.biz, 2013). It truly is about choice. Players can decide the value they see in the game through purchasing items, telling friends about the game, giving feedback, and/or just playing the game.

One of the prime reasons for the existence of F2P is to combat piracy, or better yet compete with it. Take what Gabe Newell head of Valve Software said in an interview with GeekWire:

“The easiest way to stop piracy is not by putting antipiracy technology to work, it’s by giving those people a service that’s better than what they’re receiving from pirates” (Bishop, 2011).

Valve proved this to be the case, when launching *Steam* in Russia which is infamous for pirating games. In the same interview Newell stated, that Russia is Valve’s largest continental European market outside of Germany. F2P does offer a better service than what pirating a game does, since in F2P developers can provide and add to the experience. This is exactly the same logic Apple had when releasing iTunes and the iPod where Steve Jobs said, “Customers think the price is really good where it is. We’re trying to compete with piracy — we’re trying to pull people away from piracy and say, ‘You can buy these songs legally for a fair price.’ But if the price goes up a lot, they’ll go back to piracy. Then, everybody loses.” Really when it comes to piracy, it’s better to compete with it and convince consumers that your service is better than illegally downloading it.

This talk of service leads us into one of the core concepts of F2P, Games as a Service.

Games as a service

One of the most important aspects in F2P games is the fact that they are services. The term usually used in the industry is referring to these games as, “Games as a Service.” Let us first explore some of the existing literature regarding services before going through the concept of Games as a Service.

According to Vargo and Lusch (2006), service is, “The application of specialized competences (skills and knowledge), through deeds, processes, and performances for the benefit of another entity or the entity itself.” Obviously in the realms of F2P the entity would be the player. Service-Oriented Thinking comes into play here; Beaven & Scotti (1990) describe this concept as:

1. “Services are processes with outcomes that can be perceived directly and indirectly leaving concrete impressions.”
2. “Services are personal experiences that can be uniquely tailored to meet individual needs and expectations.”
3. “Services are processes that are created and experienced with outcomes that are often distinct, direct, and imperishable.”
4. “Services are encounters that afford opportunities for greater satisfaction through participations, shared responsibility, and timely feedback.”

F2P games are games, which also entails that they are a collection of multiple processes (point number 1). Examples of processes in F2P games are leveling up characters or gaining experience, meeting players in game, learning the game, gaining in-game currency, etc. The outcomes and experiencing these processes leave impressions on players; take for example players socializing in game. If a player has friends in a game, this player is most likely going to have a positive impression of the community and the game itself. On the other hand, if a player has a bad experience socializing with players there will more likely be a negative impression about the in-game community and even the game itself. This goes to point number 4, specifically the fact that in a service the customer is a participant and there is a shared responsibility between the service provider and the consumer. This is seen with Riot Games trying to encourage positive interactions in League of Legends.

Point number 2 is all about personalization. The fact of the matter is that experiences in F2P games will most likely become unique to each user, due to being able to provide unique experiences on a per user basis through messaging, what is offered in the shop, difficulty, quests, skill, and so on.

Point number 3 goes back to what Nicholas Lovell says about F2P design being about choice. Players experience and play games differently for the most part (this is a fact in all games).

These experiences lead to an outcome that is stored in the mind of the consumer as concrete, tangible facts (Beaven & Scotti, 1990).

Lastly, going back to point number 4 also deals with feedback, which we have touched on earlier. This point coincides with point 2 due to the fact that feedback allows to a company to better serve players by tailoring experiences to the needs of consumers.

Moving on to realms of marketing, service adds to the mix (literally). One of the fundamental frameworks in marketing is the 4 Ps or also known as the marketing mix. This framework was coined by McCarthy (1964) who states:

“Marketing management continually faces the same kinds of problems: consumer analysis and analysis of the product, channels, promotion, and pricing. In view of this- and in view of our desire to deal with only the fundamental variables-we will use a broad framework. This framework emphasizes the paramount importance of the consumer and then reduces the major variables to four” (Basic Marketing, pg. 45).

The 4Ps is a simple way to explain what marketing does, particularly when developing a product. When talking about marketing a service, 3 Ps (making it the 7Ps) are added to the mix: Participants (or people), physical evidence, and process (Booms and Bitner 1980). *The CIM* defines these 3 Ps as:

- People – “Anyone who comes into contact with your customers will make an impression, and that can have a profound effect – positive or negative – on customer satisfaction.”
- Process – “The process of giving a service and the behavior of those who deliver are crucial to customer satisfaction.”
- Physical Evidence – “Helping potential customers to ‘see’ what they are buying.”

In terms of people, this could be other players in a game, customer service representatives, developers, and/or even characters in the game itself. We have gone through a few of the processes already, but other examples would be, login and loading screens. Lastly, in terms of physical evidence the most obvious is the game itself and even what players are saying about a game.

We now arrive at service dominant (S-D) logic. As stated before S-D logic is, “[A] new dominant logic for marketing” (Vargo & Lusch, 2004). This move is from product-oriented thinking to service – oriented thinking. Vargo & Lusch (2008) state 10 foundational premises (FPs) to layout the ground work of S-D logic:

1. **Service** is the fundamental **basis** of exchange
2. Indirect exchange masks the fundamental **basis** of exchange
3. Goods are a distribution mechanism for service provision
4. **Operant resources are the** fundamental source of competitive advantage
5. All economies are **service** economies
6. The customer is always a **co-creator** of value.
7. The enterprise **cannot deliver value, but** only offer value propositions
8. A service-centered view is **inherently** customer oriented and relational
9. **All social and economic actors are resource integrators**
10. **Value is always uniquely and phenomenological determined by the beneficiary**

As all these can be relevant to F2P games I think that FP 3, 6, 7, and 8 are the most relevant. FP3 describes how the game itself is what distributes the service to players, which is playing the game. FP6 is something that has been touched upon several times in this paper, both the service provider and the consumer work together during the creation and consumption of the service, as well as the improvement of the service. In other words, the company and consumer have an interactional relationship. FP7 describes a company offering a game (value proposition), but for there to be actual value the player must accept the proposition. Lastly, FP8 is self-explanatory, through S-D logic the focus must be on the customer. Essentially, a company creates value for the customer, by creating value with them.

This all finally ties into Games as a Service. This term represents the changing thought of seeing services rather than products. While this isn't new to gaming due to subscription-based MMOs and online multiplayer games, the thinking is becoming much more prevalent in the industry. It encompasses service oriented thinking, the 7Ps, and SDL. While there is not an official definition of this, here are two definitions I have found of Games as a Service. When talking with *GamesIndustry International*, co-founder of DDM, Joe Minton, described Games as a Service as the following:

“For developers, this concept [Games as a service] of having a group of people not just creating DLC and then being done, but perhaps needing to have those people being dedicated for a year or more can be tremendous. It can provide an ongoing set of revenue that helps to weather the timing of signing new deals, but also can add greater risk because they need to keep those people available, and it's even more of a scramble to line up jobs for those folks” (Peterson 2012).

Another take on Games as a Service is from Thomas Bidaux of ICO Partners, who describes this concept as:

The whole philosophy of Game as a Service underlines that a game is a holistic experience, and to make a game right means caring about the quality of every element of that experience. This starts from the initial game teaser and proceeds to include everything related to the game – its website, account creation system, [monetization] model, forum platform, bug reporting system, harassment reporting tool, friend list manager, everything.

The concept of Games as a Service focuses on all aspects of a game rather than just graphics, gameplay, and/or story. Developers must constantly update and improve the game. These updates and additions factor in data collected and analyzed on a daily basis, as well as player feedback, which goes back to customers being co-producers. This is due to the fact that in F2P games a company is much closer to its player-base and is usually interacting and collecting feedback from players. This means that with the information that is obtained in game and from players help shape what the game will become, hence Games as a Service.

Games as a service means efforts are ongoing and that a company must be in a closer relationship with customers, for this reason acquisition, retention, and monetization have to be all focused on in a F2P game. These three terms are the topic of the next section.

Acquisition, Retention, and Monetization (ARM)

Besides F2P another important three letter acronym is ARM which stands for: Acquisition, Retention and Monetization. Basically the ARM framework is: a company gets players in the game, keeps them there, and gives players the option to make purchases in the game if they see value in what is being sold. Nicholas Lovell (2010) describes the three terms as questions:

- **Acquisition:** How do I get people through the door cost-effectively?
- **Retention:** How do I keep people coming back for more?
- **Monetization:** How do I build money-making strategies into gameplay?

Lovell further states, that these three aspects have to work together. Not focusing on all three can hurt a company, for example a company can focus on just retention and monetization, but without acquisition they will be unknown (Lovell, 2010). These components come from the realms of relationship marketing, which shows the importance of marketing in F2P games, due to being player focused. In this section I will further discuss the three components of the ARM framework and will discuss what these all lead to, Customer Lifetime Value.

Acquisition

According to the *American Marketing Association* dictionary, the term we are looking at is acquisition strategy and value.

- Acquisition Strategy – “A process of finding those potential customers who are in the market and ready to buy”
- Acquisition Value – “The buyers’ perceptions of the relative worth of a product or service to them”

The way to look at this is that strategy is on the company side and value is on the consumer side. A basic example of this would be running a targeted banner ad campaign towards hardcore gamers and getting a click-through, the player will arrive at a landing page where a company will be trying to convince the player that the game is worth the download. At the same time the player will be evaluating whether the game is worth the download or not. This goes back to one of the advantages of F2P, lowering the barrier to entry for customers, and as discussed in the “Free” section consumers will not associate risk and have a shorter buying process when prompted to download the game. Overall acquisition is where a “potential player” becomes an actual player.

Moving on, the three aspects of ARM are very metrics driven in these days. One of the key metrics of acquisition which is seen all the time now is: cost-per-acquisition or cost-per-action (CPA). The metric comes from the world of online advertising. CPA is not the same as cost-per-click (CPC), “instead of paying per click; the advertiser pays only when a user takes a specific action (e.g. fills out a form) or completes a transaction” (Nazerzadeh, Saberi, Vohra,

2008). The action for F2P game would be downloading the game for the most part. CPA can also be thought of as buying consumers and this is one of the reasons why it is important to keep track of customer lifetime value. The thing with CPA is that it's constantly on the rise; here are some known CPA costs (Source: *Gamesbrief*):

- CPI for Facebook mobile ads may be \$7.50 according to Jussi Laakkonen ([source](#), April 2013)
- Chartboost have average cost per install at **\$1.80** for iPhone, **\$1.68** for iPad and **\$1.68** for iPod touch (source: [Video Games Intelligence](#), March 2013)
- Fiksu's Cost per Loyal User Index (cost of acquiring a loyal user for brands who proactively market apps) states an acquisition cost of \$1.36 as of March 2013.
- "Users are expensive and it costs **\$2 to \$3** to acquire each one" – Rick Thompson, former Chairman of Playdom, [AllThingsD](#), October 10th, 2011
- On Kixeye the cost per acquisition is **\$4** – Social Games Summit, November 14, 2011
- Positech, **CPA of \$0.50** for visitors who spend at least one minute on its site (Source: [Twitter](#), May 2012)
- On-Net Europe, **CPA of €1-5** for 'real users' who log into the game (Source: [Twitter](#), May 2012)

As one can tell there is not a set number, a company will need to figure out its own CPA at the end of the day by tracking the results of its ad campaigns.

There are several acquisition tactics out there. Most of the time, F2P companies choose the tactics that are easier to track in order to see the results of acquisition efforts, seeing which tactics acquired not only acquired the highest number of new users, but also the highest value users (based on in-game metrics). Examples would be banner ads or cross promoting through other games. Lastly, word of mouth is one of the strongest acquisition forms in F2P. This is heavily relied on in most free services, due to the fact that there might not be much money in the marketing budget and because the service itself is its own marketing due to being free.

Retention

Acquisition is where the relationship is started with a player and retention is where the relationship is managed and maintained. Retention is arguably the most important aspect of the entire framework due to the importance of players coming back to a game. *Wikipedia* defines customer retention as, "The activity that a selling organization undertakes in order to reduce customer defections." Retention in terms of F2P games can be defined as, "The extent to which users return to the game" (Seufert, 2013). In regards to monetization, the more a player returns to play a game the higher the probability that player will make an in-game purchase (or it gives a company more opportunities to up sell them).

One of the main factors of retaining players is, to first, develop a good game. This is easier said than done, but the game should be fun to play, of high quality, and immerse players.

Eric Seufert of Grey Area Labs states three reasons why players don't come back:

1. You don't communicate quality
2. You don't give the impression of deep gameplay
3. Your game is trying too hard to appeal to everyone

A way to retain players is also through achievement/success since in F2P game it can be a big motivator to keep playing. Achievement is one of the main reasons that motivate players to actually play the game. Ramin Shokrizade describes three ways for a player to achieve success in a game: levels, wealth, and player vs. player (PvP) (Gameful, 2012). Levels are gained by gaining experience in a game. Shokrizade also states that with levels, the content must be there to support high-level players, due to the fact most developers focus, primarily, on the early game (to retain players). Wealth in a F2P game is gaining goods or currency in a game. Lastly, PvP revolves around competing against other players and can be measured through a ranking system or win/loss ratio. PvP success can be exemplified through *League of Legends* and *DOTA 2*.

Social interaction plays a role in retention and, arguably, is one of the most important aspects of retaining players. A player is more likely to keep playing a game if that player has friends in the game to play with. This can also lead into monetization opportunities in the sense that a player might gift items to friends. Shokrizade sums up the importance of social interaction in regards to retention and even monetization, "The key difference is whether friendships and repeating peer interactions are fostered, as these types of relationships create peer pressure and reinforcement that can greatly increase retention and willingness to spend" (Shokrizade, 2013).

The lower barrier to entry of a F2P game is a double edged sword: on one hand it can attract a plethora of players to a game, but on the other hand players have an easier time leaving a game due to not having a financial stake in the game. This fact shows the importance of retention in F2P games.

The players who are retained can be the best acquisition tools. Seth Godin states in his book *Tribes*, "Instead of always being on the hunt for one more set of eyeballs, true leaders have figured out that the real win is in turning a casual fan into a true one" (pg. 33).

Monetization

Monetization in this framework is simply (as stated above), what you are offering to players to buy in game and what strategies are being used to convince players to make a purchase and communicate the value of what is being sold. I will be discussing monetization in much more depth in section 4 (Monetization).

Customer Lifetime Value (CLV)

Acquisition, retention, and monetization leads to customer lifetime value (CLV). CLV is defined as, “A measure of the profit streams generated by a customer across the entire customer life cycle” (Chang, Chang, and Li 2012). This measurement describes customers on an individual level and does not just factor in purchases made by customers’ overtime, but can also factor in referrals (word of mouth). CLV can also be seen as the whole overview of your relationship with players. CLV can also help with segmentation; a simple example would be segmenting the player base into high, medium, and low value customers (Chang, Chang, Li 2012). In a game CLV, though non-traditional, does not necessarily have to be just about profitability or bringing new players in, but could factor in playtime, level, win/losses, etc.

It should be noted that CLV should be higher than CPA.

Conclusion

Overall what the ARM framework stresses is a company is in a relationship with players. This is why metrics and keeping track of player data is highly stressed in F2P games. A company wants to be able to serve and create the best experience for players, which in turn should garner player retention, word of mouth acquisition, in-game purchases, and a strong community of players.

The Arguments against F2P

The discussion of F2P games is not complete without mentioning the arguments against the model. Along with the success of F2P games, the model has been shrouded in controversy by both gamers and professionals in the industry.

These arguments usually revolve around F2P games exploiting and taking advantage of players through game mechanics and psychological manipulation. According to *GamesIndustry International*, the backlash of F2P started when the creator of the successful indie game, *Braid*, said “there’s no other word for it except evil” when talking about social games in 2011 (could be taken out of context). When scouring the internet here are the main themes you will see in the arguments against F2P:

Pay-to-Win	You can pay for advantages over other players that are not paying.
Design	Must make sacrifices in the game design in favor of monetization
Immersion	Asking players to pay in game can break the immersion of the game.
Psychological Tricks	The majority of F2P games try to trick or force players to pay in the game.
Whales	F2P games rely too much on getting a few players to spend an immense amount of money on a game, while they may not be able to control spending (meaning these people are being exploited).
Quality	Developers purposely lower the quality of a game to make purchases much more desirable.

These two quotes also represent some of the arguments seen above:

“It’s almost impossible to do Free-to-Play in a non-evil way and without sacrificing the elegance of your game design, we’ll prefer to charge \$3” – Representatives of Vlambeer (GameIndustry International, 2013).

“The difference is that with a free demo, the understanding is you then make an honest pitch for the player to purchase the game at the end of the demo. The F2P model seems to rely on interrupting the player mid-game to constantly pester them for a few pennies” – Cliff Harris, Positech Games (GamesBrief, 2012).

The critics of F2P usually are referring to what Ramin Shokrizade (2013) describes as “Coercive F2P” in which free is considered just a step to get from A to B (free/playing the game) to C (\$1) to D (\$500). This type of F2P focuses on the short term rather than the long-

term, despite the nature of F2P games being an ongoing service and even at times forces players to pay just to continue. Shokrizade also states that while we have witnessed much success with coercive F2P, in the long run it can hurt us (i.e., Zynga). I will be going more in-depth with coercive F2P in the next section.

There are still debates online about F2P. No matter with more and more companies adopting the model, it seems to be here to stay. It should also be remembered that this explosion of F2P games is still very early on and there is still much to learn about the model.

Monetization

So far we have covered the principles that are relevant to Free-to-Play and the Free-to-Play itself. Now we will move on to the topic of monetization in F2P games, which is how a game makes money. In this section I will be covering various topics of monetization. In addition to literature I will be also using information I collected through 9 interviews I conducted with professionals in the gaming industry. Some of these professionals wanted to stay anonymous, while others did not. **Quotes and information taken from these interviews will be underlined.** Monetization in F2P games takes a different approach compared to other models like single price (retail) and subscription models. As stated throughout this thesis, F2P takes away the initial paywall and allows anyone that has enough interest in a F2P game to try it out for free. Instead of the monetization being outside the game, as a barrier of entry, In F2P its inside the game, as stated by one of the interviewees, “It does force monetization to be much more part of the game mechanic.” He also stated the fact that this should not cause imbalance in your game (i.e., Pay-to-Win).

Another take on monetization and F2P in general can be seen from Everplay Evangelist Oscar Clark, “You’re no longer designing the product you’re selling; you’re designing the product that is your retention strategy, the real product you’re selling, which is the virtual goods.” He purposely puts it this way so people will understand that the most important factor is not monetizing the player, but getting them to play. This has been emphasized in all the interviews I conducted that with F2P the game first needs to be good and offer an enjoyable experience.

The topics to be covered in this section are: monetization, monetization in games, current strategies employed, whales, virtual goods/currency, a framework I’d call the Games as a Service Triangle, and the future of monetization in F2P.

The Concept of Monetization

Monetization is referenced many times, but there is not much recent research on the topic. The reason for this can be seen in the definitions, where monetization is really going from barter to using an agreed up form of exchange (meaning there isn't much more to research). According to the Oxford English Dictionary (OED) the word monetize means, "Convert into or express in the form of currency" (OED 2013) or the adjective monetized, "Adapt (a society) to the use of money" (OED 2013). Wikipedia defines monetization as, "The process of converting or establishing something into legal tender" (Wikipedia, 2013). Based on these definitions, monetization in F2P games can be seen as converting parts of the game (e.g., virtual goods) into money.

A recent take on monetization is by James R. Hull in his thesis *Monetization: A Theory and Applications*. In his thesis, Hull stresses how the topic of monetization should not be a topic exclusively covered by economics, but should also be looked at through a sociological and anthropological point of view. Hull (2009) states:

"I define monetization as a process of institutional change in the means and method of exchange that operates at multiple scales. At the level of individual transaction, monetization is discrete, meaning that a transaction is either monetized or it is not, while broader levels of aggregations (the neighborhood, the village, the economic sector, the economy, and so on) it is a continuous process of cumulating one or more distinct monetized transactions.

Further, monetization, in its most basic formulation, is associated with measurable differences not only in the behavior of individuals but in the social networks that connect them.

Monetization is the introduction of new types, flows, and qualities of information into exchange networks.

Things of value that are transferred or exchanged, whatever their intrinsic properties, can be money only if the economic interaction takes place under the influence of a social institution that recognizes and supports money as a function of economic life."

Hull states that monetization is just as much a social phenomenon as just an economic one and that in monetized transactions the trust in value moves to a third party. This third party in the real world would be the government/Federal Reserve (in the U.S.), but in a F2P game it can be the company providing the service. This third party must be trusted by participants in a given transaction that the unit of value being exchanged is accurate and true (Hull, 2009). In the majority of F2P games, most transactions are

through the use of a virtual currency. The value of the currency is guaranteed through the service provider, and the same goes for the value of virtual items.

To conclude, monetization in, a social and economic sense, lowers the transaction costs of exchanges by entrusting the value of a medium of exchange to a 3rd party. In games the value of the medium of exchange must be maintained by the service provider.

Now let's actually take a look into games' monetization.

Overview of Monetization in F2P Games

We have seen that monetization is a process of converting something into money and is also a social phenomenon that takes away transaction costs and puts the trust in a third party to maintain value of the unit of exchange. The relevance to F2P games is the fact that service providers must maintain the value of the virtual currency and items in the game (which will be talked about later). On a simplistic level, monetization is really how to make money from your F2P game. As stated the difference with monetization in F2P games is the fact that the monetization is part of the game, or rather, is inside the game, as opposed to being a barrier of entry outside the game.

Technically anything in a F2P game can be monetized, like items, playtime, and features in a game (i.e. inventory space). As of now what is seen in most F2P games is that players exchange real currency to acquire virtual currency in order to purchase virtual items in the game. Companies usually employ a dual currency model that uses both premium (also known as hard) and earned currency (also known as soft) currency, which I will cover in the virtual currency section.

In his post on gameful.org titled, *Game Monetization Defined*, Ramin Shokrizade describes two forms of monetization: retail and games monetization. Retail monetization is the application of a single price to a virtual product. This is seen as the traditional form of monetization seen in the industry with flat-rate subscription fee and boxed games at retail. The other form is Games Monetization:

“I propose that the art and science of game monetization is the application of price to the means and content in a virtual world product without the sale of any discreet virtual item (which would likely break the game).”

From the same post, Shokrizade states that what are being sold are permissions. He also adds to never sell the object of the game (or the objective), the example given is being able to purchase more moves in chess makes it no longer a game (he refers to these types of products, “entertainment products”). It should be noted, that in the definition, he states that this applies to “virtual world product,” meaning MMOs, as opposed to session based games like *League of Legends* (though it is still relevant). An example of permissions is when a player purchases virtual currency, where by making the exchange a player is gaining the right to buy something in the marketplace. Lastly, in games monetization one of the biggest advantages is having multiple price points, which empowers the consumer with choice (which is one of the cores to F2P design).

In the interviews I conducted one thing was stated by the majority of respondents was the fact that they wanted purchases to be things customers actually wanted to buy. Take this quote from a psychologist in one of the top gaming companies in regards to their games, “We focus on

providing customers with content that they want to buy instead of providing content that they have to buy.” Another take on this is by Oscar Clark:

“We shouldn’t be afraid of wanting to get players to pay us money, actually freemium is about players wanting to pay us money and letting them, but if you’re going to design the model right you need to see what’s around and find out how the flow of your game works and how you build repetition on an ongoing basis and make the soft variables that people are delighted about and want to spend money on.”

For players to actually want to spend money in your game you must provide them with value (which really starts by having a good game). Another thing that was stressed by the majority of respondents is that the purchases made in F2P games must add/improve the experience of the game.

Real Money Transfer

An important concept to understand is real money transfer/trade (RMT). This topic has been in the industry for some time, dating back to two of the original MMORPG games *Ultima Online* and *EverQuest* (both games were released in the late 90s), where players would sell rare virtual items on EBay and then, meet in the game to complete the transaction (the seller giving the buyer the item). According to Shokrizade (2011) RMT is, “The exchange of real life currencies in return for virtual assets. Think of it as using a piece of a “real world” economy to buy a piece of a “virtual” economy.” Shokrizade goes further to describe three types of RMTs:

- 1st Party RMT: This is microtransactions, or the developer itself selling the virtual goods to players.
- 2nd party RMT: This is when users sell/trade item with each other
- 3rd Party RMT: This is when an outside party manipulates the economy in your game. (ex., gold farmers in *World of Warcraft*).

When talking with Shokrizade he went more in-depth into RMT. RMT 2 was the original form of RMT, but was eliminated with RMT 3 (which caused much controversy), then companies, to try and stop RMT 3, started selling the items themselves, thus having RMT 1 eliminating RMT 3. Obviously games like *World of Warcraft* still have RMT 3 activity due to not having many systems in place to negate it and being primarily subscription only (though, Blizzard has announced that it will be selling consumable items that will allow players to level up faster).

Shokrizade also brought up the point that RMT 2 is the most profitable form of RMT, and that RMT 1 can devalue items in the game. One reason why RMT 2 is not seen as much is because it is much harder and takes more time to design as opposed to just using RMT 1. Take Isaac Knowles Gamasutra post, “*Pay-to-Trade*,” where he states that economic interactions between players is not seen as much because of the consequences like MUDflation (items losing value by normal operation of the game), duping bugs/exploits, and managing multiple currencies. Knowles states that by not having trading, a company loses out on important information (that can help with pricing), the loss of a potential revenue source, and raising transaction costs for players. Knowles proposes, as the title of the article implies, that companies can have players pay a fee to trade. This goes back to the themes of being able to monetize pretty much anything in a game and permissions (in this case purchasing the permission to trade).

Lehdonvirta (2005 & 2008) proposed possible perceptions players feel when it comes to RMT and classified 7 RMT strategies by economic competition, which coincides with Shokrizade’s classifications. “Laissez-faire” would be the equivalent of RMT 2, but could also introduce RMT 3 since the operator (developer) does not get involved. “Price ceiling” is when the operator enters the market as the supplier, which would be the equivalent of RMT 1, but allow allows RMT 2. “Price floor” is where the operator becomes a buyer, something that hasn’t really been seen (an example could be ProjectEntropia). “Price Window” is when an operator

enters the market as a buyer and seller. The example given in the paper, for price floor, is ProjectEntropia, where there is a flat exchange rate between the virtual currency and real world currency; players can purchase assets in the game (i.e., land) then sell it back to the developer. “Monopoly” is where the operator is the only supplier in the game, which is the equivalent of RMT 1. “Monopsony” is the complete opposite where the operator looks to be the sole buyer, Lehdonvirta states that using this can drive user-generated content (more on this later) and defend the integrity of the achievement in a game. Lastly, there is, “embargo,” where the operator seeks to prevent all RMT activity in the game, while this can help deter the risks of RMT, an operator would not be able to capture the benefits.

Lehdonvirta also mentions the opportunity of a future model, based on the efforts of ProjectEntropia called “user-funded content” (UFC). This is where, “users fund the development of parts of a world in exchange for an in-game interest” (Lehdonvirta, 2008). This strategy would make sense, especially with the explosion of crowd-funding, but it would be difficult to do. Implementing this strategy could raise engagement in the game and can lead into some interesting interactions between players and developers.

While in the past RMT has been debated whether it should be in games or not (due to breaking immersion, fairness, etc.), due to F2P its here to stay. Another opportunity of RMT, according to Shokrizade, is that anyone can find a job in the virtual world. It has already been seen with UGC, but can even go as far as investing in virtual assets that appreciate over time or selling goods through RMT 2.

Virtual Goods and Currency

In F2P games, virtual goods are what is primarily sold to players. Lehdonvirta (2011), when discussing what virtual goods are, defined them as, “What are being bought and sold on the virtual goods markets are therefore not data, services or objects, but permissions: the exclusive right to use this feature or that corner of an online environment frequented by thousands of people.” In this sense when purchasing a champion in *League of Legends*, players are purchasing the right to play that champion whenever they desire. In addition, Shokrizade (2012) states that virtual goods are both goods and services along with permissions. A way of looking at it is that virtual goods are the permission to the access of the goods and services in a game. It should also be noted that there are several ways to classify virtual goods as you will see. Purchases of virtual goods are usually referred to as microtransactions or in-app purchases in mobile games (I will primarily be using the term microtransaction).

Despite these items existing in a virtual world and being intangible, users see value in them. In the world of economics, this is not a surprise; value is subjective and is in the mind of the consumer, thus if a consumer sees value in something and is willing to pay for it, there is value (Castronova, 2003). One of the most prominent examples of value seen in virtual items is seen through hats in *Team Fortress 2*, which players put on characters to show off while playing. Let’s review the ways that virtual goods are categorized.

In the most basic sense, virtual goods can be seen as either durable or consumable. Basically a durable good is one that, once purchased, is available for use as long as the game is in existence. More specifically Oscar Clark said, “The purpose of durable items is to get you to come back time and time again, but more importantly, to get you feel like you added utility to your experience. So what have you invested in this game that says it’s yours?” On the other hand, a consumable is an item that, once purchased, can only be used a certain amount of times and then can’t be used by the player any longer, unless the player purchases the item again. Oscar Clark gave me an example of this classification with the use of energy crystals.

“What happens in a social game if all I’ve ever done is spend money on consumable goods? At the end of that social game I resent them, they are ripping me off, they are tricking me (consumer perspective). (developer perspective) Actually it’s because I focused too much on consumables. If I engage with durable goods, so an item like a well of energy crystals. If I buy a well of energy crystals it gives me a well of 10 energy crystals a day, every time I come in [to the game] I use it. Now, I have invested into the game, a utility, that I can maximize on a regular basis, but that doesn’t stop me buying a consumable energy crystal too, because if I decide I need 11 that day, I don’t mind spending the [X amount] on that 11th one, provided that it gives me value.”

This leads into a brief discussion of the value of virtual goods. It is described earlier that value is seen through what consumers perceive, but let's actually examine the value of a virtual good closely. Virtual goods, as stated above, provide utility, which Clark uses in the classical economic sense, which is, "The ability of a good or service to satisfy a customer's needs or wants; the five kinds of economic utility are form utility, time utility, place utility, information utility and possession utility" (Monash University, 2013). Game Monetization Manager at Gameloft Benjamin Devienne described the value to me of virtual goods as, "More and more time is becoming the variable we are using to calculate the value of the item based on the rarity and when I say time, how long is it sold? And what is the time interval between each sale?" The example he gave me of the use of time is how selling two items every two weeks would have a different value than selling 4 items during 2 weeks. Another factor regarding value of virtual goods is scarcity, where an item that is rare and there aren't many people with it in the game has more value than an item that most players have. This also leads to the fact that the player with the rare item will raise their prestige (Shokrizade, 2010).

Getting back to the different categorizations virtual goods, in F2P games there are different types of virtual goods and many ways to classify them. I will cover some of the classifications that have been used. Will Luton (pg. 76-81, 2013) describes 4 categories of the types of purchases made in F2P games:

- Content – Downloadable content (DLC), can be new levels, areas, characters, or classes.
- Convenience – These are consumables, and the items usually help players level up faster.
- Competitive Advantage – These can be either consumable or durable and give players an advantage over other players.
- Customization – These can be either consumable or durable and let players personalize in-game avatars and show off their style.

It should be noted, that with the competitive advantage category, Pay-to-Win is implied. This is something that the majority of players (mainly in the U.S. and Europe) are against. Thus, using this strategy can be difficult; Luton uses the ELO (a chess ranking system) and Rare Gems in *Bejeweled Blitz* as examples to solutions to balance things out.

Lin and Sun (2007) state two types of virtual goods: functional props and decorative props. Functional props refer to those that can increase the offensive or defense of a character, really give a player an advantage. Decorative props refer changing a character's appearance or can enhance social tools. They summarize the point as, "Items in the first category [functional] make play easier, while those in the second [decorative] are primarily cosmetic."

Live Gamer (2008) describes three types of virtual items: Functional (i.e., weapons and currency), Vanity (i.e., clothes and accessories), and Social items (i.e., gifts).

According to an excerpt posted on Gamasutra by the authors of *Social Game Design: Monetization Methods and Mechanics*:

“Virtual goods can end up taking on many different forms in a game. They can be literal items which a player or character buys in order to enhance their in-game abilities, or they can be instantly consumed "items" which grant the user more turns, or access to some previously-unavailable feature.

They can also be purely cosmetic items which stroke a user's vanity by letting them customize the way their character or car or card or farm animal appears to other players. These items can be a core component of gameplay, or they can be special, even seasonal items” (Gamasutra, 2012).

With all these classifications, the categories for virtual goods that can be seen are:

- Functional – Affect the gameplay experience (e.g. characters, guns, swords, etc.). There should be caution about implementing these items, due to balance and the risk of consumers perceiving your game being pay-to-win.
- Cosmetic – Purely cosmetic items, have no effect on the gameplay (e.g., hats, costumes, etc.), meant to make your character look different.
- Consumables – Items that can be used for a certain amount of times (e.g., XP boosters, energy restoration, or potions).
- Social – gifts, where one player buys an item for another player.

Purchasing virtual goods is a form of shopping, which is the next topic of discussion.

Let’s start things off with Flow Theory. Flow is what a player is in when playing a game, and can be in when a player purchases an item. Flow really is mainly referred to as immersion in the gaming industry. Flow is, “The holistic sensation that people feel when they act with total involvement” (p.36). If you have played a game and lost track of time and realized you’ve been playing for hours, you have experienced flow. Flow has three factors: control, enjoyment, and concentration. The importance of these two concepts can be seen from Koufaris (2002) who found that both, the enjoyment of the shopping experience (flow) and the perceived usefulness of a web site (in regards to e-commerce), are both important factors for a new consumer’s intention to return to the store.

Guo & Barnes (2009) give the three stages that lead to the purchase of a virtual good: “Motivation for pursuing virtual items, purchase behavioral intention, and making final purchase decisions.” Players must first see the value in making a purchase, see an item they want to purchase, and lastly make the actual purchase.

Lehdonvirta (2009), based on past research, identified three purchase drivers (motivations) of virtual goods, functional attributes, hedonic attributes, and social attributes. Functional attributes are described in terms of performance (strength, agility, etc.) and functionality (ability, options). Hedonic attributes are attributes in which players have more of an emotional attachment to items (vanity items would be the best examples of this). Visual appearance and sounds, background fiction, provenance, customizability, cultural references, and branding are all examples of hedonic attributes. Lastly, social attributes share similar factors of hedonic attributes, but the rarity of an item is factored in, which is correlated with social status in a game.

Lehdonvirta (2011) also has looked into the question of, “do virtual goods exist?” and also the topic of virtual consumptions:

“It is time to give up the idea that virtual goods exist in a separate “digital world” and recognize that they are part of the world of consumption. One answer to the primary research question of this study is therefore that people buy virtual goods for the very same reasons as they buy other goods.”

A survey conducted by PlaySpan in 2009 found that users will pay for functional and vanity items, but interestingly gamers aren't big on paying for new content in F2P games (Gamesbrief, 2009). Content here would be levels and expansion packs. The reason for this is most likely since the entire game is already free, any update that adds gameplay content should be free as well.

Overall, virtual goods are what players purchase in games, despite existing in a virtual space, players see value with them. Now let us examine the virtual good that is most purchased, virtual currencies.

The use of virtual currencies is seen in the majority of F2P games these days. In a survey conducted by virtual economy solutions firm SOOMLA, 65% of mobile developers use “free with virtual economy (in-game coins).” Will Luton (2013) describes virtual currencies as, “the most common of all limited resources. They act as rewards and tokens toward upgrades in a core loop through the purchase of items” (pg. 86). He goes on to also say, “These currencies facilitate game wide economies where players can spend, earn and exchange with real-world currencies (via an IAP)” (pg. 86). Another way of looking at virtual currencies are as consumable items, that can lead to the purchase of other consumable items or durable items.

According to experts virtual currency usually leads to more revenue compared to just selling virtual goods alone. Shokrizade (2012) states two rules regarding when it comes to virtual economies during the first decade of his research (1999-2009):

1. Rule 1: “The sale of virtual currencies is MUCH more lucrative than the sale of virtual goods.”
2. Rule 2: Must defend your virtual assets from anything that can make them lose their equity.

Rule number one coincides with the insight of Hamari & Lehdonvirta (2010), “Perhaps most frequently, the object sold for real money is a virtual currency, which is then exchanged for virtual items.” This is one of the reasons why the majority of F2P games use a virtual currency.

Rule number 2 by Shokrizade is very important when it comes to virtual currency, you don’t want it to lose value. This also ties back in with RMT3, which can definitely devalue a currency. It can’t be stressed enough of the importance of equity in a game.

Lehdonvirta (2012) in a presentation at GDC 2012 gave a talk on virtual currency. Here he compared real money with virtual money along with comparing good money with bad money. Lehdonvirta describes how, “Money is a medium of exchange, a store of value, and a measure of value.” He states that when designing virtual currencies that attributes of “good money” (attributes stated in last sentence) should be combined with attributes of “bad money” (some attributes are that it’s not very divisible, mis-recognizable, and public/flauntable). With bad money attributes, Lehdonvirta shows how it can be beneficial to a game, “We can reverse the attributes to design bad money that adds challenge and social interaction to game economies, and can help balance them.” Adding challenge and encouraging social interaction are highly beneficial to retention in F2P games, but again with this value still needs to be maintained in the game.

The majority of companies use something called a dual currency model. As the name implies two currencies are used in this model as described below:

- Earned (soft) Currency: This is currency earned from just playing a game.
- Premium (hard) Currency: This is currency that is earned from using “real world” to purchase virtual currency.

Using these two types of virtual currency is based on the assumption of the time vs. money model. Simon Ludgate (2011) gives a description of this:

“The more money you have to spend on games, the less time you have to play them. That's because the things that get you money tend to take up time. The more time you spend getting money, the more money you'll have, and the less time you'll have. I don't mean this as an absolute description of all people, but this explanation holds true for this fairly large group of people.”

It can be seen that the earned currency is for players to use who have time and the premium currency is for those who don't have time, but are assumed to have money, to purchase items they can't acquire through extended play times.

When talking with the Director of Global Marketing Operations at one of the top F2P companies, on the topic of earning and purchasing in game, he had this to say: “It's important to have items that you can only get using the internal mechanism of the game, you have something to chase where you don't have to spend money.” He also said, in regards to players paying, “How do we make the gameplay experience a better gameplay experience and how do we offer options to our players on where they want to spend their money and quite frankly if they want to spend their money.” This is a theme that came up throughout my interviews that, in F2P, it's about making offerings that players want to spend money on, rather than have to spend money on.

When talking with Ramin Shokrizade, he had this to say about dual currencies:

“Dual currencies are inefficient if you can exchange the premium currency for earned currency. It wipes out the value of the earned currency, which is the whole point of the earned currency is to act as a reward mechanism for players. You remove the reward mechanism; they lose interest in the product.”

Going from premium to earned currency also goes against one of his microtransaction recommendations, “Play to Pay,” where players must earn the item before they can buy it (Shokrizade, 2012). He stated, “You're not earning the ability to spend money, you're just spending money.” Shokrizade went on to say that, depending on the model that you can have earned currency to turn into premium currency. Another aspect of virtual currencies is that they can be beneficial if a game is in multiple countries.

Due to a good amount of F2P games being played in multiple countries (i.e., *World of Tanks*), there are many currencies to deal with. A virtual currency can simplify the process of creating the exchange rate for multiple currencies (everyone will be on the same page). According to VP of Marketing at one of the top MMO developers in regards to this:

“I think you have to have a virtual currency, cause then it puts everyone on an equal playing field especially if you’re a global brand, I mean a dollar doesn’t make sense to someone spending Euros or other currencies”

He went on to mention that, virtual currencies can be deceptive, which companies must be careful of, but thinks, in the end, that it’s better to have one. Especially if the game has a global audience. This possible deception is described by Shokrizade (2013) who states, “Research has shown that putting even one intermediate currency between the consumer and real money such as a “game gem” (premium currency), makes the consumer much less adept at assessing the value of the transaction.” When using a virtual currency companies should be aware of the changing of valuation of something when using a different currency, thus companies must be able to communicate the value of what players are buying.

Overall, virtual goods and currencies play an important role in F2P games; they are how a company makes money after all. The company must make sure that the value of these “virtual assets” maintain their value throughout the lifespan of a game. For this to happen, companies will need a monetization expert on board who should have a background in economics and game design (more on this later). Most importantly the virtual goods in a game should improve the experience for players, which is something that was stated throughout the interviews I conducted.

Current Monetization Strategies/Tactics in F2P Games

In this part I will briefly describe the various monetization strategies/tactics that are used in F2P games.

Storefront

The majority of F2P games have a virtual storefront, which is where players make purchases. Purchases are usually made with either premium or earned currency. Some in-game stores have items that can be purchased only with premium currency and items that can only be purchased with earned. The majority games have an in-game store, but there are some that have it on a webpage (i.e., *Path of Exile*). There are store fronts that are located both in the game and on the webpage for convenience; this is seen more with PC F2P games.

Access to in-game stores really depend on the game. In most MMORPGs the store is accessed pressing a button on the in game HUD, others have you talk with an NPC in game that acts as the cashier in a way. In session based online game (ex. FPSs and MOBAs) the store is usually accessed through the main menu or the client. In mobile games the storefront is accessed through a button and sometimes you are put in the store after playing a game session (or after the results screen). The buttons for online stores usually stand out. Take *League of Legends* and *Marvel War of Heroes* for example where both games have dark blue backgrounds and light blue buttons, but the store button is a bronze color that really stands out.

Store layouts usually resemble online shopping sites by showing pictures of items, and having a price below the picture (in virtual currency).

Subscription

Subscriptions used to be the status quo for monetizing MMOs and online games. A subscription lets players pay a monthly fee and in turn players can play the game 24/7 (Shokrizade 2013). Shokrizade also refers to subscriptions as being “unlimited use subscriptions.”

Due to the fact that any part of a game can be charged in a recurring fashion, Shokrizade also describes another subscription model called microsubscriptions and states two key advantages:

1. Allows the consumer to tailor the game to their needs.
2. Allows a company to continue charging for a game service and maintains a revenue stream past the first month.

Microsubscriptions are very relevant to F2P games and go back to F2P games giving more power and choice to consumers. Through microsubscriptions, instead of a company stating that the value of a game is X amount of dollars a month and having consumers agree or disagree, a company can offer multiple value propositions to a consumer and give them the choice of subscribing or not without kicking them out of the game. Microsubscriptions can be seen as a good offering for players who plan on playing for the long-term, due to getting benefits every month.

Microtransactions/In-App Purchase

Microtransactions or In-App Purchases (IAP, the term is used for mobile devices) describe the transactions that happen in F2P games. Microtransactions derive from micropayments, which are, “Charging Web users tiny amounts of money for single pieces of online content” (Mitchell, 2007). PayPal considers \$12 or less to be the amount of a micropayment (PayPal, 2013). Shokrizade (2012) defines a microtransaction as, “The purchase of one “piece” of your game for a set price. It is a one-time transaction that in some cases can be repeated.” While there hasn’t been much said about the amount that constitutes a microtransaction, *Vindica* states that the amount is usually less than \$5, which is valid for some games, but not for others (which is why they don’t say \$5 is the definitive number). Shokrizade divides microtransactions into 3 groups: virtual good sales, content sales, and time controls.

Let’s start with virtual goods, which previously have been described above, are seen more as permissions to content in a game as opposed to just content in a game. There are different types of virtual goods as described: functional, vanity, and consumables. Shokrizade (2012) also describes goods that in the long run can hurt a game, called supremacy goods. Supremacy goods are, “A good or service that reduces the value of all other linked goods and services in its space, including itself” (Shokrizade, 2012). These goods can be seen as goods that give players advantages over other players, in reality they are virtual goods that are seen in pay-to-win games. It should also be noted that these goods usually monetize well in the beginning, but over time do cause more harm than good (think Zynga).

Content sales are simply offering players new campaigns. We have discussed above how F2P players for the most part do not like this practice due to the game content already being free.

Time controls use time gates, which prevents a player getting ahead of another player just because they have more time to play the game. This is usually seen in F2P games as the form of energy where players once they play for a certain amount of time or games cannot play again until the energy replenishes or if they buy more energy. According to Shokrizade (2013) simply being able to buy energy breaks the mechanic, but time gates are extremely useful since you have more control over the player's content consumption (it also discourages having to play all the time to be number 1). Finding balance with time gates is also difficult, due to the fact that players who might not have much money but have time will be aggravated when energy runs out. Players who have money, but not much time will be satisfied because once the energy runs out they probably got their fix (Ludgate, 2011).

Lastly, going back to the discussion of value microtransactions can devalue virtual goods in the game in the long-run, since with every purchase made the value of the rest of the same goods already in the game goes down (Shokrizade, 2012). When talking with Shokrizade he specified the fact that when using microtransactions, the primary target are whales, which can eliminate potential customers. It could be said that the hybrid model, caters to more consumers by combining subscriptions and microtransactions.

Hybrid Model

Now that we have covered both subscriptions and microtransactions, we can cover the hybrid model. Essentially, this is just a combination of microtransactions and subscriptions (or microsubscriptions) in a game. An example of this in F2P can be seen *DC Universe Online* where player can purchase virtual goods in a store or subscribe to the membership which grants premium currency each month, unlimited earned currency, access to all DLC, etc.

Gift Giving

Gift giving is an interesting way of monetizing users in a game. This also shows the importance and opportunity of sociability in F2P games. It's known that there are users who will never pay in a F2P game, but still enjoy and play the game all the time. These players might have friends who do pay money and might even gift items to them, thus in a sense monetizing that free user. An interviewee gave an example scenario to me, "Some players want to be the leader of the guild and want to make large scale purchases of items to share with all the people in the guild, in a sense to have those people work for them in order to get through the game and achieve the highest level of achievement." He went on to say that, this paying player is one who might not have a lot of time, but by providing guild members with time with stronger items, means they can be strong (or get stronger faster). Shokrizade gave a similar example and followed up, "That adds prestige to that player because everyone is indebted to that player [the paying player]."

Shokrizade has an interesting insight as well to virtual worlds in regards to gifting. Players will act more collectively and altruistically in a virtual world that you wouldn't see in the real world. He also stated the fact that, if players have a cap of how much they can spend in game, that gifting is another way to get players with more money to spend more. The gaming company Valve has even gone as far to sell an item that is sent to a random player upon purchasing it. These examples are simple, but go back to the fact that sociability is important for both retention and monetization.

User-Generated Content (UGC)

UGC literally has the customer as a co-producer, by allowing consumers to create items/content in a game. The idea behind this monetization strategy is that a player can create virtual goods and distribute them to other players. What is becoming the norm is players being able to sell items in the virtual store front to earn real money. This doesn't just benefit the player, but also the company in two distinct ways: it adds content to the game and can add to revenues. The advantage of the first benefit is that players can produce items at a much faster rate than developers, just due to numbers alone (one problem could be the quality of the content that is being produced). The second benefit is seen through profit sharing, where the service provider takes a cut of the transaction. This tactic was popularized by Valve who uses it in its two F2P games *Team Fortress 2* and *DOTA 2*. It has even been reported that some of these content creators make 6 figures and use these games as full-time jobs (Pears, 2013). SOE has been experimenting with this tactic in *EverQuest* where it takes 40 percent of revenues if the item is on the marketplace (Sinclair, 2013). SOE also plans to be using UGC in full force in its upcoming (at the time) title *EverQuest Next* and plans on introducing UGC functionality in *PlanetSide 2*.

Path of Exile has an interesting approach to UGC. The developer, Grinding Gear Games, charges a player \$1,000 to design a unique item for the game. The reason for this is most likely that Grinding Gear Games only wants people who are very serious about designing an item, and this allows them to make sure the item will be of the utmost quality for the game.

According to Lehdonvirta, UGC has the potential to represent one of his classifications, Monopsony, where the operator becomes the sole buyer. By using this, the operator would purchase items created by users and sell them in the in-game market themselves, making them act as a distributor. This would grant the operator with control of the content that comes from players. As of now it's mainly just sharing profit from sales. Most companies also have a certification process before allowing user generated items to be sold on the market.

Packs

Packs are used in F2P to sell a collection of virtual goods, and at times physical merchandise as well. Packs can be divided into two groups: founders and starter packs. Founder packs are usually sold during the closed beta of the game. Founders packs usually have three price tiers, take Turbine Studio's *Infinite Crisis* founders program: Basic - \$19.99, Standard - \$49.99, Elite - \$99.99 (they also have listings of different country currencies). The *Infinite Crisis* founder packs contain virtual currency, champion (character) unlocks, costumes (depending on tier), access to maps (depends on tiers), and lastly founders recognition where players might have a way of labeling themselves in game as a "founder." The main seller of these packs is that you're essentially purchasing access into the closed beta and also are already building prestige (as seen with founder's recognition in the example) since exclusive items are only available in these packs, and founder packs are usually not sold after closed beta.

Starter packs (or really any pack after a game launches) is usually meant for new players to purchase to get a good start in a game. These packs show up after the closed beta phase so companies can still monetize using this tactic. To get an idea of the content of these packs take the \$110 "Divine Supporter Pack" for *Path of Exile*:

- 800 Points
- Divine Supporter Forum Title
- Extended Digital Soundtrack
- Divine Weapon Effect
- Divine Rhoa Pet
- Path of Exile Logo or Tabula Rasa T-Shirt
- Chaos Orb Keychain
- 2 Path of Exile Stickers
- Free International Shipping

Other games that use this tactic are *FireFall* and *Marvel Heroes*.

As one can see, these packs can contain virtual goods/currency and physical goods. Sometimes packs include permanent boosts (i.e., XP boost) along with other virtual goods.

The obvious reason for these packs is to start making money during an earlier phase of development. Another reason though is that it helps companies identify core/paying consumers. It also can be a way to identify whales due to high price points for certain packs.

Coercive F2P and Monetization

Ramin Shokrizade (2013) coined the terms “Coercive F2P” and “Coercive Monetization.”

Coercive F2P is where the free part of a F2P game is just a step to get from A to B (free/playing the game) to C (paying \$1) to D (paying \$500). He describes two forms of control, Visibility of Control (VoC) and Tolerance to Control (TtC):

- VoC – How obvious the controlling system is to participants
- TtC – How much control a participant can tolerate

In this type of F2P, the VoC must be more masked or well-hidden so players aren't aware of what's going on or the 'goal.' Shokrizade also states that for transactions to proceed, the VoC must be less than the TtC. This type of F2P focuses on the short term rather than the long-term, despite the nature of F2P games being an ongoing service and even at times forces players to pay just to continue. Shokrizade also states that while we have witnessed much success with coercive F2P in the short-run (i.e., Zynga), but in the long-run this type of F2P hurts (i.e., Zynga).

Coercive Monetization has a similar theme as coercive F2P (both are obviously related and seen together). Shokrizade (2013) in his article, *The Top F2P Monetization Tricks* defines a coercive monetization model as, “The ability to “trick” a person into making a purchase with incomplete information, or by hiding that information such that while it is technically available, the brain of the consumer does not access that information.” This has the same themes of the use of controls. Shokrizade uses examples of the use of premium currencies, reward removal, progress gates (paywalls), soft and hard boosts, and ante games (described in the next section, pay-to-win).

When talking with Shokrizade he had this to say about F2P, “Finally F2P is at the point where they are at the pinnacle, it's gotten as bad as its going to get, people are realizing that they can't continue to use coercive monetization models because they aren't working anymore.” He thinks companies are now more open to new models (his own) and he has stated in his articles several times that the use of coercive models will lead to the eventual extinction of them, due to consumers TtC lowering. Lastly, in a marketing sense, these coercive models, due to being for the short term, are obviously harmful to customer LTV. Oscar Clark told me, “Short term thinking, to get as much money out of the player from day one, is really just stupid. It ends up breaking trust [and] ends up breaking LTV.” Every marketer and (hopefully) company knows the importance of trust, especially these days, which could be a reason why more companies are starting move away from coercive models and are looking for alternatives.

Pay-to-Win

Pay-to-Win (P2W) is arguably where most of the stigma towards F2P games lies, especially in the eyes of gamers. A basic description of P2W is giving players the option to make in-game purchases that give them advantages over other, non-paying, players. P2W has a very negative perception in the West, to the extent where some gamers, right when they hear a game is F2P, automatically assume that it is P2W. Shokrizade (2012) describes in his paper, *How “Pay to Win” Works*, the usual cycle of a P2W game, he describes P2W games as ante games, since paying players need to ante up to keep their advantage over other paying players.

“If half of your players ante up to \$15, the ones that don’t ante up are resigned to losing. Those that do ante up are betting that no one will ante higher, but someone always does. This triggers the “ante game” and it ends fairly quickly with someone buying the win and the others deciding they cannot afford to match. Once a winning ante has been decided, players quickly lose interest in the game.”

Shokrizade goes on that after this cycle revenue diminishes and that the service provider then has no choice, but to reset the server. This starts up another ante game. The paying players will keep anteing up until the majority of players leave the game (some might not even realize they are playing an ante game). The players who make these purchases are usually called whales (which I will cover later). When this topic came up Shokrizade said, “Making a more elaborate ante game is counterproductive.” The fact for this can be seen above, once players realize that the game is an ante game, no matter the quality of the game, players will start leaving. Shokrizade also stated how ante games are usually used as a way to make a quick buck, and are not planned for the long-term.

It is common knowledge in the industry that P2W is much more accepted in Asia, but this has to do more with culture. In the U.S., P2W is highly looked down upon due to the fact that our culture, ideally, likes fair competition. In one of my interviews I was told that P2W was acceptable in Asia, less in Europe, and unacceptable in the U.S.

Every person who I interviewed was against Pay-to-Win for the most part. One person went as far as to say, “For certain demographics there is no issue with that [in regards to P2W]. Other games can’t get away with it, the more competitive games, you can’t get away with it.”

Whales

Whales are the ones who pay large sums of money in F2P games, and there is much debate on who these people are. Some believe these are people who don't have much time, but have money, thus allowing them to pay large sums of money or are just people who are big fans of a game. Others think these are impulsive people who do not have much control on spending habits no matter their income. It's most likely that it's a combination of all these types of people. According to Simon Ludgate (2011), "The term "whale" differs a bit depending on how it's being used -- for some, a "whale" is merely someone who spends more than most -- but the real crux of the "whale" concept is someone who spends more than they would if the game restricted them to self-only purchases." These self-only purchases are purchases that are tied to only one account, and when there is only a finite amount of goods that can be purchased it means once they are purchased the said consumer can't buy anymore, even if he wants too. Ludgate also describes how gifting can raise how much a customer can purchase.

Gamasutra News Editor, Mike Rose, published a 9-page article on Gamasutra titled, *Chasing the Whale: Examining the Ethics of Free-to-Play Games*, where he describes his talks with actual whales of various F2P games and discusses the F2P model in general. He starts with describing three extreme cases of whales, the addiction that these individuals have to spending large amounts of money in their preferred F2P games and choose spending in game over necessities (rent, food, etc.). When presenting these cases to others (industry experts and other whales), they stated that these cases represent a small minority of whales, so the minority of the minority. In fact, Rose states that a good amount of whales that he talked with said they were satisfied with the money they spent and had no problem with the F2P model. In regards to comparing the cases, Rose remarks,

"But it could be argued that to focus on the ratio of exploited to non-exploited customers is to completely miss the point – that a business model where even the smallest portion of players can find themselves losing control and essentially ruining their lives, is a model that must surely face scrutiny, whether on an industry or governmental level."

It should be noted that almost everyone Rose talked with was against government regulation of the industry. One quote from the article from Todd Harris, Hi-Rez COO, stood out to me, "Players will remember which games and companies are exploitative, and gradually over time, we'll see a shift away from these money-grabbers, to games that treat the players with respect." With his findings (there is much more in his paper), he says that much more research is required regarding the topic of F2P.

While talking with Shokrizade about the topic of whales, he compared the difference between a hardcore gamer and a whale:

“The whale is impulsive; they have an inability to grasp the basic social dynamic that is occurring in games, it’s almost the virtual equivalent of ASD (Autism Spectrum Disorder). [Someone] with ASD doesn’t really understand why people are acting the way they are around them. It may turn out that we discover there really is a link between ASD and a whale consumer.”

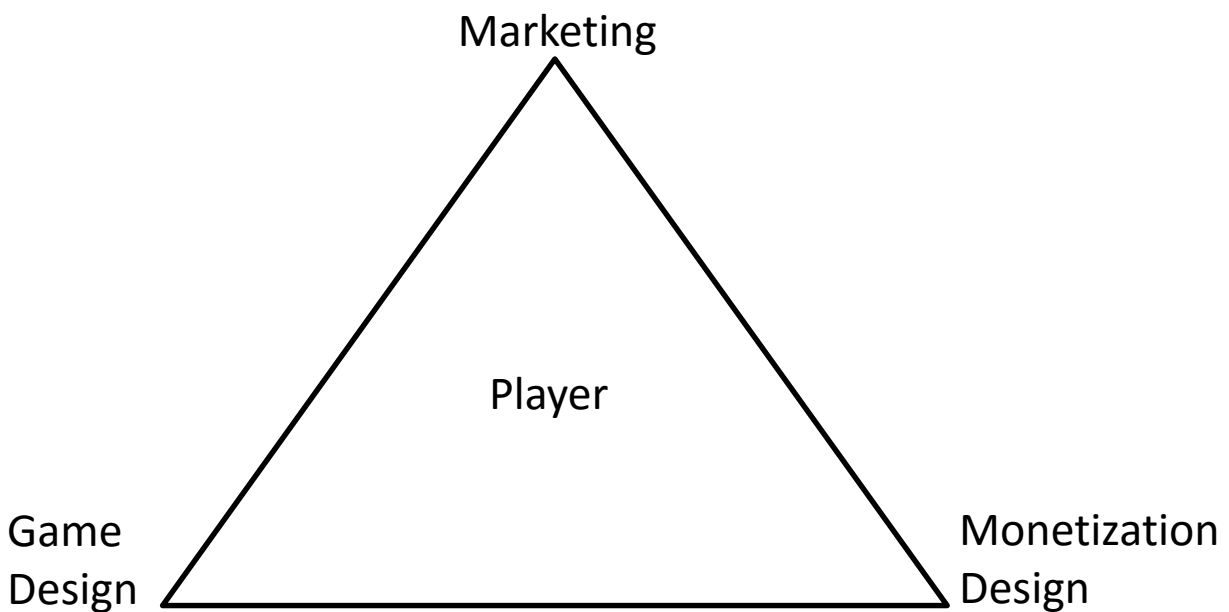
“The hardcore gamer is a completely different animal, they are a highly committed player, they are not looking for instant gratification, they actually would be much more engaged if it took much longer for them to achieve something, but they want to feel that they earned it, which is the exact opposite of whales.”

Shokrizade stressed the fact that game companies are making a mistake by primarily targeting whales instead of hardcore gamers. In his own words, “They [hardcore gamers] are being thrown to the curb in favor of whales, which is a catastrophic mistake because if you have a group that is willing to spend 10 times as much as another group why would you go for the smaller group? Other than the fact that they don’t know how to.” Shokrizade also stated the fact that hardcore gamers are a larger segment and are willing (and want to if the value is there) to spend just as much as whales, but for much longer iterations, saying, “Their spending power is one full order above the spending power of whales”. This leads me to my last point of this section.

One theme that keeps popping up is the notion that, to go forward in the F2P space, we must go away from “hunting whales.” Jason Avent of Boss Alien, the studio that makes iOS game *CSR Racing*, stated in a talk at GDC, “I think the days of chasing whales is over, because it’s too aggressive and it doesn’t stand you in good stead” (Gamasutra). This theme also popped in my interviews, that we must stop going only for whales.

Games as a Service Triangle: An Approach to F2P/Service-Based Games

Throughout my interviews and research, I have noticed something about F2P monetization, and really F2P in general, that keeps coming up. Since F2P games are agile in nature, cross-functionality is a must in F2P development. The same goes for monetization, due to the fact that monetization is inside a F2P game rather than a barrier to get into the game. What has been seen in F2P is that marketers and game developers must work closer together in order to push the success of a game (something I state throughout this thesis). There is also one other role that is part of the equation, the role of the monetization expert. In my interviews some talked about all three (by describing game design, marketing, and economics working together) others only described two (usually marketing and game design). The fact is that these three fields must work close together. I propose a simple framework or an approach to monetization, and really service-based games in general which I call The Games as a Service Triangle:

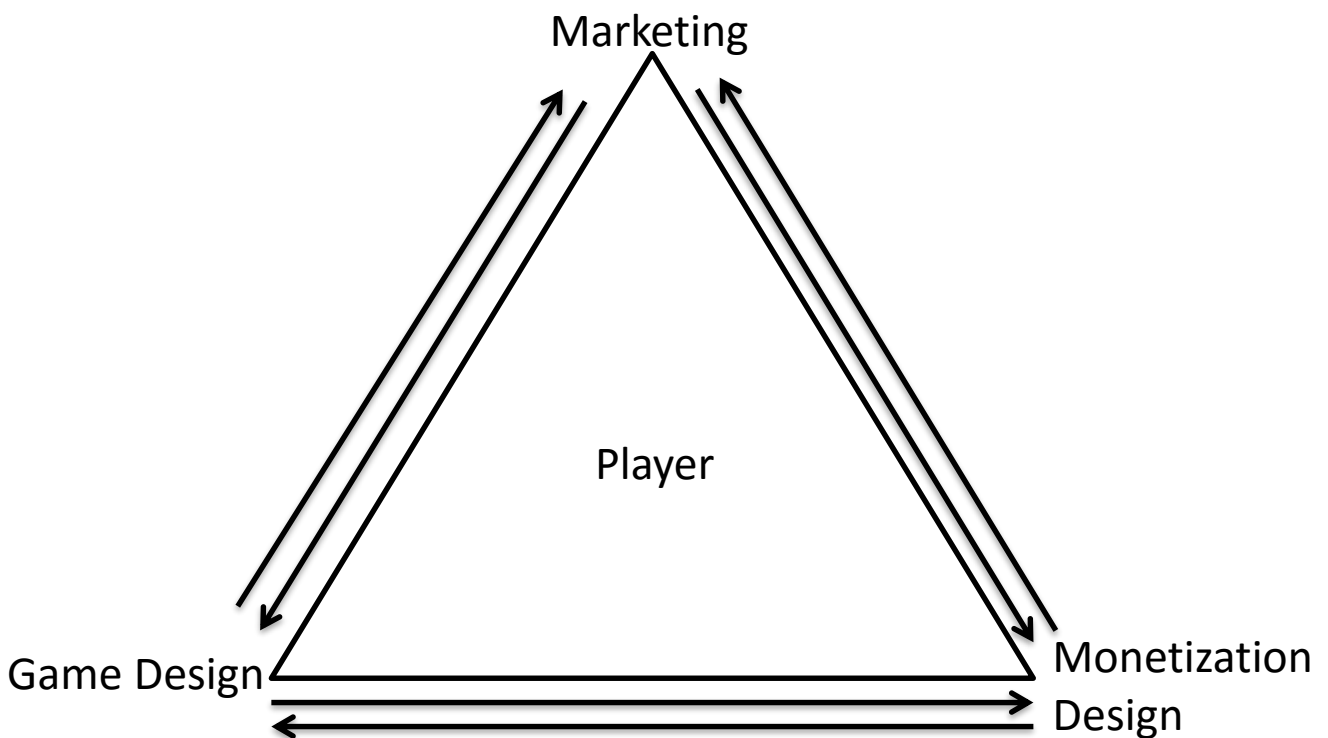


I will be developing this throughout this section. The idea here is that, when approaching the monetization in a F2P game, it depends on three fields: Game Design, Monetization Design, and Marketing. The player is in the center due to the fact that is who the focus should always be on since that is who you're serving and creating a game for. The ideal positions for these three roles are:

- Game Designer
- Monetization Expert (can have a different name, but the person who handles monetization)
- Marketer (Preferably a product marketer or even a product manager)

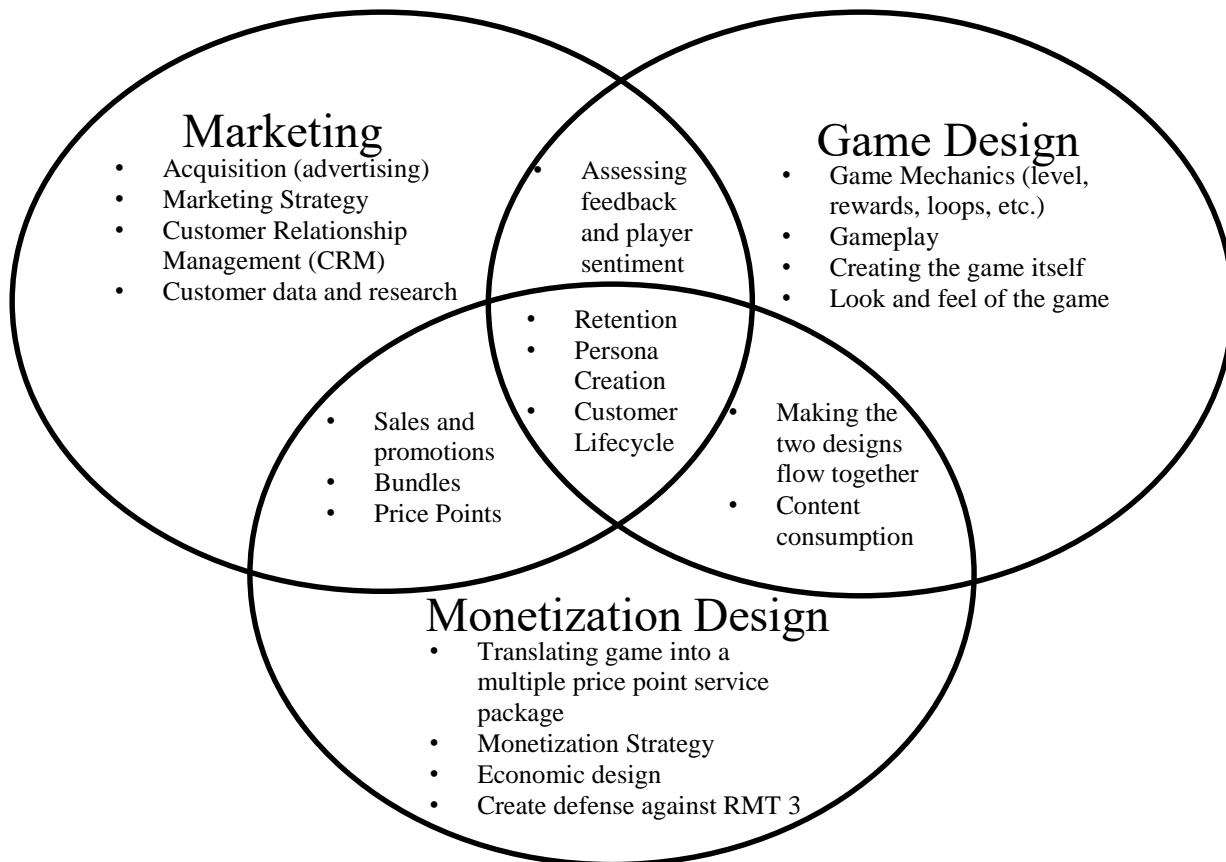
The game designer handles creating the overall game, through coming up with in-game mechanics and systems. The product marketer is the one who deals with the marketing strategy as a whole, but due a F2P game being a service, marketing efforts are on-going and should use a more agile marketing approach. The monetization expert is an interesting position at the moment, since there is demand for it, but technically there are not many who can truly fill the position. According to Ramin Shokrizade (2012), who is at the forefront of this field, in his post on Gameful titled, *How to Become a Monetization Expert*, gives a description of the position: “The role of the monetization expert in a studio is to translate the game into a multiple price point service package with the highest retail value that can be handed to the marketing department.” He goes on to state that this position is not a marketing position, but serves as a bridge to between marketers and the rest of the studio. One of the major reasons why there are not many out there who can fill this position is the fact that the need for a monetization expert is new, due to F2P monetization being much different compared to traditional methods. Another reason is, as Shokrizade states, the fact that this position requires multiple skills sets that can take up to 10 years to learn due to there being no formal way of learning how to be a monetization expert as of now (though Shokrizade states that getting a degree in Economics or Mathematics is helpful). It should be noted that in regards to monetization the most important role is the monetization expert, which is to be expected due to their knowledge in the field.

These three roles must all interact and work together. These relationships should not be viewed as exclusive, but should be viewed as more fluid. All are working towards the goal of creating the most value for players as so:



The three relationships here are: game designer to marketer, marketer to monetization expert, and game designer to monetization expert. The interactions between these fields are not exclusive, but should (or be encouraged to be) happen at the same time, since all three must work together to create the most value to consumers.

Below is a graphic that gives a broad overview of all three roles and how they interact



In the center, while it is a task that is typically handled by marketers, is something that all three will need to collaborate to do. A persona (or buyer persona) is, “examples of the real buyers who influence or make decisions about the products, services or solutions you market” (Buyer Persona Institute). It’s simply a profile of the target customer you are looking to market to. An example of the structure/formatting of a persona is (Giles, MKT 494)

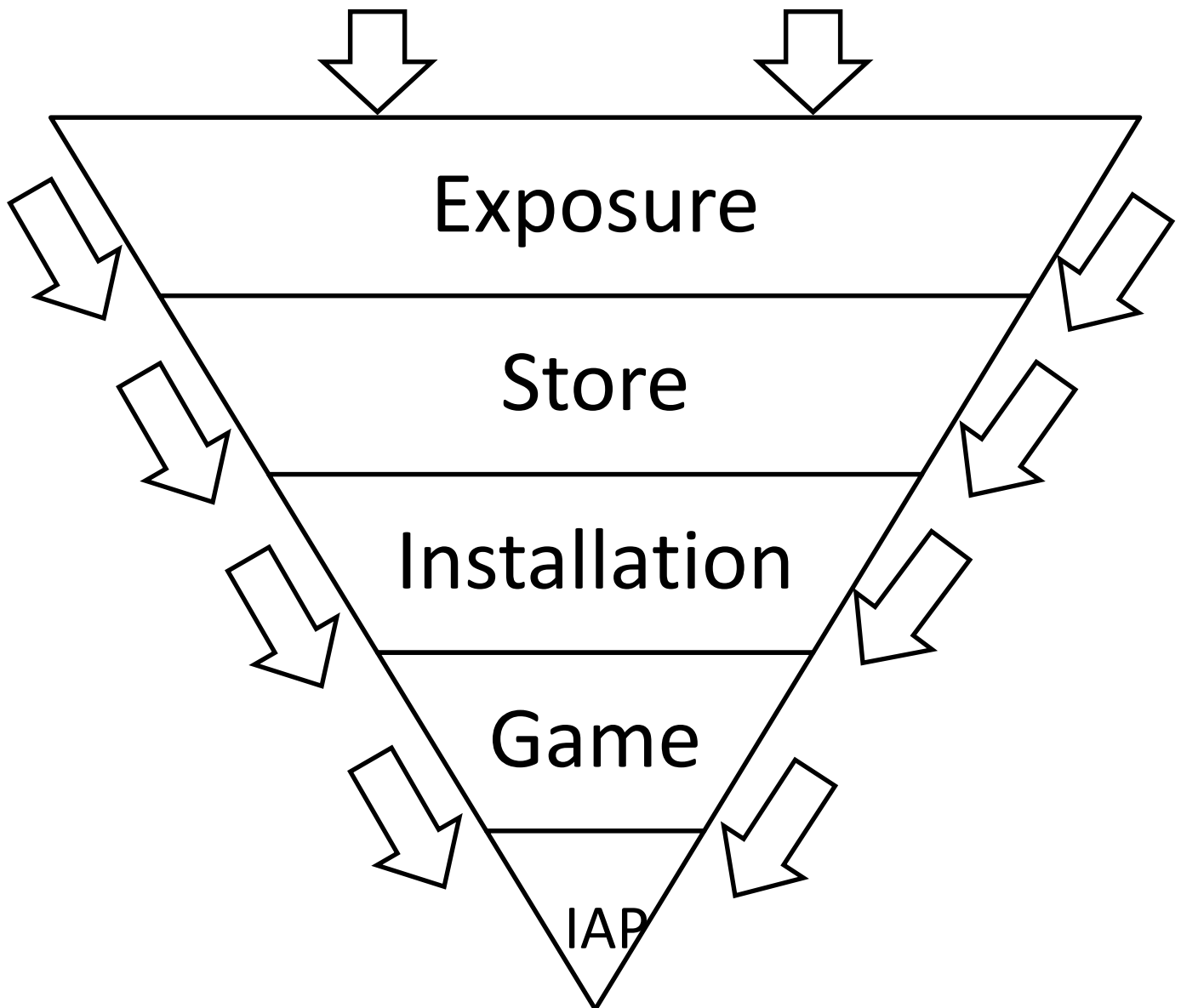
- Name
- Title (i.e. the “hardcore gamer”)
- A quote describing how they think about the game
- Bullet points describing what sets the persona from other personas or the public
- How the persona uses the game (or how they play the game)
- Demographic/personal information (age, sex, income, etc.)
- Interactions (how long they play the game, when, other digital interaction)

One advantage of using a persona is the fact that it makes the segment you're targeting more personable, for example, instead of thinking, "How will this decision impact our hardcore players who are 18-24 and enjoy the RPG elements in our game" it will be simply, "How will this decision impact Sam and his in-game experience?" By having multiple segments and types of people in a F2P game, there will be multiple personas representing different segments, and also personas will probably be made as the game is updated and content is being added. The most important fact about this is that everyone has to be focused on the end user, having these personas be created with different departments better ensures everyone is on the same page. It would be disastrous to have the game designer creating a game for a certain player, the monetization expert creating an economy for a different player, and the marketer bringing a whole different set of players into the game. Creating personas together will make sure everyone is on the same page and have the same users in mind.

As stated retention is one of the most important aspects of Free-to-Play, and each of these disciplines play a role in it. The game designer is creating the main experience, the game that players are playing, adding content to the game, and updating the game. The monetization expert is making sure that the game's economy is sustainable and balanced, so that the assets in the game maintain value and keep players interested, along with coming up with prices. The marketer is focused acquisition, as well as the relationships with players in the game, but also outside the game as well through social media channels, forums, blog posts, etc. All three should also be keeping track of feedback as well.

Customer lifecycle is simply what the expected path of the customer is. A basic example for customer lifecycle can be seen from Will Luton in his book *Free 2 Play: Making Money From Games You Give Away* where he shows the marketing funnel of a Free-to-Play game which looks like:

Potential Players



This simply shows the ideal journey of a player in a F2P game, a potential player is exposed to your game through advertising or word of mouth, then if interested will go to the place they can download the game, then play the game, and finally if they are enjoying the game and want an even better experience make a purchase. It should also be noted that a player can churn at any point in the funnel.

Talk of the marketing funnel leads into customer lifecycle. It can be said in a F2P game that there are multiple customer lifecycles. The marketing funnel seen above is just a broad

overview, if you were to add the perspective of a game designer and monetization expert there would be much added to the game and purchase sections of the funnel. Once a company's personas are more developed it should have a better idea of the journey a customer will take upon entering and playing a game, offering the essential experience that a persona is looking for. When a customer is in the game this is where the monetization expert and game designer must work together to make sure the content consumption is just right. This is due to the fact that the way to monetize players can change late game compared to early game.

Another aspect to add at the end of the lifecycle is churn. This is where marketing will need to have re-targeting and win-back campaigns ready to go for those who leave a game. This will take experimenting since different tactics will work best for different groups of players.

Now that we covered the center let's explore the relationships each of these roles have with one another.

Game Design and Marketing

Throughout this thesis I mention that, marketers and developers must work together. This part is just reiterating this fact. Throughout my interviews I was told, "It's about this marriage between game dev and design and marketing." Oscar Clark supports this, "[F2P] follows through on the fundamental principles of marketing and product design that are applied on every good that has been produced. You just need to apply them differently: different places, different channels, and different mindsets." This is very true due to the fact that in F2P, marketing is not just about acquisition, but also retention (relationship management). A marketer in Free-to-Play won't just be marketing outside the game, but also inside the game as well through sales, events, and providing relevant offerings relevant to players.

Hamari & Lehdonvirta (2010) in their paper, *Game Design as Marketing: How game mechanics create demand for virtual goods*, gives examples of how marketing principles can be seen in MMO design. The findings of the paper (see below) show how design and marketing can overlap.

Design pattern	In marketing terms	Towards	Aims to
Stratified content	Segmentation, differentiation	Rules, Environment	Create segmentation, enable differentiation and generate incentives for repeated purchases
Status restricted items	Differentiation, planned obsolescence	Items	Enforce segmentation and generate incentives for repeated purchases
Multidimensional Gameplay	Segmentation, Differentiation	Gameplay	Create segmentation and enable differentiation and create differentiated additional settings for virtual goods
Avatar types	Segmentation, differentiation	Avatar	Create segmentation and enable differentiation

Source: Hamari & Lehdonvirta (2010)

As one can tell that the relationship between the two is the fact that the mechanics and content in a game can segment users and differentiate virtual items. Marketers should be involved with a game in the beginning stages (along with the monetization expert of course). Once you find the different segments in a game, you can create items/offerings for these different segments (and determine the different lifecycles they can have).

Social media page management, which is really just where companies and consumers can communicate. This usually falls into the realms of marketing where marketers have employees or hire an agency to post content for social media, interact with players, and collect feedback. The feedback collected from these pages is usually referred to as sentiment and can be measured as positive, negative, and neutral. Insight and feedback from these pages can be then sent to or presented to the design/development teams, to give them information that can be helpful as they move forward with game updates.

Game Design and Monetization Design

It is a necessity that these two work together due to the simple fact that monetization is inside and part of the game and not just a layer on top. Shokrizade (2012) recommends that a monetization expert knows game design,

“Game design experience is going to be extremely valuable here, and the more the better. In order to assist your studio’s game designers with how various design decisions will affect monetization, you have to understand the myriad possibilities in game design first.”

When talking with Shokrizade he showed the importance of this relationship even more, “One thing I can’t stress more to anyone that talks to me is that the monetization model and the business model that you choose for your product puts certain constraints on what you can do with your design.” This shows the interdependence between the game designer and monetization expert since both their decisions affect the others.

Marketing and Monetization Design

Lastly, we have marketing and monetization design. These two roles work together primarily by focusing on providing value for the target consumer in the means of monetization. Part of this relationship can be seen with Shokrizade’s explanation of the role of the monetization expert, “The role of the monetization expert in a studio is to translate the game into a multiple price point service package with the highest retail value that can be handed to the marketing department.” Classically, pricing has been the role of the marketer, but due to the complexity and new needs in F2P games a monetization expert, favorably with an economic (and game design) background, will focus on creating the pricing scheme in the game. Shokrizade (2012) also explains this, “I think the reason most marketers have a difficult time understanding how to monetize virtual goods is that they see them as a “good”, not a “service”, when in fact they are both.” This is a topic that was covered earlier of how virtual goods are both products and services (along with being permissions).

Both must be focused on who the target customer is (as well as the game designer). Shokrizade states the monetization expert must understand games and gamers and know the difference between segments (i.e., hardcore gamers vs. whales). In the beginning both target/serve these segments differently, the marketer will be looking to acquire customer’s, position the game, build buzz for the game, and manage customer relationships. The monetization expert will be working to develop the economy and pricing for the target segments. Due to the importance of segmentation and targeting in F2P both will need to work together to come up with strategies of the wants/needs of the segments and how to best add to the experience through monetization.

In the comments of his article Shokrizade left a comment regarding a marketer and monetization expert working together, “I don’t see myself as a marketer, but I realize that to function optimally on a team, I need to pair up with a good one and get in sync right away.”

Using SCRUM as an Example of this Framework

A good example or parallel of this framework in action is through the agile methodology, SCRUM. In Scrum, there are three roles, the Project Owner, SCRUM Master, and Team Members. The roles can be summed up as such (Johnson & Sims pg. 74-80):

Title	Duties
Product Owner	Represents Customers Owns the product backlog Prioritizes stories
SCRUM Master	SCRUM expert and advisor Coach Facilitator
Team Member	Delivers user stories Does the development work Self-organizes to deliver the user stories

The equivalent of the project owner in this framework is the marketer, this is due to the fact that the project owner is the one who represents the customer and creates the user stories. The Scrum Master in this framework would be the monetization expert due to the fact that that, while developing the monetization, they are supporting development teams on how to make sure the game and monetization flow together. Lastly, the equivalent of the team member would be the game designer the one who is actually creating the game. In Scrum communication is a must, where they have 15 minute meetings every morning to inform team members how everything is going with their part of the project, if they need help or not, etc. With this framework the people of these functions must be in regular communication with each other and make sure they are on the same page and hand off data/reports to one another.

Conclusion

The Games as a Service Triangle, like anything that requires cross-functionality, requires each side to have knowledge in the different fields involved. The main reason for this is communication; just knowing the terms each side uses can make communication easier and can deter confusion. The other is that due to having different backgrounds they can come up with ideas that can help the other departments. For example, the game designer might have a good marketing idea, the marketer a good idea on the monetization design, the monetization expert a good game design idea. This type of feedback should be encouraged, but requires team members to be more accepting and have an open mind.

Monetization Designer at Gameloft Benjamin Devienne gives a summary of this relationship between the three parties when answering my question about how monetization should be approached in a F2P game:

“The approach is more a marketing job because you need an understanding of your target and what kind of game you offer, then it’s about economic design, it needs to make sense. I don’t see monetization as a layer on top of the game, it must be inside the game. It should be worked on end to end with the game designer and economic designer to make sure that the game brings value to the user because there is nothing worse than to offer monetization that does not give value to the user.”

It also requires open communication and understanding (like in agile methodologies).

I see the Games as a Service Triangle as a framework, one where a team can be fundamentally built on. It’s more of a base, since it can be executed to any team’s liking. As stated earlier the primary part missing is the monetization experts, but with how the industry is moving there will be individuals who will be able to meet the requirements of this position. In this framework game design, monetization design, and marketing must work together in order to provide the most value for the consumer and most of all provide them with the best experience.

The thinking of the Games as a Service Triangle can be summed up by this quote:

“You need people with vastly different backgrounds to bring those different visions to the table and then it takes a group of talented different people who can listen to one another and figure how to fashion all those different experiences to make the best approach for the consumer.”

Survey

In this section I will share the results of a survey I conducted.

This study is more of an exploratory study. The goal of conducting this survey was to explore the thoughts and feelings consumers have towards F2P games. Hence my research questions:

1. What are consumer's perceptions of the current monetization strategies used in F2P games
2. What are the impressions that consumers have towards F2P games in general?

Literature Review

Secondary research primarily stems from research into virtual worlds, RMT, and the purchase of virtual goods.

Guo & Barnes (2007) state that the three stages that lead to the purchase of a virtual good are: Motivation for pursuing virtual items, purchase behavioral intention and making the final purchase. Motivation can stem from simply seeing the item, if the player wants it or sees value you in it they will want to purchase it, and then finally carry out the purchase.

Lehdonvirta (2005) proposed ten different perceptions users have of RMT based on past research he and others have done. They are categorized by achievement, social, and immersion. A high level view of the perceptions stated are how RMT can break immersion (or as some would say the magic circle), it could also contribute to socialization in a game through players buying from other players and players being able to purchase items to keep up with friends (if they don't have time to play), and it also hinders achievement in the sense that players can purchase items they would normally have to earn through gameplay.

According to the research of Shokrizade, who states he has been research virtual worlds and games for 10 years, states how gamers like to be charged:

- "Most gamers have not given much thought into this (how they like companies to charge them money)"
- "Gamers don't want to "pay to win," or be in a game that allows this."
- "They actually prefer subscriptions to microtransactions"
- "Some of them prefer one time charges for content over recurring fees."
- "They think microtransactions are fine for cosmetic purchases."

Lin & Sun (2007) used Netography (in this case researching online bulletin boards and forums related to gaming) and researched gaming articles to gather information on how players feel about fairness in F2P games and how it affects immersion. Lin & Sun compared those who support F2P games and those who don't. One of their insights is how F2P games have

legitimized a black market activity (as Shokrizade states how RMT 1 replaced RMT 3). They state that players understand that even though the game is free, they understand that someone still needs to pay. In the realms of fairness Lin & Sun observed how some players stated there is no such thing as a fair game and cited how some subscription based games reward players who have more time to play than those who don't, despite everyone having to pay the same price. They also state that free players do not like players paying for advantages, but if they don't have to compete against or interact with payers they are fine with it. When it comes to fun in F2P games there were those who stated F2P games aren't fun because you can't unlock everything in a game through playing, there are items which you need to pay for to acquire, while others state it is because it gives players the opportunity to play multiple games at a minimal cost. Lastly, Lin & Sun state that in F2P games players are less likely to complain (though I would guess it's different in current times) and be less loyal to companies, due to the fact that these games are free and that exit is much easier due to not having a financial stake in the game (though there are other forms of equity that can be gained in the game to replace this, i.e. friends).

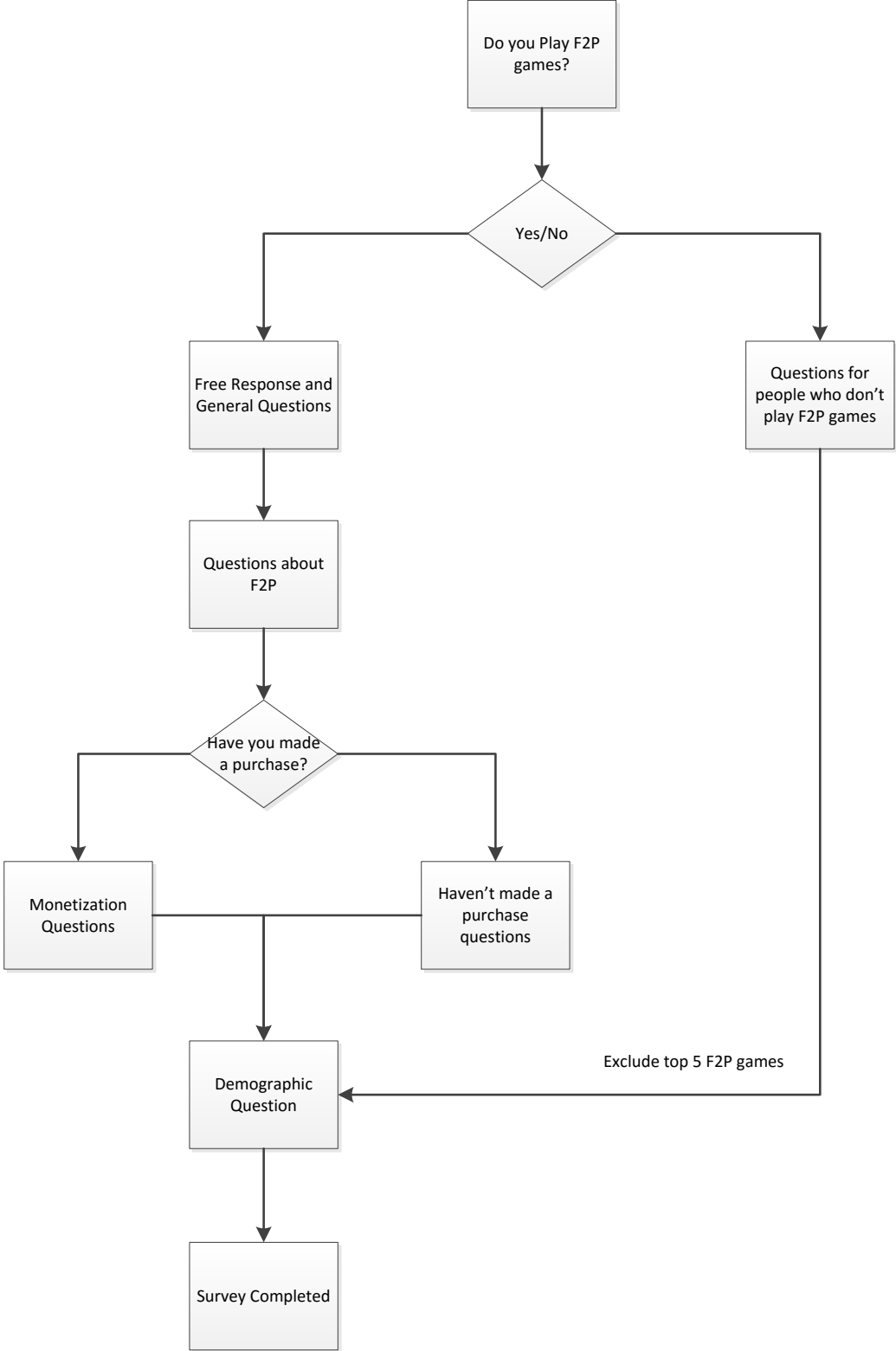
Nojima (2007) surveyed gamers, particularly MMO gamers, comparing the play styles of those who play F2P MMOs and subscription-based MMOs in regards to pricing strategy. One of his findings was that in F2P MMOs players for shorter amounts of time compared to that of subscription-based MMOs. Interestingly Nojima also states how F2P (described as per-item building), leads to more immersed users, but has the drawback of them playing less. Also stated in the paper is how subscription-based games can lead to players staying with a game longer, but there is pressure to get enough players in the game, which is where F2P games do much better. Lastly, Nojima describes how social motivation is part of a player's virtual identity which can lead to increased immersion. This last point can be seen in many F2P games due to getting a large number of users, which means there are more players to interact with, which leads to increased immersion.

Research Methodology

The research methodology I decided on was a survey, specifically an online survey that was made through Qualtrics. The majority of respondents were recruited from Amazon Mechanical Turk. The reasons for using Mturk were due to time constraints, its low cost, and through keywords having some control of who takes your survey. The majority of keywords used were towards gaming (i.e. games, free to play, etc.), to make sure respondents had knowledge of gaming. Respondents at first were compensated at \$.50 and due to low turnout I ran a second cycle raising the amount to \$1.00, which performed much better. Along with Mturk I also went to gaming forums and my personal Facebook network to recruit respondents

The survey itself had three paths a respondent could take. The first path was that a respondent plays F2P games and have actually made purchases in them (path 1). The next path was that a respondent plays F2P games, but did not make any purchases (path 2). The last path was that a



respondent does not play F2P games (path 3). The reason for this was to segment respondents and gain insight to how the feelings differ between the three types of paths. The flowchart below shows the paths:
















On average, the survey took about 10-15 minutes to complete (it depended on the path taken). The majority of questions in the survey were multiple choice and likert scales. For each path there was a required free response question that asked respondents to state their thoughts and feelings towards F2P games. Respondents had a limit of 750 characters.

Demographic Information on Respondents

Below is the descriptive statistics regarding demographic information of participants.

What is your gender?						
#	Answer	Bar	Response	%		
1	Male		52	55.32%		
2	Female		42	44.68%		
	Total		94	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	2	1.45	0.25	0.50	94	94

Age?						
#	Answer	Bar	Response	%		
1	18 - 24		23	24.47%		
2	25 - 34		38	40.43%		
3	35 - 44		29	30.85%		
4	55 - 64		2	2.13%		
5	65 - 74		1	1.06%		
6	75+		1	1.06%		
7	Prefer not to answer		0	0.00%		
	Total		94	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	6	2.18	0.88	0.94	94	94

What is your Household income ?						
#	Answer	Bar	Response	%		
1	Less than \$15,000		6	6.38%		
2	\$15,000 - \$29,999		12	12.77%		
3	\$30,000 - \$49,999		26	27.66%		
4	\$50,000 - \$79,999		21	22.34%		
5	\$80,000 - \$99,999		10	10.64%		
6	\$100,000 - \$149,999		3	3.19%		
7	\$150,000 - \$249,999		3	3.19%		
8	\$250,000+		0	0.00%		
9	Prefer not to answer		13	13.83%		
	Total		94	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	9	4.23	5.34	2.31	94	94

The general demographics of the respondents of this survey is that there were a close amount of males and females who took the survey. Respondents seem to be primarily 18-44 years old. Income ranges primarily from \$30,000 – \$79,999.

Next to get more specific with the demographics, I asked questions regarding gaming habits, to see what kind of gamers responded to the survey. Here are the results:

What are your favorite genres in gaming? (Mark all that apply)						
#	Answer	Bar	Response	%		
1	First Person Shooter (FPS)		36	38.30%		
2	Multiplayer Online Battle Arena (MOBA)		12	12.77%		
3	Mass Multiplayer Online Role Playing Game		15	15.96%		
4	Real-Time Strategy (RTS)		33	35.11%		
5	Fighting		14	14.89%		
6	Action		32	34.04%		
7	Adventure		37	39.36%		
8	Role Playing Game (RPG)		39	41.49%		
9	Puzzle		54	57.45%		
10	Sports		19	20.21%		
11	Social Games		25	26.60%		
12	Collectible Card Games (CCG)		6	6.38%		
13	Other (please specify)		10	10.64%		
	Total		332	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	13	6.70	10.65	3.26	332	94

On average, how many hours a week do you play games? (not just F2P)						
#	Answer	Bar	Response	%		
1	1 - 4 Hours		46	48.94%		
2	5 - 9 Hours		18	19.15%		
3	10 - 14 Hours		13	13.83%		
4	14+ Hours		17	18.09%		
	Total		94	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	2.01	1.37	1.17	94	94

What kind of gamer do you think you are?						
#	Answer	Bar	Response	%		
1	Avid gamer/hardcore		19	20.21%		
2	Frequent gamer		27	28.72%		
3	Occasional gamer/casual		48	51.06%		
	Total		94	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	3	2.31	0.62	0.79	94	94

Along with this I asked respondents who do play F2P games I asked them to list their top 5 F2P games (it was not required to list 5). This was used to give me more insight to the type of gamers who took the survey. The top 5 games that were most listed by respondents were:

1. Candy Crush Saga
2. League of Legends
3. Angry Birds
4. Words with Friends
5. Farmville

Overall it can be seen that the majority of respondents of this survey were casual gamers. The data collected reflects this with weekly playtime, games played, genres played, and from the respondents themselves classifying themselves. Results reflected below should take into these results into account and factor in that most responses reflect those of casual gamers, followed with gamers who are in between hardcore and casual gamers (known as mid-core), and lastly hardcore gamers.

Results/Discussion

In this section I will present the results and discuss the results of the survey. The nature of this survey is exploratory, with the primary research questions being:

1. What are consumers' perceptions of the current monetization strategies used in F2P games
2. What are the impressions that consumers have towards F2P games in general?

With this I will be presenting the descriptive statistics and review each question and sum up the results in the conclusion of this section. In total there were 37 questions (two of them being free response) with three survey paths (as seen in the figure earlier).

Free Response for those who play F2P games

The free response question for those who play F2P games asked for respondents, “Please use the space below to write your thoughts and feelings towards Free-to-Play games in regards to making in-game purchases, game quality, experience, etc.” Respondents had a limit of writing 750 characters. Here are the general themes of the free response question for those who play F2P games:

- Respondents who mentioned pay-to-win said they don’t like it, and are usually worried about the F2P games they play being P2W.
- Several respondents like the fact that they are able to get into a game and play for free. Stating that it gives them the chance to judge the quality of a game without making a financial commitment.
- Many don’t like being forced to pay or feel like they need to pay to get the full content of the game or being forced to pay to progress in a game.
- In terms of quality answers were mixed, some think F2P games are good quality now, others say its improving, and there were those who though F2P games were of low quality. It really seemed to matter the type of F2P games they played.
- Many stated they like F2P games to pass time. This goes along with many of the respondents being casual gamers.
- Several respondents mention how they do not make purchases in F2P games.
- Some respondents felt like many F2P games they play get to aggressive with upselling or feel levels ramp up the difficulty on purpose to influence purchasing.
- There were respondents who felt that making purchases to speed up processes or get level up faster are cheating and take away from a game and others did not have a problem with it.
- There was also a theme with respondents who would say something positive about F2P games (i.e. the games are free), but then mention a negative aspect of F2P (i.e. P2W).
- Several responses were mixed, where respondents will say some games are great and have no problems, while they will state some games are frustrating and feel like you’re forced to pay.

Below are direct quotes from the free response section that represent the themes stated above:

- “Free to play games are amazing. I believe that free to play games are where video games are heading at least for the PC market. Almost all of the games I currently play are free to play and I regularly spend money on them. I quit playing League of Legends about a year ago but total I would say I have spent around \$100 in the time that I played. I currently play a game called Path of Exile which has become my favorite game. So far I have spent about \$60 on POE micro transactions and will continue to support this amazing game. Free to play games have shown themselves to be just as high quality as any other game. So long as the games are not pay to win then free to play is the way to go.”
- “I like some free-to-play games but most can be a little annoying. I hate it when you have to make in-game purchases to beat a level or win the game. Also, it's obnoxious when there are a lot of pop-ups asking you to buy more things.”
- “They are usually free to play, pay to win in most cases. Quality isn't as good as subscription or bought games but it is sufficient if the community is good, and the communities on free games are usually much larger. I have no problem making in-game purchases.”
- “I like free to play games because there is no upfront investment. I don't have to read reviews or think about how many hours of gameplay a game has. I can just download the game and try it out. If I don't like it then it is no big loss. Many free to play games like Candy Crush just seem to be set up to keep you playing. The game is not really fun; it is just set up using rewards and sounds to keep you playing. I don't like the fact the free to play games always pressure you to make purchases.”
- “I wish that I could just buy the game right-out. There's no point not to charge full price unless you're hoping to make more than retail. So, the whole approach is greedy :(“
- “I enjoy free to play games quite a bit but I don't bother with the ones that require you to make in game purchases in order to enjoy a complete game experience.”
- “Free to play games for the most part are run by and kept standing by game purchases, but I have never bought anything for these. These are cool games that are usually bad graphics but keep you entertained and should only be regarded as a time waster when you are bored and not to be played that often”
- “I like them because it gives you a chance to play and try out the game to see if you like it; then if you do, you can make purchases using real money if you prefer to do so.”
- “I take advantage of Free to play games but I do not purchase them. I usually get bored by games after I know I can play them. I plat mostly casual game, not war games or anything violent. I like strategy games but I do not want to be suckered into playing games where I have to purchase virtual stuff with real money.”

General F2P Questions

This block of questions was asked to those who do play F2P games. These questions were to get a general understanding of the reasons why respondents play F2P games, platforms they play on, and just general feelings towards topics regarding F2P. The first two questions ask respondents to select reasons why they play F2P games with one letting them select multiple reasons and the other having them select only one. Below are the results of the questions, the first one being select one or more reasons and the second one choose one reason.

Please select any of the reasons below that describes why you play Free-to-Play games (mark all that apply).						
#	Answer	Bar	Response	%		
1	They are free		79	94.05%		
2	My friends play them		38	45.24%		
3	They are fun games to play		77	91.67%		
4	To compete against other players		24	28.57%		
5	To pass time		67	79.76%		
6	Other (please specify)		3	3.57%		
Total			288	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	6	2.90	2.33	1.53	288	84

Out of the reasons you play Free-to-Play games, what is the primary reason? (Select one)						
#	Answer	Bar	Response	%		
1	They are free		24	28.57%		
2	My friends play them		5	5.95%		
3	They are fun to play		36	42.86%		
4	To compete against other players		1	1.19%		
5	To pass time		18	21.43%		
6	Other (please specify)		0	0.00%		
Total			84	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.81	2.06	1.44	84	84

These first two questions explore why people play F2P games, in the free response many cite the fact that the games are free to be the primary reason for playing. As seen from the results when respondents can choose many reasons many variables go into them choosing to play a F2P game (which is obvious). When only able to select one reason, the majority chose that the games are fun (they are games after all), even though the option 1 (games are free) in the previous question was selected more (by only 2 points). Another fact that coincides with the free response is to play these games to pass time, which is probably more towards those who play primarily on mobile devices. From this players seem to want to have a fun experience and a low barrier to entry to have that experience.

The next question was asked was in the same format as above (select many, then select one), but this is in regards to gaming platforms respondents play F2P games on. The first question asked to select the platforms they play F2P games on, the next question then asked which platform is their favorite to play F2P games on. Below are the results of this (many first then select one):

What platforms do you play Free-to-Play games on? (mark all that apply)						
#	Answer	Bar	Response	%		
1	Console (i.e. PlayStation 3, Xbox 360)		15	17.86%		
2	PC/Mac		57	67.86%		
3	Mobile (Smartphones)		59	70.24%		
4	tablet (i.e. iPad)		28	33.33%		
5	Social Networking Sites (i.e. Facebook)		26	30.95%		
6	Other (please specify)		0	0.00%		
	Total		185	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.96	1.35	1.16	185	84

Out of the platforms you play Free-to-Play games on, which is your favorite to play them on? (Select one)						
#	Answer	Bar	Response	%		
1	Console (i.e. PlayStation 3, Xbox 360)		3	3.57%		
2	PC/Mac		35	41.67%		
3	Mobile (Smartphones)		23	27.38%		
4	tablet (i.e. iPad)		15	17.86%		
5	Social Networking Sites (i.e. Facebook)		8	9.52%		
6	Other (please specify)		0	0.00%		
	Total		84	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.88	1.12	1.06	84	84

From the results it can be see that the majority of respondents play F2P games on PC and Smartphones. Interestingly the PC seemed to be the most preferred platform to play F2P games on, despite the demographics hinting at the majority of respondents being casual gamers.

I can play a Free-to-Play game without paying at all						
#	Answer	Bar	Response	%		
1	Strongly Disagree		0	0.00%		
2	Disagree		5	6.02%		
3	Neither Agree nor Disagree		1	1.20%		
4	Agree		39	46.99%		
5	Strongly Agree		38	45.78%		
	Total		83	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
2	5	4.33	0.61	0.78	83	83

As seen the responses were very one sided, showing that many respondents feel that they can control their spending in F2P games.

I can play a Free-to-Play game and still get the full enjoyment out of the game without paying any money.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		3	3.61%		
2	Disagree		10	12.05%		
3	Neither Agree nor Disagree		10	12.05%		
4	Agree		42	50.60%		
5	Strongly Agree		18	21.69%		
	Total		83	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.75	1.09	1.05	83	83

While respondents report that they can play a F2P without paying, but there are some who don't feel like they get the full experience of the game if they don't pay (but most do).

Spending money in a Free-to-Play game gives me an advantage.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		7	8.43%		
2	Disagree		8	9.64%		
3	Neither Agree nor Disagree		19	22.89%		
4	Agree		27	32.53%		
5	Strongly Agree		22	26.51%		
	Total		83	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.59	1.49	1.22	83	83

The point of asking this question was that there seems to be a theme among some gamers who think that if a game is F2P it means that it is P2W automatically. As seen the majority of respondents agree with this statement. This is interesting since there are many games out there where if you spend money no advantage is gained. This could do with the fact that IAPs can have a bad reputation among some gamers.

The majority of Free-to-Play games require you to pay at one point in the game (i.e. there is a paywall)						
#	Answer	Bar	Response	%		
1	Strongly Disagree		5	6.02%		
2	Disagree		33	39.76%		
3	Neither Agree nor Disagree		20	24.10%		
4	Agree		19	22.89%		
5	Strongly Agree		6	7.23%		
	Total		83	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.86	1.15	1.07	83	83

This question deals more with coercive monetization, and looks to see if players feel like they are forced to pay in most F2P games. As seen most respondents disagree with the statement presented, but there is a good amount of respondents who agree with the statement.

I feel comfortable with the amount of money Free-to-Play games ask me to spend						
#	Answer	Bar	Response	%		
1	Strongly Disagree		12	15.38%		
2	Disagree		19	24.36%		
3	Neither Agree nor Disagree		21	26.92%		
4	Agree		23	29.49%		
5	Strongly Agree		3	3.85%		
	Total		78	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.82	1.29	1.14	78	78

Respondents seemed to have mixed feelings regarding this question, which could be due to the fact that value (in terms of price) is perceived differently among consumers.

The majority of F2P games I have played are fun games.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		1	1.20%		
2	Disagree		6	7.23%		
3	Neither Agree nor Disagree		6	7.23%		
4	Agree		52	62.65%		
5	Strongly Agree		18	21.69%		
	Total		83	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.96	0.69	0.83	83	83

F2P games are services, but they are games. When it comes to games players usually want to experience something that is fun and entertaining. While the results shouldn't be surprising, since the F2P games respondents play are most likely fun since they keep playing them.

The next question asked to rate the quality of F2P games on the platforms, using a slider that ranged from 0-100, the results can be seen below:

Think of the gaming platforms you have and the Free-to-Play games you play on them. Please rate (0 being horrible and 100 being the best) what you think is the quality, in terms of graphics, game play, payment methods, and overall experience, of the Free-to-Play games you play according to gaming platform.					
Please keep rating relative to the platform (i.e. judging quality of mobile games to console). Mark not applicable if you don't play F2P games on the platform.					
#	Question	Responses			Mean
1	Console	37			60.35
2	PC/Mac	69			74.64
3	Mobile (Smartphones)	64			66.83
4	Tablet (i.e. iPad)	42			72.48
5	Social network (i.e. Facebook)	45			60.22
Statistic	Console	PC/Mac	Mobile (Smartphones)	Tablet (i.e. iPad)	Social network (i.e. Facebook)
Min Value	0	3	8	2	1
Max Value	100	100	100	100	100
Mean	60.35	74.64	66.83	72.48	60.22
Variance	809.01	448.94	529.51	643.52	1066.49
Standard Deviation	28.44	21.19	23.01	25.37	32.66
Total Responses	37	69	64	42	45
Total Respondents	37	69	64	42	45

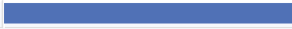

While not surprising that PC was the highest rated in terms of quality F2P games (m=74.64), but what is interesting is how tablets (m=72.48) was only about 2 points below, but there were less respondents that rated it. Consoles, which had the least respondents and were rated the second lowest in terms of quality, as of now are hard to judge due to lack of F2P games on them, but the next generation of consoles will be changing this fact.

The last question for this block of questions looked to see play time in regards to payment model. Respondents were required to enter a percentage for the type of games they played.

Please estimate the percentage you play Free-to-Play games compared to other types of games (total should add to 100)					
#	Answer	Min Value	Max Value	Average Value	Standard Deviation
1	Pay-to-Play (make one payment to play)	0	99	32.76	33.02
2	Subscription only (paying a monthly fee to play)	0	100	5.69	15.99
3	Free-to-Play	0	100	61.95	34.31

These results show that respondents mainly play F2P games, which should not be surprising due to the fact that the barrier to entry is much lower. This trend is seen as well with pay-to-play (e.g., *Grand Theft Auto V*) being the next most played and the last being subscription based games (e.g., *World of Warcraft*) with barriers to entry increasing with each category respectively.



This next question was used to divide the paths in to path 1 and path 2:




Have you every made a purchase (with real money) in a Free-to-Play game?				
#	Answer	Bar	Response	%
1	Yes		49	59.04%
2	No		34	40.96%
	Total		83	100.00%









Path 1: Have made a Purchase in a F2P Game




In this section I will be presenting and discussing the results of those on Path 1 (those who have made purchases in F2P games).





First I will present a brief demographic profile of those on this path by the results below:

What is your gender?						
#	Answer	Bar	Response	%		
1	Male		26	55.32%		
2	Female		21	44.68%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	2	1.45	0.25	0.50	47	47

Age?						
#	Answer	Bar	Response	%		
1	18 - 24		7	14.89%		
2	25 - 34		20	42.55%		
3	35 - 44		20	42.55%		
4	55 - 64		0	0.00%		
5	65 - 74		0	0.00%		
6	75+		0	0.00%		
7	Prefer not to answer		0	0.00%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	3	2.28	0.51	0.71	47	47






What is your Household income?						
#	Answer	Bar	Response	%		
1	Less than \$15,000		3	6.38%		
2	\$15,000 - \$29,999		5	10.64%		
3	\$30,000 - \$49,999		18	38.30%		
4	\$50,000 - \$79,999		9	19.15%		
5	\$80,000 - \$99,999		3	6.38%		
6	\$100,000 - \$149,999		1	2.13%		
7	\$150,000 - \$249,999		2	4.26%		
8	\$250,000+		0	0.00%		
9	Prefer not to answer		6	12.77%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	9	4.09	5.21	2.28	47	47

What kind of gamer do you think you are?						
#	Answer	Bar	Response	%		
1	Avid gamer/hardcore		11	23.40%		
2	Frequent gamer		14	29.79%		
3	Occasional gamer/casual		22	46.81%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	3	2.23	0.66	0.81	47	47






On average, how many hours a week do you play games? (not just F2P)						
#	Answer	Bar	Response	%		
1	1 - 4 Hours		18	38.30%		
2	5 - 9 Hours		8	17.02%		
3	10 - 14 Hours		8	17.02%		
4	14+ Hours		13	27.66%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	2.34	1.58	1.26	47	47

The demographics are similar they examined earlier, despite breaking down the data more. This is seen in each demographic category, including the gaming ones. Thus respondents are primarily casual gamers followed by mid-core and finally hardcore gamers.

The questions of this path revolve around asking respondents their payment preferences as well as their satisfaction towards making purchases in the F2P games they play.





I prefer paying a flat monthly subscription fee rather than paying for items/content in-game (microtransactions)						
#	Answer	Bar	Response	%		
1	Strongly Disagree		14	28.57%		
2	Disagree		19	38.78%		
3	Neither Agree nor Disagree		6	12.24%		
4	Agree		7	14.29%		
5	Strongly Agree		3	6.12%		
	Total		49	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.31	1.47	1.21	49	49

It seems that respondents prefer paying for in-game items than paying recurring subscription fee. While this may differ from the findings of Shokrizade, the difference could be attributed to (and I am assuming) his results come from surveying more hardcore gamers, while this survey has a majority of respondents who are casual gamers.

I prefer paying an upfront fee to play game rather than downloading a game for free and being given the option to pay for items and content in the game (Microtransactions).						
#	Answer	Bar	Response	%		
1	Strongly Disagree		5	10.20%		
2	Disagree		7	14.29%		
3	Neither Agree nor Disagree		13	26.53%		
4	Agree		15	30.61%		
5	Strongly Agree		9	18.37%		
	Total		49	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.33	1.52	1.23	49	49







Interestingly with the majority of respondents being casual gamers, it seems the majority prefer to pay an upfront fee. It should be noted though that many respondents stated how they like being able to try and get into a game for free without having to pay in the free response section





of the survey. Despite liking paying an upfront fee as a subscription, they prefer the traditional retail model of paying a single price to play the full game.

How do you feel towards having the option of purchasing items and/or subscribing in a Free-to-Play game?						
#	Answer	Bar	Response	%		
1	Very Poor		0	0.00%		
2	Poor		10	20.41%		
3	Fair		25	51.02%		
4	Good		12	24.49%		
5	Very Good		2	4.08%		
	Total		49	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
2	5	3.12	0.61	0.78	49	49

This question is meant to see how respondents feel about, as described in an earlier section, hybrid monetization models. As seen from the results above respondents seem to not have a problem with having the option to purchase items or subscribe if they want to make a payment in game.

The next three questions look to see the amounts of money that respondents have spent in F2P games:

For the Free-to-Play game you have spent the most money, what's the total amount you spent?						
#	Answer	Bar	Response	%		
1	\$.01 - \$9.99		16	33.33%		
2	\$10.00 - \$19.99		11	22.92%		
3	\$20.00 - \$49.99		8	16.67%		
4	\$50.00 - \$99.99		5	10.42%		
5	\$100.00 - \$299.99		7	14.58%		
6	\$300.00 - \$499.99		0	0.00%		
7	\$500.00 - \$999.99		0	0.00%		
8	\$1000.00+		1	2.08%		
	Total		48	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	8	2.60	2.67	1.63	48	48

Please estimate how much you usually spend in Free-to-Play games per month						
#	Answer	Bar	Response	%		
1	\$.01 - \$9.99		41	85.42%		
2	\$10.00 - \$19.99		5	10.42%		
3	\$20.00 - \$49.99		1	2.08%		
4	\$50.00 - \$99.99		1	2.08%		
5	\$100.00 - \$299.99		0	0.00%		
6	\$300.00 - \$499.99		0	0.00%		
7	\$500.00 - \$999.99		0	0.00%		
8	\$1000.00+		0	0.00%		
	Total		48	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	1.21	0.34	0.58	48	48

In the last purchase you made in a F2P game how much did you spend?						
#	Answer	Bar	Response	%		
1	\$0.01 - \$4.99		25	52.08%		
2	\$5- \$9.99		18	37.50%		
3	\$10.00 - \$19.99		1	2.08%		
4	\$20.00- \$39.99		2	4.17%		
5	\$40.00 - \$79.99		2	4.17%		
6	\$80.00 - \$99.99		0	0.00%		
7	\$100.00+		0	0.00%		
	Total		48	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	1.71	1.02	1.01	48	48

Based on the fact that many selected the first choice, it can be said that the majority of respondents have only made around 1-3 purchases.

The next two questions looked to gain insight to the spending habits of gamers.

What best characterizes your spending in a Free-to-Play game? (Mark all that apply)						
#	Answer	Bar	Response	%		
1	Purchasing virtual currency to buy other items in-game		30	62.50%		
2	Purchasing founder or starter packs		4	8.33%		
3	Purchasing Content (DLC, characters)		17	35.42%		
4	Purchasing virtual goods (Costumes, weapons, etc.)		11	22.92%		
5	Purchasing Boosts (XP boost, build faster, etc.)		10	20.83%		
6	Other (please specify)		5	10.42%		
	Total		77	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	6	2.77	2.84	1.69	77	48





The results of this question are not surprising due to the fact that the vast majority of F2P games use a virtual currency, which is the purpose of the next question:

After purchasing Virtual currency what kind of items do you usually purchase with it? (Mark all that apply)						
#	Answer	Bar	Response	%		
1	Cosmetic (changes look of your character)		16	33.33%		
2	Boosters (XP Boost, Build faster)		15	31.25%		
3	Functional (Weapons, armor)		18	37.50%		
4	Content (DLC, Characters)		22	45.83%		
5	Other (please specify)		8	16.67%		
	Total		79	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.89	1.69	1.30	79	48






As seen above, respondents seem to purchase a little of everything. It seems as if when making a purchase respondents do not gravitate to one specific type of purchase. For those who

selected other they stated purchases such as: inventory space, keys to open chests, and access to new levels/towns.

The next two questions looked to see how players feel after they have made purchases:

Purchases I have made in F2P games have added to the experience and enjoyment of playing these games.						
#	Answer	Bar	Response	%		
1	Never		0	0.00%		
2	Occasionally		7	14.89%		
3	Sometimes		23	48.94%		
4	Frequently		12	25.53%		
5	Almost Always		5	10.64%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
2	5	3.32	0.74	0.86	47	47

One of the themes in my interviews was that, in F2P games, purchases should add to the experience of the game. From looks of the results it seems that most the majority of those who make purchase only occasionally or sometimes feel like the experience in a F2P game improves after making a purchase.

Do you ever regret making purchases in Free-to-Play games?						
#	Answer	Bar	Response	%		
1	Never		6	12.77%		
2	Hardly Ever		10	21.28%		
3	Occasionally		24	51.06%		
4	Often		6	12.77%		
5	All of the Time		1	2.13%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.70	0.87	0.93	47	47

This question is based on one of the negative consequences of impulse purchases is buyers' remorse (as discussed earlier). While these terms are subjective, anytime a player might feel regret of making a purchase in a F2P game, can lead to a negative experience or perception of the said game. The results here are similar to those above (though the wording is different), which is interesting since respondents at times feel as if the purchases they made have added to the experience, but there are times where they regret it.

This next question was deals with coercive monetization, since one of the prominent discussions regarding F2P how companies get users to pay.

Have you ever felt like you were forced to make a purchase in a Free-to-Play game?						
#	Answer	Bar	Response	%		
1	Never		11	23.40%		
2	Rarely		14	29.79%		
3	Sometimes		15	31.91%		
4	Often		7	14.89%		
5	All of the Time		0	0.00%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	2.38	1.02	1.01	47	47

The results here show that some respondents do feel at times that they are forced to pay in a F2P game. While this isn't the case for every purchase they have made they still get this feelings at times.

The last question of this path looks to see if respondents feel like they need to make a purchase to get the full experience of a game

I need to make purchases to get the full experience of a Free-to-Play game.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		4	8.51%		
2	Disagree		15	31.91%		
3	Neither Agree nor Disagree		10	21.28%		
4	Agree		18	38.30%		
5	Strongly Agree		0	0.00%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	2.89	1.05	1.03	47	47

This question has a similar theme as the last one, which is to see if respondents who monetize feel as if they need to pay to fully enjoy a F2P game. The results are mixed with, with those who disagree with the statement (19) only having one more selection compared to those who agree (18).

Path 2: Have not made a purchase in a F2P Game

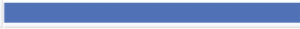



These first questions for this path look to see how free players feel about paying players and purchases in F2P games in general. Just like the previous section I will begin by providing a demographic profile of these respondents.

What is your gender?						
#	Answer	Bar	Response	%		
1	Male		17	50.00%		
2	Female		17	50.00%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	2	1.50	0.26	0.51	34	34

Age?						
#	Answer	Bar	Response	%		
1	18 - 24		10	29.41%		
2	25 - 34		13	38.24%		
3	35 - 44		8	23.53%		
4	55 - 64		2	5.88%		
5	65 - 74		1	2.94%		
6	75+		0	0.00%		
7	Prefer not to answer		0	0.00%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.15	1.04	1.02	34	34






What is your Household income?						
#	Answer	Bar	Response	%		
1	Less than \$15,000		1	2.94%		
2	\$15,000 - \$29,999		5	14.71%		
3	\$30,000 - \$49,999		3	8.82%		
4	\$50,000 - \$79,999		10	29.41%		
5	\$80,000 - \$99,999		5	14.71%		
6	\$100,000 - \$149,999		2	5.88%		
7	\$150,000 - \$249,999		1	2.94%		
8	\$250,000+		0	0.00%		
9	Prefer not to answer		7	20.59%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	9	4.91	6.08	2.47	34	34

What kind of gamer do you think you are?				
#	Answer	Bar	Response	%
1	Avid gamer/hardcore		5	14.71%
2	Frequent gamer		9	26.47%
3	Occasional gamer/casual		20	58.82%
	Total		34	100.00%

On average, how many hours a week do you play games? (not just F2P)						
#	Answer	Bar	Response	%		
1	1 - 4 Hours		20	58.82%		
2	5 - 9 Hours		8	23.53%		
3	10 - 14 Hours		3	8.82%		
4	14+ Hours		3	8.82%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	1.68	0.95	0.98	34	34

Again the results here are similar. There seems to be a bigger proportion of casual gamers in this path and the majority income level seems to be higher (\$50,000 - \$79,999). Males and females have equal distribution in this path as well.

The next four questions see what respondents on this path think of those who make purchases in F2P games.

I think it is fair to be able to purchase advantages with real money in Free-to-Play games.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		4	8.51%		
2	Disagree		14	29.79%		
3	Neither Agree nor Disagree		17	36.17%		
4	Agree		10	21.28%		
5	Strongly Agree		2	4.26%		
	Total		47	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.83	1.01	1.01	47	47

The results for this question are fairly mixed, with most respondents being neutral, but between agree and disagree; more seem to disagree with the statement. This result goes along with the research of Lin & Sun (2007), where they state that players might complain less about unfair aspects of free games, due to the fact that they are free and also that they understand studios need to make money. This can be one explanation for the mix results of this.

How do you feel about players who purchase items that give no advantages? (Ex. cosmetic items that only affect the look of the character)						
#	Answer	Bar	Response	%		
1	Completely Unfair		2	5.88%		
2	Slightly Unfair		2	5.88%		
3	No Opinion		15	44.12%		
4	Slightly Fair		2	5.88%		
5	Completley Fair		13	38.24%		
Total			34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.65	1.51	1.23	34	34

The results of this question are quite obvious since paying for an item that does not give any advantages to the buyer doesn't necessarily affect the experience of the free users.

How do you feel about players who purchase items that give advantages over other players who don't make a purchase? (Ex. a gun that does more damage than all other guns)						
#	Answer	Bar	Response	%		
1	Completely Unfair		7	20.59%		
2	Slightly Unfair		12	35.29%		
3	No Opinion		7	20.59%		
4	Slightly Fair		5	14.71%		
5	Completely Fair		3	8.82%		
Total			34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.56	1.53	1.24	34	34

Here the majority of respondents see it unfair to pay for advantages, which is not surprising since P2W is one of the major criticisms in F2P. It is interesting how there were those who see it as fair to pay for advantages. Though the possible logic they have could be the fact that if someone is paying for something with their own money, they deserve to get something of value for that, which could be advantages.

How do you feel about players who purchase items that give advantages and disadvantages? (Ex. A gun that does more damage but has a smaller clip size and/or longer reload time)						
#	Answer	Bar	Response	%		
1	Completely Unfair		2	5.88%		
2	Slightly Unfair		6	17.65%		
3	no Opinion		15	44.12%		
4	Slightly Fair		8	23.53%		
5	Completely Fair		3	8.82%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.12	1.02	1.01	34	34

The results here are mixed, with the majority of respondents citing “no opinion.” This could be due to the fact that there are not many examples of in-app purchases such as this (the only one that comes to mind is *Team Fortress 2*). Respondents though lean more towards seeing it as fair than unfair, but not by much (32.35% to 23.53% respectively).

These final questions for Path 2 look to gain insight on why players do not make purchases in F2P games.






I don't need to make any purchases since I can earn the majority of items in Free-to-Play games by just playing						
#	Answer	Bar	Response	%		
1	Strongly Disagree		1	2.94%		
2	Disagree		3	8.82%		
3	Neither Agree nor Disagree		5	14.71%		
4	Agree		17	50.00%		
5	Strongly Agree		8	23.53%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.82	1.00	1.00	34	34

This question is asked since the majority of F2P games at this time seem to follow the dual currency model (as described earlier), where players can earn items and equipment by playing or can earn them (or speed up the process) by paying.

The items that can be purchased in the Free-to-Play games I play are not worth purchasing						
#	Answer	Bar	Response	%		
1	Strongly Disagree		1	2.94%		
2	Disagree		5	14.71%		
3	Neither Agree nor Disagree		5	14.71%		
4	Agree		17	50.00%		
5	Strongly Agree		6	17.65%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.65	1.08	1.04	34	34

This is attempting to see how respondents who have not made a purchase in F2P games value them. As seen from the results the majority (67.65%) of respondents seem to be in agreement



with the statement, that they think offerings in F2P games are not worth purchasing. Again this can be the fact that they can earn the items by just playing as seen in the previous question.





I want to make purchases in Free-to-Play games, but I just don't have the money to do it.						
#	Answer	Bar	Response	%		
1	Strongly Disagree		10	29.41%		
2	Disagree		13	38.24%		
3	Neither Agree nor Disagree		4	11.76%		
4	Agree		3	8.82%		
5	Strongly Agree		4	11.76%		
	Total		34	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	2.35	1.75	1.32	34	34






This last question took after the time vs. money model where those with time usually have less money, but those with money usually have less time. The results of this hint that those who don't pay just might not have the will to pay or see the point of paying as opposed to not having the resources to pay (despite many in-app purchases being low in terms of price).




Path 3: Don't Play F2P Games

The goals of the questions below are to see what the respondents who don't play F2P think of them. Keep in mind that the sample size of this group is small (13 respondents). Below is the demographic profile of respondents on this path.

What is your gender?						
#	Answer	Bar	Response	%		
1	Male		9	69.23%		
2	Female		4	30.77%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	2	1.31	0.23	0.48	13	13

Age?						
#	Answer	Bar	Response	%		
1	18 - 24		6	46.15%		
2	25 - 34		5	38.46%		
3	35 - 44		1	7.69%		
4	55 - 64		0	0.00%		
5	65 - 74		0	0.00%		
6	75+		1	7.69%		
7	Prefer not to answer		0	0.00%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	6	1.92	1.91	1.38	13	13

What is your Household income?						
#	Answer	Bar	Response	%		
1	Less than \$15,000		2	15.38%		
2	\$15,000 - \$29,999		2	15.38%		
3	\$30,000 - \$49,999		5	38.46%		
4	\$50,000 - \$79,999		2	15.38%		
5	\$80,000 - \$99,999		2	15.38%		
6	\$100,000 - \$149,999		0	0.00%		
7	\$150,000 - \$249,999		0	0.00%		
8	\$250,000+		0	0.00%		
9	Prefer not to answer		0	0.00%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.00	1.67	1.29	13	13

What kind of gamer do you think you are?						
#	Answer	Bar	Response	%		
1	Avid gamer/hardcore		3	23.08%		
2	Frequent gamer		4	30.77%		
3	Occasional gamer/casual		6	46.15%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	3	2.23	0.69	0.83	13	13

On average, how many hours a week do you play games? (not just F2P)						
#	Answer	Bar	Response	%		
1	1 - 4 Hours		8	61.54%		
2	5 - 9 Hours		2	15.38%		
3	10 - 14 Hours		2	15.38%		
4	14+ Hours		1	7.69%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	4	1.69	1.06	1.03	13	13

The differences with the demographic profile of this group is that the age range is primarily 18-34, other than that it is quite similar to that of the rest of the paths, even with much less respondents.

To begin let us review the free response question for those who do not play F2P games. I asked, “Even though you don’t play Free-to-Play games please state your thoughts and feelings about them in the space below.” Below are the general themes I gathered from this free response:

- In most F2P games those who pay have an advantage over those who don’t (P2W)
- One respondent stated how he would rather be told about the fees and costs before download, rather than going into the game and discovering what they are.
- Compared to pay upfront games, the quality in F2P and experience of F2P games can’t compare.
- They do not have time to play F2P games, stating they are time consuming.
- One respondent stated that he cannot play them because of the quality of the internet connection in his country.

The following questions are an attempt to gain insight to why these respondents do not play F2P games.

What are the primary reasons you do not play Free-to-Play games? (Mark all that apply)						
#	Answer	Bar	Response	%		
1	Free-to-Play means a game is Pay-to-Win (where a player can purchase advantages over other players)		6	46.15%		
2	They are low quality games		7	53.85%		
3	In the end you have to pay to fully enjoy the game		7	53.85%		
4	There is not a Free-to-Play game that interests me		6	46.15%		
5	You will be forced to make a payment sooner or later in a Free-to-Play game		3	23.08%		
6	Other (please specify)		3	23.08%		
	Total		32	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	6	3.06	2.45	1.56	32	13

It seems like most respondents find the reasons stated to be why they don't F2P games. They see them as being P2W, of low quality, and that you need to pay to fully enjoy the game.

What is the main reason you do not play Free-to-Play games? (Select one)						
#	Answer	Bar	Response	%		
1	Free-to-Play means a game is Pay-to-Win (where a player can purchase advantages over other players)		0	0.00%		
2	They are low quality games		3	23.08%		
3	In the end you have to pay to fully enjoy the game		4	30.77%		
4	There is not a Free-to-Play game that interests me		3	23.08%		
5	You will be forced to make a payment sooner or later in a Free-to-Play game		1	7.69%		
6	Other (please specify)		2	15.38%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
2	6	3.62	1.92	1.39	13	13

Interestingly no one chose the first choice, since one of the main complaints of F2P is P2W. As seen the majority of respondents went with choice 2-4. The majority of respondents don't play because they feel like they must pay to truly enjoy the game. One explanation of this could be that if they really need to pay to fully enjoy a F2P game, they might as well pay up front to play a game that they see as higher quality (quality being one of the other reasons do not play F2P games).

Free-to-Play games are not actually "Free to play," you still need to pay						
#	Answer	Bar	Response	%		
1	Strongly Disagree		1	7.69%		
2	Disagree		0	0.00%		
3	Neither Agree nor Disagree		5	38.46%		
4	Agree		4	30.77%		
5	Strongly Agree		3	23.08%		
	Total		13	100.00%		
Min Value	Max Value	Average Value	Variance	Standard Deviation	Total Responses	Total Respondents
1	5	3.62	1.26	1.12	13	13

The results of this question follow the same trend as the question above. The respondents who do not play F2P games feel like they are forced to pay for F2P games, thus it can be said that they do not see the value in playing them, since they see them as of low quality (as seen in above that let's respondents select many reasons).

Conclusion

This survey looked to answer these two research questions:

1. What are consumers' perceptions of the current monetization strategies used in F2P games?
2. What are the impressions that consumers have towards F2P games in general?

When answering these questions, more weight should be held to casual gamers compared to mid-core and hardcore gamers. One major trend in this survey was the polarization of some responses, meaning that there was a close amount of respondents who were on both sides of a statement/question.

Let us begin with the first question. In the realms of monetization, it seems the majority of respondents feel as if someone spends money then that person gains an advantage in a game. Interestingly, it seems respondents prefer to have the option of IAPs compared to a subscription, but prefer to pay upfront compared to IAPs.

When it comes to the kinds of purchases respondents make in games it falls under several virtual item categories (i.e. booster, function, and cosmetic items). Those who have made purchases in F2P games sometimes feel as if what they have purchased added to the experience of a game, but sometimes they also regret making purchases. According to the interviews I conducted purchases in F2P games, ideally, should add to the experience not detract from it. On the subject of experience there was a mixed response when it comes to experiencing the full game. Some respondents felt as if it was you need to make purchases to fully experience a F2P game, while others felt as if you did not.

Those who have not made a purchase in F2P games actually seem to have mixed feelings when it comes to paying for advantages. The majority didn't agree/disagree, besides that, more people see it as unfair to pay for advantages than fair. When I asked about paying for advantages again, rephrasing it by stating "advantages are gained over players who don't pay," then players see purchasing items that give advantages as unfair. When it came to paying for items that give no advantages players were more one sided, still the majority had no opinion, but more see it to be more fair than unfair. Lastly it seems that these respondents do not make purchases due to being able to earn items through playing.

Overall the perceptions seem mixed when it comes to monetization; players seem to have both positive and negative feelings towards it, which is seen in several of the question results.

Next, let us answer the second question. The fact that these games are free bodes well with gamers, with this fact they are worried of a game being P2W. As seen though, the majority play F2P games because they are fun, which shows that when developing a F2P game, the first thing that should come to mind is making a game that provides a fun and enjoyable experience. The

majority of respondents feel that they can play a F2P game without paying. Respondents see PC as having the highest quality F2P games, followed by Smartphones, Tablets, Console, and then Social Networks. Gamers play F2P games for several reasons, the top reason being that they are fun to play followed by the fact that they are free, and then to pass time. The majority of respondents state that the F2P games that they have played are actually fun. Again, the impressions of F2P games are mixed among respondents.

Those who don't play F2P games feel that F2P games are really not free, that to fully enjoy a game you must pay. Many of them also state that F2P games are of low quality compared to other games with different monetization models. There were those who don't play them because they state they just don't have the time.

As of now it seems that gamers have mixed feelings about F2P games, this could be due to the fact that they are free, and thus they feel like they should not complain (as seen with Lin & Sun). In a way it seems that respondents want to like F2P games, because they are free games, requiring no financial commitment, but they are just highly wary of the possible problems that F2P games can have (i.e. P2W). Problems with this survey can be seen by having a low sample size and lack of in-depth analysis. Moving forward researches should dive deeper into the underlying causes of these mixed feelings.

The Future of Free-to-Play

To close the thesis, I would like to present the responses to one question I asked while interviewing industry professionals: “Where do you see F2P games and monetization in the next 5 years?” It should be noted that the gaming industry is a highly unpredictable industry. This question came from sheer curiosity, since it is always fun to predict what the future will be like. First I will go through a common consensus interviewees had in responses to this question and then I will cover significant individual predictions.

One consensus of the future and one that everyone in the industry is aware of is F2P coming to consoles. There have already been announcements of F2P coming to the PS4 and the Xbox One, also Nintendo is working on a F2P *Steel Diver* game. One of the challenges of F2P on consoles though is trackability. VP of marketing at one of the top MMO developers told me this in regards to console F2P, “Just figuring out how to market a F2P console game is difficult, because typically when we market PC games its really easy to go buy banner ads and you can track all the way through the funnel.” He also said that it’s up to first parties to fix this. This problem means that when you “buy” players (CPA) you aren’t aware of the whole journey of the player, especially after the initial acquisition. Though it should be also noted that in F2P word of mouth is one of the key forms of acquisition as one interviewee put it, “Paid advertising is one way, but word of mouth is key [in regards to F2P acquisition].”

Another consensus was the fact that F2P was here to stay. They also stated that F2P wasn’t going to replace other models and be the end all be all model for games. It is just another option for companies to use. As one of the interviewees said, “F2P will expand and work on some platforms better than others, but I still think that with AAA console experiences, consumers will still want that.” The one thing that was stressed in these interviews was that you must look at the genre and game you are making and see what type of monetization will work best.

VP of marketing at one of the top MMO companies is interested in seeing the use of seasons in F2P games. He describes this tactic as such by dividing gear into three tiers, “The top tier gear is only obtained by performance, the mid-tier gear is a combination of monetary [premium] and in game currency [earned], and starter level gear can be, “buy it and get ready to go”.” Top players are rewarded with the latest gear or the newest season of gear due to their performance in game and going through content at a much faster rate, thus a company must keep these players interested. Intermediate players would be able to earn or purchase (dual currency model) the last season. Finally, beginners would be able to only purchase gear while they are learning the basics (think starter packs).

Director of app services of one of the top mobile ad networks says, “There will be more integration of real world rewards with monetization almost like credit cards. Like if you spend

X amount maybe you will get a free flight.” He also believes that there will be more cross monetization on mobile, he describes this as, “If I spend a dollar in game A I’ll get 100 gold in that game, but if I spend 5 dollars I’ll get 1000 gold in that game and 20 gold in another game.” He went on to also say, “We are going to see a more horizontal spread of your purchase, where what you purchase in game A will affect game B.” Real world rewards could serve as another motivation for gamers to make in-game purchases, also cross monetization can lead to more cross promotion opportunities for games, which is a popular acquisition tactic for mobile F2P games and is still developing (i.e. *Clash of Clans* and *Puzzles & Dragons* having themed levels of each other’s game).

The CEO of a company that helps online businesses acquire and retain customers says, “much more opportunity in the F2P space due to the model being young and the fact that developers are still playing around with it.” He also stated, “I think there will be more use of the hybrid models and higher price points.” He also brought up a theme that was seen in other interviews as well, “it seems that most companies who offer F2P games are scared to ask for money and that a company should not be especially if you have players who are willing to pay.” He also sees states that with the hybrid model you don’t just get the best of both worlds, but offering a subscription in a F2P game can be for the players who plan on playing for the long-term.

Game Monetization Manager at GameLoft Benjamin Devienne made the comparison of the food industry after World War II and the gaming industry today: After WWII the food industry was local and specialized, also of high quality. Producers had to make sure their food was of high quality, since if it wasn’t consumer’s would not come back. He states that this is equivalent to the console games in the 90s. After a while better cars came into the market that allowed consumers to drive farther distances and super markets came into being as well because of this. The food was cheaper and of lower quality and consumers chose these super markets over specialists because these super markets offered convenience. The parallel of this is where we are in F2P right now. Devienne ends this example by stating that quality is coming back to food now and higher quality F2P games are coming out now too. This is supported by the fact that some F2P games out there now (i.e. *WarFace* and *PlanetSide 2*) and games coming out (*EverQuest Next*) are comparable to the quality of a AAA game. This also means that development costs for F2P games will be on the raise (which is usual for the industry).

Oscar Clark had this to say when talking about the future of F2P monetization:

“I don’t see us backing out of the freemium model, but I do see it focusing more on the value we can add and less on the money we can take. I think that’s a good thing because it will be a Darwinian experience. Players want value and players will only return if they feel good about the experience. The key driver will be delight and return.”

This goes back to one of the first steps of making a successful F2P game is to make a good game. F2P games are services and in services a consumer's experience is very important since it is ever changing, which means companies have opportunities to always improve them or on the other hand risk making them worse. One of the ultimate retention strategies is really making a good game. These two quotes from Oscar Clark better summarize his point: "Best monetized games are great games, where monetization works with "the flow of the game"" and "Make a great game because if I want to spend money on a great game, but I want to spend money to make the game greater."

Director of marketing at one of the top F2P companies believes there will be more premium F2P games, as in AAA quality F2P games. He also believes that companies will even work together more with consumers to dictate the direction of the game. He also believes there will be a movement in regards to content, "I think there is going to be a movement away from selling content, I think when people create content it's going to be immediately added to the F2P...Having players getting in the game and playing for free and having them experience all the glory the game has to offer rather than this velvet rope where I can play the first 20 levels or play up to this point or play the base game, but all my friends are in these other parts and you have to be to be there." Content in this sense regards to levels or what you play, this makes sense due to the fact that players are "free to play" the game.

Ramin Shokrizade stated the potential of high conversion rates once we go away from mainly targeting whales: "if you had a broader monetization model that appealed to more than just whales, it appealed to everyone, then you'd be seeing conversion rates closer to what you see in a subscription model, but with discriminatory pricing."

To close this entire section off Ramin Shokrizade had this to say about the future of monetization in F2P and in general:

"You've got two models right now, you've got subscription and you've got microtransactions, and you have World of Tanks playing with something called Hybridized monetization models, but beyond that I have created a stable of 7 monetization models with 30 variants already, but that's just scratching the surface. Soon we will have thousands of monetization models, as soon as we can make that cognitive leap and get passed the idea that there are two ways to things [monetization]. Once we are free of that then there will be an unlimited amount of ways to sell something."

Conclusion

The Free-to-Play sector is a growing sector of the gaming industry. The F2P model itself is a digital hybrid business model due to being able to generate revenue through multiple ways. Two key concepts that tie into F2P games are agile and games as a service. Agile software development and marketing should be used together with marketers and developers working together to provide the best experience for players. F2P games being services means that launch is the beginning, not the end, thus companies must collaborate with their players to shape the game. Despite having a big impact on the gaming industry, the model is still very young and there is much to be still learned.

Key Takeaways:

- Don't have Pay-to-Win
- Purchases in game should add to the experience
- Collaboration between game designers, monetization experts and marketers is a must (Games as a Service Triangle)
- Monetization is now inside the game rather being an outside barrier.
- Monetization should be developed right in the beginning of development
- There seems to be mixed feelings about F2P games according to the findings of my survey.
- Deter buyer's remorse among paying players
- Be careful of having paywalls in games or having players feeling like they need to pay
- Respondents like the fact that F2P games are free, but are weary of P2W
- F2P games should be able to be played free forever and be fun to play

Limitations of the survey conducted are sample size, the use of only descriptive statistics, time constraints, budget, and primarily pooling respondents primarily from Mturk. Future research should use a larger sample size; compare casual gamer's thoughts on F2P with hardcore gamers and use more sophisticated statistical models. Future research can also explore the different consumer journeys that can take place in a F2P game, like how does making a purchase affect the habits and decisions someone makes while playing.

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