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Electronic Gaming and the Ethics of Information Ownership

Abstract:

Players of electronic games, particularly on-line role-playing games, may invest a substantial degree of time, effort, and personal identity into the game scenarios they generate. Yet, where the wishes of players diverge from those of game publishers, the legal and ethical interests of players remain unclear. The most applicable set of legal principles are those of copyright law, which is often grounded in utilitarian justifications, but which may also be justified on deontological grounds. Past copyright cases involving video arcade and personal computer gaming suggest that the gaming scenaria generated by players may constitute original selection and arrangement of the game elements, thus qualifying such gaming sequences for copyright protection as either derivative works or works of joint authorship. But this result may be difficult to justify on utilitarian theories. Rather, the personal investment of game players suggests a deontological basis for claims of game sequence ownership.

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Introduction

Electronic gaming confronts the player with an interface, typically textual or audiovisual, that requires creative response in order to play the game. Players typically must choose from a finite number of responses provided by the game developer, but the combination of responses lies in the hands of the player. Any particular game sequence is the result of such player creativity. Whether in solo, or stand-alone game play, or multi-player environments, players take dormant, latent game environments and by their play infuse them with a realization of potential, with activity, with narrative. Even the most limited electronic game scenarios contain some element of player creativity and choice; it is after all the options available that allow the player to display and develop skills that make the game challenging and enjoyable. The more sophisticated the game, the greater number of creative options available to players, and the more unique and personalized the player experience becomes.

At times, however, the creativity infused into games by players may diverge from the creative options initially chosen by the publisher. Players may wish to take the game narrative or experience outside the parameters desired and designed by the game publisher. Players may wish to imbue the game scenario with new objects, new challenges, new choices. Players may wish to link disparate games together, to move characters and narratives between competing game environments, or to link stand-alone games together in multiplayer of the players' choosing. While game publishers may in some instances determine it to be in their own self-interest to permit or encourage such activity, in many instances such player activity will run counter to the business plan of the publisher. Such situations present an ethical conflict between the interests of game developers and game users.

Where the interests of player and publisher diverge, control over the use and development of the game will be at issue, which means that ultimately ownership of the game will be at issue. Ownership of gaming scenarios and player gaming narratives will be largely governed by the intellectual property rights conferred under copyright law, and, in any conflict between game developers and game players, most particularly governed by the division of rights dictated under copyright doctrines addressing multiple authorship. Although no copyright cases to date address the ownership of computer gaming scenarios, principles articulated in several cases

addressing first-generation computer video games suggest how ownership would likely be allocated. Thus the ethical question regarding control of electronic gaming experiences will be largely governed by the moral justification for current configurations of copyright law.

Yet, it is not clear that the moral configuration of copyright law adequately addresses the configuration of interests present in the interaction of players with electronic games. In particular, it is unclear whether copyright law considers and respects the personal investment of game players in game characters and game narratives. In this essay, I propose to examine the failure of current copyright justifications to account for such interests. I begin by discussing the nature of user interaction with electronic games, and the treatment of such interaction under current copyright law. In particular, I review several electronic gaming cases that indicate player game developments or contributions are unlikely to be recognized under copyright. I then discuss the moral justifications for copyright, noting their misalignment with player gaming creativity, especially with regard to character development and narrative. I conclude with some observations as to the moral basis for recognizing the creations electronic game players.

The Nature of the Game

The activity of participants in such multi-player role-playing games generates value in several different forms. For example, in the course of game participation, players may accumulate virtual objects or monetary tokens that have value not only within the game, but which also have value in the "real world" where markets have developed for the sale or barter such intangible property, which may then be used by other players in the game.

To date, a fair amount of commentary has been generated regarding the ownership and property interests attending such virtual objects.¹ But essen-

¹ Lastowka, F.G. and Hunter, D. (2003) *The Laws of the Virtual Worlds*, California Law Review, 92, 1-74; Stephens, M. (2002). Student Note, *Sales of In-Game Assets: An Illustration of the Continuing Failure of Intellectual Property Law to Protect Digital Content Creators*, Texas Law Review, 80, 1513-1535.

tially no scholarship has been advanced to consider the ownership or property interests in the game itself – in the characters and narratives generated by game play. Ownership of this more traditional form of intellectual property may be at issue when conflicts arise between game owners and game players as to control over the progress of a game scenario, over the creation of game sequels or spin-offs, and over mobility or compatibility between different games.

At a superficial level, such matters may seem simple and well settled: At the level of player perception, the output of the game typically constitutes a collection of sounds, images, and animation, and text, constituting an audiovisual work. Such works are protected under the law of copyright; copyright subsists in original works of authorship fixed for a perceptible duration in some tangible medium of expression. Since the audiovisual output of the game is fixed for some duration in computer hardware, copyright law will apply. Additionally, at a more fundamental level, typically unseen by players, the computer code that controls and generates the game scenario will also fall under the system of copyright. Thus computer games comprise a variety of copyrightable works, at a variety of levels.

Copyright vests ownership and control of a work, such as computer code or audiovisual output, in the author of the work -- either a natural person or the employer of a natural person. Copyright law is typically justified on utilitarian grounds, as a means for granting the creator of an original work exclusive rights in that work, providing an incentive to encourage the creation of such works for the benefit of the public.² This view has characterized the American approach to copyright, and has gained increasing prominence worldwide as the United States has increasingly dominated international copyright treaty negotiations. However, copyright has also sometimes been justified under a deontological "personality" theory, a view that has traditionally characterized the continental European tradition. Under this approach, copyright is justified as recognizing the infusion of a creative work with some aspect of the author's personality or individual expression; thus copyright law recognizes and

validates the autonomy of the author.³ These two approaches have been the dominant moral justifications for copyright, although other theories, such as a Lockean labor or "desert" theory, have sometimes been advanced, justifying copyright as a recognition or validation of the author's effort.⁴

Considering Player Contributions

But on more careful consideration, the ownership of an individual gaming scenario, when considered at the level of particular game narrative, presents greater legal and ethical challenges. Game players, especially when participating in role-playing game milieux, may invest a considerable degree of time and creative effort in developing their character attributes, building or collecting portfolios of character possessions, and chronicling their character exploits. Admittedly, such attributes, artifacts, and exploits lie within the constraints of the computer code and worldview laid down by the game designers. But the players contribute new narratives, new character attributes, new combinations of game elements within the general parameters of the game.

Consequently, as a practical matter, no particular game experience can be said to arise wholly from gaming elements established by game creators – rather, players participate in shaping and developing the gaming scenarios in which they are engaged. Such contributions may well constitute original expression of the type protected under copyright. Indeed, the output of a game, resulting from the interaction of a player with the game controls or interface, may constitute a series of copyrightable works, each differing from the others due to different user choices and reactions to the options programmed into the game scenario itself. Given the personal and resource investment of game players in their characters, this player investment deserves a legal analysis of the rights of players to own and control their creative contributions. Additionally, whatever the outcome of such a legal analysis, the investment of players a broader ethical analysis of the interest players might properly be accorded in their contributions.

² Landes, W.M. and Posner, R.A. (1989). An Economic Analysis of Copyright Law, *Journal of Legal Studies* 18, 325-363.

³ Drahos, P. (1996). *A Philosophy of Intellectual Property*, Dartmouth, Brookfield

⁴ Hughes, J. (1988). *The Philosophy of Intellectual Property*, *Georgetown Law Review*, 77, 287-291

If a given game scenario arises from the original contributions of both the game developer and the game player, then the law regarding multiple authorship becomes applicable. Although copyright law varies somewhat a bit from country to country, certain general standards are widespread due to international treaty agreements. In general, copyright recognizes two major categories of multiple contribution: that of joint authorship and that of derivative works. The first of these, joint authorship, typically occurs when more than one author contributes original expression to the inception of a work, with the intent of producing a unified final product. In such cases, each contributor has a complete individual right to ownership of the final product. Derivative works, by contrast, tend to occur sequentially, when a subsequent or follow-on contributor adapts an existing work with the authorization of the initial contributor – for example, setting lyrics to music, or adapting a novel into a screenplay. In this case, each contributor owns and controls the portion of the work contributed, not the entire final product. Of course, adaptation of the work without permission constitutes an infringement of the initial author's exclusive right to adapt the work, and such use of the initial work can be halted by legal action. Indeed, under U.S. law, the unauthorized adaptation of a copyrighted work goes unrecognized; the adaptor accrues no rights in the unauthorized contribution, no matter how original.

Recognizing Player Contributions

If players contribute original expression to gaming scenarios, and have at least the implied permission of the game producers, then logically players must either be joint authors or authors of derivative works. But the law has been slow to recognize the contributions of participants in such "ergodic" works. The question arose early in the history of computer-generated gaming, with the commercial advent of video arcade games: Galaxian, Pac-Man, Centipede, Missile Command. Such games, now considered arcade "classics," generated CRT computer graphics in response to user interaction via buttons, joysticks, or trackballs. The player in essence accessed stored images, sounds, and image sequences by means of the game console controls, in response to stimuli generated by the game program. Thus, any given sequence of game play was the product of user choice in response to the program, arguably making the player an author.

For example, in *Stern Electronics v. Kaufman*,⁵ a United States federal court considered the problem of player participation in the context of an infringement suit against the supplier of an allegedly infringing video game. The defendant in the suit challenged the copyright in the plaintiff's game by arguing that player control of the video output the game constituted original expression, a prerequisite condition for authorship in copyright. But the court reasoned that the player control generated only a variation on the plaintiff's game, and the court declined to address the question as to how much participation by the game player would be necessary before the producer of the game could no longer be considered to have contributed enough original expression to be considered an author.

Subsequent courts facing the same issue adopted a similar stance, emphasizing the limited number of choices that could be made by the game player.⁶ At least one court mused a bit as to whether a given video output might be a work derivative of the game software, but concluded in dicta that the manufacturer of the game was entitled to monopolize the work in any event.⁷ In deciding these challenges to these challenges to the copyright of video games, these courts focused on the copyrightable contribution of the game manufacturers to the images and instructions embedded in the game software or semiconductor chips. The authorship of a given game sequence was not directly at issue, consequently, these early courts never squarely addressed the contribution made by the player to any given game – the possibility that the player might be contributing original expression to the output, that the output might be a work of joint authorship or derivative work.

The contribution of players to game sequence, and was more directly addressed by the opinion of a U.S. federal appellate court in *Microstar v. Formgen, Inc.*⁸ There the court considered the status of player-generated add-on levels to the popular "Duke Nukem" computer video game. The publisher of the

⁵ 669 F.2d 852, 856-57 (2d Cir. 1982).

⁶ See *Midway Mfg. Co. v. Artic Int'l*, 704 F.2d 1009, 1012-13 (7th Cir. 1982); see also *Williams Electronics v. Artic Int'l* 685 F.2d 870, 874 (3d Cir. 1982).

⁷ 704 F.2d at 1014.

⁸ 154 F.3d 1107 (9th Cir. 1998).

game had encouraged players to create and trade additional levels beyond those initially programmed into the game; however, a commercial firm had gathered a large number of such player add-ons and was selling them on CD-ROM media without permission of the game publisher. The additional levels were constituted of computer "MAP" files that called up graphics from the standard game image library, and only the MAP files, not the proprietary graphics files, had been copied. But the court nonetheless found the player-created levels to constitute a type of derivative work of the game. The opinion compares the MAP files to narratives in literary sequels, and holding that the original developer had the right to control the distribution of such sequels.

The *Microstar* court's MAP files as literary "sequels" effectively recognizes the selection and arrangement of game elements by players as authorized derivative works. This selection and arrangement analysis would have been equally applicable to the arcade video games cases; given the large number of possible game play sequences that might be generated by player choice, the player contribution was as constrained or as trivial as the *Stern* opinion suggests. The greater number of creative choices for players engaged in electronic role-playing games suggests and even stronger case original selection and arrangement, constituting authorship of a derivative work.

Such derivative works are presumably authorized by the purchase of the game for play. In the video or role-playing game context, some implied license or authorization might be inferred from the nature of the game; the player surely has some type of permission to generate a new game pattern, as that is necessary and presumably intended in order to play the game. Authorization may otherwise be inferred from the publisher's acquiescence in creation of the new sequences -- for example, in *Microstar*, the game publisher's encouragement of the development and trade of additional player-generated levels conferred at least implied, and at times explicit, permission to create the derivative works of the game. Moreover, it is possible in at least some cases that the game sequences might constitute works of joint authorship, as the game developer certainly contemplated and intended the use of the game by players to generate original sequences. Authorization might move the manipulation into the category of derivative work, where the reader's contribution qualifies for its own authorial copyright.

Justifying Player Authorship

The logic of these cases strongly suggests that the narratives generated by user game play constitute original expression as defined in copyright law, and are likely derivative works if not works of joint authorship. Some previous commentary, focusing primarily on the ownership and control of game characters, has mistakenly argued that copyright is inapplicable to role-playing scenarios, a conclusion leading in turn to questionable ethical analysis of game scenario ownership.⁹ The mistaken legal conclusion appears to stem from erroneous assumption that copyright must be unitary, or must vest in a single author.

But with the derivative work analysis for gaming narratives now in hand, can the legal result of player authorship be justified within the ethical assumptions of copyright? From a utilitarian standpoint, offering ownership or control of game adaptations might generate some additional incentive to prompt the creation of such add-ons. Creation and sharing of game improvements might be prompted by the promise of some creative control, and conversely, deterred by the knowledge that, in the absence of copyright for improvers, control of improvements would accrue to the original game owner. However, such improvements seem to arise more spontaneously, without the promise of copyright reward, often motivated by the player's non-pecuniary interest or enjoyment. Little or no incentive seems necessary to prompt players to develop their own game characters and narratives within the framework of the game; players are likely to do so for the enjoyment or challenge of the game, rather than for the reward of some exclusive rights.

Additionally, broad control over copyrighted works and their adaptations has been justified on the argument that an effective incentive for the initial author requires extended control over uses of the work, including ownership of improvements or applications in adjacent markets. On a utilitarian theory, shared control for follow-on improvements would be justified only if the benefit from recognition of player's rights outweighs the lessened incen-

⁹ Reynolds, R. (2002). Intellectual Property Rights in Community-Based Video Games, Retrieved September 10, 2005 from <http://www.reynolds.com/downloads/RReynolds-MMORPG-IPR.doc>

tive for the initial work. Such benefits seem more dubious if improvements will in any event be developed due to other motivations, without the recognition of players' rights. Thus the utilitarian argument for recognition of player ownership seems uncertain.

But from a deontological, personality-based perspective, recognition of player copyright in their characters and narratives may seem more compelling. Players often invest a good deal of effort in character development, suggesting that a Lockean desert approach would recognize some natural right to the results of such efforts. Perhaps even more importantly, players tend to invest a good deal of personal, psychological capital into game character development – forming an attachment to and identifying closely with the game character. Characters will frequently function as a fantasized extension of the player's psyche, or may even form an important aspect of the player's own self-image or persona. Copyright recognition of this personal investment may help to affirm player individuality and autonomy; failure to recognize such as substantial personal investment may tend to undermine the personal autonomy of players when disputes over control of game scenarios arise.

This suggests that gaming may be ripe for application of personality-based theories of intellectual property, both recognizing and protecting an important aspect of the player's individuality and personality. At the same time, the analysis of joint authorship above suggests that the latitude for protecting personal investment as a property right is not unlimited. If the personal investment of players in a game scenario is to be recognized, then we must similarly recognize that the initial game developer may have something of a personal investment in the game as developed. If the work is a work of joint authorship, then the investment of personality is also joint, and the control that comes with authorship must be balanced or shared in order to validate the personal investment of each party. Current copyright law in fact mandates forms of such sharing for ownership of joint or derivative works.

Additionally, we must acknowledge that personality-based theories of authorship may have their dark side. Personal identification with property has its positive aspects: identification with a home, a wedding ring, a sporting trophy, a doctoral dissertation, or perhaps even with a game character can define the individual in a healthy and affirmative manner. But as Peggy Radin cautions us in her classic discussion of personality-based ownership theories, in-

vestment of identity in property may sometimes go too far, becoming an unhealthy obsession.¹⁰ Certainly signs of obsessive or addictive tendencies may sometimes be seen in game player behavior, and in the degree of identification of the player with the scenario being created. Of course, the tendency toward unhealthy property obsessions is not limited to identification with intellectual property, and the potential for personal obsession with corporate securities or sports cars or collectible figurines has not hampered societal adoption of regimes for ownership of such items. Still, it may be appropriate to exercise care in adopting a personality-based theory of ownership that could encourage unhealthy personal investment, ironically damaging the individual whose personal worth is meant to be affirmed.

Conclusion

If characterized as a "narrative" selected and arranged from the elements of a game, player-generated scenarios seem to fit the copyright categories of joint or derivative works. Such recognition of game scenario authorship seems legally plausible from the results of past video game cases, and ethically plausible on a deontological theory of copyright. Of course, many game publishers have hedged against such a result by contractually requiring players to cede any ownership rights in their game narratives to the publishers. Such contracts are at times legally suspect, and require their own legal and ethical analysis.¹¹ But such an analysis can only proceed after the disposition of the underlying property rights in the game scenario are clear.

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¹⁰ Radin, M.J. (1982). Property and Personhood, *Stanford Law Review*, 34, 97-1015.

¹¹ Guibault, L. (2002). Copyright Limitations on Contracts: An Analysis of the Contractual Overridability of Limitations on Copyright, *The Hague, Kluwer.*

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