Virtual Worlds: Between Contract and Property

Justin B. Slaughter

Abstract: Although virtual worlds have existed in some form for several years, it is only recently that the phrase has begun to seem truly accurate, with many users increasingly choosing to live the primary part of their days logged into a virtual world. While virtual worlds are causing us to rethink how we view relationships and communications, they are also increasingly coming into conflict with our prior conceived notions of property law. With virtual worlds facing an escalating number of conflicts over property ownership, it is becoming imperative that the status of virtual property be addressed to ensure the continued growth of virtual worlds and their nascent, booming economies.

In this Article, I examine the current conflicts over property rights within virtual worlds and offer a solution to the current problems. Although the status quo is untenable, I show that neither property law nor contract law can provide an exclusive solution to the current conflict. Instead, I argue that virtual worlds and their unique characteristics call for the creation of a new type of property interest, which I call the virtual easement. Combining features of both property and contract law, the virtual easement allows for sufficient user property protections as well as maintaining virtual world companies’ control over their worlds. If established, the virtual easement should allow for continued growth of virtual world economies with a minimum of governmental interference. I conclude with a discussion of possible policy concerns relating to the establishment of the virtual easement.
# Table of Contents

I. Introduction ..................................................................................................................... 3

II. The Failings of the Status Quo ..................................................................................... 15
    A. Licenses to Play ....................................................................................................... 23
        1. License Law ........................................................................................................ 23
        2. Licenses Within Virtual Worlds ....................................................................... 25
        3. Additional Concerns .......................................................................................... 29
    B. Total Control as an Economic Inefficiency and Moral Concern ............................. 31

III. Flawed Solutions—Contract and Property Applied to Virtual Worlds ...................... 35
    A. Contract .................................................................................................................... 35
        1. Contracts of Adhesion ........................................................................................... 36
        2. Unconscionability ................................................................................................. 37
        3. Individual Contracting .......................................................................................... 39
        4. Executed License .................................................................................................. 40
    B. Property ....................................................................................................................42
        1. Absolute Property Right ....................................................................................... 42
        2. Property Rule ........................................................................................................ 44
        3. Lease ..................................................................................................................... 46

IV. The Virtual Easement ................................................................................................. 47
    A. Transferability .......................................................................................................... 48
    B. Longevity .................................................................................................................. 51
    C. Liability Rule ............................................................................................................ 53
    D. In Rem ...................................................................................................................... 56
    E. Virtual Numerus Clausus ......................................................................................... 57

V. Policy Concerns ........................................................................................................... 65
    A. Necessity .................................................................................................................. 66
    B. Destroying the Game Conceit .................................................................................. 69
    C. Jurisdictional Concerns ............................................................................................ 71
    D. The Possibility of Creating Property Through IP .................................................... 72

VI. Conclusion .................................................................................................................. 73
I. Introduction

At the end of April, 2006, Marc Bragg won a tract of land called Taessot in an auction.1 Shortly after learning that he had won the property, however, the previous owner informed him that there had been a procedural error during the auction. As a result, the sale was void, and the money Bragg had transferred to the owner was supposed to be returned.2 Yet, after several weeks, not only had Bragg not received his promised refund, but the prior owner had allegedly converted other pieces property that Bragg owned, including money, other tracts of land, and even Bragg’s small fireworks business.3 Worse, the prior owner then auctioned off the confiscated property to “the highest bidder.”4 Understandably, Bragg responded to this by filing suit against Taessot’s prior owner for conversion, breach of contract, and unjust enrichment.5 Although such events come across as entirely ordinary, there is one fact that makes Bragg’s case quite unique.

None of Bragg’s property actually exists.6

Rather, to be more specific, all of his property is virtual property,7 existing in the virtual world Second Life.8

---

2 Id. at 20-21.
3 Id.
4 Id. at 22.
5 Id. at 39, 42, 43.
7 The exact definition of virtual property remains somewhat nebulous, see generally F. Gregory Lastowka & Dan Hunter, The Laws of the Virtual Worlds 92 CAL. L. REV. 1 (2004) [hereinafter Laws] (discussing prior and current conceptions of virtual property), especially since all visible/accessible personal or real property within a virtual world is nothing more than code, but I believe Joshua A.T. Fairfield’s definition is the most accurate currently. “This [particular] kind of code is designed to act more like land or chattel than
Although forms of virtual worlds\(^9\) have existed in some form for several years, it is only recently that the phrase has begun to seem truly accurate. An evolution of online communities like LamdaMOO\(^10\) and Habitat,\(^11\) virtual worlds became particularly visible to the general world with the advent of Massively Multiplayer Online Role-Playing Games (MMORPGs) in the mid-to-late 1990s.\(^12\) These virtual worlds, many of which were based on fantasy or science fiction,\(^13\) exploded in population over the following years, with some virtual worlds possessing hundreds of thousands or even millions of ideas. It pervades the internet and comprises many of the most important online resources. Often this kind of code makes up the structural components of the internet itself. Domain names, URLs (uniform resource locators), websites, email accounts, and entire virtual worlds are all examples of this . . . type of code. They are rivalrous. If one person owns and controls them, others do not. They are persistent. Unlike the software on your computer, they do not go away when you turn your computer off. And they are interconnected. Other people can interact with them. This kind of code I term “virtual property.” Joshua A.T. Fairfield, *Virtual Property*, 85 B.U. L. Rev. 1047, 1049-50 (2005) (internal citations omitted).


\(^10\) A particularly famous Multi-User Dungeon (MUD), LamdaMOO is a persistent online community in the form of an eternally active chat room. See LamdaMOO: An Introduction, http://lambdamoo.info/ (last visited Jul. 18, 2007). Notably, LamdaMOO, like many MUDs, is entirely text-based.


\(^13\) Primer, supra note 9.
subscribers. Additionally, the variety of virtual worlds has also increased over the last several years. While many virtual worlds continue to have a fantasy or science fiction setting that largely revolves around player versus player combat or the fulfillment of a quest, an increasing number eschew those forms to focus primarily on social interaction.

Although one reason for people to become involved in a virtual world may well be escapism from the real world into a fictitious environment, it would be unfair to suggest that virtual worlds are just games. In many cases, virtual worlds are emerging as full societies. When the company which owns a virtual world has promulgated unpopular rules and requirements that users must follow, groups of users have banded together within the world to stage protests. Similarly, the finances of individual worlds have exploded to the point where some not only have floating and fixed exchange rates with the U.S. Dollar, but also economic controls have been established to insure

---

14 Id. See also MMOGCHART.COM, http://www.mmogchart.com/ (last visited Jul. 18, 2007) (showing subscriber statistics for many MMORPGs for the last decade).
15 See, e.g., WORLD OF WARCRAFT; STAR WARS GALAXIES.
16 See, e.g., FINAL FANTASY XI.
17 See, e.g., THE SIMS ONLINE; THERE.COM; SECOND LIFE; see also Primer, supra note 9.
19 See, e.g., Posting of James Grimmelmann to LawMeme, http://research.yale.edu/lawmeme/ (Sept. 21, 2003, 21:20 EST) (Discussing the “tax revolt” within Second Life that involved avatars clothing themselves in American icons, wearing shirts that said “Born Free: Taxed to Death,” and the promulgation by users of “Don’t Tread on Me Billboards” throughout the world).
the stability of the economies of individual worlds.23 Such innovations have resulted in scholars studying the economics of virtual worlds.24 Similarly, people have begun to spend such a large percentage of their lives within virtual worlds25 that users’ avatars frequently “marry” other avatars, with some of those marriages extending into our analog world.26 Virtual worlds are also increasingly the site for professional and political meetings as well, with scholars and presidential candidates giving press conferences and town halls ‘in-world’ over the last few months.27 Finally, and most importantly for the purposes of this essay, all users of virtual worlds acquire virtual property simply by entering the world, ranging from holdings as small as their avatar and the initial items/currency distributed by companies upon entering the world to real and personal virtual property holdings worth in excess of U.S. $1 million.28 Additionally, thanks to the increased complexity and richness of the Internet today,29 it has become commonplace for users to trade virtual property since, at base, all virtual property is merely code and therefore easily transferable.30

24 See, e.g., Cyberian, supra note 12 (studying the economics of the virtual world Everquest). See also, Capitalism 2.0, http://randolfe.typepad.com/randolfe/ (Jan. 23, 2007) (arguing that the Second Life economy is based on a virtual real estate bubble).
25 See, e.g., Laws, supra note 7, at 6 (stating that the average user of Everquest spent twenty hours per week within that virtual world).
26 Id. at 28.
28 Who Wants to Be a Virtual Millionaire, supra note 20.
30 David Nelmark, Virtual Property: The Challenges of Regulating Intangible, Exclusionary Property Interests such as Domain Names, 3 NW. J. TECH & INTELL. PROP. 1 (2004). Of course, as with all things on the Internet, this increased distribution comes with increased dangers. See MARGARET J. RADIN, INTELLECTUAL PROPERTY AND THE INTERNET 182 (2004).
Due to these innovations, however, actions within the universe of virtual worlds,\(^\text{31}\) can reach “far beyond local boundaries”\(^\text{32}\) and impact the real world in significant ways.\(^\text{33}\) As virtual worlds become increasingly commodified and users make such worlds their primary place of business, the revenues generated from trades, sales, and purchases in-world represent income that governments may regard as taxable.\(^\text{34}\) Similarly, the theft of a piece of virtual property, for which a user paid some amount of real world-currency, represents the total loss of the value of that property—if the hoverboard I effectively paid U.S. $30 for is taken from me, my total personal assets are now reduced by U.S. $30 in both the digital and analog realms.\(^\text{35}\) And of course, if a user chooses to make interacting within a virtual world her full-time job, it is not unexpected that she can exchange her virtual world currency for real world currency in such numbers as to make “playing” within a virtual world ultimately more profitable than working any number of real-world jobs.\(^\text{36}\)

Given both their relatively recent origins and the inherent difficulties courts and legislatures have had addressing the internet and intellectual property generally,\(^\text{37}\) the

\(^{\text{31}}\) A group which might be collectively called “the Metaverse” after the virtual world discussed in Neal Stephenson’s book, *Snow Crash*, which has become something of a literary touchstone for scholars of virtual worlds. See Jack M. Balkin & Beth Simone Noveck, *Introduction, in State of Play*, supra note 9, at 1, 1.


\(^{\text{33}}\) See *The Right to Play*, supra note 9, at 72.

\(^{\text{34}}\) Id. at 76. See also Cory Ondrejka, *Escaping the Gilded Cage: User-Created Content and Building the Metaverse, in State of Play*, supra note 9, at 158, 163; Leandra Lederman, “Stranger than Fiction”: Taxing Virtual Worlds, 82 N.Y.U. L. Rev. 1620 (2007).

\(^{\text{35}}\) See F. Gregory Lastowka & Dan Hunter, *Virtual Crime, in State of Play*, supra note 9, at 121, 126 [hereinafter *Virtual Crime*] (arguing that it is incorrect to think that the theft of virtual property has as little impact on the real world as the death of a user’s character within a video game).

\(^{\text{36}}\) Indeed, the ability of virtual worlds to effectively ‘create’ value makes them one of the more fascinating innovations of the web. See LAWRENCE LESSIG, *Code* 12 (2006) [hereinafter *Code*].

\(^{\text{37}}\) See Caroline Humphrey & Katherine Verdery, *Introduction: Raising Questions about Property, in Property in Question* 1, 9 (Caroline Humphrey and Katherine Verdery, eds. 2004) [hereinafter *Raising Questions about Property*] (noting that the fact that there is rarely scarcity present makes solving intellectual property disputes difficult); Eldred v. Ashcroft, 537 U.S. 186 (2003) (holding that it was within
legal status of virtual worlds remains in a great deal of flux.\textsuperscript{38} Prior attempts to apply law to cyberspace even in discrete circumstances have proven difficult, with court decisions often coming down to a choice between several outcomes, all of them negative, with the result that prior case law on related topics is a poor guide.\textsuperscript{39} Also, commentators and professionals have been unable to find an accurate prism through which virtual worlds may be analyzed.\textsuperscript{40} Indeed, the best analogy/analytical tool at present is the idea that virtual worlds are the internet equivalent of the nineteenth century company town,\textsuperscript{41} but this analogy is beset with problems.\textsuperscript{42} This lack of clear-cut analogies to real-world institutions or principles has resulted in general confusion within the scholarship as well, with commentators frequently misunderstanding virtual worlds,\textsuperscript{43} having difficulty defining aspects of the worlds,\textsuperscript{44} or reversing course on the nature of virtual property and virtual worlds.\textsuperscript{45}
While such issues would be problematic even in a system that was functioning perfectly, the general confusion about the law of virtual worlds is particularly pressing given that legal problems relating to such worlds are, as was predicted, rapidly multiplying. While there have been a handful of lawsuits in the past, the number and risk of lawsuits specifically over virtual property appears to be increasing. Within Second Life, beyond the pending lawsuit between Bragg and Second Life’s owner, Linden Lab, another lawsuit is brewing over an ‘eviction’ from a piece of virtual property. Also, a large number of users within Second Life are threatening a class action lawsuit due to the company’s release within the world of a tool which can make copying of their possessions substantially easier. Additionally, several virtual worlds have experienced lawsuits relating to the issue of whether virtual property can be sold by users over Ebay. Finally, one user is even seeking to sue another user for theft, with no indication of whether the suit will be handled in Second Life or in the analog world. With commodification of virtual worlds accelerating as more and more entities recognize the

---

46 See Jankowich, supra note 43, at 185 (claiming that users will increasingly turn to courts to seek legal redress for their grievances where owners of virtual worlds prove intransigent); Molly Stephens, Note, Sales of In-Game Assets: An Illustration of the Continuing Failure of Intellectual Property Law to Protect Digital-Content Creators, 80 TEX. L. REV. 1513 (2002); William V. Vetter, Preying on the Web: Tax Collection in the Virtual World, 28 FLA. ST. U. L. REV. 649 (2001) (discussing concerns about how to properly tax assets accrued from commerce within the Internet).

47 The most famous of which was the BlackSnow Interactive case, “the first dispute over virtual property to make it to the real-world court system,” though no final decision was reached as the defendants simply ceased paying their attorneys at the beginning of court proceedings. Laws, supra note 7, at 50-51; see also Julian Dibbell, Owned! Intellectual Property in the Age of ebayers, Gold Farmers, and Other Enemies of the Virtual State—Or, How I Learned to Stop Worrying and Love the End-User License Agreement, in STATE OF PLAY, supra note 9, at 137 (discussing how the BlackSnow case altered views of End-User License Agreements generally).


commercial potential these spaces represent, these trends are likely to continue into the foreseeable future.

Additionally, and somewhat ironically, the situation has been exacerbated by the promulgation of more user rights by Second Life. While virtually all virtual worlds make their users agree to their terms of service (ToS) by clicking through an End-User License Agreement (EULA), practically all EULA’s state that users have only a license to use the game, with the companies retaining all rights and title in all circumstances. On the advice of legal scholars, however, Linden Lab decided in 2003 that it would grant users limited intellectual property rights within Second Life, altering its ToS to state that users “retain copyright and other intellectual property rights with respect to Content you

---

52 See Ondrejka, supra note 34, at 170 (“Currently MMORPG developers are in a race that they cannot possibly win as they try to stay ahead of the users who choose to commodify their games’ content and currency.”).
53 See e.g., World of Warcraft Terms of Service (Jan. 11, 2007), http://www.worldofwarcraft.com/legal/termsofuse.html (“All rights and title in and to the Program and the Service (including without limitation any user accounts, titles, computer code, themes, objects, characters, character names, stories, dialogue, catch phrases, locations, concepts, artwork, animations, sounds, musical compositions, audio-visual effects, methods of operation, moral rights, any related documentation, "applets" incorporated into the Program, transcripts of the chat rooms, character profile information, recordings of games played on the Program, and the Program client and server software) are owned by Blizzard or its licensors. The Program and the Service are protected by United States and international laws. The Program and the Service may contain certain licensed materials, and Blizzard's licensors may enforce their rights in the event of any violation of this Agreement.”); Sony Online Entertainment LLC Terms of Service, http://www.station.sony.com/termsofservice.vm (last visited Jul. 18, 2007) (“The Station, including, without limitation, all SOE Communication Features, contains copyrighted material, trademarks and other proprietary information including, without limitation, text, software, photographs, video, graphics, music and sound, and the entire contents of The Station and each area contained therein are copyrighted as a collective work under the United States copyright laws. SOE owns a copyright in the selection, coordination, arrangement and enhancement of such content. You may not modify, publish, transmit, participate in the transfer or sale, create derivative works, or in any way exploit, any of the content contained on The Station (including, without limitation, content that The Station enables you to download) without the express written permission of SOE and the copyright owner. In the event of any permitted copying, redistribution or publication of copyrighted material, no changes in or deletion of author attribution, trademark, legend or copyright notice shall be made. The downloading of copyrighted material from The Station is allowed by you only for your own use. You acknowledge that SOE and/or third-party content providers remain the owners of all materials posted on The Station, and that you do not acquire any of those ownership rights by downloading copyrighted materials.”).
54 Press Release, Linden Lab, Second Life Residents To Own Digital Creations (Nov. 14, 2003), http://lindenlab.com/press/releases/03_11_14 (“Changes to Second Life's Terms of Service now recognize the ownership of in-world content by the subscribers who make it. The revised TOS allows subscribers to retain full intellectual property protection for the digital content they create, including characters, clothing, scripts, textures, objects and designs.”).
create in Second Life, to the extent that you have such rights under applicable law.”

Considering that Second Life’s EULA still states that “Linden Lab retains ownership of the account and related data, regardless of intellectual property rights you may have in content you create or otherwise,” the ultimate result of this policy change has been to further muddy the situation, with users having more reason to believe they are the actual owners of the virtual property they possess, even while companies believe they continue to have all ownership rights within their virtual worlds.

A prime reason for these increasing legal dilemmas, however, is the fact that the relationship between users and companies in terms of ownership of virtual property is uncertain. Yet, the current contract law-based regimes do not seem to offer any solutions either. While the EULA’s might appear to be solid protections against user lawsuits and provide a good vehicle to determine which parties own what pieces of property within virtual worlds, many commentators doubt that courts will fully uphold the entirety of many EULA’s given how greatly they tilt the balance in favor of the owners of the virtual worlds. In truth, the idea that users are free to participate in virtual worlds, and in some cases even create new content, but not be able to keep the items the users spent real money for and possess is anathema to our general societal conceptions of how labor and property work. It is thus quite conceivable that courts will strike down the single instrument governing virtual worlds. Given that the general law of licenses itself has

56 Id.
57 See, e.g., Laws, supra note 7, at 51; Right to Play, in STATE OF PLAY, supra note 9, at 76 (“Only time will tell how robust all the EULA’s are, . . . .”); Bobby Glusko, Note, Tales of the (Virtual) City: Governing Property Disputes in Virtual Worlds, 22 BERKELEY TECH L.J. 507 (2007).
59 See discussion infra Part II.A.2-3.
been something of a confusing jumble for decades, however, it may not be feasible to simply begin declaring that the licenses conferred on users through the EULA’s automatically come with property rights over all items/code/money that the users accumulate within virtual worlds, nor is it at all likely that any game company would voluntarily choose to limit its profits and control of the game world. Indeed, given how poorly law seems to fit virtual worlds in general, there seem to be no easy answers to the virtual property dilemma at present.

Given the mounting legal issues that virtual worlds face, and the apparent failure of contracts to provide the basis for a working regime of virtual property ownership, it seems inevitable that some degree of real-world law must overtly be brought into the Metaverse by officially establishing the legal status of virtual property. Although this path may not be the ideal solution given the many negative side effects of legal rules and regimes, it seems to be the only option that can provide stability and clarity to the question of who owns virtual property, as continued uncertainty will only breed further chaos and an exponentially increasing number of lawsuits.

A number of major obstacles will need to be overcome if property law is to enter the Metaverse, though. Most importantly, legal guarantees have to be light and flexible enough that the core values of virtual worlds, such as the ability of companies to alter/re-

---

60 See Alfred F. Conard, *An Analysis of Licenses in Land*, 42 Colum. L. Rev. 809 (1942) [hereinafter *Analysis*].
62 E.g. increased complexity, rigidity, hierarchy, etc. Admittedly, some skeptics of the wisdom of bringing law into virtual worlds believe that it should be relevant in a limited fashion, but only where “there [is] a real world right or interest at stake and even then there should be some reluctance.” Saunders, *supra* note 42, at 240.
63 Laws, *supra* note 7, at 50-51.
code the worlds and continued existence of the fantasy aspects\(^{64}\) of the worlds, will not be significantly damaged.\(^{65}\) To this extent, mandating full property rights within virtual worlds could do grave, possibly even fatal, damage to their unique characteristics and attributes. The jurisdictional complexities associated with most things on the internet must also be addressed, including the issues of what claims real-world courts have jurisdiction over,\(^{66}\) whether and how virtual world property can be taxed,\(^{67}\) and which courts can hear claims arising from virtual worlds. Even more critically, which jurisdiction’s laws will govern within a given virtual world, where the company may be based in California but users can be playing anywhere in the world? Finally, the virtual worlds will themselves have to deal with the transition period into accepting the new regime of virtual property, but it is important that this transition not be so difficult or stressful that the continued growth of the Metaverse is inhibited, ideally through some version of a finite menu of different options from which companies can choose.

At base, however, it must be remembered that the idea that law should have some sway is not particularly controversial given the nature of prior interactions between the law and emerging technologies. For good or for ill, it is impossible to fully separate virtual worlds from the real world—every avatar is controlled by a person in the real world, and the transactions and interactions within the world cannot help but trigger

\(^{64}\) Or, as it is sometimes called, the “game conceit.”

\(^{65}\) Richard A. Bartle, *Virtual Worldliness*, in *STATE OF PLAY*, supra note 9, at 31, 34, 43.


effects in the real world. Additionally, while the prospect of giving legal salience to virtual property is daunting for practical and theoretical reasons, it is common to see such obstacles when faced with new technologies—indeed courts have struggled greatly to address the legal status of both movies and video games in the past. Yet, simply surrendering and leaving virtual worlds and virtual property outside the realm of the law appears to be the worst option by far, as evidenced by the problems wrought by attempts to leave the Internet “law-free” for a time during the previous decade. If law could be applied to the Internet due to concerns about the status of its users, it is logical that law should have some degree of power over virtual property.

As I will argue in this essay, there must be a new kind of property interest created for property possessed by users of virtual worlds, one that lies between contract and property, combining the consideration and restitution damages of contract and the in rem theory of property. More precisely, the property interest in question exists on this spectrum somewhere between the license and the easement, comprising elements of both: the transferability and eternal nature of the easement and the concept of creating irrevocability through expenditures of capital and labor and the privilege to not be a trespasser in the realm of another of the license. In effect, the interest is a super-license or a lesser easement, though I suggest that the proper name is a virtual easement.

This essay will advance the argument for this new property interest online by first discussing the failure of the status quo within virtual worlds and the need for a new

---

68 See Virtual Liberty, supra note 58, at 2090 (suggesting that the more that virtual worlds are commodified and become “a nexus for transactions that have real-world values,” the harder it will be for law to ignore virtual worlds); Saunders, supra note 42, at 230.
69 See Mutual Film Corp v. Industrial Comm. 236 U.S. 230 (1915); Interactive Digital Software Association v. St. Louis County, 329 F.3d 9523 (8th Cir. 2003).
rubric. Next, this piece will argue that neither contract nor property can perfectly control the rights and duties of virtual world creators and users with regard to virtual possessions, and that a new course is needed. With that established, this essay will then analyze the advantages of the virtual easement and its ability to map onto the form of virtual worlds. Next, this essay addresses several policy concerns associated with the promulgation of this new interest, including maintaining the sanctity of the game world, the risk of increasing judicial confusion, and jurisdictional concerns. Finally, this essay concludes by outlining a few areas of possible future research.

II. The Failings of the Status Quo

As previously alluded to, the current relationship between users and companies in terms of virtual property is in a state of flux, even though some parties seem to believe that the current regimes established by EULA’s are, if nothing else, in little danger of breaking down in the near future.\(^\text{71}\) As this Part will argue, however, many aspects of the current system appears both inefficient and untenable even in the medium-term, as the EULA’s are reestablishing an anachronistic, unfair, and potentially chaotic licensing system, giving the owners of virtual worlds too great an ability to harm users, damaging the economic potential of the worlds, and doing violence to moral conceptions of property.

Before this topic can be discussed in detail, however, a brief discussion of the incentives facing companies and the framework of this paper is in order. Assuming that

\(^{71}\) See supra p. 6.
the companies, as profit-seeking enterprises,72 will be rational actors, a number of general statements can be made about the companies’ incentives. First, that the companies all desire to grow their market-share, and, to that end, will attempt to keep their virtual worlds fairly up-to-date in terms of technological advances to both virtual worlds and internet commerce generally.73 Similarly, the companies will seek to make all their profits sustainable, preferring moderate long-term gains over acting in such a way as to create high short-term gains but reduced long-term profits.74 To gain such sustainable profit and increased market-share, it is reasonable that companies will try to avoid needlessly angering users, but should instead accede to their requests wherever possible.

Of course, there are additional incentives at play to complicate matters. Companies, in the interest of sustaining profits, will want to not act in ways that reduces their ability to control and change their worlds, since such restrictions make efficient reorganizations and technological additions more difficult. For example, assume that users ask for, and receive, the right to have their land within a virtual world stay in the same place relative to other landmarks and to not be ejected for any reason. Following this grant, a given user acts in ways that anger his neighbors and disrupt the community generally, causing several other users to threaten to leave the virtual world unless the offending user is ejected or rehabilitated. Due to the rights that the company gave users, it cannot be certain of rectifying the situation, but must ask the user to accede to its requests and then basically hope for the best.

72 Admittedly, Linden Lab in particular claims to have been founded “to connect us all to an online world that advances the human condition,” suggesting motives besides pure profit. Given that investors have supported even that organization, however, it seems impossible for Linden Lab to desire to not make money. See About Linden Lab, http://lindenlab.com/about (last visited Jul. 18, 2007).

73 Evidence of this can be seen in Sony’s adoption of Station Exchange in response to mass Ebay trading. See infra note 111.

74 Granted, however, that a company may prefer short-term gains if it believes it is doomed to fail in the long-run.
To be fair, the divergence of users’ and companies’ interests primarily occurs ex post any event or problem. Before, or ex ante, a user signs up for membership in a virtual world, both the company and the user has an interest in thinking that users have some amount of rights. In terms of marketing, Linden Labs certainly benefits from users thinking their “second life” has rights analogous to their “first lives,” since this encourages users to be more interested in entering the virtual world and to spend more money in the virtual world.\textsuperscript{75} If a user thought all virtual world money was only play money, they might be willing to throw a few dollars into the world for fun, but would not seriously consider investing significant sums of money in world. Once an incident has occurred where the company wants a user out of the virtual world, the user suddenly has a strong interest in process and property rights existing, while the virtual world just wants to make the user leave without effort or fanfare.\textsuperscript{76} Of course, in that situation, the company also wants to power to make the user leave without the company having to compensate the user in the process, since even compensation will require the company to spend time, effort, and money before the deviant user finally leaves the virtual world.

As a result, while users may prefer maximum rights, the addition of many rights, property or otherwise, may make virtual worlds less governable. Indeed, in extreme cases, such as users having the absolute right to remain within a world upon entry in all circumstances, it may become impossible for companies to exercise any real measure of

\textsuperscript{75} Indeed, this seems to have been the rough belief of Marc Bragg.

\textsuperscript{76} Admittedly, some scholars see this dichotomy as evidence a reason to prefer dealing with such problems after they occur or to set up terms that are more favorable to companies. Lucian A. Bebchuk and Richard A. Posner, \textit{Boilerplate in Consumer Contract: One-Sided Contracts in Competitive Consumer Markets}, 104 MICH. L. REV. 827, 828 (2006). Yet, given the lack of information on the part of many users and the utility of using the current custom of defining the user-company relationship at the outset, it appears that ex ante agreements are vastly preferable in dealing with virtual worlds. See Lisa Bernstein, \textit{Formalism in Commercial Law: The Questionable Empirical Basis of Article 2's Incorporation Strategy: A Preliminary Study}, 66 U. CHI. L. REV. 710 (1999).
control over their worlds. Significantly, the degree to which companies are accustomed to having control over their own worlds is perhaps the most salient difference between analog land and digital land. While governments expect that individual property owners will have a significant degree of autonomy over their own land, game companies expect to be the final arbiter in terms of how digital land is used. This difference is critical for why developer incentives will match up with user interests less than analog developers incentives will match-up with analog property owners. Although game companies believe they have the right and duty to manage all the land in their world, analog developers neither desire nor have anywhere near the same amount power to modify and control land use. Game companies thus have an incentive to not grant any rights or interests that make their virtual worlds less governable, an incentive that naturally clashes with the incentives of users to have as many rights and interests as possible.77

An additional complicating incentive is that companies will, in the interest of maximizing profit, want to make their virtual worlds open to the largest number of people possible. Activities that may offend users (such as graphic sexual imagery, racism, or radical political beliefs) may be disfavored by companies. Similarly, attempts to follow the rule of law of one country in particular may turn off users in different countries, encouraging companies to adopt a poly-national approach to real-world law by following the laws of as many states as possible.78

77 An understandable incentive for users to have, since they presumably want to get the maximum benefit possible from the money they spend to have the right to interact within virtual worlds.
78 The companies will not treat all countries equally, of course. Appeasing the populations of countries with significant technological infrastructure and broad interest in virtual worlds (such as the United States, Japan, South Korea, and the European Union) will naturally take precedence over countries that lack broadband broadband access and have few potential virtual world users (such as much of Africa, central Asia, and the Middle East).
While specific companies may have more nuanced interests, these are the broad strokes of the companies’ incentives. Overall, the interests of the companies and users will largely align—most things that the users want in terms of new tech or minor adjustments to how things work will be happily agreed to by the companies, since acquiescing in such requests makes it more likely that users will stay happy, continue to remain in a given virtual world, and encourage friends to join as well. Yet, there is a natural clash in terms of the property and, to a lesser degree, the speech rights of users—companies will want to minimize the granting of additional rights due to concerns that further user rights and interests will impede efforts to mold and alter virtual worlds. While some enterprising virtual world may adopt increased property rights or personal rights, this has not happened yet, and the small number of full virtual world operators suggests that there may be some collusion in this regard.

To a significant degree, developers of virtual worlds are in the same position as developers and common-interest communities (CIC’s) within the analog world. When a developer or CIC has difficulty gaining information about potential renters or members, the developer or CIC will tend control access through mild exclusion strategies.

---

79 Such as, at least potentially, Linden Lab. See supra note 72.
80 A view that has generally been propagated by Prof. Robert C. Ellickson. See Generally ROBERT C. ELICKSON, ORDER WITHOUT LAW (1991).
81 Speech rights are less at issue since most virtual worlds seem reluctant to limit users’ speech since that may trigger an outburst of outrage at the restricting company. Additionally, users appear to have far more speech rights than property rights, though speech rights are far from unlimited. See Second Life Community Standards, http://secondlife.com/corporate/cs.php (last visited Jul. 17, 2007).
82 The primary reason for this is that there is an extraordinarily small number of virtual world operators that are sizable enough to allow for users to accumulate significant assets. Additionally, by all accounts, opening a major virtual world is a massive undertaking and requires significant investments of time, resources, and liquid capital. Additionally, there are significant incentives for companies to not be the first to adopt new property rights. See infra note 256.
condominiums are largely occupied by and designed for extroverted, clean citizens of upstanding moral character, thereby encouraging the renter, who knows better than all other persons whether he fits that description, to decline to rent such a condo if he does not feel he would enjoy or fit in with his neighbors.\textsuperscript{84} Virtual worlds effectively utilize a similar dynamic—endemic to the structure of virtual worlds is the idea that its users can interact according to the norms of the world, and problems arise frequently when a user refuses to follow accepted customs. In virtual world terms, hacking the system for personal gain is perhaps the best example of a gross violation of social norms, and developers and users interests are aligned in preventing such anti-social behavior.

Yet, by the same token, developers of CIC’s and analog housing tend, like virtual world platform owners, to have different incentives than their communities on governance issues. As noted by Professor Lior Jacob Strahilevitz, CIC’s and developers tend to establish any common amenities at the outset and eschew adding other such amenities down the road.\textsuperscript{85} The primary reason for this is that the addition of any new common amenity will be regarded differently by individuals within a building or a CIC, with some finding that the change benefits them and others discerning that the change leaves them worse off.\textsuperscript{86} The end result of such a mid-stream change is significant controversy, sometimes to the point that the peace and neighborliness of the community is severely harmed.\textsuperscript{87} In effect then, developers and CIC’s end up being strongly averse to change.\textsuperscript{88}

\textsuperscript{84} Id. at 1851.
\textsuperscript{85} Lior Jacob Strahilevitz, Exclusionary Amenities in Residential Communities, 92 VA. L. REV. 437, 461 n.74 (2006).
\textsuperscript{87} Id.
Unfortunately, the same has proven to be true of virtual worlds. Although some worlds have experienced significant change a moderate length of time after they were first opened to the public, the vast majority have not changed significantly in the interim, in large part because even minor “patches” tend to result in significant anger from users over how companies have “ruined” a feature of a virtual world. Not only does this mean that companies are gun-shy about embarking on major non-cosmetic renovations of an extant world, but it also makes companies loathe to trust users much like developers are afraid to give too much power to current occupants with regard to policy-making. Additionally, the relatively small number of major virtual worlds means that a company cannot make such a change without attracting significant attention from the Metaverse generally, with the result that one virtual world’s endorsement of more user rights places severe pressure on other worlds to follow suit, even if the change is a net negative for companies. This externality strongly encourages all companies to silently agree to refrain from making major changes to user rights. Given that virtual worlds have been around for several years and are becoming massive economies in their own right, thereby further discouraging major changes given the increase in numbers of users, I thus assume that the failure to create property rights thus far means that property rights will not be established by companies without external pressure from courts or governments.

In terms of the general framework of this work, the primary information that we

89 Sony’s creation of Station Exchange and Second Life’s establishment of modest intellectual property rights being the primary events. See supra note 53; infra note 111.
90 Richard A. Bartle, Virtual Worldliness, in STATE OF PLAY, supra note 9, at 44.
91 Barzel & Sass, supra note 86.
92 While Second Life’s change has not forced the hand of other worlds yet, it has increased pressure on those worlds.
need to know in making effective virtual easements is largely economic. First, whether users will change the amount of time and effort they spend interacting within virtual worlds if some manner of property rights is established. Second, are there any users that will refuse to make use of virtual worlds if property rights are established (a prospect that seems unlikely at present). Finally, to what extent will establishing various kinds of property rights decrease the profits of virtual world operators. While the exact contours of this data remains unknown, the present state of the Metaverse and the general incentives of users suggest the answers to these questions will provide evidence that some manner of property interest should be established.

The lack of substantial empirical research on virtual worlds beyond a few economic studies also mandates that some assumptions be made. First, it is assumed that users are profit-seeking and will not senselessly throw away money. While users may spend significant amounts of capital in pursuit of an experience, we can assume that the vast majority will not act irrationally or randomly. Additionally, we can assume that the economics of virtual worlds remains such that it can be profitable in the analog world to accumulate virtual property. If the situation changes such that virtual property becomes worthless in terms of analog world money, the need for some property rights within virtual worlds will be decreased. Admittedly, there still may be need for property rights from a position of wanting to preserve personal autonomy, but the economic reason is especially compelling. Similarly, we must assume that there is some way to have general regulations across virtual worlds and across different countries—if every country insists on having a separate system of regulation, enforcement of so many different regimes may not be feasible. More troubling would be if countries cannot find a way to make

93 See supra note 77.
companies abide by regulations; while there are options available for dealing with this risk, they may not be palatable politically in certain countries. Finally, for the virtual easement to be established, there must be some interest on the part of users to have virtual property rights. While users have expressed such a desire obliquely, there has been relatively little in the way of overt demands in this regard.

A. Licenses to Play

1. License Law

In truth, it is somewhat surprising that owners of virtual worlds would make EULA’s the means of contracting with users given that license law itself has been itself quite confused for decades. The doctrine does seem fairly clear at first glance—according to the Restatement, most licenses are revocable at any time, but when a licensee has “made expenditures of capital or labor in the exercise of his license in reasonable reliance upon representations by the licensor, as to the duration of the license, [he] is privileged to continue the use permitted by the license to the extent reasonably necessary to realize upon his expenditures,” and the license is deemed an executed license. Under the conventional view, this is a license on the right to continue having access to the resources and items reasonably necessary to realize one’s expenditures, and the licensor has not right to interfere. Moreover, an executed license is not revoked by the

94 See discussion infra Part V.C.
95 See Analysis, supra note 60; Alfred F. Conard, The Privilege of Forcibly Ejecting an Amusement Patron, 90 U. PA. L. REV 809, 811 (1942) [hereinafter Amusement Patron]
96 RESTATEMENT (FIRST) OF PROPERTY § 519(1) (1944) (“Except as stated in Subsections (2), (3), and (4), a license is terminable at the will of the possessor of the land subject to it”).
97 Id. at § 519(4). See, e.g., Cooke v. Ramponi, 239 P.2d 638 (Cal. 1952).
licensor’s conveyance of the property the license is attached to. An executed license is thus on the property itself, rather than on the licensor.\(^9^\) Yet, this clear-cut definition breaks down on closer analysis. Even discounting the fact that not all courts elect to follow the Restatement,\(^1\) it is far from clear exactly when the necessary amount of expenditures have taken place to turn an ordinary revocable license into an irrevocable executed one.\(^1\) The question of when a licensee can be said to have acted in “reasonable reliance upon representations from the licensor” is similarly unclear.\(^2\) Courts have responded to this confusion with some fairly outlandish decisions, such as holding that licenses are revocable but can only be revoked with reasonable cause or that revocation not be accompanied by an ejectment through force.\(^3\) Given that there has been a dearth of scholarship on licenses for decades, moreover, this is a state of flux that is unlikely to vanish anytime soon.\(^4\)

Even beyond the question of when a license is revocable versus irrevocable, however, widespread use of licenses can be problematic given that they are not

---

99 Id. at 329.
100 Id. at 380. At its most basic level, irrevocability is an attempt to protect significant investments of time and money and thereby make it feasible for widespread investments based on licenses. See Michael A.Carrier, Cabining Intellectual Property Through a Property Paradigm, 54 DUKE L.J. 1, 79 (2004) [hereinafter Cabining].
101 Compare State Dep't of Highways v. Woolley, 696 P.2d 828, 831 (1985) (suggesting that any expenditure may make a license irrevocable) and Camp v. Milam, 291 Ala. 12 (stating that the a license turns into an executed license when it has been “acted upon so as to greatly benefit the licensor”) with Eliopoulos v. Kondo Farms, Inc., 643 P.2d 1085 (Id. 1992) (holding that an executed license is irrevocable only for as long as it takes to realize plaintiff’s expenditures, with defendant’s investment of $500 and labor to dig a trench being realized by six yeas of the trench draining water from his land) and Bieber v. Zellner, 220 A.2d 17, 19 (Pa. 1966) (holding that improvements on a roadway did not themselves indicate reliance).
102 Compare Brown v. Eoff, 530 P.2d 49, 51 (Ore. 1975) (stating that plaintiff’s attempt to negotiate a permanent arrangement defeated the argument that plaintiff had acted in reasonable reliance) with Belm County Water Dist. v. State, 135 Cal. Rept. 163, 166 (Cal. App. 1976) (holding that expenditures in reliance on a revocable water permit made the permit irrevocable).
103 Amusement Patron, supra note 95, at 812.
104 Henry E. Smith & Thomas W. Merrill Casebook ch. V; see, e.g, Amusement Patron, supra note 95, at 818, 822.
enforceable against third parties. While most property rights\textsuperscript{105} are “in rem” and therefore “good against all the world,” licenses, like the vast majority of contract rights, are “in personam” and only enforceable against the licensor.\textsuperscript{106} As such, while licenses are a fairly good tool for determining a governance strategy for a piece of property, they are not a good mechanism to control who has the ability to exclude others from using that property.\textsuperscript{107}

2. Licenses Within Virtual Worlds

As complex and bewildering as license doctrine can be in the abstract for the real world, however, the situation within virtual worlds is even more confusing and troubling. As noted previously, although most EULA’s’ terms appear on their face to be impossible to crack,\textsuperscript{108} the kinds of activities these EULA’s govern makes it very questionable

\textsuperscript{105} E.g. fee simples, easements, leases.
\textsuperscript{106} \textit{Restatement (First) of Property}, supra note 96, at § 521; see Thomas W. Merrill & Henry E. Smith, \textit{The Property/Contract Interface}, 101 Colum. L. Rev. 773, 782 (2001) [hereinafter \textit{Property/Contract Interface}].
\textsuperscript{107} See \textit{Property/Contract Interface}, supra note 106, at 791.
\textsuperscript{108} Admittedly, the fact that all of these EULA’s utilize boilerplate begs the question of whether users even attempt to read the text of the EULA’s before signing them. In their seminal article twenty years ago, Alan Schwartz and Louis L. Wilde argued that the critical question is not whether all users will read boilerplate, but whether any number of users will. According to Schwartz and Wilde, if even a small proportion of users actually read and “shopped” for good standard-form contracts, enough competitive pressure could be placed on organizations that efficient standard-form terms would be adopted throughout the market. Alan Schwartz & Louis L. Wilde, \textit{Imperfect Information in Markets for Contract Terms: The Examples of Warranties and Security Interests}, 69 Va. L. Rev. 1387 (1983). Of course, the counter to this theory is that a select few users reading boilerplate will not improve the quality and efficiency of all standard-contracts, but will only force the readers to switch to “a more expensive higher-quality provider” that the non-readers cannot even utilize. Jason Scott Johnston, \textit{The Return of Bargain: An Economic Theory of How Standard-Form Contracts Enable Cooperative Negotiation Between Businesses and Consumers}, 104 Mich. L. Rev. 857, 885 (2006). Moreover, given that the majority of consumers have proven unable to comprehend the terms of given boilerplate agreements, it questionable whether forcing users to read a contract, a proposition that may not even be possible from a technical perspective, would make any difference in terms of encouraging efficient choice of contract. See Ronald J. Mann, \textit{Contracting for Credit}, 104 Mich. L. Rev. 899, 911 (2006).

While it is far beyond the scope of this work to resolve this debate, some observations may be made about boilerplate in terms of EULA’s for virtual worlds in particular. Specifically, it likely does not matter that the vast majority of users do not read the EULA’s. Although it is probable, even likely based on other research, that only a small proportion of virtual world users read the terms of service, see id., the
whether courts will uphold them across the board.\textsuperscript{109} If nothing else, although the vast majority of EULA’s claim that users do not have the right to transfer, trade, or sell the virtual property they “possess” to other entities, users are engaging in such practices en masse.\textsuperscript{110}

While such acts would be troublesome even if unsanctioned, though, in some cases the game company acts as the middleman in such transfers,\textsuperscript{111} taking a cut from all sales while still retaining the right to terminate a user’s account “at any time.”\textsuperscript{112} Given that the right to transfer and the right to use are “at the heart of courts’ and laypersons’ unique nature of the good that is being received upon agreement, access to a virtual world, somewhat mitigates the failure of most users to read the terms themselves. After all, the communicative nature of virtual worlds and the length of time that users spend in a virtual world makes it much easier to free ride off the fact that other users have read the requisite EULA, much like groups of users can work together to digest boilerplate by all reading a small piece. See Kevin E. Davis, \textit{The Role of Nonprofits in the Production of Boilerplate}, 104 MICH. L. REV. 1075, 1094 (2006). For instance, if a EULA states that all users may not make any profit from trading goods within the virtual world, even if only one user out of 10,000 reads the EULA, the level of interactivity among users makes it possible for that discovery to rapidly spread throughout the virtual world. While it is less easy for consumers to change virtual worlds after an agreement due to sunk costs, it is probable that the more negative the term, the more consumers will choose to leave the virtual world. As such, the fact that involvement in a virtual world is long-lasting and users can join together and free ride off the efforts of other users suggests that whether most users read a EULA is irrelevant—all that matters is whether a very, very small number do, and whether they can easily distribute their findings throughout the specific virtual world and the Metaverse generally.

Yet, to a degree, all discussions of whether it matters if boilerplate is read are irrelevant at present with regards to virtual worlds due to the very small number of virtual worlds. While it is relatively easy for consumers to shop around for better terms of insurance, airfare, or a loan, there are only a handful of extant virtual worlds and all of them have practically identical terms within their EULA’s (with the marked exception of Second Life giving users a modicum of intellectual property rights). See \textit{supra} note 53. As a result, the fact that users are faced with the Hobson’s Choice at present of accepting the terms as given or not being involved in any virtual world means they have no meaningful choice at present. It is entirely possible that the number of virtual worlds with different terms will increase in the near future, however.\textsuperscript{109} See \textit{supra} notes 53-56 and accompanying text.\textsuperscript{110} See \textit{Cyberian, supra} note 12.

\textsuperscript{111} The primary example of this is Sony’s Station Exchange, http://stationexchange.station.sony.com/ (last visited Jul. 18, 2007), which sought to end sales of virtual property through Ebay by mandating that all sales of virtual property from its virtual worlds must go through its own service. The service has proven wildly popular, with over U.S. $180,000 worth of virtual property being transferred through the system in its first thirty days. See Daniel Terdiman, \textit{Sony Scores with Station Exchange}, CNET NEWS.COM, Aug. 25, 2005, http://news.com.com/Sony+scores+with+Station+Exchange/2100-1043_3-5842791.html.

understandings of property,” it appears clear that virtual property is being used very differently compared to the average uses of property governed by licenses.\textsuperscript{113}

Admittedly, aside from Sony and Linden Lab,\textsuperscript{114} many owners of virtual worlds have not promulgated such mixed messages to the same degree and may claim that no amount of trading can create reasonable reliance when the EULA states that the user has no right to her virtual property. Although such a claim does not remedy the situation things even if it is completely accurate given the size and significance of Sony’s and Linden Lab’s virtual worlds, this claim may be quite inaccurate. Most critically, such agreements, whether agreed to through a click-wrap license or a browse-wrap license, are almost never read by users.\textsuperscript{115} Additionally, after clicking through during the initial installation and running of the client program, users are almost never forced to assent to the EULA again.\textsuperscript{116} Considering that “most of the time Layman negotiates his way through the complex web of property relationships that structures his social universe without even perceiving the need for expert guidance,” it is very feasible that courts will hold that the licenses are not universally revocable.\textsuperscript{117}

In truth, the idea that millions of people are putting significant amounts of capital into virtual worlds may force courts to act simply for public policy purposes. While common law courts struggled early in the Twentieth Century to find reasons why a

\textsuperscript{113} Wendy J. Gordon \textit{An Inquiry into the Merits of Copyright: The Challenges of Consistency, Consent, and Encouragement Theory}, 41 STAN. L. REV. 1343, 1354 (1989).
\textsuperscript{114} See supra notes 54-56 and accompanying text.
\textsuperscript{116} See, e.g. \textit{SECOND LIFE}; see also THERE.COM (requiring click-through assent of its ToS only when the ToS is updated).
theater patron with a ticket could not be ejected at any time at the owner’s discretion, an equilibrium was eventually reached based on the idea that owners of places of amusement have a common law right to exclude who they wish. The situation of virtual worlds is much more troublesome, however. While a patron of a race track may lose the right to gamble further upon his ejectment, he retains the money he has cashed in and, at the very least, the possessions he entered the race track with. A theater patron only loses the value of his ticket, along with possibly the value of his lost time. In contrast, a user of a virtual world, if his license is revoked and he is “ejected” risks losing access to his entire account and all the assets attached to it, assets that could easily amount to thousands of dollars or more. In effect, users are paying for the privilege to use something that can be revoked at any time without any hope of refund or redress, a notion which strongly goes against our notions of justice and equity. From a purely practical standpoint, the idea that users of virtual worlds have only the barest amount of control over their property should raise concerns about whether the property is being used well—if anything, the fact that a generic possession could be taken at any time should make it less likely that a person will use that possession as effectively as possible, since that person may naturally fear growing too reliant on the item in case it is eventually lost. As Richard Bartle puts it, “When you buy a virtual object, you’re gambling that the virtual world giving it meaning will not change in such a way that it reduces the amount

119 See Ziskis v. Kowalski, 726 F. Supp. 902 (D. Ct. 1989). An additional reason for this outcome may be the belief that the greatest danger was arbitrary ejectment and that seemed to be rare. See Amusement Patron, supra note 95, at 822. The core question seems to have been largely forgotten after that time.
120 Along with perhaps any concessions he might have bought after entry.
121 Id. at 810.
122 See Fairfield, supra note 7, at 1050.
that people will pay for that object.” 123 The current state of virtual worlds with regard to virtual property is thus something of a recreation of the law of licenses before *Hurst v. Picture Theatres, Limited*, 124 where a user has the privilege to use virtual property in his possession, but that use can be revoked at any time, resulting in a very weak form of “ownership.” 125

3. Additional Concerns

Given how young many virtual worlds are, it is also unclear how courts will respond to the current system once users have been involved in virtual worlds for several years or a decade. Most critically, after significant periods of time have passed, it is possible that courts could find that users have obtained property rights within virtual worlds through adverse possession. While it might be quite difficult to find a plaintiff who met all five of the requirements of adverse possession, 126 it is far from inconceivable, with the primary obstacle likely being whether a piece of virtual property held by the user within a virtual world controlled by a company counts as either actual or exclusive use. If that could be found, however, it would be possible to see courts granting actual “title” to virtual property. Moreover, if exclusive use proves to be the primary barrier to plaintiffs, courts could simply claim that a user-plaintiff has gained an easement by prescription, which would still have the effect of a court finding that a user has a property right within a virtual world. 127 The many individual state statutes on adverse possession are:

---

123 Bartle, *in State of Play*, supra note 9, at 44.
124 Supra note 118.
125 Contra Michael A. Carrier and Greg Lastowka, *Against Cyberproperty* 22 Berkeley Tech. L.J. (forthcoming 2008) (manuscript at 20, on file with author) [hereinafter *Against Cyberproperty*] (arguing that robust technological and legal regimes protect users interests online).
126 HOVENKAMP & KURTZ, supra note 98, at 65.
possession would largely determine the degree to which these attempts succeed, but one
decision holding that adverse possession was effected or an easement by implication
created could itself do massive damage to the Metaverse.128

Admittedly, given that a user can access a virtual world legally only by
permission of the game companies, it may be hard to imagine how anything akin to
adverse possession could occur. Yet, depending on how courts view “access” with
regards to virtual worlds, such a scenario could come to pass. The traditional view,
namely, that a user is granted access upon purchasing a ticket, makes adverse possession
practically impossible. Yet, an alternative view could be taken that while the access was
by permission, the game company was only a tollbooth operator, and the user has
effectively become a squatter by making an avatar and claiming that bit of code has her
own.

In truth, this is a situation that defies real-world analogy. Faced with the
Hobson’s choice of bending adverse possession slightly or depriving a person of
substantial assets, it is not difficult to imagine that a court would structure its decision in
such a way as to suggest that the plaintiff when being let into the world saw themselves
as purchasing the account in entirety from the game company, blurring whether they
actually had permission. In other words, it is the distinction between having permission to
enter the world and permission to control the character—while a user knows she has
permission to enter, whether she has permission to use the character is a different story.

Given the difficulties of such parsing and the likely unfamiliarity of most judges and
juries with virtual worlds for the near and moderate future, it is easy to see a court
coming down on the side of the plaintiff at least once. Given the current precarious state

128 See Cabining, supra note 100 at 19
of user-company legal relationships within virtual worlds, one such decision could have an apocalyptic effect on the Metaverse.

**B. Total Control as an Economic Inefficiency and Moral Concern**

Based on the terms dictated by the various EULA’s, the owners of the virtual worlds effectively have total control of their virtual worlds, a situation that also poses problems for the future of the Metaverse. Because the companies control the code and norms of the virtual worlds, at base, they make all property decisions.\(^{129}\) Even though users may have some control over individual transactions, the company, due to its control of the metrics, is the ultimate decision-maker. Virtual worlds are thus something of a recreation of the company towns of the late-nineteenth century—given that even in company towns the company stayed out of the homes of its workers, however, virtual worlds represent a purer conception of the company town than just about anything seen a hundred years ago.\(^{130}\) Currently, it is possible, even easy and simple, for one company to simply subtract a critical attribute from a piece of virtual property or move the location of a piece of virtual property from a highly desired area to a less-desired area, actions that may substantially change the value a user’s total virtual property assets,\(^{131}\) possibly to the point that pieces of virtual property lose their entire value.\(^{132}\)

As such, although the Internet is conceived of as a place that is defined by openness and is an “experiment of self-governance,”\(^{133}\) virtual worlds stand as something of a counterpoint. Since users are asked to enter and “live” within a virtual world

\(^{129}\) See Jankowich, supra note 43, at 215.
\(^{130}\) See Saunders, supra note 42, at 203-04.
\(^{131}\) See Bartle, in STATE OF PLAY, supra note 9, at 44 (offering a differing perspective).
knowing that all their possessions are not ultimately in their control, a more accurate
description than a company town in cyberspace might be digital feudalism.\textsuperscript{134} Although
this may seem like hyperbole given that users have to willingly choose to accept the
terms of a virtual world, the absence of perfect information in bargaining naturally tends
to result in unfair contract terms. According to Prof. Alan Schwartz, an uninformed
promise will often receive terms that are undercompensatory in nature even where full
negotiation is possible.\textsuperscript{135} While there is certainly value to the idea that the company does
have the right to punish its users for infractions of the norms and rules of the word, it
seems inefficient and incorrect that a user risks losing her entire stock of assets and
virtual property for any infraction. If anything, such dangers serve as a counterweight to
the continued growth of and investment in virtual worlds, even as those worlds are
beginning to gain broad-based interest from society.\textsuperscript{136} In effect, the fact that possession
of all virtual property is divided between at least two entities, the company, which has the
title and exclusionary rights, and the user, who has possession and the ability to actually
use the property, suggests that the current state of virtual worlds is something of a
mutated anticommons,\textsuperscript{137} one where no one has full privileges, causing under-use of the

\textsuperscript{134} See Jankowich, supra note 43, at 218. Granted, this is something of a malapropism given that feudalism
largely rested on in personam agreements. The term “digital feudalism” is designed rather to evoke the
general popular view of feudalism as an institution that lets the few dominate the many.
\textsuperscript{135} Alan Schwartz, The Myth that Promisees Prefer Supracompensatory Remedies: An Analysis of
\textsuperscript{136} A trend marked especially by the entrance of corporations into virtual worlds in recent months. See, e.g.,
Patrick Cain, Companies are Finding Second Life, INVESTORS.COM, Feb. 21, 2007,
http://www.investors.com/editorial/IBDArticles.asp?artsec=17&issue=20070221; Kate Benner, I Got my
Job Though Second Life, FORTUNE, Jan. 23, 2007,
07012310.
\textsuperscript{137} See Michael A. Heller, The Tragedy of the Anticommons—Property in the Transition from Marx to
worlds’ resources. Specifically, two factors can be deemed largely responsible for this state of affairs. First, there has been a general lack of foresight by game companies—in their attempts to minimize the risks to themselves and future profits, most companies have been reluctant to establish broader property rights, even though such rights could spur users to spend more money and time within virtual worlds. Second, there are externality issues, particularly in terms of how a system of property rights would be managed—as it is likely that the brunt of any regulatory system’s costs would fall on the companies, keeping property rights minimal appears to be a cheaper alternative.

Although virtual worlds might have great potential for the creation of value through user-created content and trading, at present, they do not appear optimally efficient.

Beyond specific concerns about the practical impact of such control, however, there are also concerns about the sheer morality of such a system given long-standing general philosophical views toward property rights. Specifically, the idea that users are asked to move online and build inventories, accumulate wealth, or even engage in the creation of new goods, all while still being willing to give up all ownership of those

---

138 Of course, the company could mandate efficient use of the resource, but that sort of rigidity would likely doom the virtual world. Similarly, direct use of the resource by the company would practically eliminate the usefulness or need for users, also damaging the world.

139 See supra notes 72-81 and accompanying text.

140 Of course, it is entirely possible that network effects could be a third factor in triggering this anti-commons, possibly by encouraging users to spend time in multiple worlds as opposed to one, with the result that many users only skim the surface of each world. If property rights existed for virtual worlds, however, it is very possible that users would choose to focus on one individual world to the exclusion of others in the hopes of fully utilizing the world’s resources in the pursuit of economic profit. The lack of any hard data on these issues makes analysis of this topic mere speculation at present, however.

141 Most relevant for this topic are the Lockean, Utilitarian, and Hegelian theories of property rights. See Laws, supra note 7 at 40 (discussing all three in depth); see also, Ruckelshaus v. Monsanto Co., 467 U.S. 986, 1003 (1984) (discussing Locke); Raising Questions about Property, in PROPERTY IN QUESTION, supra note 37, at 4 (Locke); Cabining, supra note 100, at 9-10 (utilitarian); Theodore J. Westbrook, Owned: Finding a Place for Virtual Property Rights, 2006 MICH. ST. L. REV. 779, 791-801 (2006) (discussing all three).
things,142 does violence to the idea of property as being labor-dessert,143 the greatest good being given to the greatest number,144 and the concept of property ownership assisting the establishment and growth of personhood. Of these three conceptions, the final is perhaps the most troubling. Although a critique using the first and second conceptions of property can be partially deflected since the company, by virtue of having made and maintained the virtual world, has a right to own the property within and the greatest utilitarian outcome may well occur when all property is ultimately owned by one party, it is difficult to see an argument for why having the company own the property results in an enriching socializing experience for users,145 especially considering how significant it is for someone to be able to say “this is mine.”146 While not having the ability to own their virtual property might limit the degree to which users form entirely new identities within the virtual world, this is not necessarily a good thing, especially given that one of the primary appeals of virtual worlds is the constant ability to create for oneself a new identity regardless of past and socialization. The total control of virtual property by game companies is effectively undercutting one of the greatest strengths of the virtual world archetype—even as some scholars warn of the game conceit 147 being damaged by property rights, some level of property rights may be necessary to fulfill it.148

142 Along with, in most cases, the intellectual property rights associated with new creations.
143 In a very real sense, the laborer is not allowed to keep that which he has worked with or even created.
144 Since the EULA’s effectively vest the property right in one party, depriving millions of users of such rights.
145 Laws, supra note 7, at 50-52
146 See Thomas W. Merrill, Property and the Right to Exclude, 77 NEB. L. REV. 730 (1998) (arguing that exclusion is the sine qua non of property rights); Adam Mossoff, What Is Property? Putting the Pieces Back Together, 45 ARIZ. L. REV. 371, 377-78 (2003) (discussing the long-standing notion that exclusion is the most important aspect of traditional property rights).
147 Game conceit can be defined roughly as the idea that one is “playing” a game. In other words, “[w]hen people play games, they agree to abide temporarily by a set of rules which limits their behavior (i.e. restricts their freedom), in exchange for which they gain whatever benefits the game offers. Game theorists refer to the boundary that separates the game world from the non game world as the magic circle, from an early description of play spaces by John Huizinga. Virtual worlds are not games but they use the same
As such, the current situation of virtual property within virtual worlds is problematic, with the governance system created by the EULA’s potentially untenable, economically inefficient, and morally suspect. Given these dangers, it is worth looking to property and contract law for solutions—as the next Part discusses, however, neither provides a wholly good model to apply to virtual worlds, necessitating that a new kind of property interest be established for virtual worlds.

III. Flawed Solutions—Contract and Property Applied to Virtual Worlds

Although the EULA’s seem to be untenable as a system for governing virtual property, there remains the possibility that effective use and ownership of virtual property could be controlled through either contract or property law. Given the unique natures of virtual worlds, however, it appears that many of the most likely legal concepts for managing contract and property relationships would not be good fits for virtual worlds.

A. Contract

Given both that EULA’s are contracts, and that contract law would be less invasive within virtual worlds than property law, one might think that contract law would be a good mechanism for governing virtual worlds. Yet, an analysis of how many of the key ideas of contract law, specifically, contracts of adhesion, unconscionability, individual

conceit: that some freedoms must be willingly given up for a time in order that new freedoms can be experienced during that time.” For a longer discussion, see infra pp. 58-60.

148 See Bartle, in STATE OF PLAY, supra note 9.
contracting, and executed licenses, would be applied to virtual worlds reveals that contract law would not dramatically improve the use and ownership of virtual property compared to the status quo.

1. Contracts of Adhesion

Contracts of adhesion, “contract[s] formed as a ‘product of gross inequality of bargaining power’ between parties,” might seem on first glance to be well-tailored to meet the problems of virtual property. The current instrument that states the terms of who owns virtual property and how it may be used and transferred is the EULA, and given that any user is not able to negotiate unique terms but is forced to accept all terms of the EULA or be denied access to the virtual world, the concept of contracts of adhesion would seem to provide an excellent way to enforce more equitable terms on the ownership of virtual property.

Yet, beyond the obvious question of just what terms would be deemed a contract of adhesion and which would not with regards to virtual worlds, the doctrine is not nearly strong enough to provide effective protection for users. Simply put, while the EULA’s do seem to fit the nominal definition of a contract of adhesion, the doctrine generally has been held to require some showing of procedural unconscionability, such as fraud. Indeed, a primary attribute of contracts of adhesion, one that is often missing in standard-form contracts like EULA’s, is that the party with less bargaining power has to be forced

---


150 7 Arthur Linton Corbin, CORBIN ON CONTRACTS 29.10 (Joseph M. Perillo ed. 2006); see Flores v. Transamerica Homefirst, 113 Cal. Rptr. 2d 376, 381 (2004). This is different than substantive unconscionability, of course. See infra pp. 32-34.
to make a decision without the opportunity to consider the consequences. Similarly, the
presence of any meaningful choice also seems to defeat the possibility that a contract
will be held to be a contract of adhesion. The fact that a potential user can take as long
as she wishes before assenting to the terms of the EULA and can choose between many
different EULA’s renders this aspect of contract law a dead-end for virtual worlds. After
all, standard-form contracts in the analog world which might be construed as contracts of
adhesion have been largely upheld by virtue of their usefulness for both consumers and
businesses. Even the fact that the EULA’s could have deferred terms does not seem to
make the EULA’s unenforceable on unconscionability grounds.

Barring a significant change in the way standard-form contracts are generally
viewed then, it seems that the doctrine of contract of adhesion would provide no
additional support for users’ property rights.

2. Unconscionability

Another possibility would be to utilize the doctrine of unconscionability itself, but
this would also prove somewhat problematic. Again, while this doctrine might seem

---

unconsionability” existed where “the terms of the agreement were presented on a ‘take it or leave it’ basis .
. . with no opportunity to opt out”).
152 The fact that there are other valid options available besides assenting to the contract (what I meaningful
choice for short) means that users are not being forced to agree but are consenting because they wish to. In
other words, there is true consent on the part of users.
153 See Flores, 113 Cal. Rptr. 2d at 38; Robin v. Blue Cross Hosp. Serv., Inc., 637 S.W. 2d 695 (Mo. 1982).
law’s notions of bargained-for exchange, courts and theorists generally consider enforcement of such terms
appropriate.”)
ProCD and Hill basically put a stamp of approval on deferred terms even with regard to claims of personal
unconscionability).
156 While procedural unconscionability is needed for a contract to be a contract of adhesion,
unconscionability requires substantive unconscionability and, in some jurisdictions, procedural
quite useful since users are paying significant fees for the privilege to spend money in a virtual world but have no right to keep anything they purchase or possess within the world, suggesting that the terms of the EULA are substantively unconscionable, this doctrine also fails to have much potential.\textsuperscript{157} If anything, it seems like unconscionability is less feasible as a workable doctrine for controlling user-company relations than contracts of adhesion, since some jurisdictions require both procedural and substantive unconscionability for a contract to be held unenforceable on unconscionability grounds.

Assuming that a jurisdiction did not require procedural unconscionability, however, showing that substantive unconscionability exists would be quite difficult. Because virtual worlds are, in many cases, largely designed for entertainment, it is highly likely that courts would apply the logic of Justice Scalia in \textit{PGA}\textsuperscript{158}—specifically, that the rules in such a game are arbitrary and cannot be measured or disputed by judges.\textsuperscript{159} Also, it would be quite difficult to argue that consideration was not being received by users, given that users are receiving something, the right to exist/play within a virtual world, even if they are not receiving some measure of property rights. While that may not seem significant considering the amount of virtual property and monetary assets at stake, that is likely more than enough for most courts. Not only is it unclear exactly what constitutes unconscionability. \textit{See} Bower v. Gateway 2000, Inc., 676 N.Y.S. 2d 569, 574-75 (App. Div. 1998) (holding that procedural unconscionability is not always required for a finding of unconscionability); Maxwell v. Fidelity Fin. Servs., Inc., 907 P.2d 51, 58-59 (Ariz. 1995) (holding that despite the fact that “perhaps a majority” of courts have held that there must be at least some quantum of both procedural and substantive unconscionability, a claim of unconscionability can be established under Arizona’s version of the U.C.C. with a showing of “substantive unconscionability alone”).

\textsuperscript{157} \textit{See} \textit{RESTATEMENT (SECOND) OF CONTRACTS} § 208 (1981).
\textsuperscript{159} \textit{See} \textit{Virtual Crime, in STATE OF PLAY, supra} note 9, at 129.
substantive unconscionability in a general sense,\textsuperscript{160} but also “courts have difficulty distinguishing between terms that create a reasonable arrangement of risks and terms that constitute exploitation of consumers.”\textsuperscript{161} Combined with the fact that it is unclear whether U.C.C. Article 2 even applies to downloadable software,\textsuperscript{162} the general picture that emerges is that unconscionability might also be a fairly mediocre solution to the question of how to apportion virtual property rights.

3. Individual Contracting

Although it seems that the fact that the standard-form contract EULA’s are a problem, going in the other direction toward individual contracting does not seem to be a particularly practical or optimal solution either. Admittedly, individual contracting between specific users and the company, forgetting the massive cost issues to the company,\textsuperscript{163} would guarantee arrangements that best fit the needs of just about all users.\textsuperscript{164} Yet, individual contracting would likely not be a valid option for virtual worlds even if they only had a sliver of the millions of users they do, given that the unique property rights that each user could possess over their virtual property would make trading and even governing pieces of virtual property practically impossible due to astronomical information costs. Since “information costs are [the] key to understanding a system of property rights,” the prospect of multiplying current information costs a

\textsuperscript{160}See Arthur Allan Leff, Unconscionability and the Code—The Emperor’s New Clause, 115 U. PA. L. REV. 485, 487-88 (1967) (analyzing the Uniform Commercial Code’s section 2-302 and the absence of a precise definition for unconscionability)
\textsuperscript{161}Hillman & Rachlinski, \textit{supra} note 154, at 441.
\textsuperscript{162}See Specht v. Netscape, 360 F. 3d 17, 29 fn. 13 (2d Cir. 2002).
\textsuperscript{163}See Fairfield, \textit{supra} note 7, at 1092. Of course, if this were an opt-in regime, it is possible many users would not care one way or another.
\textsuperscript{164}See Property/Contract Interface, \textit{supra} note 106, at 777 (stating that contracting parties are generally in the best position to evaluate costs and benefits).
million-fold underlines that this is also a mediocre option—better to stay with a poor default than adopt an unworkable system.¹⁶⁵

Admittedly, one possible solution to this would be to establish some manner of database, a wiki of virtual property that could be easily accessed by users. While the concept of having access to clear-cut types of virtual property is appealing,¹⁶⁶ a wiki may be difficult to utilize due to practical issues related to bandwidth costs and translation costs (since the wiki would have to be accessible to people around the world), both of which would likely fall on the companies, who will resist the additional costs for what they may see as negligible benefit. Additionally, it is possible that the system may not be accessed frequently by users, since many users, who may not have an especially strong economic focus on their involvement within virtual worlds for the near future, may think that the effort is not worth their time.¹⁶⁷ As a result, many users may fall into the trap of only using a handful of property types anyway.

4. Executed License

As previously noted,¹⁶⁸ the doctrine of licenses is quite muddled, but the idea of utilizing the executed license to clarify and define virtual property rights is somewhat

¹⁶⁵ Id. at 776, 852.
¹⁶⁶ And one that I also seek to use in the virtual easement. See discussion infra Part IV.E.
¹⁶⁷ After all, the average user at present has an incentive to standardize wherever she believes that the effort to create unique property interests is outweighed by the cost in time and energy in researching possible interests. For the average user of virtual worlds, there seems to be a greater incentive to focus on exploring the worlds rather than accumulating items, a trend that exists largely because the number of new users keeps multiplying. Once the number of virtual world users stabilizes and relatively new users are a fairly small percentage of the general number of virtual world users, the incentive to focus on exploration will likely decrease. Given the growth of virtual worlds over the last few years, it may be years before such stabilization occurs, and the longer the status quo in terms of property rights persists, the harder it will become to adopt radical changes to how virtual property is possessed.
¹⁶⁸ See supra pp. 19-21.
fruitful given that it lies on the boundary of contract and property.\footnote{169} The primary problem, however, remains: the amount of resources that have to be spent so that the license will be held irrevocable to allow for the licensee to recoup his investment.\footnote{170} Although the passage of statutes stating what the baseline investment in time and/or money must be for this to take place would be one option,\footnote{171} it is unclear just what kind of impact such a system would have on virtual worlds. Some users who have been in the world a very long time could use this principle to stay well after the company wishes them to leave, to the extent that the companies control of the virtual world could be damaged. Similarly, even if clear benchmarks could be established for when licenses have become executed, it would be practically impossible to devise a clear-cut and accessible system of benchmarks for how long a user needs to recover their investment. If, for instance, a user invests U.S. $4000 buying a special sword and has an executed license in that property when the company asks them to leave, the amount of time the user will be able to continue being involved in the world may depend entirely on the demand within the market for that item. While the license might last hours for some, it might last weeks or even months for others, making it exceedingly difficult for game companies to enforce ejections. Finally, there is also the issue of just what the user has an executed interest in—their general holdings\footnote{172} or individual pieces of virtual property.\footnote{173}

\footnote{169}The executed license has been said to be effectively the same thing as an easement. \textit{Analysis, surpa} note 60, at 820.

\footnote{170}See Cooke v. Ramponi, 239 P.2d 638, 641 (Cal. 1952).

\footnote{171}It would likely have to be a federal statute given jurisdictional issues, however.

\footnote{172}Meaning that a user who has invested significant resources in her avatar could instantly have an executed license in everything they accrue from the time the license for the avatar becomes executed.

\footnote{173}Meaning that it would be difficult to know just which pieces of virtual property counted as executed licenses and which did not. Although this problem could partially be solved by logging transactions, it is unlikely that users would have access to this information.
While the irrevocable license seems less critically flawed than the other contract options, it too is an incomplete solution.

**B. Property**

Although property law would allow for more clear-cut standards and management of virtual property than either the status quo or contract law, it would also be something of a poor fit for virtual worlds. In truth, all of the most likely candidates from property law for managing virtual property, absolute property rights, a property rule, and leases, solve some of the problems that virtual worlds face but not all such problems.

**1. Absolute Property Right**

Perhaps the simplest option for giving legal definition to virtual property would just be to give users the same rights when they buy virtual property that they would have if they bought real or personal property in the analog world. Although there are significant key differences between the nature of virtual property and property in the analog world and the system would be very rigid, this would have the advantages of clarity and standardization, along with conforming to general public norms—if one pays for something, one expects, on some intrinsic level, to have some right to it. Yet, given that virtual worlds are still controlled and owned, as a whole, by the companies, this

---

174 Although Joshua Fairfield believes that, like real-world property, virtual property has “rivalrousness, persistence, and interconnectivity,” supra note 7, at 1053, the fact that the code of virtual property can be deleted at any time without difficulty by administrators regardless of who possesses it underlines some of the innate differences between virtual property and real property.

solution seems to cut too far in favor of users, as establishing property rights within the world might destroy the ability of companies to maintain and regulate their worlds.\(^\text{176}\)

First, a system of full property rights would mean that virtual property, once purchased, could be found to be completely out of the control of companies.\(^\text{177}\) But even if this problem could somehow be solved, possibly by stating that all users only have an easement in their virtual property,\(^\text{178}\) others would remain. Most critically, altering the mechanics of the world in such a way as to change the attributes or natures of virtual property could become impossible. For example, suppose a user purchases a suit of armor, and the company later decides it is too powerful. In an attempt to prevent the suit from giving players who possess it an unfair advantage,\(^\text{179}\) the company decreases the armor’s ability to defend by fifty percent, thereby decreasing its value by a significant amount, it is possible that a user could successfully sue the company for damages.\(^\text{180}\) This danger is not limited to just changes in the economic value of virtual property either—if a company were to change a user’s virtual property island so that its position within the world changed from one continent to another, it is possible that the user could attempt to sue then too, alleging something like a diminishment of enjoyment and demanding that the island be returned to its prior place. Giving players full ownership of property could also make cyber-trespass\(^\text{181}\) possible in the literal sense—indeed, while some virtual

---

\(^{176}\) But see Patricia A. Bellia, Defending Cyberproperty, 79 N.Y.U. L. Rev. 2164 (2004) (arguing for the establishment of a property rule regime for cyberproperty, though she primarily focuses on cyber-trespass related issues).

\(^{177}\) Since exclusion is the core aspect of traditional property rights. See Merrill, supra note 146.

\(^{178}\) Though this could be troublesome to implement as well, in part due to the need for a deed of conveyance and the open question of whether the easement would be in gross or appurtenant. See HERBERT HOVENKAMP & SHELDON F. KURTZ, supra note 98, at 321.

\(^{179}\) One example of the company wishing to keep the virtual world interesting and roughly balanced, per its incentives. See supra notes 72-81 and accompanying text.

\(^{180}\) See Bartle, in STATE OF PLAY, supra note 9, at 44.

worlds already make it possible for users to exclude other users from their virtual land through code features, users could use their property rights to sue others in tort for trespassing. Considering how virtual worlds thrive in part because of their fluidity and the absence of clear boundaries, the risk of being legally liable for stepping the wrong place would dramatically change the tenor of virtual worlds, depriving them of the adventure/exploration dynamic that most possess.

2. Property Rule

Additionally, the inherent nature of virtual worlds as realms completely governed by one entity does not fit with the application of a property rule. Not only is all property in a virtual world effectively fungible in terms of economic value—there is no difference between this virtual hoodie and that virtual hoodie of the same style and color—but also virtual world companies need to be able to force changes in the world if they are going to continue to have the ability to mold their worlds and maintain game conceit, possibly necessitating server resets that destroy players’ current virtual property, though the company can then give all users inventories identical in function and value to the inventories they had beforehand. Under a property rule system, users could sue in that situation and, since the users precise virtual property would be destroyed in this situation, win. The prospective of such a risk could easily encourage inefficient investment in protections against server crashes and make companies afraid to reset

---

184 See Bartle, in STATE OF PLAY, supra note 9.
185 While it might appear that users would have no incentive to do so, users tired of the world but unable to sell their possessions could engage in suit to gain an easy pay-out from companies.
servers in general. As such, if a company wishes to change one part of its world from random buildings to structures of the same family of architecture, it needs to know that it will succeed from the beginning and not be forced to enter negotiations with the end result in doubt. While this might appear onerous to users, the fact the fungibility of code means that while they perceive that they are buying a house, a ship, or a pair of shoes, they are really just buying the utility of those items. As such, a system based on the value of virtual property, a la a liability rule, would be a more efficient system of governance.

Admittedly, this position does require a rather significant assumption—namely, that users will not mind if all the virtual property they possess can be replaced with the identical items. Although this is logical given the way virtual property works, it is quite common for users to become attached in non-economic ways to property in the analog world. If a child loses a cherished store-bought doll, a parent will often be unable to remedy the child’s feeling of loss by replacing it with an identical doll. After all, the child has not only become attached to the kind of doll, but also that particular doll due to the experiences that the child shared with it. Of course, adults seem to lack similar feelings for most of their personal possessions, and it is impossible for virtual property to experience the same “wear and tear” that may engender increased attachment to analog property, suggesting that it is fair to assume that users will be able to recognize that one virtual Opal Sword is the same as any other.

\[186\] See Calabresi & Melamed, supra note 183.

\[187\] Fantasy elements connected to some virtual worlds may encourage illogical emotional connections to virtual property, however, since users may see their specific equipment as the reason for their success (i.e. they believe they are a unique hero within a virtual world with unique items). Research on how users relate to their virtual property is warranted before a final position can be taken on this subject.
3. Lease

Given that users are effectively paying dues for the privilege to interact within the virtual world, the lease may seem an attractive option for controlling property relations between users and companies—yet, this solution also fails to fit the Metaverse particularly well. First, the question of just what the user has a lease on, the account, each individual avatar, or each individual piece of virtual property, is a troubling one, especially since virtual property is traded so easily and often between users. Yet, if a user has a lease on each individual piece of property, it may become difficult for users to keep track of the status of the potentially hundreds or thousands of leases they have. One possible solution could be a system of recordation or recording, though this might be very expensive for a company to maintain. Conversely, having the lease be on the actual avatar’s possessions would mean that the leases were being broken apart whenever a trade took place. Second, while the lease does offer a way for companies to roughly have the ability to eject users promptly but still give users an opportunity to recoup their investment by utilizing periodic tenancies of relatively short duration, if the time period was long enough, it could lead to users engaging in extremely negative behavior out of spite if they feel they have nothing to lose from it. Most importantly, though, this form of property seems ill-suited just because it is not quite as fluid as virtual property—while leases can be assigned, this would only really work if the lease were on each individual piece of virtual property, as otherwise users would be transferring

188 See Henry E. Smith & Thomas W. Merrill Casebook VI-3 (“One can think of a lease as an arrangement in which the owner of the property lends possession to another, in return for periodic payments of money called rent.”).
189 Possibly as short as a month or even a week at a time. See Herbet Hovenkamp & Sheldon F. Kurtz, supra note 98, at 89-90.
190 In truth, allowing users who engage in especially egregious acts, like hate speech or physical threats, to remain in the system for even a few hours after their offending acts could be anathema to most companies and deleterious to the Metaverse as a whole.
portions of the lease to other users, transforming it mid-lease. Combined with the various warranties that accompany leases, such as the covenant of quiet enjoyment, and the fact that leases seem to add needless formalism to the situation, the lease also seems to be a less than optimal solution. Notably, though, it appears that one of the most critical attributes of the lease, divided control between user and company, is especially useful.

On further analysis, then, it seems neither contract nor property provide, by themselves, optimal solutions to the question of what kind of property rights should be established for virtual property within virtual worlds. Yet, it does appear that many of the different subsets of contract and property, such as the license and the lease, have some beneficial characteristics. As such, the next Part discusses how many of the superior attributes of contract and property can be combined to create a property interest for virtual property that will allow for maximum efficiency for both users and companies.

IV. The Virtual Easement

Although society should be hesitant about completely changing legal rules and regulations when facing new technological innovations, adaptation to this new form of communications and commerce seems to necessitate that a new approach be designed to govern ownership of virtual property, one that balances the interests of users, owners of virtual worlds, and the society in general. As indicated by the previous Part, the best fits within both property and contract to virtual worlds are those which possess some


192 See Agin & Kumis, supra note 61, at 333.
measure of traits of the other area of law. As such, the new property interest, which may be called the virtual easement,\textsuperscript{193} follows in this pattern by adopting different attributes of contract and property law. Specifically, the virtual easement can be transferred from one user to another, will last as long as the user continues to make investments of time and/or money in their account and the world remains functioning, will be governed by a liability rule instead of a property rule, will have in rem enforcement capabilities, but will also be flexible so that different virtual worlds may choose from a limited, finite menu of interrations. Each of these attributes will be addressed in turn.

A. Transferability

Since the ability to transfer an asset is arguably one of the key powers needed for one to say that she owns that asset,\textsuperscript{194} the virtual easement must allow for some degree of transferability if users are to feel anything like owners of their virtual property.\textsuperscript{195} To this extent, the virtual easement can be considered almost entirely transferable between individual persons, barring some potential minor limitations. Specifically, it may be wise to not allow minors or dependents to make binding transfers.\textsuperscript{196} This, of course, assumes

\textsuperscript{193} The property that the easement may be thought of as attached to is the user’s account within the virtual world. As such, the virtual easement can be roughly analogized to an easement in gross.

\textsuperscript{194} See Gordon, supra note 113, at 1354. I grant, of course, that many pieces of property cannot be transferred, such as some types of remainders subject to condition precedent (for example, O grants Blackacre to A until he attempts to transfer or sell it) or, more importantly, human property interests (i.e. at present, A can not transfer his freedom to B and make himself B’s slave). Still, much tangible and intangible property can be transferred and I take the position that transferability over entirely economic goods that are not connected to personal autonomy are ideally transferable.

\textsuperscript{195} See id. (stating that the right to exclude, the right to transfer, and the right to use “are at the heart of courts’ and laypersons’ understandings of property”); Jessica Litman, Cyberspace and Privacy: A New Legal Paradigm? Information Privacy/Information Property, 52 STAN. L. REV. 1283, 1296 (2000).

\textsuperscript{196} The primary reason for this being that children and the mentally handicapped have impaired ability to consent to contracts. See RESTATEMENT (SECOND) OF CONTRACTS § 12 (1981); Loretta M. Kopelman, What Conditions Justify Risky Nontherapeutic or "No Benefit" Pediatric Studies: A Sliding Scale Analysis, 32 J.L. MED. & ETHICS 749, 749, (2004).
that individuals who fit those descriptions are involved in virtual worlds, but there is ample evidence of minors in particular comprising a significant proportion of virtual worlds, as well as having entirely youth-centered virtual worlds (see, e.g. Teen Second Life). Considering that the virtual easement applies only to situations where there has been some investment of time and value to a virtual world, however, presumably most minor and dependent virtual world users will not be at risk for engaging in trades without the permission of a parent or guardian. For those trades of virtual property which are not consented to, however, the best position may be to hold that they are binding subject to the law of agency. This is ultimately a policy decision that would be best reconsidered after additional study, however.

While one primary reason for allowing transferability attribute is sheer practicality, another is the evocation of moral values of personhood and autonomy through the transfer process. Transferability may be taken to include sale, gifting, or even given to a third-party by descent or a will—just as a grandfather could make a bequest of $100,000 to his grandson, he could make a bequest of his user account within a virtual world as well.

There is one very important caveat to this transfer, however—the only thing that the receiving party has a right to is the value of the transferred item. While a game company could allow for a transfer of a virtual property scarf between user A and user B, the company may choose to intercede in the transfer. While it will be outside the company’s power to stop a sale, it may ‘buy’ the item from user A for market value, in

---

197 Because distribution of information is so easy and systems for trading virtual property already largely in place, if underground. See Radin, supra note 30.
198 In effect, the virtual easement would be as descendible as an easement in gross. See HERBET HOVENKAMP & SHELDON F. KURTZ, supra note 98, at 320.
effect negating the sale. While this might appear highly controversial, it can serve as a critical market regulation device for game companies, such as preventing transfers of especially potent items to players who have yet to sufficiently earn them.\footnote{See Bartle, \textit{in State of Play}, supra note 9, at 41; \textit{Law and Liberty, in State of Play}, supra note 9, at 94.} The situation may be analogized to restrictions on the sale of body parts\footnote{See Newman v. Sathyavaglswaran, 287 F.3d 786 (9th Cir. 2002).} or personal liberty more generally,\footnote{See Bailey v. Alabama, 219 U.S. 219 (1911). By personal liberty, I mean that a person may not willingly give up his freedom (i.e. choose to be a slave). In other words, just as it is taken as fact that persons may not give up their liberty, since that violates societal norms, so may game companies take it as fact that a user may not give up their current status in the world by using money as a substitute for effort and commitment. Although the concept of slavery is far more troubling on a moral level than the idea that a novice gamer may be as powerful as a seasoned veteran, both ideas represent profound violations of societal norms, violations so great that they can throw the stability of the given society into question.} with the additional notation that the restrictions placed by game companies on transfers need not be eternal. While restrictions on the sale of human parts are often couched in moral terms, a game company may decide to intercede in the sale for entirely arbitrary reasons: it wishes to encourage exploration of an area where the virtual property may be procured, it wishes to keep the item a mark of honor, or it wishes that a given item only be possessed by users named George.

Naturally, a retort to this system is that, rather than intercede in the sale, the game company should simply not allow it at all, but this would damage the structure of the virtual easement—if the property interest is predicated on economic value, it must be possible to receive value for that item or the item becomes worthless. This danger is especially pronounced for gifts and bequests—a bar on transfers unilaterally would have the effect of the company taking possession of (potentially) valuable items at no cost to itself. While this does not mean that the company must buy an item that has no natural value...
buyer in the market, it may not decide by fiat that a user’s virtual property has become economically valueless. Such a scenario would be ripe for abuse.

B. Longevity

As previously noted, the length of an executed license is highly variable depending on the amount of the licensee’s expenditures. The virtual easement adopts an altered form of that position, but one that is far more predictable—namely, the length of the virtual easement is tied to both the continued existence of the virtual world and expenditure of time and/or money on the account. While some virtual worlds have proven quite persistent, it is unexpected that they will last forever, especially those run by companies for a primarily commercial purpose. Moreover, the virtual easement is tied to the individual virtual world. As a result, there is a question as to what happens to the property interests when/if the virtual world ceases functioning. Although it can be assumed that users will have legal notice of a final, permanent shutdown of a virtual world’s servers, meaning that users will have a chance to attempt to make returns on their investments, it is expected that such an announcement will cause all in-world goods to greatly diminish in value or even become valueless. Yet, it would be incorrect to suggest that users can make trades or seek to sell virtual property within their accounts once the

---

202 E.g. has a market value of U.S. $0. Procedural safeguards may be considered for situations where an item is given by bequest but has no natural buyers at the time the transfer actually takes place, such as the recipient having the right to take a calculated payment from the company or the privilege to wait x months to see if the market changes.

203 See supra notes 70-72.


205 Significantly, this does not mean a player has an interest only in virtual property on one server. For virtual worlds that allow a user to choose which server to enter upon log-on, it may be assumed that his virtual property is not in any way lost or damaged in the process. Of course, where switching servers ad hoc is forbidden by the code or norms of the virtual world, then the user may have an interest only in the virtual property on the server that their assets (avatars, items, money, etc) inhabit.
world has stopped functioning: at the time of final shutdown, all assets within the virtual world effectively revert to the owner of the virtual world.206 Although this may be a disincentive to investing in a virtual world, to establish a system that forces game companies to buy-out all its user’s accounts if it wishes to shut down the world would be potentially economically inefficient even under a liability rule if the virtual world was only somewhat unprofitable.207 Indeed, it is conceivable that a company might regard it as less costly to keep the virtual world running, even if it is a net loser, if the cost of a universal purchase of all user accounts was very high.208

In terms of expenditures, the baseline for users to continue to have the virtual easement must be continued payment of any and all dues associated with the account209—a failure to pay for a set period of time210 would be tantamount to breach of the terms of the virtual easement and would mean that the game company could, potentially, elect to take possession of the account’s virtual property. Of course, there are some virtual worlds where a person may have an account without any fees at all,211 so this rubric would not always prove useful. An alternative measure of expenditure, however, could be either a time spent in-world requirement212 or simply a requirement that the user log-on for any length of time every so often (e.g. once a day, week, month, year, etc.). The primary reason for this requirement, which gives the companies

206 Thereby mimicking the trajectory of a fee simple determinable interest.
207 For a discussion of why users cannot contract to avoid this scenario, please see infra pages 56-58.
209 These fees can be considered something resembling consideration in a contract sense.
210 One that may vary by virtual world.
211 See, e.g., THERE.COM; SECOND LIFE.
212 Such as requiring that a user spend 5 hours a month logged-on with their account to constitute a sufficient expenditure. Given that the average user spends 20-30 hours a week logged on, this is far from an onerous requirement, but it could be modulated up or down depending on the nature of the world. See CODE, supra note 36.
something resembling adverse possession rights over user accounts, is to reduce efficiency within virtual world economies by making it impossible for users to acquire property and later cease interacting with the virtual world, rendering their acquired property inaccessible to other users and the company itself. While one might argue that the status of all virtual property as code means that the company could always simply put a new version into the world, the fact that the user could potentially stay uninvolved for years and then return adds needless complexity to the situation and makes it extremely difficult for companies to manage their virtual world economies with any degree of certainty.

C. Liability Rule

Perhaps the most important attribute of the virtual easement is that it is based not on a property rule system but a liability rule one with each user having the entitlement, and the virtual world’s owner having the right to buy all of the user’s virtual property at market price at any time—in other words, a Rule 2 system in the Calabresi/Melamed rubric. If the company elects to use this option, the virtual easement will be deemed terminated and the user may be ejected from the virtual world, presumably forever if the

213 Although restitution damages can be given in response to an injury to property, I prefer to suggest that the liability rule, which will presumably focus on restitution damages, sounds more in contract law than in property. I take this position primarily because contract law is inherently more closely linked to the kind of restitution damages that would be at play for the virtual easement. While restitution of property might well necessitate the restoration of the actual property in question where money is by itself an insufficient remedy (for example, if A converts B’s bicycle, a court working from a property perspective may order the that specific bicycle be returned, while a court working from a contract perspective would likely just demand that the monetary value of the bicycle be returned). In terms of the virtual easement, courts should place maximum focus not on the property in question, whether it is available for return or not, but merely the monetary value of item, thus suggesting a closer connection to contract law. Admittedly, this distinction is minute and not particularly salient in terms of how the virtual easement would work in practice.

214 See Calabresi & Melamed, supra note 183. Of course, where there is no market price, some other manner of valuation would be necessitated. See Richard A. Epstein, A Clear View of The Cathedral: The Dominance of Property Rules, 106 YALE L.J. 2091, 2114-15 (1997) [hereinafter Clear View] (stressing that liability rules must operated at an efficient price to be effective).
company wishes. At base, the procedure for how this transfer would work would resemble a form of eminent domain, where the company gives a user notice that their property is being taken and that fair compensation will be granted.215 Admittedly, the user might be able to gain reentry of some kind if virtual worlds were determined to be common carriers, but given that the FCC does not even believe the internet itself is subject to common carrier non-discrimination regulation, this seems highly unlikely.216 At the end of the day, the need for companies to have the ability to exclude some users renders makes them more like club goods than public goods.217

While it might appear strange to apply this type of liability rule/entitlement system to virtual worlds given that the party that has a near-monopoly is the game company and not the user population,218 it must be remembered that, counter-intuitively, the game company’s near-monopoly status is not inherently offensive. Instead, the game company’s Leviathan-esque position is something that is crucial to management of the virtual world in some opinions and should be maintained as much as possible.219 Thus, if the virtual easement is meant to make it possible for players to have some degree of legal

215 Although a right of first refusal system might be preferable, only a system styled on eminent domain will guarantee that companies have the ability to kick users out of their worlds when the company desires it. Admittedly, a hybrid system could be established that gives users the chance to look for an in-world buyer, yet this would increase the amount of time of the process. Further, if the company is paying fair-market value anyway, there would be little incentive for users facing expulsion to search out potential buyers.


218 See Clear View, supra note 214, at 2093 (“A liability rule is typically adopted to counter the monopoly position of the holder of the asset. The holder of cash has no monopoly position at all, so it is very hard to believe that by allowing the present holder of some specific asset to designate the person who must take it off his hands, we advance any conceivable measure of social welfare.”).

219 See Bartle, in STATE OF PLAY, supra note 9; see also James Grimmelmann, Virtual Power Politics, in STATE OF PLAY, supra note 9, at 146, 146-47 (2006) (noting that without careful control, virtual worlds can change dramatically in potentially dangerous ways practically overnight).
ownership of their virtual property, a safety valve is needed to prevent users from becoming deleterious influences to the virtual world—hence, the liability rule. Yet, it must be noted that even a liability rule can be abused. It would be potentially inefficient and morally troublesome if a user could log-off in the middle of a series of trades and, upon attempting to log-on a few hours later, be informed that his account’s assets have been purchased by the company and his account has been terminated. As such, some degree of advance notice must be needed prior to termination to allow a user the ability to settle their affairs within the virtual world, though this period of time could be extremely short depending on the world. Although this might lead to extremely negative behavior by users during the period where their account is awaiting termination, this could be partially mitigated by increased administrative monitoring or limits on the ability of a user’s in-world abilities that are not germane to economic purposes. Additionally, this liability rule right would be available only to the virtual world’s owner, making it an in personam right. While it might seem strange to apply the liability rule to only one party, given that users’ property interests are derived from the virtual world, and that giving users the ability to effectively buy-out other users could be very dangerous, this strategy seems to be necessary for the system to work.

---

220 See supra notes 72-81 and accompanying text.
221 Indeed, for a virtual world with an especially fluid economy, it could be as short as a handful of hours, though a good minimum would be twenty-four hours given that a user might not log-on for a significant portion of a day at a time. Other lesser procedural safeguards would also likely be warranted. See Clear View, supra note 214, at 2120.
222 Given that platform owners have the natural ability to view all transactions and events within the world, see Law and Liberty, in State of Play, supra note 9, at 88, it would be an easy technical solution to simply “flag” pre-termination accounts for greater monitoring.
223 See Property/Contract Interface, supra note 106.
224 Dramatically increasing the danger of a user gaining monopoly level power in markets for some virtual world goods.
D. In Rem

Although the liability rule would effectively be in personam in nature, the rest of the virtual easement would have the form of an in rem entitlement, capable of being enforced against third-parties both inside and outside the world. This would be a massive change compared to the status quo even compared to other attributes of the virtual easement, since it would make actual litigation possible between users. Indeed, even just making the current EULA’s enforceable against third parties would make them strongly resemble full property rights. This innovation may seem unnecessary considering that a majority of the dangers this essay has focused on relate not to disagreements between users but conflicts between users and companies. Nevertheless, there are significant possibilities for fraud and misrepresentation in deals between users already, with such risks likely increasing as virtual worlds become increasingly commodified, and it becomes easier to engage in trades with other users.

The ability to sue other users in contract or tort should not be unlimited, however, as unlimited litigation rights could lead to users turning to the law to resolve disputes better left in-world, such as the infamous hypothetical of a user suing regarding the theft of a an item in a virtual world where users are allowed to steal items. As a result, there will have to be some measure of recognition that this in rem right only applies to user-actions that “break the game,” such as hacks of servers to steal virtual property. In the same sense, there would need to be some understanding within the judiciary that users

---

227 See Law and Liberty, in STATE OF PLAY, supra note 9, at 93; Station Exchange, supra note 111.
228 See Right to Play, STATE OF PLAY, supra note 9, at 73
229 See Saunders, supra note 42, at 233.
could not sue the platform owner for crafting code that indirectly resulted in loss or
damage of virtual property.230

E. Virtual Numerus Clausus

Finally, and perhaps most importantly, while the virtual easement would apply to
some virtual worlds, its attributes would not be inherently universal. Instead, just as
property law has a set number property interests available for use, a concept known as the
Numerus Clausus,231 the virtual easement would also have a small, finite number of
forms from which companies could choose, with some amount of external limitations.
Specifically, game companies would, while creating their virtual worlds, effectively
choose from a number of pre-determined property interest schemes that would apply to
all users within the world, a concept that, in terms of virtual worlds, has been described
as interration.232 For fantasy MMORPG’s where the primary purpose of the virtual world
is to provide an atmosphere for adventure, exploration, and amusement, the virtual
easement could be minimal in nature, possibly to the extent that the current EULA-ruled
system is kept entirely in force and users have zero or near-zero rights. In contrast, virtual
worlds where economic trading and the acquisition of virtual property play a more
significant or even primary role in why users are involved would presumably have the
virtual easement in full. In fairness, however, it must be noted that there are many
different reasons why users choose to participate in a virtual world. It is not

230 Such as the creation of non-user avatars which maim and/or rob users’ avatars—while it is possible that
proximate cause itself could be a sufficient remedy to this danger, it would be better to prevent courts from
even reaching the question. The exact dimensions of the in rem right will likely have to be determined only
after additional study of how the virtual easement worked in practice, however.
231 See Numerus Clausus, supra note 175.
232 See Right to Play, STATE OF PLAY, supra note 9, at 78-82; Law and Liberty, in STATE OF PLAY, supra
note 9, at 107-13.
inconceivable, or even unlikely, that some users log-on to fantasy MMORPG’s to gain virtual property for profit,\textsuperscript{233} while others focus on exploration within primarily economic virtual worlds. Yet, the system is best structured not to individual users but the community as a whole for purposes of notice, so some generalizations of the users’ reasons for joining the virtual world will have to be made in each instance.

Yet, there should be some limits to the amount of choice that platform owners will have over the strength of the virtual easement; instead, one factor in determining the nature of virtual easements for specific worlds will depend on the degree to which trading and property acquisition are core elements of the world. For a world like Second Life, for instance, where purchasing and acquiring property is critical to the world’s structure, it is difficult to see anything but the full virtual easement being applied.

The primary reason for this stance is that, if left to their own devices, it is fairly likely that all platform owners will choose the least level of property protection regardless of the attributes of their virtual worlds.\textsuperscript{234} Already, there is strong evidence of market failure within the Metaverse. There relatively few major virtual worlds in existence, nor are there likely to be more in the near future given the massive startup and marketing costs associated with virtual worlds, making it unlikely that an enterprising band of users could easily create a new virtual world that can be accessed by the general population while having more detailed rights for users. By the same token, there is little difference between the EULA’s of the various virtual worlds.\textsuperscript{235} Such uniformity, although allowed in the law, has come to be seen by some scholars as psychologically\textsuperscript{233} Indeed, this is the essence of “gold farming.” See Julian Dibbell, supra note 47, at 141. \textsuperscript{234} See Virtual Liberty, supra note 58, at 2090 (suggesting that it will be important to consider the degree to which virtual space is a marketplace or “a nexus of transactions that have real world values” as well as whether the world is offered as a space for free exchange of ideas). \textsuperscript{235} See supra note 53.
exploitative since they actually discourage individual bargaining; by all accounts, the companies have no desire to bargain in any way, shape, or form with their users based on past actions.\footnote{See Jason Scott Johnston, \textit{Boilerplate in Consumer Contract: The Return of Bargain: An Economic Theory of How Standard-Form Contracts Enable Cooperative Negotiation Between Businesses and Consumers}, 104 MICH. L. REV. 857, 864 (2006).} After all, when a user breaks a rule, the default is termination from the system, not the initiation of arbitration or negotiation with the accused user.

There is little in the way of credible commitment as well, especially considering that a company in dire straits could find a case infusion by banning a user for unjust reasons and selling their virtual possessions. Since the only barrier to that is reputational damage to the game, a wily company could simply watch for dubious behavior by users that could at least theoretically be construed as forbidden and err on the side of punishment rather than mercy. Such a scenario is ripe for abuse. Additionally, the inability of most users to easily extract all their virtual possessions from one world and move to another that seems to be better run is a major market inefficiency preventing a virtual world from easily benefiting from positive changes to its infrastructure and user-company relations. Once a user has sunk a significant amount of costs into one virtual world, she will be very loathe to move to a different one even if the company adopts new measures that are objectively tyrannical, such as a major hike in user fees or forcing users to pay if they wish to have the highest possible bandwidth for all data connections. Even in a world like Second Life, which does make it possible for users to easily “cash their chips out” of the system by converting all Linden dollars into U.S. dollars, it is practically impossible for reputational cachet and social relationships to carry over into another
world, further discouraging users from leaving the world. Given these concerns, virtual
worlds are unlikely to be explained by a Tiebout hypothesis.237

As can be gleaned from the use of the term Numerus Clausus, companies would
not be allowed to make a choice from outside the list of predetermined options—in other
words, using the menu would be mandatory. If every individual virtual world operator
were allowed to choose their own set of property rights for users, the result would be
chaos. Yet, as referenced above, there will also have to be some amount of oversight on
companies’ choices within the menu so that virtual worlds operators do not choose
regimes that are inappropriate for certain virtual worlds. If, for example, the owner of a
virtual world centered on fiscal interactions chose an option with zero or near-zero
property rights, the entire goal of establishing the virtual easement would be thwarted and
the status quo would remain unchanged.

In the interests of clarity, the following example may be helpful. Assume that a
new virtual world has been created, one that allows users to have property within the
world and even has a currency exchange between the virtual world and the analog world.
The owner would then sit down and be forced to choose from the predetermined menu of
property user rights. For the sake of this hypothetical, assume that there are five options
listed on the menu: 1) no user rights, 2) intellectual property rights for users; 3) partial
property rights for users, such that all user accounts in excess of $2000 must be
compensated; 4) no property may be taken from a user without just compensation; and 5)
no property can be taken from a user without just compensation, and the user has the
right to challenge the companies decision to take the property in some type of

Although the owner might wish to choose the first option, his attorney would inform him that the first two options are for virtual worlds that have minimal user asset accumulation, and his virtual world cannot choose those options. Faced with the remaining three options, the owner chooses option four believing that it will encourage users with less money to enter his virtual world and that the administrative requirements of the fifth option will cost too much money.

To be fair, it has been suggested that the problem could be largely remedied by individual users contracting with companies. If a user could contract with a company to allow a form of “insurance,” one that would give the user all monetary value of his account upon the company’s termination/acquisition of the account for any reason, that would solve many of the current problems. It is highly doubtful that the companies would individually contract with users given that there is a dearth of information available to companies about the identity of their users. Prior to logging on, it is just about impossible for a company to have any idea how that user will act within the world—a convicted murderer playing from a prison terminal could be entirely upstanding, while a banker might access a virtual world to feed a rebellious or even sadistic streak. Even assuming that companies do allow such individual contracting, there would be problems with such an incomplete system. First, users could purchase such insurance and take that as a license to engage in mayhem the worlds and the uninsured. Second, given the arguments of Alan Schwartz, it is likely that the insurance scheme would be undercompensatory for users. Finally, this system effectively forces...

---

238 Note, these are not meant to indicate how the menu might look, but is merely a hypothetical menu. Ideally, the menu should not be too long or unwieldy, but it would be perfectly reasonable for the menu to have between ten and fifteen options available.

239 See supra note 135.
all the costs onto the users, since the company would have to expend no additional
resources on this system but would instead pocket a potentially sizable sum of cash for
doing nothing. As a result, a company may begin to discriminate against the uninsured
by viewing users according to two different standards based on whether or not they own
insurance. In such a system, it is easy to imagine virtual worlds not terminating the
insured except for severely harmful actions since the infringing user would be
compensated upon termination. In contrast, the company would both gain the in-world
resources of a terminated uninsured user while also further deterring users from declining
insurance. This outcome effectively makes insurance mandatory.

Of course, it is possible that efficient distribution of different kinds of virtual
easements across the Metaverse could be achieved largely through market forces,
incentives like lower taxes on company profits, or refusal to allow trading for some
interrations, but given the degree to which the virtual easement in its strongest form
would change the dynamics of user-company relations, such incentives may not be
enough.240 Considering that a major reason for establishing the virtual easement would be
to increase efficiency of property interactions, to allow platform owners to thwart this
goal for their own benefit would be a depressing outcome.241

To summarize, while companies will have some manner of choice as to which
type of virtual easement their world will utilize, they will be forced to have some minimal
kind of virtual easement. In other words, there would be a set number of options that
virtual world platform owners could choose between. While it would be at least possible

---

240 See Law and Liberty, in STATE OF PLAY, supra note 9, at 109-10.
241 See Numerus Clausus, supra note 175, at 38 (“From a social point of view, the objective should be to
minimize the sum of measurement (and error) costs, frustration costs, and administrative costs. In other
words, what we want is not maximal standardization—or no standardization—but optimal standardization.
Fortunately, standardization comes in degrees.”).
for a platform owners to select a different option after the virtual world has been operating, there would be significant barriers to reducing the rights of users so as to prevent bait-and-switch situations.

Of course, it is possible that the minimum level of protection will be the status quo: virtual property controlled by licenses that are revocable at any time.\textsuperscript{242} To prevent platform owners from taking advantage of the menu system and simply choosing the option that gives them the maximum amount of rights, it will likely become necessary to have a governmental agency monitor and referee the menu to ensure that platform owners operate in good faith. For instance, if a virtual world is focused on trading, a la Second Life, and its owner tries to select an option that would give users far too few rights, the governmental agency may refuse to allow it to operate until the platform owners picks a different option on the menu. The reason for this is that, as noted previously, companies seem to have an incentive to not adopt the virtual easement unless they are forced to by a third-party.

In fairness, however, the above-referenced menu system is not the only potential solution. If it could be shown that some companies would adopt the virtual easement voluntarily, thereby placing market pressures on other firms to follow suit, the virtual easement could be a default rather than a menu system.\textsuperscript{243} For the default position to work, however, it must also be shown that users would have sufficient ability to determine which virtual worlds offer robust property rights and which do not. If users

\textsuperscript{242} In other words, the first option in the hypothetical above. \textit{See supra} pp. 59.

\textsuperscript{243} Unfortunately, we currently lack data that would speak to this question.
have difficulty gaining information, then the above menu regime would be preferred.\textsuperscript{244} Notably, since the outcome manner of default system would look little different from the above menu system, the only reason this situation is to be preferred is that it would definitely not require the existence of a governmental oversight agency. As referenced earlier,\textsuperscript{245} the communicative nature of virtual worlds should make it fairly easy for information to be generated about the policies of various worlds. There is, however, the additional problem of switching costs;\textsuperscript{246} users may be unwilling to change to a new virtual world due to differences in social infrastructure and sunk costs within one virtual world. In such a scenario, a menu regime may be necessitated even where companies’ incentives make the promulgation of default rules feasible. Additionally, the default system would likely not have a finite number of kinds of virtual easement, meaning that the default system would be far more chaotic and confusing than the menu version. Given the low likelihood of companies adopting the virtual easement, however, it seems like the menu system will have to be instituted.

While some of the ultimate dimensions of the virtual easement will have to be decided after further analysis of the economics and societies of virtual worlds, creating a set of virtual easements for a number of virtual worlds that are transferable, long-lasting, based on a liability rule, and enforceable between third parties should have substantial positive effects. Beyond giving greater clarity to what users’ property rights are within virtual worlds generally, giving users some modicum of rights over their virtual property

\textsuperscript{244} This kind of system has been dubbed the “protection strategy,” since it “can impose a rule that favors the uninformed party in order to reduce that party’s need for information gathering.” \textit{Id.} at 805. This is a contrast to the “notice strategy” which seeks to facilitate the generation of information.

\textsuperscript{245} See \textit{supra} note 108.

\textsuperscript{246} Defined as “the costs of switching from one standard to another. They play a role in determining whether a product or service becomes an enduring standard.” Brant T. Lee, \textit{The Network Effects of Whiteness}, 53 AM. U.L. REV. 1259, 1282 (2004).
should spur further investment within virtual worlds by users, helping the worlds to continue to grow. Similarly, the virtual easement would defeat many of the moral and philosophical quandaries of the status quo, with users able to more fully develop identities within virtual worlds. Finally, offering a legal standard for user property also makes it more feasible for governments to begin taxing income derived from profits made within virtual worlds, thereby filling a current gap in the relationship between the analog world and virtual worlds.

V. Policy Concerns

Though the current state of virtual worlds is precarious in terms of virtual property and the virtual easement seems to offer an excellent answer to the question of what is to be done about virtual property, establishing the virtual easement is not without potential dangers.247 First, there is the question of whether it is necessary to establish the virtual easement now, when virtual worlds are still in their infancy and the problems are still being discovered; with the situation in flux, companies have an incentive to be nervous about radical change. Also, there is the concern that creating anything resembling property rights within virtual worlds will destroy the game conceit and rob virtual worlds of much of their fantasy, reducing them to just a digital version of the analog world. Another complaint is on jurisdictional lines—how can virtual worlds be regulated at all given that not only do they not “exist” in a physical sense within any one

247 Of course, these dangers exist in large part due to the nature of companies’ incentives at present. For instance, the fact that virtual worlds remain in flux militates against radical change to the structural of virtual property unless such a change is critical for continued prosperity. For more, please see discussion supra notes 72-81 and accompanying text.
country since a virtual world owner could place their servers anywhere in the world. From a legal perspective, there is also the question of whether property rights can be created in this regard at all, since the establishment of the virtual easement simply takes intellectual property and attempts to make it into actual property. This Part will address each of these concerns in turn.

A. Necessity

Although Marc Bragg has filed suit against Linden Lab and there have been a handful of examples of users of various virtual worlds seeking damages from owners of virtual worlds in the courts,\textsuperscript{248} it must be noted that such situations are the very rare exception rather than the norm. In fact, the most troubling conflict between a user and a virtual world owner from a property rights perspective, the arbitrary ejectment of a virtual world user for no good reason and the confiscating of his property, seems to be an even rarer proposition. As Prof. Alfred Conard notes,

\begin{quote}
It is evidence that the conception of a proprietor arbitrarily expelling a patron is a legal fiction. Proprietors very rarely expel patrons who are not violating established rules, or suspected of it, despite their legal privilege to do so. On the other hand, proprietors do exclude patrons on a variety of grounds which are not always reasonable.\textsuperscript{249}
\end{quote}

Cyberproperty, moreover, is not without ills since, by its very nature, it can have a chilling effect on speech and the general public nature of online communities, making it easier for virtual worlds to resemble a patchwork of individual homesteads rather than interconnected holistic communities of millions.\textsuperscript{250} In this regard, enacting a major

\begin{footnotes}
\textsuperscript{248} See supra pp. 9-10.
\textsuperscript{249} Amusement Patron, supra note 95, at 816.
\textsuperscript{250} See Against Cyberproperty, supra note 125, at 22.
\end{footnotes}
reform of the structure of virtual worlds at this stage instead of applying existing legal regimes could do more harm than good to virtual worlds by increasing legal confusion within courts,\textsuperscript{251} with the establishment of the virtual easement possibly leading to an unwanted explosion of user property rights at the expense of platform owners.\textsuperscript{252}

Such concerns, while understandable, do not provide sufficient reason for forgoing the establishment of the virtual easement, however. First, although the virtual easement would represent a marked change, it is not one that has been totally unexpected—for the last decade, analysts have argued that the internet and online spaces must be governed by a mix of contract and property.\textsuperscript{253} Additionally, while there have been relatively few examples of clear legal claims involving virtual worlds as of yet, this may be less due to the inherent stability of the system and more due to the relative youth of virtual worlds in general. As the total population of the Metaverse and the size of virtual world economies increase, it is likely that the number of legal conflicts over virtual property will multiply in number and degree. Additionally, it can be argued that the inability of users to own property is already having a dampening effect on virtual world economies, as users are reluctant to effectively gamble their money on virtual property. Even though the economies of virtual worlds have grown dramatically in the last few years, it is conceivable that this growth would have been even more pronounced if users had a degree of ownership over their virtual world assets.

\textsuperscript{251}See Nelmark, supra note 30, at 22 (arguing that it is dangerous to create \textit{sui generis} rules which initially provide a better fit for new forms of property but often address a specific act, such as cybersquatting, “without considering the broader implications of the law”); Joseph H. Sommer, Against Cyberlaw, 15 BERKELEY TECH. L.J. 1145, 1148 (2000) (“[M]ost legal doctrines are flexible and likely to accommodate new social practices . . . .”).

\textsuperscript{252}See Against Cyberproperty, supra note 125, at 24.

Although such situations as Marc Bragg’s may be rare, that also is little reason that the law should attempt to avoid them; if anything, the fact that avoiding the area until a difficult case appears before a prominent court is a more frightening proposition, since, without guidance, it is very foreseeable that the outcome of such a case could be displeasing to all parties. Finally, while some scholars do believe that the current system is sustainable, the vast majority believe that a deluge of litigation over virtual property is coming, and that clear guidelines for courts to use in considering cases on virtual property would be critical for working out the dimensions of virtual property rights. The more time that passes, the greater the potential risk of legal chaos.

254 See, e.g., Laws, supra note 7, at 50-52; Raph Koster, Declaring the Rights of Players, in STATE OF PLAY, supra note 9, at 55, 66-67; Right to Play, in STATE OF PLAY, supra note 9, at 83-84; Virtual Liberty, supra note 58, at 2045.

255 See Laws, supra note 7, at 51. Without clear guidelines, it is entirely possible that differing jurisdictions could develop different property rights standards, an outcome which could be potentially disastrous since the level of transaction costs could become astronomical.

256 Admittedly, one could respond to this point by asking why no virtual world has yet attempted to create full property rights given the risks at issue. There seem to be a number of animating factors behind this decision. First, while conflict is extremely likely in the future, cases like Bragg’s remain the exception, and there has yet to be a smoking gun case similar to A&M Records v. Napster that crystallizes the issue for observers. 239 F.3d 1004 (9th Cir. 2001). Until this case appears, many in the industry may well prefer willful ignorance to taking significant action. By the same token, it is conceivable that companies are making the political calculation that government, if it eventually steps in, will regulate far less than the companies would independently, offering further inducement to refrain at the moment. To some extent, there is also an element of risk of mutually assured destruction for the companies. Finally, increased regulation would likely also mean increased bureaucracy and costs, concerns that similarly militate against companies increasing their property rights so far, just as the high cost of starting a virtual world likely prevents new entities from establishing virtual worlds with full property rights that can compete with established players like Blizzard and Sony. See Posting of Richard Bartle to Terranova, http://terranova.blogs.com/terra_nova/ (Dec. 16, 2005).

Sadly the exact animating factor for the company’s failures to act appears to be difficult to discern at this time, yet it does appear unlikely that it is due to some belief in virtual worlds as “public goods” given how strenuously the EULA’s seek to claim that companies are complete and total owners of their virtual worlds. See supra Part II.A.3.
B. Destroying the Game Conceit

Considering that virtual worlds were birthed largely in fantasy, and that much of the Metaverse is comprised of MMORPG’s that either do not have significant commodification or could exist without significant commodification, the concern that the virtual easement could destroy the game conceit is a very real one. In fact, it is possible that the establishment of the virtual easement in some virtual worlds could have an impact even on those virtual worlds which do not increase user property rights by underlining just what rights the users of those virtual worlds do not possess.

Yet, the fact that the virtual easement will not be universally applied and can be given multiple interrations should limit many of the especially egregious effects on the game conceit. The virtual easement can and should be structured in such a way that if two users engage in player-to-player combat, the loser cannot seek redress in a court. Additionally, at a bare minimum, the virtual easement could be interrated to effectively create a spectrum of property rights, such that while users in Virtual World A (an MMORPG) have no more rights than they have in current EULA’s, users of Virtual World B (an MMORPG that encourages property acquisition) could have the long-lasting and liability rule dimensions of the virtual easement but not the transferability and in rem attributes, while users of Virtual World C (a space that is effectively a place to inhabit online) could have the full virtual easement. The concept of a spectrum can also be calibrated further, to the point that platform owners could have as much flexibility

---

257 The key example of the latter situation is Sony’s Everquest II—although the creation of Station Exchange has standardized trading between players, such trading is far from germane to the game and could be abolished without many negative impacts beyond a loss of additional revenue to Sony and the end of players being able to financially profit from being involved in the virtual world.

258 See Bartle, in STATE OF PLAY, supra note 9, at 40.

259 See Virtual Liberty, supra note 58, at 2068.
determining the virtual property rights of their worlds as individuals have determining
ownership of real and personal property in the analog world.260

In some respects then, the establishment of the virtual easement could be seen as
supplying a sense of order to a subset of virtual worlds—the beginnings of a system of
systematized order within virtual worlds. In its most aggressive version, the virtual
easement simply sets up rules and regulations for companies to follow in dealing with the
property of users, a situation that can be roughly analogized to the constitutional and
legal limitations on zoning and eminent domain in the analog world.261 The primary
differences between real-world zoning and the use of eminent domain lie in the relative
simplicity of the virtual easement—there are no inherent requirements on when the
takings clause can be used262 or what the proper metric of a taking is,263 but merely the
existence of an reimbursement for users when the company desires to take their virtual
assets. In other words, while some observers may claim that this represents the death of
the game conceit, the additional rules on the virtual world are fairly light, and actually
seek to make a game company’s interactions with its users more standardized.264 It is

260 See Merrill, supra note 146, at 37.
261 See supra note 215 and accompanying text.
263 See Loretto v. Teleprompter Manhattan Catv Corp., 458 U.S. 419; Penn Central Transportation Co. v.
264 To be totally fair, this does not mean that it is impossible for a virtual world or a court to decide that
regulatory takings in the spirit of Loretto, Lucas, or Penn Central can occur within virtual worlds. Indeed,
if virtual world continue to grow in size, population, and technological detail, it is conceivable that some
parties, likely users, will eventually move to create a system of “virtual regulatory takings,” wherein
companies could be required to reimburse users for taking assets unintentionally. This outcome is the
specter that Bartle and other writers refer to when discussing the game conceit—the possibility that game
companies could lose the vast majority of their control on virtual worlds, and that virtual worlds would turn
into nothing more than an electronic mirror of our analog world. Yet, this concern is premature and
resembles fears that providing any sort of regulation to a market entails the destruction of an economy. At
present, the possibility of such an outcome occurring anytime in the near or moderate future is
infinitesimal, as there are currently no persons advocating such a system at all. The subject, however,
would be fruitful for further thought by members of the academy.
even conceivable that the existence of the virtual easement could make it easier for
companies to “re-zone” their virtual worlds. After all, while game companies may be
reluctant to simply take the assets of users without compensation for fear of increasing
user ire, the possibility of compensation for lost assets should help pacify such users.

The concern over damage to the game conceit at the hands of the virtual easement
is already largely being rendered moot by current events, however, as platform owners
are attempting to reap large economic benefits off of users while maintaining total control
of all virtual property.265 Both Second Life’s decision to grant intellectual property rights
to users and Sony’s establishment of its Station Exchange auction system represent large
moves away from the vision of virtual worlds as primarily play spaces without any
concomitant change in users’ rights. As such, the virtual easement may mitigate some of
these trends and help preserve the game conceit for some virtual worlds by forcing game
companies to make a choice—either accept the virtual easement, meaning that the
companies can continue profiting off of individual transactions between users, or
continue the EULA system but without the ability to profit off of user-user
trades/auctions.

C. Jurisdictional Concerns

Although it can be argued that virtual worlds can be said to effectively reside in
whatever jurisdiction their servers are located in, the generally nebulous connection
between the analog world and cyberspace space generally makes precise regulation of

265 See Virtual Liberty, supra note 58, at 2071, 2073; Law and Liberty, in STATE OF PLAY, supra note 9, at
94-95.
virtual worlds a fairly daunting task.\textsuperscript{266} Yet, even assuming that virtual world companies attempt to escape the establishment of a virtual easement system of property rights by moving their servers to a different country,\textsuperscript{267} it should still be possible for the United States to regulate the activities of users who are United States citizens. If nothing else, the recent legislation passed by Congress regulating online poker websites provides precedent for the United States regulating the activities of foreign websites with regard to United States citizen users. As a result, if the virtual easement were established, courts could make platform owners choose between accepting that United States citizen users have property rights over their virtual world assets to some degree and not allowing United States citizens to enter their virtual world. Although the latter outcome would be quite deleterious, the size of the virtual world user base in the United States militates against this outcome.

D. The Possibility of Creating Property Through IP

Finally, although the relationship between intellectual property (IP) and property has not always been particularly well-defined,\textsuperscript{268} the virtual easement takes that relationship in a somewhat revolutionary new direction by suggesting that users can take code which only appears to be a piece of property and grant it many of the same rights as real property. In the most extreme sense, the virtual easement can be critiqued for


\textsuperscript{268} While intellectual property is the realm of “abstract proprietary interests in the intangible” and property is the law of the tangible, the divide between them is often quite narrow. ROGER E. SCHECHTER & JOHN R. THOMAS, \textit{INTELLECTUAL PROPERTY: THE LAW OF COPYRIGHTS, PATENTS, AND TRADEMARKS} 4-9 (2003).
allowing for a user to take a part of a copyright (some part of a virtual world’s overall code) and create property rights effectively out of thin air (by claiming a measure of property rights over that piece of code). Yet, it must be noted that virtual property itself is somewhat distinct from intellectual property—although virtual property may be, at base, code, a piece of virtual property shares many significant attributes with real property, like exclusivity, transferability, and even a degree of tangibility. More importantly, people interact with virtual property not in the abstract way they deal with intellectual property but in a fairly concrete manner—indeed, users interactions with virtual property are giving a new normative dimension to how intellectual property can be perceived.269 As such, if the primary barrier to perceiving virtual property as being worthy of property rights is its existence as code, this is not by itself a problem—after all, “the law turns the intangible into property.”270

VI. Conclusion

Although virtual worlds have managed to exist largely outside the law for the first few years of their existence, that period seems to be drawing to a close. At present, the status quo of virtual property appears largely untenable, with the EULA-controlled system of rights management likely to be increasingly challenged by users in courts. As neither property law nor contract law appear able to provide by themselves a good system to control the ownership of virtual property, however, it appears that the best solution to

270 See FREE CULTURE, supra note 32, at 82.
the virtual property question is to create a new interest that combines different aspects of contract law and property law—the virtual easement.

As previously mentioned, although the broad strokes of the virtual easement have been described, much work remains to be done before the virtual easement’s form(s) should be ultimately finalized. Beyond analyzing how the U.S. government should consider enacting the virtual easement and what, if any, cooperation should occur between countries in this regard, a great deal more research about the economies of virtual worlds would be very useful so as to maximize the efficiency of the worlds. Moreover, any establishment of virtual property rights will have to be workable within the virtual worlds, so further studies of users’ opinions on this subject and the existence of virtual worlds in general would be useful—although “online democracy” within virtual worlds is still fairly nascent, users have begun fairly ferocious movements when faced with what they believe are illogical or unjust policies.

Although the novel technical nature of virtual worlds might fill some in the academy with pause about how the law should deal with the question of virtual property, it should be remembered that the law has dealt with novel technologies before. Though an improper regulation of virtual worlds could damage the Metaverse gravely, the greatest danger is not that governments or courts will enact poor laws but that no action will be taken in the belief that an appropriate system of virtual property rights will work itself out naturally.  

In the relatively near future, a court or a legislature will attempt


272 Considering that Marc Bragg’s lawsuit has been transferred to federal court and has survived a motion to dismiss, it’s even possible that this very first suit could itself be the tsunami that inaugurates the regulation of property rights within virtual worlds. See Bragg v. Linden Research, Inc., No. 06-4925 (E.D.
to regulate the use, sale, and ownership of virtual property.\textsuperscript{273} Although it may seem somewhat counterintuitive, establishing a system of virtual property rights before that happens may well be the best way to guarantee that the one of the most remarkable innovations of cyberspace is able to meet its potential.