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THE OFFICIAL STRATEGY GUIDE FOR VIDEO GAME STUDIES:
A GRAMMAR AND RHETORIC OF VIDEO GAMES

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Nathan Clinton Garrelts

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THE OFFICIAL STRATEGY GUIDE FOR VIDEO GAME STUDIES:
A GRAMMAR AND RHETORIC OF VIDEO GAMES

By

Nathan Clinton Garrelts

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ABSTRACT

THE OFFICIAL STRATEGY GUIDE FOR VIDEO GAME STUDIES:
A GRAMMAR AND RHETORIC OF VIDEO GAMES

By

Nathan Clinton Garrelts

Video games constitute a significant portion of our documentary culture, and as

such they not only reflect our values, but also are in constant conversation with them.

Although there have been many studies that comment on the connection between video

games and culture, and several other studies that attempt to understand how playing video

games may affect audiences, almost no video game studies actually study the material,

formal, or interactive qualities of video game content. Of those studies that do discuss

video game content, most are incomplete because they treat video games as a pre-

composed static medium, which contemporary video games are not. Consequently, we

have a very shallow understanding of video games and have no systematic way for

understanding the ways in which ideological content may be communicated when people

play video games.

This dissertation proposes a model to objectively dissect the video game as a

dynamic and interactive medium. The first half of the proposed model is a grammar of

video games, which consists primarily of terminological framework designed to elucidate

the content with which gamers work with and within as they play a video game. This

framework consists of objects, agents, commonly depicted interactions, commonly

depicted programmed responses, and video game scenes. The functionality of this

grammar is demonstrated through analysis of three games in the *Final Fantasy* series: *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X*.

The second half of the proposed model is a method for studying the rhetoric of video games. The primary rhetorical resources of video games are *orienting systems*, which include regulating configurations, embedded narratives, and social systems. Through these orienting systems gamers are encouraged to identify and cause player-controlled agents to interact. The functionality of this rhetoric of video games is once more demonstrated on three games in the *Final Fantasy* series.

In the final chapter this dissertation proposes that further examination of the grammar and rhetoric of video games can give video game scholars insight into the potential ideological allegiances of video games. This dissertation also concludes that video games may have strong allegiances to the postmodern ideologies.

For Judy and David.

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This manuscript reflects the coursework and professional influences that shaped me as a student at MSU, and those same influences that will continue to shape me as a professional in academia. Thus, my indebtedness and acknowledgements expand a bit beyond this document.

I would especially like to thank my dissertation chair, Dr. Kathleen Geissler. Throughout the writing of this dissertation her continual feedback and encouragement have been invaluable, and her guidance and encouragement throughout my studies at Michigan State University have helped to shape me into a professional academic. No doubt, this was not an easy task. Nevertheless, Dr. Geissler mentored me with genuine concern and tact, which made her an excellent adviser. I would also like to extend a special thanks to Dr. Danielle De Voss, who often reminded me of the value of my academic pursuits and listened patiently as I tried to express half-formulated ideas—not always dissertation related.

The contributions of others toward my successful completion of this dissertation and degree program are also notable. In my days as an undergraduate student at Michigan State University, Dr. Larry Landrum exposed me to literary theory in one of his senior level English courses. I distinctly remember struggling to understand and apply the theories he taught us to the texts we were reading in the class. It was this experience, and challenge, that prompted me to take several literary theory classes as a master's student at Ball State University and continue taking theory classes when I returned to MSU as a doctoral student. The first two courses I took were an American Studies methodology class with Dr. Dean Rehberger and a Media Arts theory class with Dr. Gretchen

PREFACE

I grew up with video games. In fact, at about the time that PONG invaded homes across America, I was just old enough to hold a video game controller. Of course, I was also small enough to have the controller ripped from my hands by older cousins vying for a spot on the floor in front of a small black and white television at my grandparents' house. As a child it seemed that I played video games everywhere I went. I played games on an Atari 2600 while at my parents' friends' house and Intellivision at another parents' friends' house. When my family went to the local roller rink, I watched the teenagers play arcade games--many of which I was still too short to play--and waited for my turn. I also played games with friends on one of the most popular personal computers of the 80's, the Commodore 64. It wasn't until 1986 that I had my first video game console. That summer I had managed to save enough money to buy a Sega Master System and asked my parents if they would go to the store and buy it for me. My parents not only came back with the system that I sent them to buy, but also brought back with them a stack of video games.[1] Since then, I have owned countless game consoles and personal computers. I am a gamer and cannot remember a time that I was not a gamer.

Accordingly, when I began thinking about what I wanted to write about in my dissertation, a video game related topic sounded like a great idea. As I am among the first generation of academics raised on video games, I thought that I might be able to bring a unique perspective to the existing discourse on video games. Plus, video game studies seemed particularly urgent in the world beyond the ivory tower. As Craig Anderson and

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[1] That night, my father who had been opposed to having a game console in the house, stayed up all night long playing video games. He missed work the next day so that he could catch up on missed sleep, and to my knowledge, has not played a video game since.

Karen Dill assert in "Video Games and Aggressive Thoughts, Feelings, and Behavior in the Laboratory and in Life," "the active nature of the learning environment of the video game suggests" that video games have a greater affective impact than "TV and movie media" and for this reason video games warrant immediate study.[2] Unfortunately, I quickly learned that the opportunity to study such a new medium did not come without a cost. Whereas I initially anticipated that the published literature on video games would be limited and manageable, when I began writing this dissertation, to my chagrin, I discovered otherwise.

Video game studies today are as methodologically diverse as cultural studies and draw from whatever disciplines seem to be useful. Unfortunately, as video game studies gain critical mass, the interdisciplinarity of video game studies is proving to be problematic. First, it is very difficult to find the most recent video game studies scholarship unless one is pointed in the right direction. Much of the current scholarship is published in a wide variety of journals, and many of the most recent and best essays are only available on the internet in published conference proceedings, in on-line journals, and through dedicated video game studies organizations. The difficulty of finding recent scholarship is worsened by that fact that, at the moment, there are (almost) no published collections of essays on video game studies and very few books on the subject. Of the currently published books, many focus only on violence/gender, or are otherwise problematic because they study the culture surrounding video games and not video games themselves. Because of the openness of video game studies to new theoretical approaches, there also seems to be a contingent of academics who enter video game studies without having actually played video games, or having played only one or two

[2] This study like many others focuses on violence.

games. These non-gamers often misrepresent video games or use obscure examples in their studies.

As more video game players come of age, the continual influx of new scholars, websites, conferences, and organization dedicated to studying video games has begun to correct these problems. Yet, it seems to me, as an academic and someone who has grown up playing video games, there is a greater problem. Like (popular) cultural studies, video game studies is still struggling to legitimate its object of study as worthy of academic attention. For example, given that video games "remediate" elements of several different media, video games are being studied as narrative text, cinematic text, and new media. While such studies reframe video games in terms of media that are already valued in academia, thus legitimizing the study of video games as a worthwhile academic endeavor, the application of theories designed for other mediums has resulted in studies that pervert the medium of the video game. When one subtracts the sum of canonized media from video games, there is often something left over—the difference is a profound amount of choice and interactivity. Indeed, most current video game studies only consider a handful of the individual images, essentialize the narrative, and then quickly digress to the world outside of the game. Almost no studies address the increasingly interactive and dynamic quality of video games and the varied content and narratives that result from different types of interactivity during game play--video games are treated as simple and static texts. This perversion of the medium has given academic studies of video games a poor reputation among gamers and game developers, and has prevented video games studies from developing critical understanding of video game content.

To be sure, representing one medium in the terms of another does facilitate analysis when no other alternatives are given. This transference of theory from one medium to another, however, also entails making choices about what content to discuss and what content to ignore, and whatever medium is being represented will be in some way distorted. This task is even more difficult when working with a medium whose content refuses to be pinned down, filtering it through the lens of film studies, or narrative studies, etc. and then translating it to prose. Indeed, as I began to study video games and present conference papers in preparation for writing the dissertation, I immediately noticed that while I had a lifetime's worth of knowledge about video games, I found it impossible to articulate what I knew and experienced. As a result, as I struggled to discuss video games, along the way I developed a terminology, grammar, and rhetoric, which combined what I knew about video games from experience with what I learned about video games from studying the scholarship. It then became possible for me to talk very specifically about video games in a way that, for me, captured the essence of the medium. As I proceeded to write my dissertation, I found that the best contribution that I could make to video game studies was not to study an individual game, as I had anticipated in my initial dissertation proposal, but to provide video game studies with a useable framework so that everyone can finally study video games themselves and not just the issues surrounding the games.

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VIDEO GAMES, VIDEO GAME TECHNOLOGY, AND VIDEO GAME STUDIES:
COMPLICATIONS DURING THE REBIRTH OF VIDEO GAMES

I believe in the recognition of devices as devices -- but I also believe in the reality

of those devices. In one century men choose to hide their conquests under

religion, in another under race. So you and I may recognize the fraudulence of the

device in both cases, but the fact remains that a man who has a sword run through

him because he will not become a Moslem or a Christian -- or who is lynched in

Mississippi or Zatembe because he is black -- is suffering the utter reality of that

device of conquest. And it is pointless to pretend that it doesn't exist merely

because it is a lie. (Hansberry 248)

Today an "estimated" 60% of Americans, "or about 145 million people, play

video games on a regular basis" ("Fair Play?"). According to Mark J.P. Wolf, people

"now spend more time in the interactive virtual world of games than they do in watching

movies or even television" ("The Medium"). Contrary to popular belief, adolescent boys

are not the only people playing video games. In addition to statistics that show that girls

now "make up 43% of PC players and 35% of console gamers" ("Girls and Video

Games"), researchers have also noted an increase in the penetration of video game

consoles in "urban areas" as well as an increase in the number of game consoles owned

by minority group members ("Comparing Generations"). It is also increasingly the case

that homes with video games are "wealthier and have fewer people in the household,"

which suggests that there is "a growing adult market for this entertainment medium"

("Comparing Generations"). Indeed, the Interactive Digital Software Association reports that the average video game player is now 28 years old ("Ten Facts"). It is no surprise then that video game sales have surpassed Hollywood box office sales and are quickly closing in on other forms of entertainment media such as movie rentals.[3]

Because of their popularity, video games constitute a significant portion of what Douglass Kellner has termed "media culture." In his book of the same name, Kellner asserts that for many Americans, "the fabric of everyday life" is woven from the "images, sounds, and spectacle" of popular media (1). The prominence of media in our lives has made it a popular site for "key social groups and competing political ideologies [to] struggle for dominance" (2). The result is that popular media, including video games, can potentially promote "racism, sexism, ageism, classism, and other forms of prejudice," or, conversely, "advance the interests of oppressed groups if it attacks such things" (4). This formulation is similar to that proposed by Cynthia Selfe and Richard Selfe in their essay "The Politics of the Interface: Power and Its Exercise in Electronic Contact Zones." In this essay the Selfes conclude that "computer interfaces," of which video games are a variety, present audiences with various "non-innocent" borders that "run the gamut from liberatory to oppressive." The implication of both of these studies is that video games are complicit in communicating ideologies, which as defined by Stuart Hall are "the mental frameworks -- the languages, the concepts, categories, imagery of thought, and the systems of representation -- which different classes and social groups deploy in order to make sense of, define, figure out and render intelligible the way society works" (26).[4]

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[3] In the year 2001 the video game industry made $9.3 billion while Hollywood box office sales only totaled $8.1 billion (Snider).

[4] In his book *Ideology*, Terry Eagleton list some other possible definitions of ideology currently in circulation:

Recognizing the ideological content of media culture, Kellner suggests that media patrons increase their "critical media literacy." Likewise, in order to combat the unthinking consumption of what they term "non-innocent" content, Cynthia and Dick Selfe encourage teachers and students to make themselves aware of the veiled connotative meanings inherent in computer interfaces. Unfortunately, the emerging discipline of video game studies has not been well equipped with frameworks to study video game content in its simultaneously formal, substantive, and interactive form, and attempts to study the ideological allegiances of video games often ignore the dynamic nature of video games and place an unwarranted premium on certain images or interactivity while ignoring others. Simply put, many studies are shallow, preferred readings.

As is elaborated throughout this chapter, the current state of video game studies is largely a side effect of the historical development of the medium. When video games first became popular, they were still a very unrealistic handful of colored pixels on a screen, with computer-generated beeps for sound effects, relatively simple interactivity, and a sparse or non-existent narrative. Consequently, the first studies of video games discussed the world outside of the game, which usually meant a discussion of psychological and sociological issues that resulted from interacting with video games. Current video game studies has its origins in these studies, and it makes sense that those who wished to study

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(a) the process of production of meaning, signs and values in social life; (b) a body of ideas characteristic of a particular social group or class; (c) ideas which help to legitimate a dominant political power; (d) false ideas which help to legitimate a dominant political power; (e) systematically distorted communication; (f) that which offers a position for a subject; (g) forms of thought motivated by social interests; (h) identity thinking; (i) socially necessary illusion; (j) the conjuncture of discourse and power; (k) the medium in which conscious social actors make sense of their world; (l) action-oriented sets of beliefs; (m) the confusion of linguistic and phenomenal reality; (n) semiotic closure; (o) the indispensable medium in which individuals live out their relations to a social structure; (p) the process whereby social life is converted to a natural reality. (Eagleton, *Ideology: An Introduction* 2)

ideology in video games likewise focused on select images and simple interactivity and then drew conclusions about the ideological allegiance of an individual video game from this simple analysis.

Granted, recent theorists such as Espen Aarseth and Gonzalo Frasca have encouraged scholars to study video games as dynamic interactive texts, and recent video game studies by Mark Wolf and Ted Friedman have proposed that the connection between identification and interactivity is an important site for "winning" a game, the production of narrative, and ultimately the communication of ideological content. Yet, no framework has been proposed to distill dynamic video game content or to articulate the intersection between identification, interaction, and ideology. The result is that our knowledge and understanding of ideological content in video games are still incomplete.

Accordingly, this dissertation develops a framework to help scholars elucidate the varied content of video games as well as the non-innocent "secondary production hidden in the process" of a video game's "utilization" that results from identifying and interacting in a dynamic virtual world (DeCerteau xiii). I propose that video game studies first needs a method, a terminological framework, for distilling complex and expansive video game content. Such a framework can help ensure that no content is ignored or disproportionably discussed. This framework, I assert, might fruitfully elucidate the objects, agents, commonly depicted interactions, commonly depicted programmed responses, and video game scenes, all of which constitute the substance of the game world, which I have termed the video game base. Secondly, I propose that although the content presented gamers during the course of a video game may differ depending on the choices a gamer makes, video games are rhetorically structured and video game scholars

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can study how identification and interactivity are encouraged. The second part of my

model for studying video games identifies several orienting systems within the video

game base that direct players' interactivity and suggests that studying these systems may

give us better insight into the ideological allegiances of a video game. My hope is that the

application of both parts of this model will generate a more accurate context for studying

video games and distilling ideological content. Throughout this dissertation I test both

parts of this model on three games in the *Final Fantasy* series, and in the final chapter of

this dissertation evaluate the effectiveness of this model.

The Development of Video Games

In the early sixties, Ralph Baer, designer of the text generation systems used by

mission control for the United States mission to the moon, began designing a system that

would allow people to play electronic games on their home televisions--something which

he had been thinking of since the birth of television ("100 Defining Moments").[5] He

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[5] Many histories of video games begin with Willy Higginbotham who created the game "Tennis for Two" in 1958. The game, which was displayed on a small oscilloscope screen, depicted a side view of a tennis court. Attached to the device was a paddle, a small box with a knob and button on it: "The knob controlled the angle of the player's return, and the button chose the moment of the hit. A player could hit the ball at any time, providing it was on his side of the net. Gravity, wind speed, and bounce were all portrayed" (Anderson).

Still other histories of video games begin in 1961 when Steve Russel and fellow hackers Alan Kotok, Peter Samson and Dan Edwards created the game *Spacewar* on a PDP-1 computer in a basement at the Massachusetts Institute of Technology ("100 Best Video Games"). According to Russel in a 1972 *Rolling Stone* article, the PDP-1 was an inexpensive computer that had a keyboard and tube display that allowed for what, at the time, could be considered complex graphics. As Bushnell had just finished reading a science fiction series by Doc Smith that included intergalactic pursuit, the group of hackers decided that spaceships were a fitting graphic for a game. Importantly, Russel noted "By picking a world which people weren't familiar with, we could alter a number of parameters of the world in the interests of making a good game and of making it possible to get it onto a computer" (Brand). After the invention of the game, because of the accessibility of the code, other hackers were able to add things to the game such as invisible mode, which made gameplay more exciting (Brand).

Nolan Bushnell is also usually mentioned in histories of the media. In 1971, Nolan Bushnell and some other collaborators made a self-contained, coin operated, electronic gaming machine for public use named *Computer Space*--what we would refer to today as an arcade game. Because it was difficult to play, the game never became popular. One year later Bushnell made another attempt at building an arcade game

developed the first home gaming system, appropriately named the Brown Box because of the brown simulated-wood-grain box in which the electronic components were enclosed, at Sanders and Associates in 1967 (Boyer 178).[6] The machine was demonstrated June 14th of that year and licensed in 1970 to Magnavox, which sold approximately one hundred thousand of these machines under the name of Odyssey 1TL200. Devices such as this that hooked to televisions became known as game consoles, and the games played on them became known as console games, or because the console transmitted a video signal to a television, video games ("Pong-Story").[7]

Compared to the standards of today, the graphics and audio of the first video games were all very simple, as was the interactivity. During the first decade of their existence (the seventies), video games largely consisted of simple, often achromatic[8] or monochromatic, images on a landscape of black displayed on a computer monitor, television screen, or alternate electronic display. Players could manipulate the horizontal and vertical (X and Y) screen location of select images using a variable switch (paddle), or other input device such as a joystick. These interactions not only had an effect on the object being controlled but also had a corresponding logical effect on other images (objects) that coexisted in the space displayed on the screen. In addition to moving objects, by pushing a designated button on the input device, the player of the game could also launch projectiles or issue other commands such as "jumping." This button push was

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with a much simpler game modeled on tennis--the game was *PONG*. With the success of *PONG*, Bushnell founded Atari, which he sold in 1976 for 28 million dollars. One year later, the Atari 2600 game console became wide spread across America ("100 Best Video Games"). Thus, in some ways Bushnell was involved in both the development of arcade games and the proliferation of game consoles.

[6] In addition to two hand-held input devices, Baer also modified a child's toy gun to work in conjunction with the machine. The connection to video games and violence seemed almost destined.

[7] In his foreword to Mark J.P. Wolf's book, *The Medium of the Video Game*, Ralph Baer gives a more complete and very concise account of his role in the development of video games.

[8] Zettl defines this as "totally desaturated colors (having no hue) that show up white, black, and various shades of gray" (361).

often accompanied by electronic beeps that imitated the literal sound[9] of the action being presented. In this virtual environment, players competed against other players, or against the machine itself, attempting to manipulate the objects in this world more successfully than one's opponent could. Defeating an opponent according to the rules of the game, or earning more points than he or she in a designated time limit, usually denoted victory.

Although video games in the early eighties such as *Pac-Man*, *Donkey Kong*, *Frogger*, and *Q-bert* were a bit more graphically and audibly advanced than the earlier *PONG*, players were given almost no choice as to how they interacted within the virtual world of the game, nor could they significantly alter the world. Consequently, what players saw, what they heard, and how they interacted within a game were almost assured so long as the player was indeed playing the game. Whether players had one point or ten thousand points, one life or ten lives, whether they progressed from the first level of the game to the second level, what they saw and experienced was what every other player saw and experienced. The primary difference between one played game and another was how far a player progressed and how many points he or she achieved. Thus, one player recounting the game could say little more than any other player except his or her score.[10] Accordingly, as Jay Bolter and Richard Grusin say in *Remediation: Understanding New Media*, because early video games only required players to guard against and defeat enemies, the ideology present in early video games was clearly to defend the status quo (93).

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[9] This is a "sound which refers to its original source" (Zettl 368). In other words, literal sound is a sound fittingly emitted by a being or object, such as a chirp from a bird.
[10] Lisbuth Klastrup discusses a similar point in her 2002 essay "A Virtual World Aesthetics: Theorizing Multi-User Textuality."

Despite the simplicity of early video games, because of their novelty, the home video game industry in the late seventies and early eighties boomed, particularly with the introduction of the Atari 2600. Unfortunately, in the corporate haste to capitalize on the popularity of this media, the early home video game market was plagued with several game consoles and games. As a result of little differentiation between games and a flooded market, in 1984 consumer interest waned and the home video game industry "imploded" ("Nintendo"). Stores were left with stacks of games at reduced prices, and for a while the home video game market seemed near death. Fortunately for gamers, in 1986 two Japanese companies, Sega and Nintendo, released powerful new game consoles capable of processing more complex games and displaying more colors than any game console previously released. The introduction of these machines revived "the dead video game market" ("Nintendo").

The Sega Master System, launched in June of 1986, was the more powerful and innovative of the two machines. The Master System, which boasted an 8-bit CPU, could display 32 simultaneous colors onscreen, out of 64 available colors, at a resolution of 256 x 192. The Master System could also accept two types of game media, game cartridges and game cards (although the latter never really caught on). The machine also had six games that could be played using 3-D Glasses (sold separately) that contained miniature LCD screens. According to the official Sega website, the console was a "massive hit in Europe and South America" especially in Brazil. It unfortunately did not do well in North America ("Sega Master System").[11]

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[11] Among the most popular games for this system were *Space Harrier*, *Shinobi*, *Alex Kidd in Miracle World*, *Phantasy Star* and *Sonic the Hedgehog*.

The other game console released that year, the Nintendo Entertainment System, was a small gray box with a flap on the front that could be lifted so that a cartridge could be inserted and then concealed. The Nintendo was notably different than the Sega and other previous game consoles which typically required that the cartridge be inserted in the top of the machine and remain visible during game play. The design of the Nintendo added a bit of mystique to the device. Yet, despite its cool appearance, the performance of the Nintendo could not match the performance of the Master System, nor was it as innovative ("Nintendo"). The NES, which also boasted an 8-bit CPU, could only display 16 simultaneous colors, of the 52 available colors, at a resolution of 256 x 240. In addition, the Nintendo could only accept one type of media,[12] the cartridge, and did not feature a cool 3d peripheral.[13] Yet, despite its technical inferiority, Nintendo's ad campaign in conjunction with consumer ignorance caused Americans to embrace the Nintendo.[14]

The introduction of Sega and Nintendo consoles and the development of quality games for these platforms rescued the home video game market and ushered in a new wave of technological advancement. Thus, the politics of what are popularly referred to as the console wars were established,[15] and the competition between these two companies, each vying for a larger market share than the other, stimulated a rapid development of video game hardware and software which has not yet ceased. As new hardware such as the Super Nintendo, Nintendo 64, and Nintendo Game Cube has been

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[12] The storage capabilities of the Nintendo cartridge were limited to about 256kb maximum, with many games being much smaller than this. The file for the dissertation is larger than most Nintendo games.

[13] To be fair to Nintendo, consumers could purchase an optional "Robbie the Robot" peripheral. Both game consoles also came standard with a light gun peripheral to use in conjunction with various hunting or law enforcement games.

[14] In Japan the machine was called the Famicom.

[15] From the very beginning there was competition in the video game industry, however not on the scale that it is today.

developed over the last two decades, the complexity and quality of video games has increased substantially. Today video games incorporate near life like graphics and spoken dialogue,[16] and activity is depicted with a simulated camera presence that makes video games similar to other narrative televisual media. Current video games can have running/playing times upwards of 120 hours, and can even continue infinitely. By the time players reach the end of a game they may have forgotten how the game began, and psychological closure at the end of a game is nearly impossible for players to achieve. To further complicate this, game players are presented with a number of options on how to tailor their individual gaming experience. For example, in games such as *SoCom Navy Seals*, a military special operations game for the Playstation 2, players can choose to play the game using either first person or third person camera perspectives. In addition, most recent video games present players with expansive spaces and allow them to interact in multiple ways within these spaces; this results in each player having a unique experience. For example, while the video game *Grand Theft Auto III* has a rather complex gangster narrative embedded, players may spend their time rescuing people with a stolen ambulance or giving people taxi-cab rides—players need never participate in the violent criminal portions of the game.

Indeed, scholars have pointed out the agency of gamers in shaping the text of the video game, and though it is acknowledged in some select writings, the agency of gamers has unfortunately not yet been incorporated in video game studies on a large scale. For example, in his book *Cybertext* Espen Aarseth discusses the ergodic (writerly) nature of such texts as video games. According to Aarseth, ergodic texts require audiences to shape

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[16] A good discussion of video game audio can be found in "Video Game Music: Not Just Kid Stuff" by Matthew Belinkie.

the text, or their experience of the text, from the content provided in the text.[17] In a more

recent essay "Computer Game Studies, Year One", Aarseth reiterates:

> Games are both object and process; they can't be read as texts or listened to as
>
> music, they must be played. Playing is integral, not coincidental like the
>
> appreciative reader or listener. The creative involvement is a necessary ingredient
>
> in the uses of games. The complex nature of simulations is such that a result can't
>
> be predicted beforehand; it can vary greatly depending on the player's luck, skill
>
> and creativity.

For Aarseth, games are "simulation" and "radically different" than "narratives as a

cognitive and communicative structure," and they demand to be studied on their own

terms. Similarly, Lisbeth Klastrup, who is interested in "story production" and "the

production of tellable events," builds on several of Aarseth's propositions and

summarizes this situation nicely. She says that "the permanent text producing objects"

such as complex gaming environments, combine with "the impermanent text producing

objects," such as the players, in order to produce "the impermanent text output object,"

which is the individual event in a game.

In short, as video games have become more technologically advanced, the

possibilities for interaction within the world of a video game have exponentially

increased, and players are allowed to shape their own game experience. The result is that

while early video games could be easily discussed and studied, it is much more difficult

to discuss and study recent games because the "played game" is different depending on

who is doing the playing. At the same time, as Mark J. P. Wolf points out in his 2001

book *The Medium of the Video Game*, the "complexity and depth" of video games "give

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[17] Ergodic cybertexts are different than hypertexts, which are typically linear in comparison.

the video game designer more opportunity to embody a message, world-view, or philosophy into a game." According to Wolf, the complexity of video games, correspondingly, makes video games "more difficult to study than traditional media" (4). In light of the profound amount of agency given players, and the potential for players to engage in excorporative game play, studying the ideological allegiances of video games is unquestionably difficult.

Video Game Studies

To date, most video game studies have been unable to come to terms with video games as they currently exist. Although quantitative, literary, cinematic, new media, psychological, sociological, and cultural approaches to studying video games have incrementally advanced our knowledge, they often present video games perverted with the bias of their disciplines, focus on one component or set of components of video games, and almost never acknowledge the agency of the gamer. As will be discussed in the remainder of this chapter, this has resulted in a stunted critical media literacy of video games and our inability to accurately discuss video games as ideological. Nearly every piece of video game scholarship to date talks *about* video games, and almost none of this scholarship actually studies an individual video game.[18]

Historical Studies

Historical studies of video games are perhaps the least biased and most accurate of any video game studies to date, and there have been several very good histories

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[18] In fact, if one were to compile all of the lines in video game studies that were actually about video game content, this could be done in one large volume.

published that chronicle the previously discussed development of video games.[19] Now in its third edition, and touted as one of the best histories, is Leonard Herman's book *Phoenix: The Fall & Rise of Videogames*. Although it is graphically simple and textually un-adventurous, the history is an accurate account of the development of video games.

There are several other popular histories of video games, each with individual strengths. *The Ultimate History of Video Games: From Pong to Pokemon* (2001) by Steven Kent, is particularly notable because it combines interviews, anecdotes, images, letters, and discussion of the greater cultural context of video games; this book is an artifact as much as a historical account. This book is a revised edition of Kent's previously published *The First Quarter: A 25-year History of Video Games*. Similarly, *High Score! The Illustrated History of Electronic Games* (2002) by Russell DeMaria and Johnny Lee Wilson incorporates images of package art, screenshots, advertisements, and just about every other piece of game ephemera with some interviews and commentary.

Lastly, in keeping with the trend toward the visual depiction of history, is a book titled *Game On*, which is based on an exhibit originally held in 2002 at the Barbican in London titled *Game On*. This book, compiled by Lucien King, collects the images of agents, machines, and ephemera from the exhibit in order to bring the exhibit to those who could not go to see it. There have also been a series of histories released that chronicle the exploits of one particular video game company. For example *Game Over: Press Start To Continue* (1999) by David Sheff and Andy Eddy chronicles the history of Nintendo's development.

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[19] This is in addition to the fact that almost every book on video games includes a bit of historical context.

Quantitative Studies

As already indicated, there have been many studies that focus on quantifying the age, race, and income of players, as well as others that focus on the financial success of the industry. More recently, quantitative video game studies have begun to respond to changes in the content and culture of video games, and topics such as gender and race are becoming increasingly common, particularly studies that take as their subject the number of male or female gamers, or the prevalence of race or gender depictions or images in video games.

Perhaps the most comprehensive study of such video game content was conducted in 2001 by the child advocacy group Children Now and titled "Fair Play? Violence, Gender and Race in Video Games." In this study researchers found that the female agents are noticeably absent in video games and account for only 16% of the agents ("Fair Play?").[20] Of those female agents depicted, researchers found that many fit stereotypical images and were "more likely to scream, wear revealing clothing and be nurturing" ("Fair Play?"). This study also found that eleven percent of female agents "had a very voluptuous body (i.e., very large breasts and a very small waist). Another 7% of female characters [agents] had either very thin or extremely disproportionate bodies, meaning that nearly 20% of female characters [agents] modeled unhealthy or unrealistic body sizes" (Fair Play?).

On the subject of race, the "Fair Play?" study revealed that white agents made up 56% of the agents in video games and the majority of the heroes. When members of other races were present in games, they were relegated to marginal roles or specific genres. For

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[20] One study conducted in 2000, "revealed that 92% of arcade games had no female roles, and of the 8% that did, 6% were 'damsels in distress,' and only 2% had active (rather than passive) roles" ("Girls and Video Games").

example, "African Americans and Latinos were typically athletes and Asian/Pacific Islanders were usually wrestlers or fighters." In this particular study of popular games, Latinas and Native American males were not present.

The study also took into consideration such features as rate of injury and language usage. For example, besides being the most likely to use profanity, African American males were physically harmed from attacks 61% of the time, which gave them the greatest pain threshold of any race. This fact seems positive until one considers the implication is that increased force is necessary when confronting African Americans ("Fair Play?").

No doubt, the results of quantitative studies are telling, or at least they appear to be telling, particularly regarding the ideological content that may be communicated to audiences. Indeed, we may look to these numbers and encourage consumers to be aware of what they are consuming. Yet, simply because the content is presented to gamers does not mean that they identify with the content--as some video game studies or politicians who use these numbers to sway voter opinion want us to think. This question of presence and identification will be more fully addressed in chapter four.

Literary Studies/ Film Studies/ New Media Studies/Ludology

With the introduction of more complex games in the mid-eighties, and the continued developments in the medium over the last decade and a half, a popular concern with video game content suddenly became practicable. As a result, many studies of video games have struggled to classify this medium and identify its relationship to other media.

The increased presence of text, cinema like graphics, dialogue, narrative, and interactivity

has resulted in video games being studied as literature, film, and eventually new media.

One popular focus has been on video games as interactive fiction, or as a

postmodern form of storytelling. The most notable text for video game studies on this

subject has been Janet Murray's 1997 *Hamlet on the Holodeck: The Future of Narrative

in Cyberspace*. In this book, Murray, who is an MIT Humanities Professor, explores the

changes and possibilities for narrative in the digital age, which includes discussion of

video games. More specifically, Murray discusses different types of narrative, their

historical development, transference to digital media, and the pleasures offered audiences

by the narrative. While a lot has changed in video games since Murray wrote this book,[21]

many of the issues she raised regarding narrative possibilities in the digital age are still

fundamental for understanding the different types of narrative in video games.

The increasing similarity and overlap between video games and cinema has also

attracted film studies scholars. As cultural theorist Julian Stallabrass notes in *Gargantua,*

the experience of playing a video game, which was once wholly unique, is being

"dominated" by the creep of cinematic genres.[22] The end of this transformation is that the

medium of the video game is "losing any sense of itself, becoming entirely subservient to

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[21] For example, Murray points out that because the agents in video games are not often developed this has made it difficult to "translate" them to film (51). She also speculates that "economic and social forces" will stunt the development of narrative in video games. While there is still some truth to these formulations, this has begun to change with a recent wave of crossovers between video games and film, such as *Tomb Raider*, *Resident Evil*, and *Final Fantasy*. Likewise, as will be demonstrated, narrative has not been stunted and is increasingly complex and developed in some video games. To her credit Murray also recognizes that she is theorizing about a very immature media and equates the infancy of digital video, and video games, with the "incunabula," texts produced before 1501, thus leaving room for further theorizing about narrative in digital media (25).

[22] When this book was originally published in 1996, cinematic qualities were just starting to become apparent and the major difficulty faced by designers was that interaction could not be combined easily with the cinematic qualities of the games. In the last decade this difficulty has been surmounted and some video games switch almost seamlessly between full motion video or cinema graphics and game-play.

the conventions of cinematic illusion" (86).[23] Stallabrass further remarks that video games are tending toward "the 'interactive movie'" (86). At the same time Stallabrass says that "cinema itself mimics virtual reality" and has been attempting from the outset to create the virtual experience that video games already provide (87). In this way, there is an exchange between video games and film. Accordingly, a recent collection of essays, *ScreenPlay: Cinema, Videogames, Interfaces*, edited by Geoff King and Tanya Krzywinska, explores the bond between film and video games and the continual conversation between the two media.

The Medium of the Video Game, edited by Mark J.P. Wolf, is a collection of essays on video games clearly influenced by film studies. In the book Wolf defines video games, includes brief histories of video games from both Steven Kent and Ralph Baer, discusses the multiple cultural significances of the media, and most importantly begins to sketch a framework for discussing space, time, and genre in video games. While Wolf begins the book by saying that video games warrant their own theory, he continues on to say that theories developed for film, television, and media studies work the best. Throughout the book he particularly applies film theory to video games in order to understand how space and time are structured. Wolf also makes an attempt to re-think the use of genre as a tool to categorize video games and suggests that genre classifications be made according to the types of interactivity within video games, and not the iconography, as is the case in film studies. From this perspective, Wolf names 42 different genres.

Wolf's effort to study video games is noble. He is one of the few academics

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[23] In a recent essay, "Computer Games Have Words, Too: Dialogue Conventions in *Final Fantasy VII*," Greg Smith elucidates the connection between film dialogue and the dialogue in video games. Smith particularly studies the "under appreciated importance of words" in video games and makes a case for studying them in addition to studying visual content.

studying the medium who has proposed a terminology and structure for distilling some video game content. At the same time, the heavy film jargon he uses may be a bit too thick to remember and redeploy for non-film scholars. Still, Wolf's book is a necessary text that begins to bridge the gap between film studies and the emerging field of video game studies.

New media studies also often incorporate discussions of video games. In their 1999 book *Remediation: Understanding New Media*, Jay Bolter and Richard Grusin propose that new media draws its power from playing with the cultural codes and conventions of prior media, what they call "remediation." In proving this, the pair discuss everything from the internet to video games, particularly focusing on the distinction between the transparent immediacy[24] of some media which ignore the message of the medium and the hypermediacy, as Marshal McLuhan might argue, of other media in which the "medium becomes the message." In the final chapters of their book, Bolter and Grusin expound on the complex relationship between image, knowledge, self, and physical bodies (254). One of their arguments is that through interaction with new media our formulation of self becomes a complex formulation of experiencing others' points of view and "virtual empathy" (247). Studies of identity, such as Bolter and Grusin's, provide an obvious segue into discussions of how the ideological content presented in video games affects audiences.[25]

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[24] In his 2000 book, *Visual Digital Culture: Play and Spectacle in New Media Genres*, Andrew Darley discusses the progress and effects of digital culture on other media forms and particularly the viewing habits of society. Through studying the technical accomplishments of films such as Forrest Gump, computer games, and simulation rides, Darley argues that the pleasure of viewing is now more closely linked to the form of the media than the inherent meaning of the content.

[25] Indeed, a popular concern of new media seems to be how people use media to re-form their images of self. Sherry Turkle's 1984 book, *The Second Self: Computers and the Human Spirit*, also ends with chapters on identity. This topic is also addressed in the 2002 book *New Screen Media: Cinema, Art, Narrative* by Martin Rieser and Andrea Zapp and *New Media: A Critical Introduction* by Dovey Lister, et

In *The Language of New Media* (2002) Lev Manovich, Associate Professor in the

Visual Arts Department, University of California San Diego, discusses new media in the

context of a greater media development and what distinguishes new media from its

former counterparts. Although he is not writing explicitly about video games, he

discusses video games several times, particularly the CD-ROM game as a type of digital

cinema. According to Manovich, the technical development of the hardware that makes

these games possible, "repeats the nineteenth century progression: from sequences of still

images (magic lantern slides presentations) to moving agents over static backgrounds (for

instance, in Reynaud's Praxinoscope Theater) to full motion (the Lumieres'

cinematograph)" (313). Today, according to Manovich, games "like *Myst*, and *7th Guest*

also evoke distinctly modern cinematic codes" (312). Like Wolf's book *The Medium of*

the Video Game, much of Manovich's book is influenced by film studies and focuses on

cinematic representation.

Although most new media studies consider many of the qualities that comprise a

video game, they also tend to incorporate some disciplinary bias. According to Espen

Aarseth in his 2000 essay "Computer Game Studies, Year One," classifying video games

as new media is problematic because under the guise of the "pseudo-field of 'new

media'" there is a continual push to "claim computer-based communication for 'visual

media studies.'" The problem Aarseth identifies with this is that "computer games are not

one medium, but many different media." This is an idea that Aarseth previously

developed in his 1997 *Cybertext: Perspectives on Ergodic Literature.*

In the beginning of this book, Aarseth introduces the terms *cybertext* and *ergodic.*

Cybertext is used to refer to a particular type of text that combines the medium of a text

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with the content in one inseparable unit. For example, one can read the story of the three bears from a book or hear someone tell it, and it remains virtually unchanged. Cybertexts cannot be separated from the medium in this way, since the medium is a crucial part of the message. Aarseth later adds that cybertexts are not confined by "aesthetics, thematics, history, or material technology" and may exist in multiple forms (5). The second term, *ergodic*, Aarseth says, refers to texts that require audiences to work[26] in order to get meaning from them; this is a requirement of most cybertexts. Throughout the book Aarseth discusses the narrative and ergodic qualities of several types of cybertexts, and in one chapter particularly focuses on adventure games such as *Adventure* and *Zork*. He points out in this chapter that adventure games are entirely different than anything currently produced and "must be judged on [their] own terms" (107).

Aarseth's work has been popular among video game scholars who want to distance video game studies from other disciplines. In particular, Aarseth has been well-received by scholars who purport to be studying video games from the fledgling discipline of Ludology (game studies) proposed by Gonzalo Frasca. Directly counter to those who study narrative in video games, ludologists focus on the rules underlying a game and the concept of play.

Psychological and Sociological Studies

In early video games there was not much content that could be analyzed, and psychological and sociological studies were particularly fitting. For example, Simon Gottschalk in his essay "Videology: Video-Games as Postmodern Sites/Sights of

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[26] Aarseth appropriates the term *ergodic* from physics, which derived the term from the Greek word *ergon*, meaning "to work."

Ideological Reproduction" lists several different psychological and sociological studies conducted during the infancy of video games. Gottschalk's list is indicative of the historical and present trends in psychological and sociological video game studies. He writes:

> There has been a considerable amount of research carried out by psychologists exploring various aspects of video-game playing. These include: the motivations behind their uses, their presumed addictive qualities, the cognitive strategies involved in the games, the pleasures they provide, and other various effects (Turkle 1984, Malone 1981, Greenfield 1984, Dominick 1984, Anderson and Ford 1986, Loftus and Loftus 1983, Morlock 1985, Graybill et al. 1985). Among sociologists, researchers have investigated the relation between the use of video-games and gender (Kaplan 1983, Kiesler 1983), personality and other demographic variables (McClure and Mears 1984), patterns of consumption (Panelas 1983), relationship with deviant behavior, sociability and academic performance (Ellis 1983), and family dynamics (Mitchell 1985).

The obvious focus of this research fell into two categories. The first was the ways in which players use video games. The second, more popular category was the affective impact that video games have on players. This second concern has traditionally taken the form of studies of the effects of violent content on gamers.

The most frequently cited psychologist/sociologist within this category of research is without a doubt MIT professor Sherry Turkle. Turkle's 1984 book *The Second Self: Computers and the Human Spirit*, explores the mental and social aspects of computer use including addiction and pleasure. Turkle's study, which was based on a six-

year study during the infancy of videogames, is one of the earliest and best known studies that addresses video game media. More recently, in 1995, Turkle published *Life on the Screen: Identity in the Age of the Internet.* In this book Turkle comments on how the computer-human relationship has altered our mental and social relationships and our perspective on the world, and expanded our definitions on what it means to be human and gendered.

Within psychological and sociological studies the most popular topic has been on the affective nature of violent video game content. As Bolter and Grusin assert, the concern with video game violence has likely resulted because new media such as video games have remediated other media, such as television and film, with which we were previously concerned (99). Accordingly, in the process of remediation we brought the popular concern for violence to video game studies. One popular theory among video game violence researchers is that video games teach players violent social scripts to re-enact in the world outside of the game. For example, according to video game researchers Anderson and Dill, the "enactment of aggression is largely based on knowledge structures (e.g., scripts, schemas) created by social learning processes." Because playing video games can teach players these social scripts, they predict that in the long-term, "as the player learns and practices new aggression-related scripts," aggression is more likely to surface "when real-life conflict situations arise." This same argument is also used to explain how video games may perpetuate oppression or liberation.

Yet the apparent violence exhibited by gamers may not be fully attributable to learned social scripts. In a 2001 study performed at Tohoku University in Japan, researchers found that the aggression that many theorists once thought stemmed from

violent social scripts is more aptly a result of underdeveloped minds. The study at Tohoku University, which analyzed the brain activity of teenagers playing video games compared to teenagers doing math, found that the students doing math stimulated and exercised the part of the brain that is associated with the control of aggression. Alternately, teenagers playing video games "stimulated activity in the parts of the brain associated with vision and movement" (McVeigh). The study suggests that a lack of stimulation to the parts of the brain that control aggression may cause violent behavior among teen video-gamers to more readily surface. Combined with the social script theory, the situation becomes even more ominous. Through playing games people not only learn social scripts to act out, but they also lack the control to contain their violent impulses.

Among video game violence researchers there have also been sub-categories of research focusing demographically on the intersection of violent video game content with the gender and age of players (Janushewski and Truong). According to Truong and Janushewski, studies of gender and violence revealed that, in part, because females were less exposed to video games they were "more affected by video game violence than males." Regarding age and violence, the findings were inconclusive; however, this study did find that children were more likely than other age groups to be violent after playing violent video games. Janushewski and Truong also find that "education levels and economic class have not yet been looked at."

Not surprisingly, much of the research on video games and violence has been criticized for being inaccurate. In a recent essay titled "Evaluating the Research on Violent Video Games," psychologist Jonathan Freedman surveys popular studies on

video games and violence and finds that "This body of research is not only extremely limited in terms of the number of relevant studies, but also suffers from many methodological problems." The transgressions range from "insufficient attention" to the games used, "no attention" given "to eliminating or at least minimizing experimenter demand," and "questionable" evaluations of the "measures of aggression" (Freedman). In a similarly negative pronouncement on video game violence research, social and organizational psychologist Jeffery Goldstein forecasts that continued studies do not promise to advance our knowledge on "whether violent video games cause real-life aggression" (Goldstein). Still, he says the topic of violence and video games remains popular, and he points out that research has--once again-- "begun to consider how and why people play (violent) video games."

In short, the assumption of psychological and sociological studies, particularly those concerned with violent content, is that video games affect audiences. As with other media, a second assumption is that the effect on audiences is negative. Psychological and sociological studies of violence and video games, for the most part, investigate whether video games encourage aggressive behavior, aggressive thought, or cause addiction, or they speculate about how violence shapes audiences and what the greater social consequences might be. Although there may be no scientific justification for these assumptions, these studies were prevalent during the infancy of video game studies and continue to be renewed with each new advance in video game technology. [27]

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[27] Regardless of the study, the sentiment toward violence and video games among researchers tends to be the same--violence in video games is bad. Amazingly, many gamers argue the contrary. If we understand media violence, particularly the violence that is present in video games from the perspective of writers such as Stephen King and Jan Harold Brunvard, perhaps these games serve a positive social function--the games are a means to release fears and violent tendencies. Avid gamers also quickly blame any negative correlations on bad parenting or mental dysfunction.

Cultural Studies

Of particular interest to this dissertation, academics have begun to make many more connections between the values of the world inside the game and the world outside the game besides violence. Because of their topics and methodological approaches, these studies can be considered cultural studies critiques of video games. Since children and young adults have an active part in consuming and shaping the current media culture, several books particularly worry about the messages that are being communicated to these gamers and how they are encouraged to act in response. Cultural studies of video games also focus on gender, the culture and pleasures of gaming, and ideology.

One of the earliest and best books on the subject of youth culture is Marsha Kinder's 1991 book, *Playing with Power in Movies, Television, and Video Games: From Muppet Babies to Teenage Mutant Ninja Turtles*. As with other studies of video games, in this book Kinder discusses video games and the crossover between cartoons, and movies. However, unlike other studies, Kinder proposes that television, movies, and video games combine in a triumverate to create what she terms a "supersystem" that encourages consumption and identification with the culture of consumption of late market global capitalism. The danger of this, as Kinder points out, is that as children are interpellated as consumers they may begin to identify with the gendered or other images depicted on the screen.[28]

The depiction of gender in video games has been of particular concern to Justine

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[28] Similar studies include Sue Howard's edited collection *Wired Up: Young People and the Electronic Media* (1998), which presents interviews, research, and discussion on electronic media, including video games, and the intersection between families, children, media, and leisure; and Julian Sefton-Green's edited collection *Digital Diversions: Youth Culture in the Age of Multimedia* (1998), which broaches this same subject by presenting an international collection of essays.

Cassell and Henry Jenkins, editors of the 1999 collection *From Barbie to Mortal Kombat: Gender and Computer Games*. Throughout this collection of essays, Cassell and Jenkins suggest problems in the current video game culture ranging from the quantity of female representations in video games to the way the current representations are presented; the two particularly fear the implications of a digital culture that is not inclusive of girls and women or that presents male biased images or types of interactivity. The collection also presents interviews with those in a position and with a desire to change the video game industry. The book concludes with some academic solutions to the problem; one in particular, contributed by Cassell, suggests that game designers give gamers more control over the games they play and how they wish to interact—which seems to be happening.

Of particular relevance to this dissertation is the essay, "Complete Freedom of Movement: Video Games as Gendered Play Spaces," contributed by Jenkins. In this essay Jenkins says that "Video game culture is not a world children construct for themselves but rather a world made by adult companies and sold to children." In fact, he notes much of the current video game culture reflects traditional boys' play culture, including the "boys' adventure story[s]" "of the 19th and early 20th century" in which the "protagonists struggle across an astonishingly eclectic range of landscapes — desserts, frozen wastelands, tropical rain forests, urban undergrounds — and encounter resistance from strange hybrids (who manage to be animal, machine, and savage all rolled into one)"(279). Accordingly, Jenkins fears that video games may reproduce the bias of the nineteenth and early twentieth century children's literature, which was responsible for "the development of gender-specific reading strategies" and the perpetuation of gender

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roles in which men are "risk" takers with stunted "psychological and emotional development," and women are "care" takers (277). To contest the perpetuation of debilitating ideologies communicated in the "blue and pink ghettos inside the play space," Jenkins promotes the development of games that "will provide common play spaces for girls and boys" or "a gender neutral space" (294).[29] [30]

Both J. C. Herz in *Joystick Nation: How Videogames Ate Our Quarters, Won Our Hearts, and Rewired Our Minds* (1997) and Stephen Poole in *Trigger Happy* (2000) have studied the video games with the intention of understanding what attracts players to them, among other things. In *Joystick Nation*, Herz frames her study historically, as well as in the context of how games are made, and proposes what individual pleasures may be found in different game genres. She ends the book by suggesting that video games help shape our identity and teach us how to interact in an increasingly chaotic and technologized world by reducing "all kinds of messy, uncontrollable situations to manageable proportions" (218). Similarly, in his book *Trigger Happy*, Steven Poole discusses the history of the video games and attempts to identify the pleasures, structure, and ideological underpinnings of different genres.[31]

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[29] Admittedly, Jenkins says that we do not know what gender neutral games may look like and "The danger may be that in such a space, gender differences are going to be more acutely felt, as boys and girls will be repelled from each other rather than drawn together."

[30] To his credit Jenkins also notes that girls do engage in the spaces created for male gamers and when they do so, "Girls may compete more directly and aggressively with boys in the video game arena than would ever have been possible in the real-world of backyard play." However, he also notes that when interacting in these environments, girls are "likely to encounter the misogynistic themes that mark boys' fantasies of separation from their mothers" (291). Bolter and Grusin also point out that video games may perpetuate the "sexually aggressive male gaze" (101).

[31] At the same time there are books like Arthur Asa Berger's recent book *Video Games: A Popular Culture Phenomenon* (2002) that covers several of the main topics in video game studies. Unfortunately, Berger's lack of knowledge about video games and clear catering to the popular media hype/bias which often surrounds video games has made many of his assertions seem uninformed or at least not fully thought out.

While these previously mentioned studies are relevant to this dissertation, perhaps the most important scholarship for this dissertation is that which attempts to directly address video games as ideological. Stallabrass, Jenkins, Friedman, and Gottschalk have all made direct arguments about the ideological content of video games, albeit often in the course of other discussions.

Julian Stallabrass in *Gargantua: Manufactured Mass Culture* (1996) likens the commodification of mass culture to the greedy, violent, and gigantic beast Gargantua. In his formulation, the commodification of culture has become so central that commodification dictates both the cultural artifact that is produced and how it is consumed. Moreover, the ideological content that is presented supports further consumption of mass culture. The chapter titled "Just Gaming"[32] Stallabrass discusses the economic and militaristic subtexts within video games, the relationship between space and time and game play, the politics of video game interfaces, and the creation of utopian or distopian worlds within games. At the same time he weaves through the discussion a continual commentary on the relationship between video games and other media, particularly cinema, and discusses points theorists might use as springboards for analysis.

In "Nintendo® and New World Travel Writing: A Dialogue," Henry Jenkins and Mary Fuller suggest that scholars approach video games not as an activity that aims to uncover narrative, as literature and film scholars would have us believe, but instead an activity that aims to uncover space. Particularly in the portions of the discussion contributed by Jenkins, he likens this process of uncovering new areas to explore as "the transformation of place into space" as discussed by De Certeau. At the end of "Nintendo® and New World Travel Writing," Jenkins raises the question of ideology,

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[32] This was also published in the *New Left Review* in 1993.

and proposes that because video games do not hinge on narrative, "ideology" does not function "through character [agent] identification but, rather, through role playing." This "need to venture onto unmapped terrain and to confront its primitive inhabitants," an activity which is no longer possible in the places outside of the game, is once again made possible by the video game which transforms children "into virtual colonists driven by a desire to master and control digital space."

Ted Friedman, Assistant Professor of Communication at Georgia State University, has written several essays that explore how players interact in simulation games such as *SimCity* and *Civilization* and the ideological subtexts of this interaction. As Friedman says in the beginning of the essay, "*Civilization* and Its Discontents: Simulation, Subjectivity, and Space" originally published in 1999 in *Discovering Discs: Transforming Space and Genre on CD-ROM*, video games "restructure perception" and cause players to "look at the world a little differently." The metaphorical example he gives is of a Tetris commercial that causes a child to "see everything as Tetris blocks." Friedman speculates that if we begin to view the world as a video game, this may cause us to "lose track of the human consequences of real-life violence and war."[33] On the other hand, Friedman points out that the affective nature of video games might make it easier for people to see the interconnectedness of society; the example he gives is of *SimCity*. After playing this game, players might view their neighborhoods not at isolated communities, but as a part of a complex, greater system.

Unfortunately, although each video game may present a different way of seeing, Friedman argues that beneath the surface still lies "familiar ideological baggage" and

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[33] Paolo Palladino says something similar in "We Are Not Playing Some Stupid Arcade Game: War in the Age of the Videogame."

"very old presumptions about how the world works." In the case of *SimCity*, Friedman

argues that "the political and economic premises it rests on are conventionally capitalist,

if somewhat liberal." In *Civilization II* on the other hand, the "gaming experience does

allow for variant interpretations." Players can deploy several strategies for "winning" the

game, which include "making war, wiping the other civilization off the map and taking

over the world," or "becoming the first civilization to colonize another planet." Yet

underneath each victory lie "ideological assumptions[34] which determine which strategies

will win and which will lose. And underlying the entire structure of the game, of course,

is the notion that global co-existence is a matter of winning or losing."

Lastly, in his essay "Videology: Video-Games as Postmodern Sites/Sights of

Ideological Reproduction," originally published in *Symbolic Interaction* in 1995, Simon

Gottshcalk discusses video games in their postmodern context and proposes eight

different categories[35] of ideological organization that can be identified. The culmination

of Gottshalk's eight categories is a "videology" that both "amplifies several cultural

orientations" and "expresses" the "themes" of "postmodern culture and consciousness."

He ultimately comes to the conclusion that video games may not be in clear ideological

opposition to the world outside of the game as John Fiske earlier proposed in his 1989

book *Reading the Popular*. Unfortunately, Gottschalk admittedly came to these

conclusions from observing gameplay in arcades in Las Vegas. This is problematic

because not only is this "videology" dated, but it is also based on a form of gaming that is

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[34] In the "Semiotics of *SimCity*" Friedman says, "Computer programs, like all texts, will always be ideological constructions. The fear of some critics of computer games, though, is that technology may mask the constructedness of any simulation."

[35] In short Gottschalk's eight categories reveal that: (1) violence organizes video games, (2) "the other is always violent," (3) the violence is preferentially an individual undertaking, (4) women are depicted as "helpless," (5) drugs are unacceptable, (6) there is an intertextual relationship between video games and other media, (7) game play can be thought of as a "hyper-simulation" that wholly consumes the gamer, and lastly, (8) gamers find pleasure in discovering the order beneath the chaos of the game.

nearing extinction--though somewhat revived in cybercafes. More problematically, Gottschalk does not give us a framework for distilling the "videology" of current video games. The best that we can take from Gottschalk's analysis is the hope that maybe some of the eight commonplaces he identified are still present, and perhaps there is still a connection to postmodern culture.

The Problem

To be sure there is a difference between video game studies that discuss the context of a video game, which includes the historical significance, psychological or sociological effects, and cultural situatedness of the medium, and video game studies that aim to analyze the particulars of the medium itself, which include literary studies, film studies, and new media studies. In between these paradigms there are studies at the intersection that elucidate the conversation between the medium and the context. While all of these are well intentioned and attempt to make a valuable contribution, it is a basic premise of this dissertation that there have been too few studies of the medium itself to make any definitive statements about the connection between the content of the medium and the context in which the games exist. In other words, before we can fully understand how the medium works in a context and the conversation the medium has with the context, we must understand the medium.

Like cultural studies scholars, each academic who studies video games works within his or her respective disciplines and borrows from the language and methods of that discipline. Of course this interdisciplinarity has resulted in a wonderful array of studies. Indeed, scholars such as Stallabrass, Jenkins, Aarseth, Murray, Turkle, Kent, etc.

have all helped to redefine our understanding of what video games are and how players interact with them and have begun to uncover the ideological content presented to gamers.

Unfortunately, the interdisciplinary nature of video game studies has also caused disciplinary biases to be manifested in video game studies. For example: the underlying assumption of most psychological studies of video games is that gamers unwittingly consume and are affected by video game content as they interact with the games; quantitative studies of video games, through selection and the use of percentages often make insignificant content seem significant; literary studies of video games prize the textual or narrative qualities and ignore the visual and audio components; similarly, film studies of video games often prize the visual and narrative components over the audio and interactive components, and lastly cultural studies have granted agency to the youth in shaping media culture, but not in consuming media culture, and have tended to present the ideological content of video games as immutable.

Not only does the interdisciplinary openness of video games studies create a hypertrophy of certain video game content, but as academics read and rally against academics from other disciplines, an antagonistic discourse community is also created. No doubt, the interdisciplinary nature of video game studies has also caused a lot of confusion and wasted effort. It is not uncommon for video game scholars to misunderstand one another, propose what has already been proposed only in different terms, and in general struggle to communicate their ideas about video games.

Most problematic, two decades and several game consoles after the rebirth of video games, the lack of a common terminology combined with disciplinary biases has

prohibited an honest assessment of the medium of the video game in its dynamic multi-media entirety. In short, we do not have a comprehensive understanding of the greater structure of video games, nor have we begun to formulate how the content of a video game encourages players to identify, interact, and shape the video games they play. Most astonishingly, with no unified theory of video games, the relative significance of, and relationships between, current video game studies cannot be easily adjudicated. As a consequence, those new to video game studies are presented with no alternative but to approach video games from within their current discipline, or learn a little psychology, film theory, literary theory, cultural studies, etc. In other words, the failure of video game studies to develop a center perpetuates its dysfunction by not providing newcomers with any starting point. In this dissertation I propose a model to elucidate video games as expansive, potential, dynamic texts and distill how gamers are encouraged to identify and act within the virtual worlds presented them in video games. This model includes a common terminology, grammar, and rhetoric of video games—all of which are lacking in video game studies.

Accordingly, the second chapter of this dissertation suggests a terminological framework for dissecting video games. I point out that video games are complex media texts that, like writerly texts, do not have meaning guaranteed; they are at best collections of sights and sounds with immense potential for players to make meaning through interactivity. I argue that scholars must consider the actuality of the game world as it is presented to players as a dynamic space and propose that the content of a video game, what I term the video game base, be divided into objects, agents, commonly depicted interactions, commonly depicted programmed responses, and video game scenes. I define

each of these terms, connect the origins and various focuses of each term to current video game studies, and in the end of the chapter propose that we use these terms to formulate a grammar of video games.

In the third chapter, the popular video game series *Final Fantasy* is introduced, and I use three games in this series to test my proposed model for elucidating video game content: *Final Fantasy, Final Fantasy VII*, and *Final Fantasy X*. I begin the discussion of each game with a brief overview of the technology that made game play possible and particularly note the connection this technology had to the development of dynamic and interactive virtual spaces within each game. I then present several charts that catalog the contents of the video game base of each game; these charts demonstrate the functionality of the proposed grammar for distilling the most significant content of a video game. As each chart is presented, I comment in the text of the chapter on the different types of video game studies that might be suggested by this content, thus reuniting my model with interdisciplinary video game studies.

Because video games are interactive, and the content that a gamer sees, hears, or feels while playing a video game depends on this interactivity, in order to study the ideological implications of an entire game, video game studies must also consider how gamers are encouraged by the video game base to identify with and act within the world of the game. In the fourth chapter I propose that video games are rhetorical and encourage specific types of identification and then interaction, which in turn yield the revelation of specific content. The main argument of the this chapter is that video games function largely through utilizing orienting systems, of which I identify three: regulatory configurations, embedded narrative, and social systems. Once these orienting systems

have been identified within a particular game, one can speculate with more authority about the content that may be presented as the game is played. More importantly, the identification and action induced by these orienting systems may be studied as the key site where gamers are ideologically interpellated.

This second part of my proposed model for video game studies, which I refer to as a rhetoric because its main emphasis is to explain how gamers are induced to identify and act, is tested in the fifth chapter of this dissertation. In the fifth chapter I draw on the previously discussed video game base of the three games in the *Final Fantasy* series, and identify the orienting systems in each game and show how gamers might be encouraged to act within these systems.

The final chapter of this dissertation evaluates the effectiveness of the proposed grammar and rhetoric for studying video games and advancing video game studies, particularly our knowledge of the intersection between ideology and video games. I conclude that while this model provides a good platform for analyzing ideological content, we might also consider the cultural situatedness of a video game, the resulting text of an "already played video game," and the possible ideological allegiances of the "already played video game."

CHAPTER 2

A GRAMMAR OF VIDEO GAMES: A TERMINOLOGICAL FRAMEWORK FOR DISSECTING AND DISCUSSING VIDEO GAMES

Whereas games in the early eighties consisted of a handful of colored pixels on a screen with a relatively simple or nonexistent narrative and beeps for sound effects, beginning in the mid-eighties, with games released for the Nintendo Entertainment System and Sega Master System, this was no longer the case. At this time, video games began to present players with complex graphics, audio, and several lines of scripted text. As a result of the competition for market share that ensued after the introduction of these machines, two decades later current video games incorporate lifelike audio, near lifelike graphics, narratives that potentially span over 100 hours, and complex interactivity. In light of the expansive nature of video games, the individual interactivity of how a gamer plays a game and the individual utterance of the played game that results cannot be assumed. In many games, the act of playing the game has become an act of choosing which content will surface and authoring what I have termed the "already played video game." Unfortunately, video game studies have not formulated a way to objectively dissect video game content and discuss video games as a dynamic medium. As the technology marches on, and the games become more complex, our inability to re-present the complexity of the medium of the video game is becoming increasingly apparent.

Discussing video game content is problematic because defining the parameters of what constitutes video game content might vary depending on the theoretical perspective from which a scholar approaches content. Given the focus of the current video game studies, the most inclusive yet focused definition of video game content must incorporate

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the material, formal, and interactive components of the medium of the video game. Material content is that which is depicted on the screen; it is that which in the world outside of the game would be referred to as matter. Functioning as matter within the world of the game, material content has both substance and takes up space. Examples of material content are trees, cars, and clouds. Formal content is the way in which this material content is presented to an audience; this may include location on the screen, camera perspective, special relationship to other objects, and graphic quality of the depiction. Formal content is important because form affects the way in which an audience perceives the material content. Lastly, interactive content is the potential of audiences to manipulate both the matter and/or the form in a video game. Audiences may interact with a video game in such a way as to combine material content, destroy material content, change the location of material content, or even change the camera perspective from which the material content is viewed. While video game studies have attempted to study components of each type of this content, these attempts, in comparison with the number of studies that focus on the context of a video game, are minimal.

Furthermore, matter, form, and interactive potential are presented simultaneously in a video game and are inseparably linked to one another; to discuss one necessarily raises questions about the nature of the other two. As it is nearly impossible to divorce these three types of content from one another, it seems foolish to propose a model for video game studies that does this. Henceforth, I will not make a distinction between these three terms and will refer to this triumvirate simply as video game content. At the same, time in proposing my model I make subtle reference to each of these types of content,

especially so that current video game studies can locate themselves in relation to the model that I propose.

In this chapter I propose that discussing video games in their dynamic entirety is possible. The development of such a model might begin by understanding that there are limits to the expansiveness of video games, and that gamers, like humans in the real world, do not make the initial conditions of their own existence.[36] Instead, gamers can only interact within the constraints of the system that they find at hand. As Henry Jenkins says in "Complete Freedom of Movement," "players can only exploit built-in affordances and pre-programmed pathways" (Jenkins).[37] Thus, in order to understand video game content as dynamic we must first understand the reality from which players construct their individually played game text--what I have termed the video game base.[38] After all, this base is the only thing that is static about the media.

Of course there have been several scholars that have commented briefly on the deep structure of video games, and considering what these scholars have said may provide some insight into the key components of the video game base that need to be considered when formulating a terminology and grammar. The two models that I will refer to most in this chapter are those presented by Espen Aarseth in his book *Cybertext: Perspectives on Ergodic Literature* and the model proposed by Janet Murray in her book *Hamlet on the Hollodeck*. Aarseth's discussion of his model spans only seven short

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[36] While deliberating about the nature of authorship in digital environments, Janet Murray discusses this issue in *Hamlet on the Holodeck* (152).

[37] More technologically advanced gamers can purchase software that alters the game program and allows gamers to exploit a game in ways not intended by its creators. Two popular devices are the *Game Genie* and the *Game Shark*. Computer gamers can also install special software that allows them to change the game graphically by changing agents appearances or environments. One of the most popular of these was called *Nude Raider*, which made the popular Lara Croft agent appear topless.

[38] Similarly Marx said "Man makes his own history, but he does not make it out of the whole cloth; he does not make it out of conditions chosen by himself, but out of such as he finds close at hand." Marx referred to these conditions as the base.

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paragraphs and was provided by Aarseth in order to give readers of his book a "generalized conceptualization of a typical, but advanced, adventure game" (103). Accordingly, Aarseth's model is not very complex, nor was it intended to be. In Aarseth's model, a "user" sends input through the "interface" of the game to a "simulation engine," which "calculates" a user's input according to the guidelines of a "database." Aarseth divides the "database" into things such as world rules, characters, other objects, and a world map. The "simulation engine," after referencing the "database," sends this output to the "representation engine," which can either send events to the interface according to the user input or send events to the interface according to programmed "system events" that occur when a specific condition is met.

Similarly, in her book *Hamlet on the Hollodeck*, Janet Murray briefly identifies and comments on "The Four Essential Properties of Digital Environments" (71). Within her model Murray makes two major divisions and proposes that the properties of digital environments, of which video games are one example, can be divided into interactive and immersive properties. Interactive properties can be further divided into procedural and participatory properties. Digital texts are procedural in that they give programmed responses to user input, and participatory in that they require human input. Immersive qualities can be divided into spatial properties and encyclopedic properties. Spatial properties create for users a sense of space in which to navigate, and encyclopedic properties present users with a huge quantity of content with which to interact (71).

The model I propose in this chapter is an attempt to apply the earlier models of Aarseth and Murray directly to video games, as opposed to the more generic cybertexts or digital environments for which these models were designed. I refine these models by

amending them with the terminology and insight presented in video game scholarship and my observations of the video game medium. The grammar of video games I propose in this chapter is also noticeably influenced by the grammar of motives proposed by Kenneth Burke in his book of the same name. In this book Burke states that in any situation we "must have":

> some word that names the act (names what took place, in thought or deed), and another that names the scene (the back-ground of the act, the situation in which it occurred); also, you must indicate what person or kind of person (agent) performed the act, what means or instrument he used (agency), and the purpose. (X)

In *A Grammar of Motives* Burke elaborates on each of these five components, popularly referred to as Burke's pentad: act, scene, agent, agency, and purpose. More importantly, because each element of the pentad has a corresponding effect on other elements of the pentad, Burke asserts that investigation of each term cannot be isolated from investigation of the other terms. Throughout the book he refers to the relationships between terms as ratios, and "inquire[s] into the purely internal relationships which the five terms bear to one another" (xi).

The grammar of video games proposed in this chapter functions similarly to Burke's grammar. The terminological framework I propose in the beginning of the chapter is an easy way to name the essential components of a video game, and in the end of the chapter I propose that the significance of each component needs to be considered in relationship to the other components. More specifically, after briefly analyzing

disciplinary commonplaces from past video game studies, in this chapter I propose that

the video game base typically includes:

(1) *Objects*-- particular functions in the world of a video game assigned to a word,

image, or sound in the video game.

(2) *Agents*-- entities that directly act within the game world to make things

happen;

(3) *Commonly Depicted Interactions*-- the depictions of agents interacting with

and within the world of the video game.

(4) *Commonly Depicted Programmed Responses*--the depictions of responses the

game executes when specific conditions are met.

(5) *Video Game Scenes*-- the virtual world of the video game created through the

combination of objects, agents, interaction, programmed responses, and non-

literal audio elements.

Throughout this chapter each of these categories is further subdivided into more specific

terms. The sum total of all these commonplaces comes together to create an amazingly

complex virtual world in which players may interact. In order to facilitate understanding

each of these terms, the various subdivisions that I make within each category, and the

connections between them, in this chapter I also provide several charts. The solid lines

and arrows on each chart point to divisions of content, while the dotted lines with hollow

arrows trace the input and output of data. During the course of discussing each term I

focus solely on defining and classifying the term and provide the representative chart as a

visual aid; I do not discuss the input and output features. After I have finished discussing

all of these terms, I combine the individual charts into a single chart, in which the flow of

data connects the various components. It is at this time that I discuss the input and output, and various connections between elements of the video game base. I also propose the various elements constitute a grammar of video games.

It is my hope that the terminology and grammar proposed in this chapter will facilitate discourse in video game studies by providing video game scholars with a common language and structure for conceptualizing video games as a dynamic media. Use of this proposed model to study an individual game might also help video game scholars understand the significance of the varied content of that game, as well as what different methodologies might be effective for studying the game (this is discussed extensively in the third chapter). In particular, once the content of a video game base is objectively distilled, the ideological content of that video game can be studied using theoretical approaches ranging from Marxism to feminism. In the exposition of the video game base I also point out that each of these components has the potential to transmit ideology; yet, in the text that follows I do not propose a methodology for studying ideology imparted by each of these components--as this is not the emphasis here. The task at hand is more aptly an exposition of the video game base and a derivation of a terminology that may usefully provide a framework for dissecting video game content and formulating a grammar of video games. This terminological framework will also be referenced in the fourth chapter in which I discuss how the content of the video game base is used to encourage identification and motivate action.

Objects

The data of video games, according to Aarseth, may consist of objects, characters, and space. Accordingly, the first two parts of my framework consider these elements, and particularly strive to define the various types of content and distinctions that can be made within this content.

The definition of objects that I propose is informed by computer programming. In computer programming objects are not visual elements, but rather functions. Objects are a set of parameters for behavior and sometimes assigned to the set of parameters is a specific image (sprite, icon, etc.). For example, in a video game program an object (set of parameters) might denote that anything that comes in contact with the representation of the object will be brought to a standstill. This object may be represented in the actualized video game world with the image of a rock, for example. However, the image of a brick wall, or giant marshmallow or even a word could equally be assigned to this object, and the parameters of the object might equally dictate that anything that comes in contact with the object will bounce off and reverse direction. In recent games these objects may also be accompanied by literal sounds as well; for example, a stream may look, sound, and respond to interaction as running water might be expected to respond. In *Hamlet on the Hollodeck*, Murray discusses the video game *Zork* as one of the earliest video games that utilized object oriented programming. In *Zork*, objects were simply words linked to a set of functions. But at the time, compared to programs based on a more binary logic, the concept of objects that had their own parameters independent of the greater program was a breakthrough.

As depicted on Figure 2.1, I have identified three primary functions that objects

typically serve in video games, and accordingly made further subdivisions within each

category. The three primary categories of objects are ambient objects, facilitating objects,

and agents—which will be discussed separately in the next section. Ambient objects are

often the most numerous of any objects in a video game, and their primary function is to

give definition to a particular space by drawing on socially shared conventions.
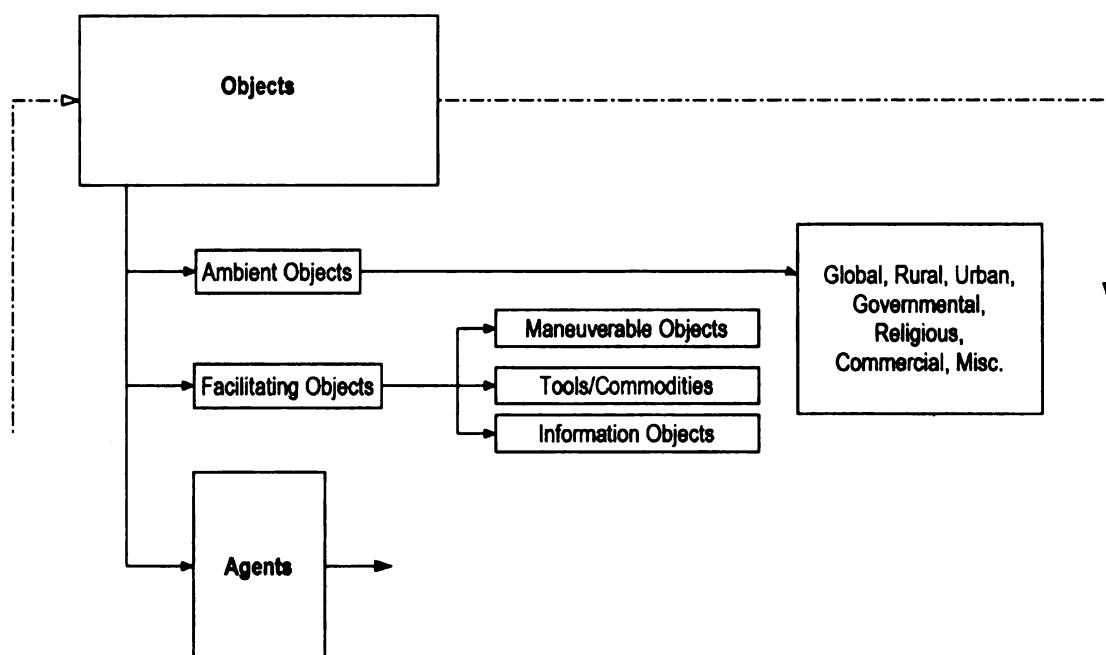
Figure 2.1: Objects

In early video games the environment for interaction created in the limitless space

of the virtual was denoted by a handful of colors, usually one to simulate the ground and

one to simulate the sky. Conventions borrowed from other media dictated that black

backgrounds often denoted outer space, as in the game *Spacewar,* or nighttime, as in the

game *Night Driver.* Backgrounds that were blue denoted daytime or water, as in the game

Fishing Derby. Thus, the space of early video games was relatively simple. Of course in

some video games space is still denoted by color, or unchanging background images. However, with the increased technological capabilities of modern hardware these spaces are increasingly complex and filled with ambient objects such as mountains, buildings, flags, and chairs. These objects do not often exist independently of one another, and a primary function of ambient objects is to combine to create different environments within a video game. For example, for many people the image of a couch is the defining object of a living room environment. When a couch is joined with paintings, a television, and reclining chair the living room environment is even more solidified.

In other words, the location where the game takes place is no longer simply space, but a complex aesthetic environment created through the intentional placement of ambient objects; the space in video games is for the first time beginning to manifest the meaning of the term *virtual world*. As Jenkins says, the push of the "video game industry" is to create "more graphically complex, more visually engaging, more three-dimensionally rendered spaces, and towards quicker, more sophisticated, more flexible interactions with those spaces" (Fuller and Jenkins). Because environments are as numerous as they are in the world outside of the game, a shorthand for referring to environments might be useful for discussing them. I have found that ambient objects typically combine to create global, rural, urban, governmental, religious, commercial, residential, and miscellaneous environments, which may include environments such as entertainment arenas. Of course within these categories there can be several other more specific environments.

The second function of an object is to allow agents to interact with other agents or other objects. I have termed these objects facilitating objects, and subdivided these

objects again according to more specific functions. The first category of facilitating objects is maneuverable objects. These objects facilitate or hinder maneuvering in the world of a game, such as the motorcycle in *Alex Kidd in Miracle World*, or the X-Wing fighter in *Star Wars: Rogue Leader*. As will be discussed in the next section, maneuverable objects often become agents. The second category of facilitating objects is tools/commodities, which are objects that are used to perform other actions within the world of game or sustain life. Good examples of tools/commodities are the various guns in *SoCom*, or the golf clubs in *Hot Shots Golf*. The last category of facilitating objects is information objects, which communicate information about the world of the game or allow gamers to manipulate information within the world of the game. These include objects such as the Al Behd Primers in *Final Fantasy X* or the computer terminals in *Metal Gear Solid 2: The Son's of Liberty*. Of course, some objects have a dual function, such as maneuvering and interacting with other agents. An example of this might be a car equipped with guns such as one finds in the game *Twisted Metal*. The car is used both to maneuver and to shoot at other objects.

The existence of objects, and the subcategory of agents in video games, suggests two avenues for the study of video games. First, it suggests that we classify objects according to function. Secondly, it reminds us that the images or words chosen to represent an object are not fixed and are instead chosen by a video game designer/programmer, which makes understanding the connection between object and image an important site to study the communication of ideology.

Agents

Perhaps the most frequently discussed and analyzed objects in the video game base are those objects that actively interact within the game world to make things happen. Instead of *actor*, or the popular term *character*[39] the term I use to refer to these objects is *agent*. I do so because the term actor brings with it the meaning of role playing or pretending; and although in many cases this may beaccurate, this term also prescribes the ways that players might interact in the world of a game and potentially blinds us to other possibilities for interactivity. Likewise, the term *character* is imprecise because it denotes life and personality. While active objects in video games often take the form of humans, animals, aliens, or robots, they sometimes also take the form of inanimate objects such as marbles or tubes of toothpaste, which are not living and rarely express character.[40] Accordingly, the term *agents* seems to be less burdened with other meanings. Agents are mediators or representatives for some other institution or being, and the word has the connotations of some control from beyond without being burdened by alternate definitions and connotations.

In discussing the agents in the video game base, gamers have already made the terminological distinction between those agents that are controlled by a player in a video game and those agents that are not.[41] The terms already given to this distinction are appropriately "player-controlled" and "non player-controlled." Accordingly, player-controlled agents are usually assigned or chosen at the beginning of the game. Because

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[39] Gamers often use the term *player-controlled character*, and Mark Wolf, author of the *Medium of the Video Game*, also uses the term *player character* in chapter four of his book.

[40] Klastrup divides agents into Players, Non Player-controlled Characters, Objects, and World Rules.

[41] Jens Jensen, who studies "Virtual Inhabited 3D-Worlds," makes the distinction between avatars, autonomous agents, and users. In this formulation the primary distinction between avatars and autonomous agents is the control of the user. While this is a valid distinction to make, I do not believe that it necessitates invoking a distinct term. If anything, Jensen might have simply used the term non-autonomous agents.

players can control the movement and action of these agents, it is usually assumed that player-controlled agents are often the agents with which game players identify, much in the same way readers identify with a narrator. In addition, the simulated camera presence in some video games may adopt the "point of view" of a player-controlled agent, this is a common film technique that can further "make the audience associate with what the character [agent] sees and feels" (Zettl 370). Because gamers are often sutured to player-controlled agents, these agents have become an important site for analysis.
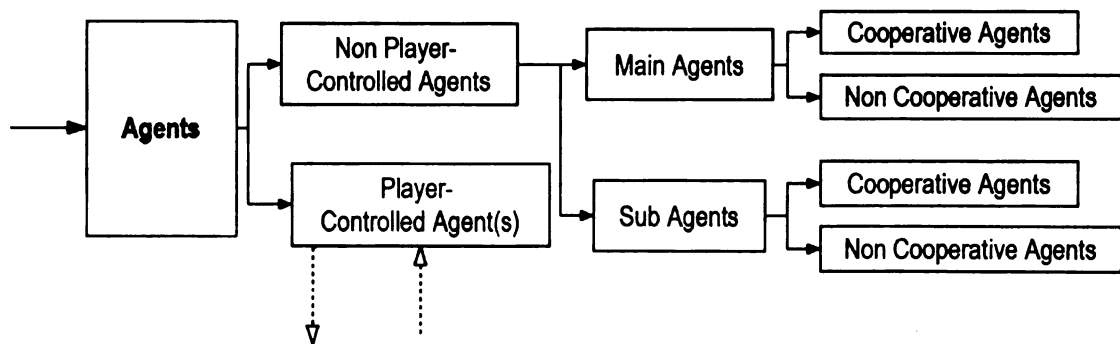
Figure 2.2: Agents

Conversely, non player-controlled agents are those agents controlled by the computer. In early video games the number of non player-controlled agents could be counted on one or two hands. Within early video games the non-player-controlled agents were usually depicted with little variation from one another and were for the most part uncooperative. These agents physically attacked player-controlled agents, usually with no justification for doing so. In the games that emerged in the later half of the eighties the numbers of non-player-controlled agents in one game could number well over on hundred, each often having a distinct appearance and capabilities.

However, while there may be hundreds of non-player-controlled agents in current video games, not all agents are as significant in the structure of the game as others. Many non-player-controlled agents are as significant as a mosquito on one's arm—they are quickly dismissed as an annoyance and little thought is given to them. On the other hand, some non-player-controlled agents have as significant a role in a video game as a player-controlled agent.

Accordingly, two more distinctions can be made based on these observations. The first is that a distinction can also be made between main agents and sub agents. Main agents are agents whose actions, dialogue, or presence directly influence the interactivity of agents or are significant for the revelation of narrative. Non-main agents are agents whose contributions are, for the most part, inconsequential—the game would be substantially the same if they were removed. For example, in *Super Mario Brothers* the main player-controlled agent Mario quickly dismisses with Koopa Troopers; however, King Koopa, who kidnapped princess Toadstool and provided the impetus for the game, is a much more formidable enemy. Players might not notice if one or two Koopa Troopers were removed; however, they would notice if King Koopa and the princess were missing from the end of the game. As video games have become more expansive, the distinctions between main and subagents have become more apparent.

In early video games non-player-controlled agents were largely non-cooperative and were the enemies that tried to kill player-controlled agents. This continues to be true of many current video games, and as Gottshalk points out, "the enemies/others are depicted as 'natives' or 'terrorists'" or "hostile chiefs of state and their malevolent cronies implicated in hostage-taking or drug-smuggling activities." However, while many

of these non-player-controlled agents are uncooperative, since the late eighties there has been an increasing number of cooperative non-player-controlled agents in the games. For example while the agent Solid Snake in the Nintendo game *Metal Gear* killed enemy soldiers, he also received help via his Codec communication device from a friend named Autocon. Likewise, as the light warriors in the Nintendo game *Final Fantasy* struggled to kill four fiends, they received assistance from friendly kings, princesses, and oracles. Thus, as with player-controlled agents, the current non-player-controlled agents also easily lend themselves to ideological analysis.

Accordingly, in addition to the distinction between who controls an agent and whether the agent is a main or sub agent, game scholars must also note whether an agent is cooperative or uncooperative. Cooperative agents encourage or are ambivalent to an agent's interactivity with the world of the game, and non-cooperative agents attempt to thwart interactivity. For example, cooperative and uncooperative agents might be assessed by whether or not their presence hinders or promotes the free exploration and/or resolution of narrative conflict.

It should also be noted that in some cases the agent might be an inanimate object. A good example of this occurs in some racing/driving games. Racing/driving games allow players to control a vehicle with the express goal of racing other vehicles (*Gran Turismo*), destroying other vehicles (*Twisted Metal*), racing for the best time (*Gran Turismo*) or continuing to race by making checkpoints (*Outrun*), escaping from law enforcement authorities (*Need for Speed*), or completing espionage missions (*SpyHunter*). Racing games frequently allow players to choose not only whether they want to drive a manual or automatic transmission, as early Atari arcade versions

permitted, but also allow the purchase of and customization of cars for features ranging from handling to tire inflation, color, and anything else that can be tweaked on a car. The car is clearly an agent, and it will mediate a gamer's commands as diligently as it were represented by the image of a person. However, referring to the car as an agent seems in some ways incorrect, particularly because players often assume the role of the understood agent in driving games and suture themselves into the driving seat. Although this does not substantially affect the nature of the interaction, it may have a correlative effect on identification, and be useful knowledge for later analysis.

The depiction of agents has changed significantly in current video games. Since the introduction of the Nintendo and Sega gaming platforms, video games have become more expansive, and the agents have become more numerous, realistic and diverse in their depictions and functions within the aesthetic environments of the game world. For example, recent developments in graphics and more involved narratives have made the presence and depiction of the few women agents present in video games increasingly apparent and an important site of study. In early video games, discerning male from female agents was irrelevant--the monochromatic line and ball of PONG, although phallic, were otherwise genderless. As games and graphic capabilities advanced, agents were introduced and these agents were usually gendered. The presence or absence of extra pixels in the chest and the color and types of clothes an agent was wearing made such distinctions possible. Perhaps the best example of this in early video games came with the introduction of *Ms. Pac-MAN* who could be distinguished from her male counterpart by the large pink bow on her head. The games *DOA Volleyball* and *BMX-X XX* are two of the most extreme and recent examples of this trend. One game centers on

women with unreal proportions in revealing bathing suits playing volleyball; the other

allows skilled players to simulate riding BMX bikes with scantily clad women and

rewards level completion with strip shows.[42] These images are no longer simple pixilated

images, but use DVD technology and powerful processors to display near lifelike images

of women. Such content has obviously attracted feminist scholarship on video games.

Fortunately, games such as *Mia Hamm Soccer* and the *Metroid* series are emerging with

alternate and less gender biased depictions. The simulated camera and complex graphics

of modern video games have not only made the depiction of gender possible, but also

ushered the depiction of race, as well as "inscape," or "events that characterize an internal

condition" such as frustration, pain, happiness, etc. possible (Zettl 368).

If we keep in mind that, as described in the previous section, agents are also

objects, albeit special types of objects, the connection between function and image can

also be studied. For example, according to Helen Kennedy in "Lara Croft: Feminist Icon

or Cyberbimbo? On the Limits of Textual Analysis," many feminist readings of this star

of the *Tomb Raider* series have attempted to distinguish "the kinds of gendered pleasures

offered by Lara Croft as the game's character [player-controlled agent] and cultural

icon." Similarly, Simon Gottschalk, in his essay, "Videology: Video-Games as

Postmodern Sites/Sights of Ideological Reproduction," has also pointed out that heroes

are "overwhelmingly young, white, muscular, and male" and "brutally enforce a "zero-

tolerance" policy towards drug-smugglers and a great variety of others, while keeping

women "in their place." Current games, he says, hail "the young male p(l)ayers as

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[42] The princess image, too, has not been displaced. In fact, in the hit game *Super Mario Sunshine* Mario decides that the princess is so helpless that he needs to take her along on his vacation so that he will not have to go save her should she get kidnapped.

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subjects of a decidedly violent, paranoid, individualist, racist, sexist, militarized and over saturated electronic New World Order."

Unfortunately, current analysis of agents in video games tends to reflect the limited perspective of academia and ignores some images in preference of others. For example, while the Fair Play study revealed that 35% of male images are idealized muscular figures ("Fair Play?") and male agents make up 84% of the agents in video games, there are unfortunately no studies of male images in video games. The popularity of feminist studies regarding the images of agents has created a hypertrophy of female images and ignored the more prominent and equally biased depictions of male agents. Video game scholars must acknowledge their bias and begin to accurately and objectively assess the agents. It seems that the first thing academics must begin to do when they approach a video game and decide to study agents, is to categorize the agents according to who controls them, whether the presence of the agents is significant or not, and whether they are cooperative or non-cooperative.

Of course, as video games become more complex, this task becomes more difficult. As will be discussed in chapter three when I test this model, agents in the current video games can number in the hundreds, and the distinction between player-controlled and non-player-controlled, cooperative and non-cooperative, and main and sub agents, is not always definite. Agents might also lapse, at times, between these categories, which makes classification sometimes difficult.

Commonly Depicted Interactions

In Aarseth's model there are two types of activity depicted for audiences of cybertexts, those expressed directly by the user and those that result from the machine responding as programmed. Murray also echoes this distinction in her discussion of participation and procedure when she notes that digital texts allow for both participatory and procedural responses. Thus, the first category I will discuss is what I have termed *commonly depicted interactions*, and in the next section I will discuss the *commonly depicted programmed responses*. The word *depicted* was added as a qualifier to each of these terms because there are interactions and responses that are input and output during the course of a game that are not depicted; these "not depicted" interactions and responses are the concern of later parts of the proposed model. The word *commonly* was added as qualifier because there may be other types of interaction and responses that are depicted that I have failed to address, likely because they are obscure.

Before I proceed to discuss interactivity, I should note that this term can be used several ways and is often used generically without qualification.[43] As I use the term here, I am referring to the process whereby a gamer interacts with a controller, the controller interacts with the machine, the machine receives this input and mediates[44] it to the screen

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[43] As Jens Jensen notes in his essay "Virtual Inhabited 3D Worlds: Interactivity and Interaction between Avatars, Autonomous Agents, and Users," interaction can be divided into several different disciplinary types:

> "interaction" in the sociological sense refers to a reciprocal relationship between two or more people, and in the informatic sense refers to the relationship between people and machines (but not communication between people mediated by machines), in communication studies it refers, among other things, to the relationship between the text and the reader, but also to reciprocal human actions and communication associated with the use of media as well as (para-social) interaction via a medium.

[44] Friedman also points out that the computer is a tool, a device to mediate a player's interactivity and insert it into the world of the game.

as an agent interacting within the virtual world of the game, and a gamer views this output on the screen in a final act of interaction. If one wanted to study interactivity, he or she could study the interaction between player and controller, controller and machine, agent and environment, environment and the gamer, or the entire process. I propose that while these types of interaction are meaningful, the interaction between agents and the virtual world is the most central to studying video games because it is this interaction that provides the majority of the content that gamers use to formulate meaning. For example, while one could study the interaction between a gamer and a gun shaped controller, such a study would be more focused on the conditions of gameplay than on the game itself—this would be akin to studying the environment of a movie theater. Similarly, the interaction between controller and machine might be a technical discussion.

Early video game consoles provided gamers with a joystick and one button that could be used to command agents within a video game to maneuver and perform activities such as jumping or shooting.[45] Current input devices, fittingly referred to as controllers, often incorporate several features. For example, one common controller has 18 different input features including joysticks, a directional pad, several differently shaped buttons and even a device that vibrates the controller, giving the player feedback when signaled to do so by the game. Video game software often utilizes all of these input/output features, and gamers are permitted to control the activities of agents and objects in complex ways within the virtual environments of video games and sometimes can even control features like camera perspective. For example, the permissive nature of some games allows players to direct their agents in ways that result in the murder of

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[45] For example, in the Activision game *Plaque Attack* players controlled a tube of toothpaste and shot toothpaste on junk food as it fell on teeth in a screen-sized mouth.

police officers, hookers, animals and strangers, using fists, cars, and weapons ranging from forks to chainsaws. At the same time players are given freedom to refrain from such violence and perform other actions, such as reading, talking, crawling, running, jumping, punching, opening doors, etc. Yet this control over agents is not always provided, and agents controlled by the computer or another gamer can also initiate activity in a video game. I have identified four primary types of activity that agents might perform and propose that all other types of activity can be classified under these categories.[46] Gamers can direct agents to (1) maneuver, (2) interact with ambient objects, (3) interact with facilitating objects, or (4) interact with other agents. I have appropriately termed these, maneuvering, ambient object interaction, facilitating object interaction, and agent interaction

Maneuvering,[47] which entails the movement of agents or objects along the x, y, or simulated z-axis within the virtual world of the video game, is the most fundamental activity that agents perform upon command from a gamer. Maneuvering, while complex, can be dissected using the six degrees of freedom discussed by Bolter and Grusin in their book *Remediation*. These six degrees of separation consist of two arrays of six, one for moving an agent's head, the other for moving an agent's body (243). These movements include up, down, left, right, and either side to side or forward and back. Bolter and Grusin point out that unlike film, in interactive digital media, audiences are allowed to change their relationship to objects freely and this may bring with it different perspectives and values.

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[46] Jens Jensen defines several different matrices of interaction "interaction between avatars," "interaction between a user-in-avatar and a virtual world," "interaction between Virtual World and the objects" and interaction "between Virtual Worlds" and other "Virtual Worlds."

[47] Mark Wolf uses the term *navigation* throughout his book *The Medium of the Video Game* to refer to this phenomenon.
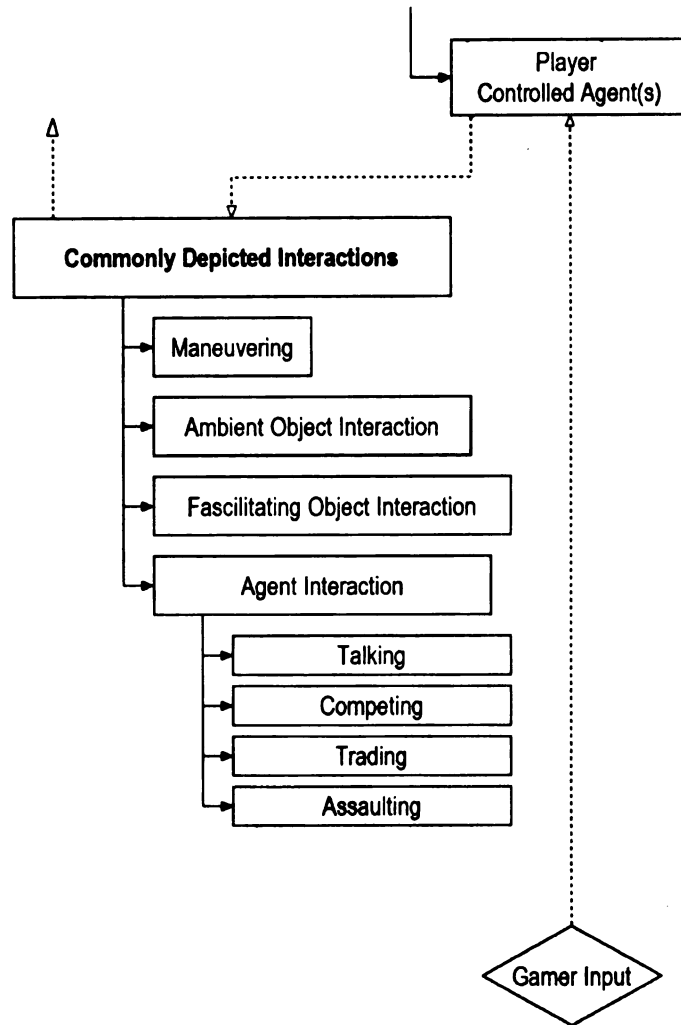
Figure 2.3: Commonly Depicted Interactions

According to Henry Jenkins, the possibility of revealing new spaces through

exploration, a particular type of purposive maneuvering, is what motivates gamers to play

video games. For Jenkins, exploration is so fundamental to video games that although

there are often "canned" sequences (cut scenes) that players cannot avoid, players often

dismiss these to move to the action of playing the game and "staying alive long enough to

move between levels, to see what spectacle awaits us on the next screen."[48] Julian Stallabrass concurs, and says that "computer gaming is largely based on spatial exploration" (85). He explains that an emphasis on spatial exploration is a necessity because agents are oftentimes too predictable to keep players engaged and also that the exploration of space is an easy trigger for the advancement of time, or narrative events, in a video game. Accordingly, maneuvering may be an important site for video game studies to investigate, particularly as it relates to exploration.

Once one is familiar with the various terms for objects and agents in a video game, the other types of interaction in video games are almost self-explanatory. Ambient object interaction involves the moving, destroying, bumping into, opening, or other types of interaction with an ambient object. While much of this interaction is taken for granted, ambient object interaction is the second most common type of interaction in a video game. The placement of ambient objects often dictates where and how an agent will maneuver, or by combining to create different environments hints to gamers the type of interaction that will be required of them. For example, a tar pit might require an agent to jump over the ambient object, or perhaps grab onto a vine, another ambient object, and swing over the lava pit. Ambient objects that combine to create a sports arena, such as a wrestling ring, will no doubt signal to gamers that they will be wrestling—another type of interaction that involves maneuvering, competing, and agent interaction.

Facilitating object interaction results when a gamer or the machine directs an agent to interact with a facilitating object. If the facilitating object is a maneuverable

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[48] In "Nintendo and New World Travel Writing" Jenkins applies DeCerteau's distinction between place and space to video games and says that video games provide gamers with many "abstract" places in which "potential" action can take place. When agents in a video game interact with these places, the potential is realized and the place "encoded in the software design" becomes the space that is "the landscape" of the game.

object such as a boat, one might board the object, at which time the interaction then becomes maneuvering. Tool/Commodity interaction might entail consuming, wearing, or activating a facilitating object such as a health potion, a suit of armor, or a protective force field. Interaction with tools/commodities often facilitates other types of interaction, particularly agent interaction. Interaction with facilitating objects that are information objects may be manifested when an agent is directed to read a sign or open a book. However, information object interaction may also result when a gamer accesses or organizes information that might symbolically represent the consciousness of an agent or the rules by which the game operates. This type of information object interaction is usually accomplished through accessing a special menu. The last category, agent interaction, results when a gamer or the machine directs an agent to interact with other agents. This primarily includes interactions such as talking, competing, trading, and assaulting, all of which are self-explanatory.

Also, as video games have become more complex the types of interaction have become more complex.[49] Fortunately, the categories for interaction proposed here are broad enough to incorporate new developments. For example, within the category of agent interaction we might also consider communication between players via real-time chat or special hardware that allows players to talk to one another as they play a networked game. This type of interaction has become increasingly popular lately and is discussed extensively in "Creative Player Actions in FPS Online Video Games: Playing Counter-Strike" by Talmadge Wright, Eric Boria and Paul Breidenbach. The authors of

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[49] Of course, for each interactive choice made there is also often an opportunity cost, something that is missed because of the choice that was made.

this essay further divide this type of agent interaction into creative game talk, game

conflict talk, performance talk, and game technical/external talk (Wright).

Commonly Depicted Programmed Responses

Programmed responses are the responses that a video game executes when

specific conditions are met. These may be defined in the parameters of objects or agents,

or may exist as part of the embedded rules of the game. I have identified four primary

types of commonly depicted programmed responses and these are illustrated in Figure

2.4. They include cut scene response, ambient object response, facilitating object

response, and agent response.
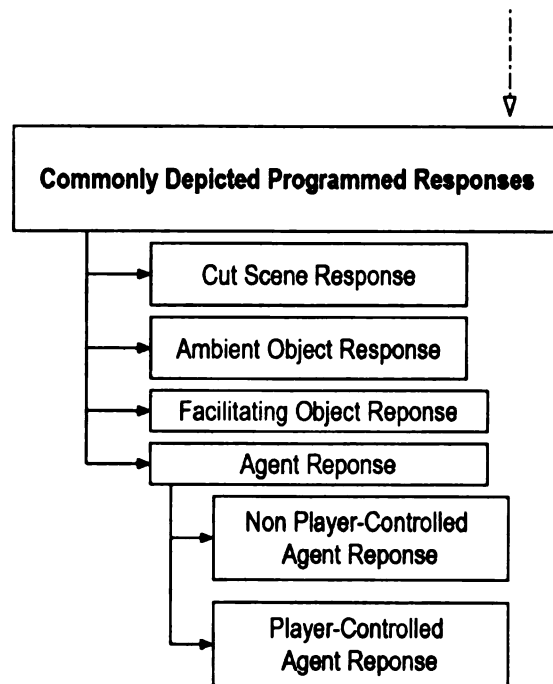
Figure 2.4: Commonly Depicted Programmed Responses

A cut scene response occurs when the game directly interrupts gameplay in order to present gamers with a predetermined *video game scene*—discussed more extensively in the next section. These cut scenes may consist of scripted gameplay, or more recently, Full Motion Video (FMV) clips. Whereas in early games these cut scenes might have consisted of an image and a few lines of text, the cut scenes in contemporary video games are much more complex. For example, in the games *Silent Hill* and *Resident Evil* when an agent enters a building, a hallway, or a room, a FMV clip of a zombie eating someone's brains, or something equally disturbing, is shown to the gamer. Because gamers do not have control of their agents during cuts scenes, this makes cut scenes one of the most static and easily analyzed components of the video game base. According to Rune Klevjer in his essay, "In Defense of Cut Scenes," cut scenes serve multiple functions in video games. They communicate the narrative, if there is one, more simply than other textual structures in video games.[50] They also act as a "release from intense action" and at the same time often "build suspense" before players resume "fast and demanding action-gameplay." The incorporation of cut scenes in video games has also made various types of montage possible, including "collision montage" which is an "idea-associative montage that collides opposite events in order to express or reinforce a basic idea" (Zettl 363). The addition of montage in video games also "intensifies" game play in the same way Wolfgang Iser theorizes it "intensifies" reading. According to Iser, when texts "cut to new characters [agents] or even to different plotlines" a reader, or in this case video game player, " is forced to try to find connections between the hitherto familiar story and

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[50] For example narrative can also be communicated through dialogue randomly gathered by interacting with other, usually non player-controlled agents in a game. A good discussion of this can be found in "Computer Games Have Words, Too: Dialogue Conventions in *Final Fantasy VII*" by Greg Smith.

the new, unforeseeable situations." As the audience has to imaginatively "formulate missing links," their experience becomes more incisive (192).

While in the past many games forced players to view these cut scenes, and in fact playing the game meant that one was sure to trigger some of these narrative events, in some recent games players are presented with the option to avoid or skip cut scenes. For example, although the script for the organized crime game *Grand Theft Auto: Vice City* is approximately 1,000 pages, features vocal performances from Ray Liotta, Dennis Hopper, and Ms. Cleo, and includes over 80 songs, players might never see or hear this content ("Vice Grip").[51] Players can completely avoid triggering cut scenes, if they want, by avoiding certain locations that are clearly marked within the world of a game. In other games, such as *Hitman 2*, gamers can skip cut scenes by pushing a button on their controller.

While ambient object response and facilitating object response depend largely on the function of the object, there are some typical responses of these functions. For example, ambient objects often respond to interaction by preventing agents from maneuvering through them; in other words, they simulate solid matter. Facilitating objects, because they are used to facilitate interaction, often subtly respond by being added to an agent's inventory, transferred to another agent's inventory, or being consumed.

Agent responses can be divided into both player-controlled agent responses and non player-controlled agent responses. For example, upon acquiring a certain number of points, coins, or experiences, a player-controlled agent may receive an extra "life,"

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[51] Compared to film, the amount of scripting is extreme; for example, the script for *Scarface* was only 100 pages ("Vice Grip").

acquire increased abilities within the game, or likewise, falling below a predetermined

level may mean death or other serious consequences for agents. Conversely, if a player-

controlled agent explores a space, or interacts with an object or agent within the game in

a certain way, this may trigger a non player-controlled agent to be rewarded or injured.

This may also trigger the non player-controlled agent to perform a commonly depicted

interaction.

It is often the case in video games that through the combination of commonly

depicted interactions and programmed responses time progresses and embedded

narratives are revealed. According to Julian Stallabrass, "temporal development" in

games is difficult to implement because one cannot guarantee how quickly a player will

progress in a game. If narrative events/sequences were triggered temporally, then, for

example, the world might be destroyed before a player even learned how to maneuver the

agents that they control. Thus, Stallabrass says in order to ensure that every player

equally reveals the embedded narrative, "temporal progress is mapped onto spatial

projection" (91). Although Stallabrass does not explain this much, what he is referring to

is the phenomena that when players explore a space, a sequence of events may be

triggered which gives the illusion of time progressing in the game world. The triggering

of events in order to denote the progress of time, or in order to reveal an embedded

narrative is one of the key functions of the programmed response.

In some recent games the temporal is no longer mapped onto the spatial. Video

games like *Animal Crossing* for the Nintendo Game cube now incorporate temporal

development independently of exploration. In other words, the game progresses

regardless of what a player does, even when a player is not playing the game, the time

spent away from the game can never be regained, nor can the missed-cut scenes. This has resulted in some children and adults staying up till odd hours in the night to watch a certain event transpire in the world of the game, lest they never see it again. This change has made studying some types of programmed responses challenging.

Video Game Scenes

As in other media, games have utilized "graphic depth factors," or techniques such as "overlapping planes, relative size, height in plane, linear perspective, aerial perspective, and light and shadow," all of which "create the illusion of depth on a two-dimensional surface (without the use of motion)" (Zettl 361).[52] In current video games the literal sounds have become lifelike and are often accompanied by non-literal sounds such as popular rap, rock, and even specially composed orchestral music. These non-literal sounds are often ambient sounds[53] that contribute to the reality of the space created on the screen or leitmotivs that foreshadow "upcoming events." Scenes may also be accompanied by controller vibrations to simulate what a player might feel while in this space. This tactile feedback is in its infancy, as computer generated beeps were once poor substitutes for literal sounds; however, given enough time this tactile feedback too will develop. Together, the combination of "response, vision and sound," presents gamers with a "unified reality" that allows for "total immersion" (Stallabrass 85). For example, staring into the television screen while playing *Gran Turismo III* not only looks similar to staring out the windshield of an automobile, it also sounds similar with the growl or whine of the engine, and feels similar with the vibration of the controller. Even the non-

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[52] Mark Wolf has also done a nice job of defining how space is presented in a video game.
[53] These are "background sounds that normally occur in a specific environment" (Zettl 361).

literal soundtracks that accompany game play convey the energy of the sensory

environment. For this reason, I suggest that each of these components be considered first

individually and then in the context of one another as they combine to create multiple

complex aesthetic environments.
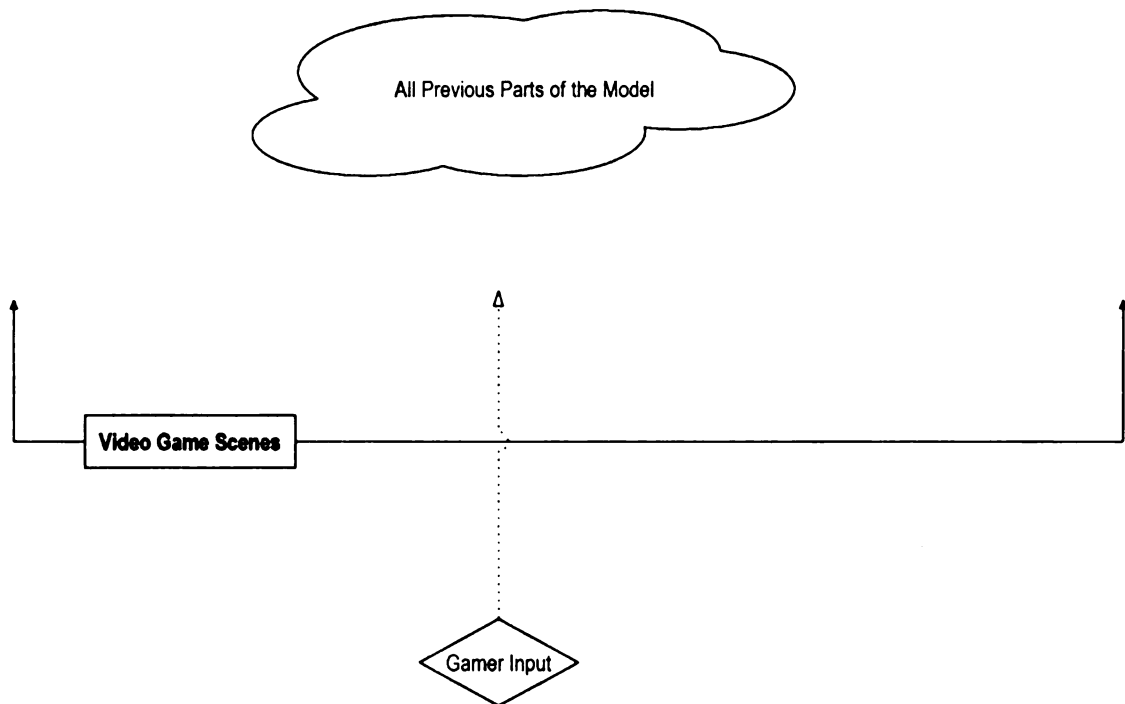
Figure 2.5: Video Game Scenes

Video game studies must strive to acknowledge the complex interrelations

between the varied content that makes up the video game base. The elements of the video

game base are often logically linked to one another and the context of the game. The

sounds, objects, agents, commonly depicted interactions, and commonly depicted

programmed responses that I discussed in this chapter, combine to create what I have

termed *video game scenes*. Studying these video game scenes might include noting things

such as perspective, color, arrangement, etc. in order to understand how aesthetic elements work together in a particular aesthetic environment to encourage gestalt. More specifically, video game studies might note in an individual game how the elements of the video game base combine to create differently themed scenes, which might facilitate discussion of a particular video game. Close analysis might reveal how reality is presented to gamers and also provide substance for discussing the ideological allegiance of sets of sounds or images.

The Grammar of Video Games

Like any grammar, the grammar of video games consists of individual units that combine, according to principles, into a greater structure. Each of the components of the video game base described in this chapter constitutes one unit of this grammar of video games, and it is the goal of this part of the chapter to briefly discuss the principles by which the individual units of the video game base combine. While the principles I outline are typical, they are not beyond reproach, and as with any grammar, there is always the potential for bad grammar as well as the potential for game developers to play with, and over time, change this grammar. It is my hope that formulating the terminology into a grammar will facilitate video game studies by making it easier to parse video game content. At the same time, game developers may also use this grammar as a guide for creating new video games, or creating video games that disrupt this grammar.

Whether gamers are engaging in violent scripts, learning to objectify women, passively viewing, or honing their skills as capitalists, in almost all video game studies players are regularly depicted as the "easily duped appendages of the machine." It is not
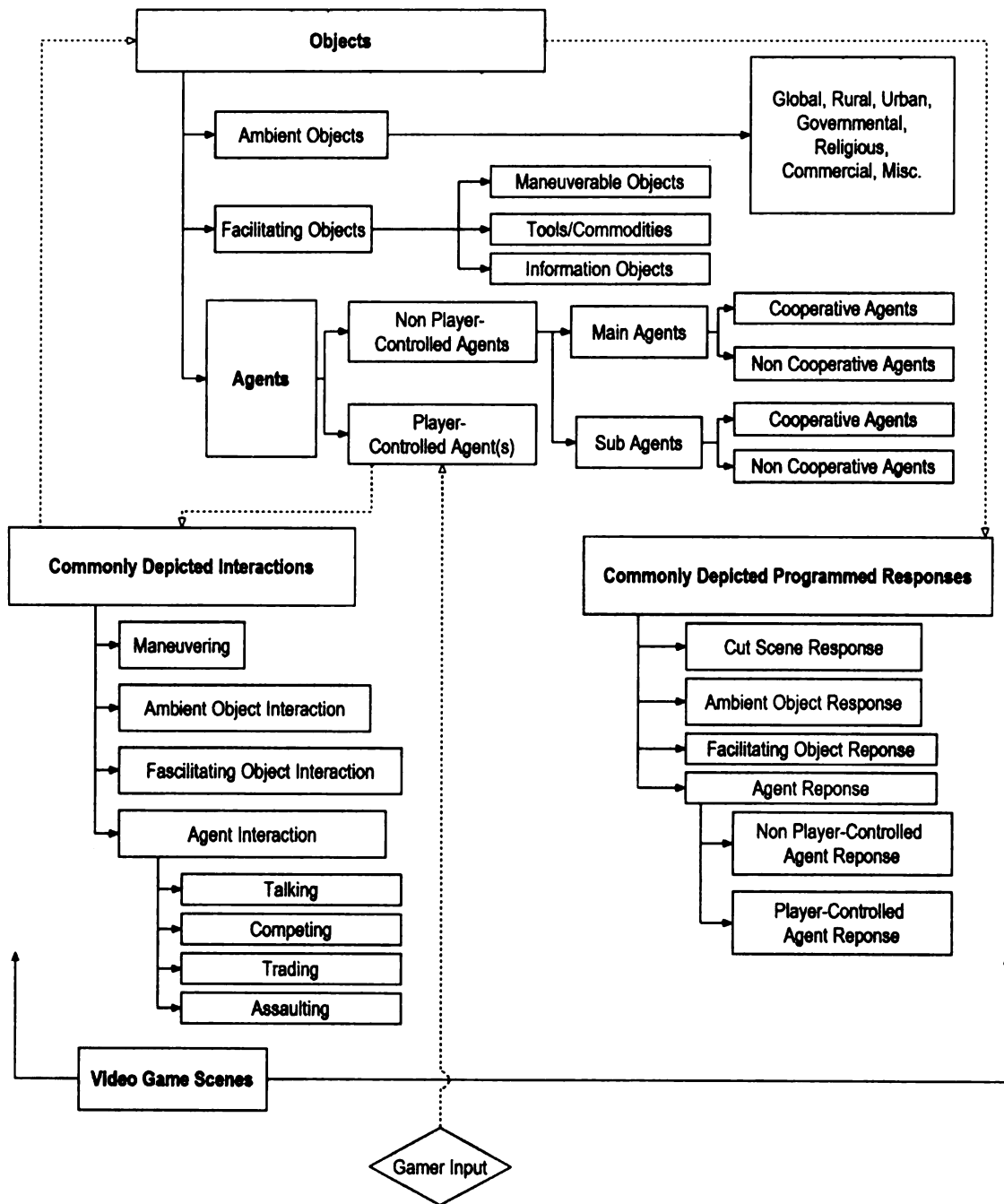
Figure 2.6: The Grammar of Video Games

my intention in this model to depict the user in such a way. In my framework the gamer

is god-like in that he/she is always presented with the opportunity to see, hear, and feel

the game and is given the opportunity to enter input into this system according to the

limitations set out by the video game base. In fact, it is the user input that unites the

content of the video game base in the same way that it is the speaker or writer who unites

words into sentences. While the user is an integral part of deciding the video game text

that will result, at the same time it is not my intent to study the user. In Figure 2.6 the

lines for gamer input I provide are an approximation, or simplification, of the circuit of

input and only provided so that I can further provide readers with an approximation of the

relationship among the content elements of the video game base.

With the simple "turning on" of the game, commonly depicted programmed

responses are initiated. These may include everything from a cut scene that begins the

game to non-player-controlled agent responses. When gamer input is passed into the

video game base and mediated to the player-controlled agent (this involves several

different interactions which where discussed previously), the player-controlled agent

perpetrates a commonly depicted interaction, which may be of several different varieties.

This interaction triggers a latent function of one or more objects (including agents),

which likely results in one or more commonly depicted programmed responses. A gamer

may choose to pass further commands to their player-controlled agent at anytime.

Whether gamers do this or not, programmed responses may continue to occur or stop

completely.

In a very simple example, when a gamer runs the game *Pac-Man* he/she is

presented with a maze-like structure, and the non player-controlled non cooperative main

agents, the ghosts, begin maneuvering through the maze in commonly depicted

programmed responses, with the express purpose of killing the player-controlled agent

Pac-Man. If a gamer does nothing, Pac-Man does nothing. Accordingly, when one of the

ghosts encounters Pac-Man, the commonly depicted assault interaction will occur, and in

a depicted programmed response Pac-Man will be killed. However, at anytime after the

game begins, the player-controlled agent Pac-Man can be maneuvered, in commonly

depicted interactions, and run from the ghosts, consume power pellets, which are

facilitating objects, and then kill the ghosts.

Conclusion

Whereas in literary studies one might find extensive studies on a specific work,

this is not the case in video game studies. It seems that, in its eagerness to study this new

media, the academic community has alienated the actual artifact. I liken this to theorizing

about novels and never analyzing an individual novel. Instead, much of the current video

game scholarship focuses on the culture of video games and the connections between

video games and other media, and there have been studies of video game content that

focus very specifically on violence in video games. The presence of these studies,

however, cleverly veils that which is not being studied; very few video game studies

comprehensively study an individual video game. As a result, current video game studies

all seem a bit shallow, especially to avid gamers who often have intimate knowledge of

video games. Furthermore, it is difficult to discuss adequately the ideological allegiances

of an individual video game because we are lacking a method for arriving at a complete

vision of a video game. This lack of comprehensive studies results, in part, because video

game scholars have not formulated a way to discuss video games in their entirety. This fault can only be corrected by acknowledging the multifaceted nature of content (substantive, formal and interactive) in video games and developing a method for studying this content in its native state in a video game.

In conclusion, one could scrutinize the composition of one object, agent, commonly depicted interaction, commonly depicted programmed response, or scene; each might be studied using various methodologies and at the same time provide some insight into the ideological content of a video game. However, video game studies must also continually acknowledge that there are multiple objects, agents, types of interaction, programmed responses and scenes, and that what appears to be simple might in some way warrant study or transmit ideology. Video game studies must also acknowledge that each of these components can combine in an almost unlimited number of ways, each combination potentially revealing something different about the motives of gamers when controlling their agent.

In the next chapter I briefly demonstrate the usefulness of this grammar of video games for enabling video game scholars to identify, dissect, and study complex video game content. This is demonstrated on the charts that accompany the next chapter, which distill the video game base, and in the text of the chapter, which analyzes the charts and suggests methodologies and types of video game studies that may be appropriate given the content of the video game base. As will be demonstrated in the next chapter, the proposed grammar can be commonsensically and easily deployed by both novices and experienced scholars.

CHAPTER 3

GRAMMATICAL ANALYSIS: A DISSECTION OF THREE GAMES IN THE *FINAL FANTASY* SERIES

The current state of video game studies makes it difficult for scholars to engage

the medium of the video game. Indeed, if one were to read several video game studies, it

would be quite apparent that video game studies spans multiple disciplines, often focuses

on discipline specific issues, and the language used to discuss video game content is

diverse. One would also quickly notice that although there are many analyses that discuss

an individual image or narrative of a video game, there are no studies of an entire video

game. The implication is that the current arrangement of video game studies has

discouraged the development of models to comprehensively study an individual video

game. Accordingly, in the previous chapter, I suggest a terminology and grammar

specifically designed to help video game scholars study video games in their entirety.[54] I

first propose a meta-terminology for each type of video game content based on its

function, and then describe the relationships among aspects of this content.[55] Combined,

the terminology and structural relationship form a grammar of video games.

In order to test and demonstrate the practicality of this grammar of video games,

in this chapter I use the previously discussed terminology and grammar to examine on the

content of three games in the *Final Fantasy* series. This test demonstrates the usefulness

of my proposed model to distill complex video game content and suggests possible sites

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[54] Although my model may at times mention the gamer and the culture surrounding video games, the model is not designed to study these things. While these considerations are no doubt important, they are moot unless we can first assess the video game text, and assessing the video game text is the primary concern of this dissertation.

[55] This part of the framework does not provide a terminology to name very specific types of content, as this may overly complicate the model, and it is important for cohesiveness that we consider the big picture of the video game.

of analysis for interdisciplinary video game studies. More generally, the analysis in this

chapter demonstrates that it is possible for video game scholarship to critically and

objectively convey to readers the complexity of the worlds in which gamers interact--

instead of quickly glossing over the content, as is often the case. This being said, I have

made several charts that classify the content of the video game base of these three games,

how much content there is in each game, and the significance of the content in the game.

Then in the body of this text, I briefly analyze the content of the video game base

generated by the application of my proposed grammar, and comment on what this might

suggest we study in each game. Please note that although I give extensive details about

Final Fantasy games, I provide only enough detail so that the coherence of my proposed

model can be demonstrated. Were I trying to make some point about one particular game

in the *Final Fantasy* series, my charts might be a bit more verbose, and my analysis

would not focus on possibilities for different types of analysis, but instead actually

perform the analysis. Because of the complexity of the games being discussed, this would

likely be another dissertation in itself.

The *Final Fantasy* series was chosen for analysis because not only is it one of the

most popular video game series, but when compared, the games in the series also

demonstrate the increasingly dynamic nature of video games over the last decade and a

half. Currently, the *Final Fantasy* series has ten games[56]and has sold more than "30

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[56] Gaming magazines are reporting that a sequel to *Final Fantasy X*, named *Final Fantasy X-2*, and *Final Fantasy XI*, which is designed for cooperative online play, will be released in the United States sometime in 2003. In 2001, Sony Pictures released a "fully computer-animated" film based on the series. The film, *Final Fantasy: The Spirits Within*, combined "nearly photo-realistic-looking characters" with voiceovers from stars such as Alec Baldwin and Donald Sutherland (Miller). An offshoot of the series, the videogame *Kingdom Hearts*, has also been released by *Final Fantasy's* producer Square in cooperation with Disney. This is one of the few times that Disney has granted unlimited control of its characters to another company, and a testament to the popularity of the *Final Fantasy* series and credibility of the Square Corporation.

million units worldwide" ("Company Information").[57] Games in the *Final Fantasy* series have thus far been released for game consoles, personal computers, and the handheld Game Boy Advance. Each successive game in the series has better graphics, richer audio, and increasingly complex interactivity. The narratives are consistently more complex, and have more and better-written dialogue.

The analysis in this chapter specifically focuses on *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X*. Because these games at the time of their original production were among the most complex video games ever produced, studying all three is ambitious. However, such a cross section provides this study with varying content for analysis and is probably the most rigorous way to test the proposed grammar and demonstrate its value to readers. The context of the production of these games over the last decade and a half also allows me to more clearly demonstrate the changes that have taken place in video software and hardware, and give some insight as to how these changes have made video games more complex and difficult to study.

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[57] The *Final Fantasy* series is immensely popular. For example, in anticipation of *Final Fantasy IX* Japanese customers had reserved "over 1 million units" in a mere 17 days. This is not surprising as the previous version of the game *Final Fantasy VIII* "sold more than 6.1 million units worldwide (Japan, North America, Europe)" (Square). The games are so popular that Square has released remastered versions of early games in the series. Although remastering media for re-release is common in the music industry, it is uncommon in the video game industry. As Miller has noted, "One thing is clear: Square's games make headlines, sell systems, and generate enormous buzz." Most gamers will agree that Square consistently produces quality games. As *Final Fantasy* historian Jason Flynn says, "With one or two possible exceptions, Square's 'failures' are superior to most other developers' best efforts." Flynn says this is because "even when one of its games doesn't quite hit the target, it succeeds in some area, like production value, innovation, plot, or fun factor" (Flynn). The popularity of this series has made Square Co., Ltd., the parent corporation responsible for the *Final Fantasy* series, the most successful "third party developer and publisher of interactive entertainment software"("Company Information"). Square Co., LTD employs 1,200 people worldwide, and has annual sales in excess of $687 million dollars ("Company Information").

The First *Final Fantasy* Game

The first game in the *Final Fantasy*[58] series was released for the Nintendo

Entertainment System in December 1987 in Japan and in July 1990 in the United States[59]

("Company Information"). *Final Fantasy* emerged at a crucial time in the development of

the video game industry,[60] a time when video games were redefining themselves, and this

game in particular presented gamers with a hint of how complex and interactive video

games would become. In *Final Fantasy*, gamers could freely explore complex video

game scenes, choose and develop agents, and maneuver objects such as ships or

airplanes.[61] The game also incorporated a complex embedded narrative and several lines

of textual dialogue, which almost no video games at the time did. At the same time, the

graphics and audio of the game were constrained by the limits of the Nintendo

Entertainment System, which only permitted games to display 16 simultaneous colors of

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[58] When *Final Fantasy* was released in the U.S. *Final Fantasy III* had already been released in Japan. This lag in release has been the trend for almost all games in the *Final Fantasy* series, in part because the games are localized according to the foreign market in which they are released. Localization usually entails language translation as well as some cultural adaptation. Game release is also dependent on player interest and the hardware available in a country. For example *Final Fantasy XI* is available for the Japanese market; however it requires that the Playstation 2 game console have an optional hard drive and network adaptor as well as the proper network services. Although the network adaptor has been released for the U.S., the other components are not sufficiently in place for the game to be released.

[59] In 1989, the Japan based Square Co., Ltd. "formally expanded into the North American market" and formed "a wholly-owned subsidiary called Square Soft, Inc" ("Company Information"). Square games had been available in the U.S., prior to 1989. Two very popular games *Rad Racer* and *World Runner 3D* were developed by Square for the Nintendo Entertainment System and released in the U.S. by Acclaim in 1987.

[60] Legend has it that when the game was developed it was given the name *Final Fantasy* because it would be last game the Square company produced before going out of business. Fortunately for Square the game was a hit. Popular legend also credits the first *Final Fantasy* with the survival and success of the Nintendo Entertainment System.

[61] Although the graphics and audio of the first *Final Fantasy* are at times innovative, they are not spectacular compared to other games of the same era, and pale in comparison to the other major RPG of that era. In 1988 Sega released *Phantasy Star*, "the first RPG ever brought to a home console in America" (Sega Master System). The game notably incorporated "3D dungeons, detailed enemy creatures, and a sprawling, non-linear quest," which made *Phantasy Star* superior to *Final Fantasy* (Sega Master System). Although *Phantasy Star* was graphically and textually superior to *Final Fantasy*, as many Sega games were, the relative obscurity of the Sega Master system hindered the game's success in the U.S.

the 52 available colors. The Nintendo also utilized a storage media that limited the size of a video game program to about 256kb—smaller than the file for this dissertation.

The Video Game Base of *Final Fantasy*

As is depicted on Figure 3.1, although the objects in *Final Fantasy* are numerous, the function of these objects as well as their depiction is simple, constrained as they are by the limits of both the Nintendo Entertainment System and the cartridge media on which the game was stored. While ambient objects are the most numerous of any objects in *Final Fantasy*, there are still relatively few ambient objects. Combined with the fact that the function of many of these objects is simply to exist and prevent or facilitate movement and are not meant to be acted upon but are provided only to be looked at, the environments created from these ambient objects can only vaguely resemble reality. The broader implication is that there is not much substance in the ambient objects and combination of ambient objects into environments to be studied, unless one wanted to study the simplicity of their visual depiction. Even then, analysis might prove as uninteresting as the environments.

Though there are hundreds of facilitating objects, as noted in Figure 3.1, the depiction of facilitating objects belittles their significance. The majority of the facilitating objects are represented with only words, as is the case with most tools and information objects. Granted, given the graphic capabilities of the Nintendo, it would have been difficult for gamers to distinguish the differences between different commodities/tools had game developers rendered these objects in the virtual world of the game. Accordingly, the descriptors for facilitating objects, and the function

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Objects:
* Depicted with sixteen colors and almost no texture.
* Appear cartoonish.

Ambient Objects:
* These include: mountains, walls, forests, oceans, doors, chests, etc.
* Hundreds of ambient objects throughout the game.
* Only a handful of ambient objects in each environment.
* The function of most objects is to simply exist.
* Doors and chests have more complex functions.
* Icons of cities and caves appear in the global envrionment.

Environments:
* All environments are present except residential and misc.
* 1 global, 10 rural, 8 urban, 6 governmental, 2 religious, and 7 differnt categories of commercial enviroments.
* Few distinctions between environments.
* Size, location, and color are the main distinctions between similar enviroments in the same category.

Maneuverable Objects:
* Ship, airship, and canoe.
* Cartoon like depictions.
* Can traverse oceans, mountains, or streams.
* Agents are rewarded with each vessel after completing a difficult task.

Facilitating Objects:
* There are over 100 different objects in this category.

Tools/Commodities:
* Include weapons, armor, and items.
* Over 100. Often appear as words only.
* Depicted with small white icons in shops.
* Weapon images are depicted during battle scenes.
* Approx. 40 weapons and 40 pieces of armor.
* Several sub-categories of these objects made from different materials
* Approx 20 items. Many are used to restore health, or trade for other items.

Information Objects:
* A menu that has various tables representing an agent's health, defensive ability, inventory of facilitating objects, etc.
* Menus may also be used to direct agents to put on armor or hold a weapon.
* A colorful map of the planet.

Agents

Figure 3.1: *Final Fantasy* Objects

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of these objects (rather than the visual depiction of these objects) seems most appropriate site of analysis for video game studies. One might also study the use value and the corresponding exchange value of facilitating objects in order to begin to reveal the way that value is assigned in the game, and understand the greater economic system.

The most significant and complex objects within *Final Fantasy* are agents. From studying Figure 3.2, one might quickly notice that gamers are able to customize player-controlled agents in several ways. Thus, it might be possible to study player-controlled agents to see how identity is shaped by players throughout the game. At the same time, as with other objects in *Final Fantasy*, the depiction of the agents is cartoonish and static throughout the game; thus, it is not practical to study race or gender in this video game, except to say that very few significant distinctions between agents can be made. Likewise, player-controlled agents do not have any dialogue, so all that may really be studied is names, images and archetypes chosen, and the tools and commodities used by these player-controlled agents.

The presence of several different categories of non player-controlled agents in *Final Fantasy*, and the respective numbers and roles of these agents as described in Figure 3.2, also suggest that a fruitful avenue of study might be to analyze the function of an agent, the image assigned to this agent, and any dialogue that the agent might say. Such insight might provide a fruitful beginning for ideological analysis of agents in *Final Fantasy*.

Agents:
* Cartoonish depictions.
* Dialogue appears typed in black boxes.
* Usually only a few sentences of dialogue per agent.
* Difficult to distinguish gender, race, or disposition from an agent's face.
* Non-animal agents are shown wearing clothes fitting their characters(i.e., a wizard wears a cloak).

Cooperative Agents:
* Includes kings, oracles, and average citizens.
* Usually one per enviroment.
* Reveal valuable information or give facilitating objects.

Non Cooperative Agents:
* The main villians are the Four Fiends, Chaos, and Garland
* Also includes agents such as a Vampire, a Cyclops, etc.
* Usually one per enviroment.
* Confrontation with these agents is usually violent, time consuming, and difficult.

Non Player-Controlled Agents:
* Appearance, attacks, and dialogue change very little throughout the game.
* Functions are predictable.

Main Agents:
* Approximately 50 non player-controlled main agents.
* All are named, look unique, and have a significant role in the game.
* Dialogue may be as long as a paragraph and change depending on the situation.

Cooperative Agents:
* Includes agents such as Arylon, a belly dancer; Kope, a man in Onrac who saw a robot; Smith, a dwarf blacksmith; and Underhill, a man who bottles fairies.
* Over 100 of these agents.
* Many do not have names.
* Often give bits of information about the planet or agents.
* Sometimes these agents say little or nothing.

Sub Agents:
* Over 200.
* Many of the people look the same.
* Dialogue is limited to a few lines and never changes.

Player-Controlled Agent(s):
* Players must choose and name four agents at the beginning of the game
* Players can choose from: Fighter, Thief, Blackbelt, Red Mage, White Mage, and Black Mage.
* Agents can maneuver, interact with ambient and facilitating objects, and interact with agents.
* The apperance and abilities of agents changes very slightly throughout the game.

Non Cooperative Agents:
* Includes agents such as Arachnid, Badman, Cerebus, Chimera, Green Medusa, Grey Shark, Hyena, Iguana.
* Over 130 of these agents.
* Exist mainly in global enviroments.
* Diverse species and attacks.
* Usually not very powerful.
* Each may appear several times thouought the game.
* Attack player-controlled agents randomly.

Figure 3.2: *Final Fantasy* Agents

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The functions of agents in *Final Fantasy* are far more complex than the functions of other objects in the game; however, the functions are still relatively simple, as indicated in the various descriptions on Figure 3.2. While player-controlled agents can exhibit an impressive range of maneuvering, ambient and facilitating object interaction, and agent interaction may include talking, trading and assaulting, most non player-controlled agents are severely limited in all these regards. Thus, regarding the commonly depicted interactions in *Final Fantasy*, for the most part these interactions are relatively simple approximations of real interaction with dialogue appearing in black boxes, and agents never actually touching one another. Accordingly, there is not much that can be studied regarding the commonly depicted interactions.

While maneuvering is present in almost every scene, one of the only things scholars could study is the relationship between the vectors of maneuvering and the simulation of three dimensions. Agent interaction is probably the most fertile interaction for analysis in *Final Fantasy*. Though the depictions of interaction such as talking, trading, and assaulting are simple, analysis of these interactions might focus on violence, social behavior, and economics. Studying these interactions might also be useful for understanding the development of these interactions from their simple states in *Final Fantasy* to more complex depictions in later *Final Fantasy* games. Most significantly, as noted in Figure 3.3, not all types of interaction are permitted at all times in *Final Fantasy*. For example, agents can only engage in battle with non-cooperative agents, and only when attacked by these agents. Thus, the justifications for violence and contexts when violence is permitted might also be studied. Talking and trading might also be studied with regards to the conditions that give rise to these interactions.

Commonly Depicted Interactions:
* Interactions, except maneuvering, are depicted with very little agent movement.

Maneuvering:
* Takes place in every environment.
* Maneuvering requires going around, over, under, or through ambient objects and enviroments.
* Agents can only maneuver along the x-axis or y-axis.
* Agents may explore as long or as far as they wish in the global enviroment, but are limited by the constraints of the ambient objects of the terrain.
* Agents can board a maneuverable object by walking into it, and the object can then be maneuvered.
* Maneuverable objects permit agents to traverse mountains or bodies of water.

Ambient Object Interaction:
* Happens most often when an agent maneuvers.
* Agents can walk into, up, down, or through these objects.
* Objects such as doors and chests may be opened.

Facilitating Object Interaction:
* Gamers may select commands from menus (infromation objects) within the game and direct agents to buy, sell, or use a facilitating object.
* This facilitating object may be directed at other objects, agents, or the environment.

Agent Interaction:
* Agent interaction is limited to talking, fighting, and purchasing.
* Not all types of agent interaction are permitted between player-controlled agents and other agents.

Talking:
* When an agent approaches a non player-controlled agent and the player presses a designated button, scripted dialogue may appear in a black box.
* Dialogue may also happen as a programmed response.

Competing:
* Not present in *Final Fantasy*.

Trading:
* In commercial environments, player-controlled agents can obtain interaction objects or services by exchaging money for them.
* Agents also may exchange items for other items several times during the game.

Assaulting:
* When an agent is confronted by a non player-controlled non cooperative agent, gamers are presented with the options on a list.
* Agents are never depicted touching one another and are separated by dividing lines.
* Non player-controlled agents are shown moving forward to signify attacking.
* Player-controlled agents are shown moving forward and a weapon moving up and down or some other simple motio to signify attacking.
* Player-controlled agents cannot harm one another, but may heal one another.

Figure 3.3: *Final Fantasy* Commonly Depicted Interactions

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Commonly depicted programmed responses in *Final Fantasy* are ripe for

narrative studies; the cut scenes, as noted on Figure 3.4, frame the embedded narrative.

The programmed responses in *Final Fantasy* also trigger several sequences that reveal

significant parts of the narrative. For example, if a player-controlled agent in *Final*

Fantasy is maneuvered into the Temple of the Fiends and approaches the knight Garland,

a programmed response is set in motion whereby Garland engages the agents in a

dialogue and then attacks them. If the player-controlled agents defeat Garland, another

programmed response rewards the agents with money and experience points, then

mystically transports them to Coneria Castle, etc. While there is not a substantial amount

of dialogue in the game, as Figure 3.2 reveals, the combination of all of the dialogue of

all the agents might fruitfully provide another avenue for textual or narrative analysis.

As I defined in the second chapter, video game scenes result from the

combination of all of the parts of the video game base. Given the information provided on

the various figures, and as summarized on figure 3.5, the video game scenes in *Final*

Fantasy are likely to be simple. The relationship of the elements of a video game scene to

one another might be studied using film studies or media studies methodologies to

understand, but due to the simplicity of the scenes this analysis would likely be a short

and superficial one. A more interesting analysis might consider the common themes of

scenes that are also noted on figure 3.5. Noting common themes in *Final Fantasy* might

suggest theoretical approaches that can be taken with the game.

Commonly Depicted Programmed Responses:
* Several programmed responses may be linked together.
* The depiction of these responses is visually and textually simple with very simple motions and sounds.

Cut Scene Response:
* Three main cut scenes: one at the very beginning of the game, one after the quest to restore four mystic orbs begins, and one at the end of the game.
* Cut scenes reveal parts of a special prophecy.

Ambient Object Response:
* Ambient objects that appear to be solid matter, such as walls or mountains, halt maneuvering at their borders.
* Oceans and streams, contrary to logic, may also prevent maneuvering.
* If an agent is in a maneuverable object, the reponse may differ. For example, in a canoe agents can travel up streams and in a ship travel on the seas.
* Maneuvering into the door of a large freestanding structure or the image of a city triggers a programmed response that changes the screen to depict the interior of the structure.

Facilitating Object Response:
* Money may be debited or credited.
* A tool/commodity may be transferred.
* The supply of a commodity may decrease or increase.

Agent Response:
* Agents may suffer phsycial damage, usually a loss of hit points (health).
* If the hitpoints of an agent reaches 0, the agent will die.

Non Player-Controlled Agent Response:
* A commonly depicted interaction may be triggered depending on the function of the agent. Assaulting and talking are the most common responses.
* Response may be delayed until a player-controlled agent halts for a moment.

Player-Controlled Agent Response:
* If the hitpoints of all four player-controlled agents reach 0, the game will be over.
* If player-controlled agents kill non player-controlled agents, player-controlled agents are rewarded with money and receive points toward increases in physical prowess.
* If a commodity is used by a player-controlled agent, that same agent, or another designated agent, may receive the effects.

Figure 3.4: *Final Fantasy* Commonly Depicted Programmed Responses

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          (   All Previous Parts of the Model   )
           (                                       )
            '-----------------------'
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    ↑                                                                    ↑
    |        +-----------------------------------------+                 |
    |        |  Video Game Scenes:                     |                 |
    └--------|  * Each type of scene is accompanied by a simple         |
             |    non-literal soudtrack.               |                 |
             |  * Environments are denoted by a few ambient             |
             |    objects, include both player-controlled and           |
             |    non player-controlled agents, and depict simple       |
             |    interaction and responses, which typically            |
             |    include a few lines of dialogue or a battle.          |
             |  * Many scenes are about exploration or physical         |
             |    confrontation.                       |                 |
             +-----------------------------------------+-----------------┘
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Figure: 3.5: *Final Fantasy* Video Game Scenes

Over all, this brief explication and analysis of the video game base of *Final Fantasy* has suggested areas that might fruitfully be studied and theories that might be used. The simplicity of the content and functions in the video game base, and poor graphic quality have severely limited the different methodologies that might be fruitfully used to study *Final Fantasy*. In the sections that follow, I will demonstrate how video games in the *Final Fantasy* series have changed, partially due to more advanced technology, and the corresponding effects the changes have had on the video game base and what can and cannot be studied.

Final Fantasy VII

After the production of the first *Final Fantasy*, Square continued to make games

in the *Final Fantasy* series; however *Final Fantasy II* and *Final Fantasy III*, which were

produced for the Nintendo Entertainment System, were never released in the United

States. In 1991, when Nintendo released the Super Nintendo,[62] a 16 bit game console[63]

Square began producing *Final Fantasy* games for this new platform ("SuperNES

Detailed Specs"). Square subsequently released *Final Fantasy IV* in Japan, which was

later released in the United States as *Final Fantasy II*.[64] As video game hardware

technology progressed and Nintendo planned for its next console, Square reevaluated the

platform for which it would develop video games.[65] With the popularity of optical CD

technology, and the storage advantages of this media over those of the cartridge,[66] Square

encouraged Nintendo to develop a console that used CD. Nintendo deferred and decided

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[62] The Super Nintendo was named the Super Famicom in Japan.

[63] The Super Nintendo featured a 16-Bit CPU which operated at 3.58Mhz. The system could display 256 colors of 32,678 available at a resolution of 512x448. The system was so popular that it sold "20 million systems in the U.S. and 46 million systems worldwide"("SuperNES Detailed Specs"). The Sega Genesis, the main competitor of the SuperNES, only featured a 16-bit 7.6Mhz processor, and could display 64 colors onscreen of 512 possible at a resolution of 320x224 ("Genesis Specs").

[64] *Final Fantasy V* and *Final Fantasy VI* were also not immediately released in the United States. In fact the decision to release them to American audiences at all came only after later games in the series had reached legendary status. The Japanese *Final Fantasy II* and *Final Fantasy III* have still not been released.

[65] As a general rule, good games can contribute significantly to making a console successful, and a market flood of a specific console can make a good game even more successful. Gamers also know that if a great game is produced for a platform they do not own, they will most likely not get to play the game. This is because many game developers produce games exclusively for one platform. For example, Nintendo produces the *Super Mario* franchise of video games exclusively for its Nintendo game consoles. The *Resident Evil* series can be found on Nintendo and Sony platforms but not the Microsoft platform. Thus, when a game developer changes its allegiance, it is a significant happening for gamers, and the corporate political alliances a software developer and publisher makes are consistently talked about by gamers and periodicals devoted to video games.

[66] To be sure there were some advantages to cartridges over CD technology. Cartridges made game information immediately accessible to the hardware, whereas CD data took some time to load into the memory of the game console. Cartridges were also made of a tough plastic with the game technology protected by a hard outer shell. This meant that cartridges could be abused by children and adults, thrown into book bags and left on floors and coffee tables without damaging the game. As anyone who has ever used a CD knows, CDs scratch easily and can even break.

that its next platform,[67] the Nintendo 64,[68] would continue to use cartridges. As a result of this decision, Square defected to Sony ("Company Information"). Although Sony was new to the game console market, its console that was introduced in 1994, the Playstation, was becoming increasingly popular among gamers. Importantly for Square, the console used CD technology. It was on this platform that the next *Final Fantasy* game was released, *Final Fantasy VII*. Using CD technology, the worlds that game developers created could be more expansive and graphically and audibly richer than ever before. The CD format not only allowed for the storage of high resolution graphics and high fidelity sound, it also permitted the storage of long clips of full-motion-video (FMV), which were too large to be stored on the previous cartridge media. The incorporation of FMV brought many new cinematic qualities to video games.[69]

Final Fantasy VII was released for the Playstation on January 31, 1997, in Japan and September 3, 1997, in the U.S. The world of *Final Fantasy VII* was labyrinthine and allowed for multiple types of interactivity—which will later be discussed. The soundtrack to the game was orchestral, and through the use of different instrumentation and rhythms

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[67] Although it was not officially a Nintendo console, Nintendo entered a joint effort with Phillips who released the Phillips CD-i. The machine was a failure.

[68] The Nintendo 64 was released in 1996 and featured a 64-bit RISC CPU, which operated at 93.75 MHz at a resolution of 256 x 224 to 640 x 480 ("Nintendo 64 detailed specs"). Without a doubt the Nintendo 64 was a popular video game console, and it had some standout titles like the *Legend of Zelda: Ocarina of Time* and *007 Golden Eye*. Still, the move to the Playstation was a wise decision for Square and Sony. In the console war with the Nintendo 64 for market share, the Sony Playstation won hands down. In fact, almost a decade after it was first released the console was redesigned in a smaller version and is still sold very affordably as the PSOne.

[69] According to the official Sony website, the Playstation had a 32-Bit RISC CPU and could produce 360,000 flat, shaded, polygons/second and 180,000 texture mapped, shaded polygons/second. The Playstation console could also display 16,770,000 colors with a resolution of 256 x 224. The sound capabilities of the Playstation also permitted developers to incorporate 24 Channels of sound at 44.1 kHz and used built-in digital effects. The Playstation also had spots for 2 memory cards and 2 controllers as well as a some mysterious I/O ports on the back that US gamers never saw (legally) used ("Playstation Frequently"). As an added bonus the CD reader on the Playstation allowed gamers to play their favorite audio CDs. For the first time ever, game consoles had another function besides playing games. The introduction of the Sony Playstation effectively changed the politics of the console wars.

it conveyed the energy of game play. The game also integrated FMV scenes to an extent that no game had previously. Because *Final Fantasy VII* used the Playstation technology more fully than any other game up to that point, production of the game cost $30 million dollars and took a team of 120 artists. Accordingly, *Final Fantasy VII* had the largest budget for advertising of any game to that time.[70] It is not surprising that *"Final Fantasy VII* sold 8.6 million copies worldwide." The success of the game also prompted Square to further assert its North American presence. In 1998 "Square joined forces with Electronic Arts" and formed Square Electronic Arts L.L.C. ("Company Information").[71]

The Video Game Base of *Final Fantasy VII*

The graphic capabilities of the Play Station game console combined with the CD format permitted Square to incorporate more, and more graphically rich, objects in *Final Fantasy VII* (this is noted on Figure 3.6). As is also noted, the graphic detail incorporated into the game also correspondingly encouraged more complex functions of objects.

There are thousands of ambient objects in *Final Fantasy VII*. While the functions of these objects are not so complex as to allow agents to interact in complex ways with each object, the functions are complex enough to permit agents to maneuver on or about these objects. More importantly, the semi-realistic graphic depictions of ambient objects in *Final Fantasy VII* make the analysis of both image and function possible. Notably, the

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[70] Because *Final Fantasy* and *Final Fantasy II* (really *Final Fantasy IV* in Japan) were the only games previously released in North America, *Final Fantasy VII* also jumped the series immediately ahead for North American gamers, thus making the distinction between the Japanese and North American releases less confusing. Thus, *Final Fantasy VIII* and *Final Fantasy IV* could be released in the United States for the Playstation console without a name change.

[71] The North American branch of this company has the "exclusive publishing rights in North America for all interactive entertainment titles developed by Square." Square Electronic Arts is complimented in Europe by Square Europe Ltd.

Objects:
* Depicted with thousands
  of colors and simulated texture.
* Many objects are also
  accompanied with a literal sound.

Ambient Objects:
* For example: There are elevators, doors,
  ladders, vines, cargo systems, computers, etc.
* Depicted with near lifelike graphic detail.
* Hundreds in each enviroment.
* The functions of some ambient objects are
  complex, and include movement and literal sound.

Environments:
* See Figure 3.7

Maneuverable Objects:
* Submarine, airship, several species of chocobos (large
  ostrich like birds), motorcycle, snowboard.
* Given as a gift, stolen, or bought at various points in the game.
* Can be used to traverse different terrains or race other agents.

Facilitating Objects:
* Over 400.

Tools/Commodities:
* See Figure 3.7

Information Objects:
* A menu that has various tables representing an agent's health,
  defensive ability, inventory of facilitating objects, etc. These
  menus can be used to arm agents, etc.
* A colorful map of the planet.
* Several, otherwise ambient objects within the gamethat
  give agents information about the world and how to interact.
  These include: letters, books, and computers.
* Some information objects notify an agent when a
  gate is locked, or give agents clues about a password.

Agents

Figure 3.6: *Final Fantasy VII* Objects

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Environments:

* The global environment has realistic detail. For example, mountains have color variation and, instead of sharp transitions between grass and mountains, grasslands gradually rise to mountains.
* 14 rural environments. Not accessible from the global environment. Linked to urban environments.
* 14 urban environments. Each reflects a city's/town's age, culture, technology and economic prosperity or deprivation.
* Several places of commerce, such as weapon, armor and item sellers, within each urban enviroment.
* The most significant urban environment is Midgar, which is divided into 19 sectors similar to neighborhoods.
* The distinction between governmental environments, commercial environments, and residential environments is difficult to distinguish.
* 2 religiously significant environments.
* A handful of residential environments within every envrioment. 3 of these are significant enough to appear in the global environment as icons.
* 8 Misc. environments such as power reactors, underwater bunkers, massive ships, etc.
* The architecture of each building is appropriate for the surrounding geographic region. For example, at the beach there are huts.

Tools/Commodities:

* Can be divided into accessories, weapons, armor, materia (magic energy crystals) and misc. items.
* There are over 100 weapons total, and aproximately 150 accessories, pieces of armor and items.
* Depicted mainly textually, except during agent interactions such as assault.
* Each player-controlled agent uses a specific type of weapon, ranging from a sword to a shotgun. There are approximately 10 weapons available for each agent, including one ultimate weapon that is often very difficult to obtain.
* Each weapon has slots that can receive energy crystals referred to as materia. The best weapons have eight connected slots in which to put materia.
* Materia adds ability to the weapon or to the player. There are 4 categories of materia and over 100 total. There are no restrictions on what agent uses the materia.
* Armor works similarly to weaponsand can be equipped with materia.
* Misc. items are mainly health products such as: antidote, elixir, ether, eye drop, echo screen, hi-potion, x-potion, turbo ether, cornucopia, hero drink, phoenix down, and vaccine.

Figure 3.7: *Final Fantasy VII* Objects Continued

quantity of ambient objects when they come together in *Final Fantasy VII* to form environments, as is noted in Figure 3.7, made possible the depiction of several distinct environments in *Final Fantasy VII*. Thus, comparative analysis between environments, as well as comparative analysis between environments and the world outside the game, are possible. It may be particularly insightful to analyze the urban environments in *Final Fantasy VII* in which prosperity, poverty, technology, etc. are apparent.

There are thousands more facilitating objects in *Final Fantasy VII* than in the first *Final Fantasy*, and the various functions of facilitating objects are also more complex. In addition, the depiction of facilitating objects in *Final Fantasy VII* is both textual and graphic. This makes analysis of facilitating objects in *Final Fantasy VII* a visual, as well as textual and functional, undertaking. Although maneuvering objects were present in the first *Final Fantasy*, the contexts in which *Final Fantasy VII* presents them, such as a race or a mountain descent, causes the game to morph, at times, into a racing game, a sports game, or flying game, which may provide for several types of genre analysis. Information objects are also much more prevalent and complex and particularly allow the customization of weapons and armor and assigning these customized facilitating objects to various player-controlled agents. This potential has ramifications, particularly regarding agent analysis.

As is noted in the agents category on Figure 3.8, there are diverse agents in *Final Fantasy VII*, and this makes possible the analysis of race, class and gender as well as quantitative studies that note the presence of such content. Given that the quantity of the dialogue ranges from one line to several paragraphs, and that the dialogue reflects race, class, and gender difference, there is also much more content for textual analysis in *Final*

Agents:
* Agents include multiple species of beings and multiple races, genders and ethnicities within these species. This is obvious from the color of skin, shape of an agent's body, facial features and even hair.
* Different types of clothes and even tattoos and body piercing are also evidence of diversity.
* Dialogue appears typed in blue boxes.

Cooperative Agents:
* Include parents, grandparents, and concerned friends of the player controlled agents.
* Reveal valuable information or give facilitating objects.

Non Player-Controlled Agents:
* Appearances and attacks change little throughout the game.
* Dialogue changes frequently depending on the actions of player-controlled agents.

Non Cooperative Agents:
* Composed of ex-friends, corporation heads, gang leaders, or wealthy capitalists including a mob boss and a casino owner.
* Confrontations with these agents are usually violent, time consuming, and difficult.
* These agents may keep re-emerging throughout the game, more powerful each time.
* The main villian is Sephiroth and the Shinra Corporation that created him.

Main Agents:
* Approximately 25.
* All are named, look unique, and have a significant role in the game.
* Dialogue may consist of several paragraphs.

Cooperative Agents:
* Includes children, merchants, assistants, etc.
* Also includes mystical creatures that come to the aid of the player-controlled agents. These are called guardian forces.
* Many do not have names.
* Often give bits of information about the planet or agents.

Sub Agents:
* Most numerous cetagory of agents.
* Dialogue is limited to a few lines.
* Provides extra information about the world and the narrative.

Player-Controlled Agent(s):
* In the beginning of the game the party consists of only one agent, Cloud Strife.
* 7 other agents join Cloud intermittently as the game progresses. Only three are seen at one time.
* 2 additional agents may or may not join the party as a result of the choices made by gamers; these agents are Vincent Valentine, a vampire like human; and Yuffie Kisaragi, a ninja.
* At some points in the game, a gamer may populate the party with various combinations of agents for specific missions.
* Abilities of these agents vary greatly depending on decisions made by a player during the game.

Non Cooperative Agents:
* Include agents such as: Adamantaimai, Bad Rap, Bahba Velamyu, Bandersnatch, Bandit, Blood Taste, Chekhov, Harpy, Joker, Marlboro, Gorki, and Gremlin.
* Nearly 300.
* Attack player-controlled agents randomly or when commanded to by other non player controlled agents.
* Usually not very powerful.
* Each may appear several times thoughout the game.
* May be encountered anywhere, but mainly in global environments.

Figure 3.8: *Final Fantasy VII* Agents

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Fantasy VII. Because players are at times given a choice about which agents will participate in the game, and which agents will use which facilitating objects, particularly materia which adds functions to a player-controlled agent, analysis of player-controlled agents in *Final Fantasy* might also consider the ways that parties of player-controlled agents are constituted, and how each agent is developed and assigned to use facilitating objects. The ability of gamers to customize player-controlled agents might warrant analysis of identity formation within the game, or a discussion of the ideological allegiance of an agent.

While non player-controlled agents in the first *Final Fantasy* had minimal roles in the game compared to player-controlled agents who were present throughout the game, in *Final Fantasy VII*, the main non player-controlled agents, both cooperative and non cooperative, are continually present and often resurface several times throughout the game. Because new information is constantly being revealed about these agents, studying these agents can be difficult. Analysis of non player-controlled agents must take into consideration the ways in which these agents are presented throughout the entire game.

Sub agents in *Final Fantasy VII* are also much different than in the first *Final Fantasy*. Whereas in the first *Final Fantasy* the sub agents served little purpose except to encourage player-controlled agents or provide them with an opportunity to hone their skills before encountering main non cooperative agents, the sub agents in *Final Fantasy VII* have a much more significant function; their presence, while not integral, helps contribute to the sense of reality of the world depicted. A good example of a cooperative sub agent whose presence contributes to the reality of the game is Marlene, the daughter of one of the player-controlled agents. Though Marlene does not play a significant role in

the game, her existence gives her father (who is one of the player-controlled agents) a reason to fight to save the planet. As with player-controlled agents, the quantity and different classifications of non player-controlled agents, and the images, functions and dialogue assigned to these agents can also be analyzed.

The player-controlled agents in *Final Fantasy VII* can maneuver, interact with ambient and facilitating objects, as well as talk, compete, trade and assault other agents. As depicted on Figure 3.8, the non player-controlled agents, with the slight exception of non player-controlled sub non cooperative agents, all have similar functions as the player-controlled agents. Despite the increased graphics and more complex function, as noted on Figure 3.9, maneuvering and facilitating object interaction is still relatively simple, as it was in the first *Final Fantasy*, and there is not much that can be studied about the ways that agents move about and open doors or ride elevators besides the technical composition of the environment and the way that different types of vectored movement contributes to the simulation of three dimensional space.

The commonly depicted interactions in *Final Fantasy VII*, as indicated by Figure 3.10, are more complex than the first *Final Fantasy* with regard to agent interaction. When one agent assaults another agent, direct contact is made between the agents. Because weapons such as swords and guns are noticeably apparent during some violent interactions, there are concrete images and interactions for critiques of video game violence.

As can be gleaned from comparing Figure 3.4 with Figure 3.11, regarding the commonly depicted programmed responses in *Final Fantasy VII*, ambient objects and facilitating objects respond similarly to the way they do in the first *Final Fantasy*.

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However, cut scenes are very different in *Final Fantasy VII*, and not only frame the

narrative, but also intermittently interrupt the narrative to give player-controlled agents

explicit directions, or explain in great detail events that happened prior to the beginning

of the video game. These cut scenes provide a significant amount of

Commonly Depicted Interactions:
* Many interactions are depicted with mechanical agent movement.
* Interaction may be accompanied by lifelike literal sound.

Maneuverig:
* Manevuering is at times fluid motion.
* Maneuvering requires going around, over, under, or through ambient objects and enviroments.
* Takes place in every environment.
* Agents can maneuver along the x-axis or y-axis and in some enviroments on the z-axis.
* Most environments require agents to maneuver on intricate paths and maneuvering must be precise.
* Mis-maneuvering is not a fatal infraction, it usually only delays the game.
* Player-controlled agents can run if a gamer presses a designated button
* Agents may explore as long or as far as they wish in the global enviroment but are limited by the constraints of the ambient objects of the terrain.
* Agents can board a maneuverable object by walking into it, and the object can then be maneuvered.
* Maneuvering objects permit mountains or bodies of water to be traversed.

Ambient Object Interaction:
* Happens most often when an agent maneuvers.
* Agents can walk into, up, down, or through these objects.
* Objects such as doors and chests may be opened.
* Objects such as elavators may be operated and vines climbed on, etc.

Fascilitating Object Interaction:
* Gamers may select commands from menus (information objects) within the game and direct agents to buy, sell, or use a facilitating object.
* This facilitating object may be directed at other objects, agents, or the enviroment.
* Activation of an interactive object might summon a non player-controlled agent or explode an energy reactor.

Agent Interaction:
* See Figure 3.10

Figure 3.9: *Final Fantasy VII* Commonly Depicted Interactions

Agent Interaction:
* Not all types of agent interaction are permitted between player-controlled agents and other agents.

Talking:
* When an agent approaches a non player-controlled agent and the player press a designated button, scripted dialogue may appear in a blue box.
* Dialogue may also happen as a programmed response.
* Agents are sometimes presented with multiple choices of what they want agents to say or what questions they want them to ask.
* How players choose to ask and answer questions or address other agents in the game usually has an impact on how the game will later progress.
* Accompanied with body gesttures and facial expressions.

Competing:
* Agents can compete several times in what gamers popularly refer to as mini-games.
* This include Chocobo Racing, playing video games, and lifiting weights.

Trading:
* In commercial environments player-controlled agents can obtain interaction objects or services by exchangin money for them.
* Agents also may exchange items for other items several times during the game.

Assaulting:
* When an agent is confronted by a non player-controlled non cooperative agent gamers are presented with the options on a list.
* Non player-controlled agents and player-controlled agents make direct contact with one another during attacks.
* Weapons or fists function realistically during fights.
* Fighting is complex, particularly because there are lot of interactive objects for agents to use in battle and more types of attacks for agents to protect against.
* Each agent may demonstrate several types of programmed responses during battle, which makes interaction and outcomes unpredictable at times.
* Player-controlled agents are also permitted to violently interact with other player- controlled agents.
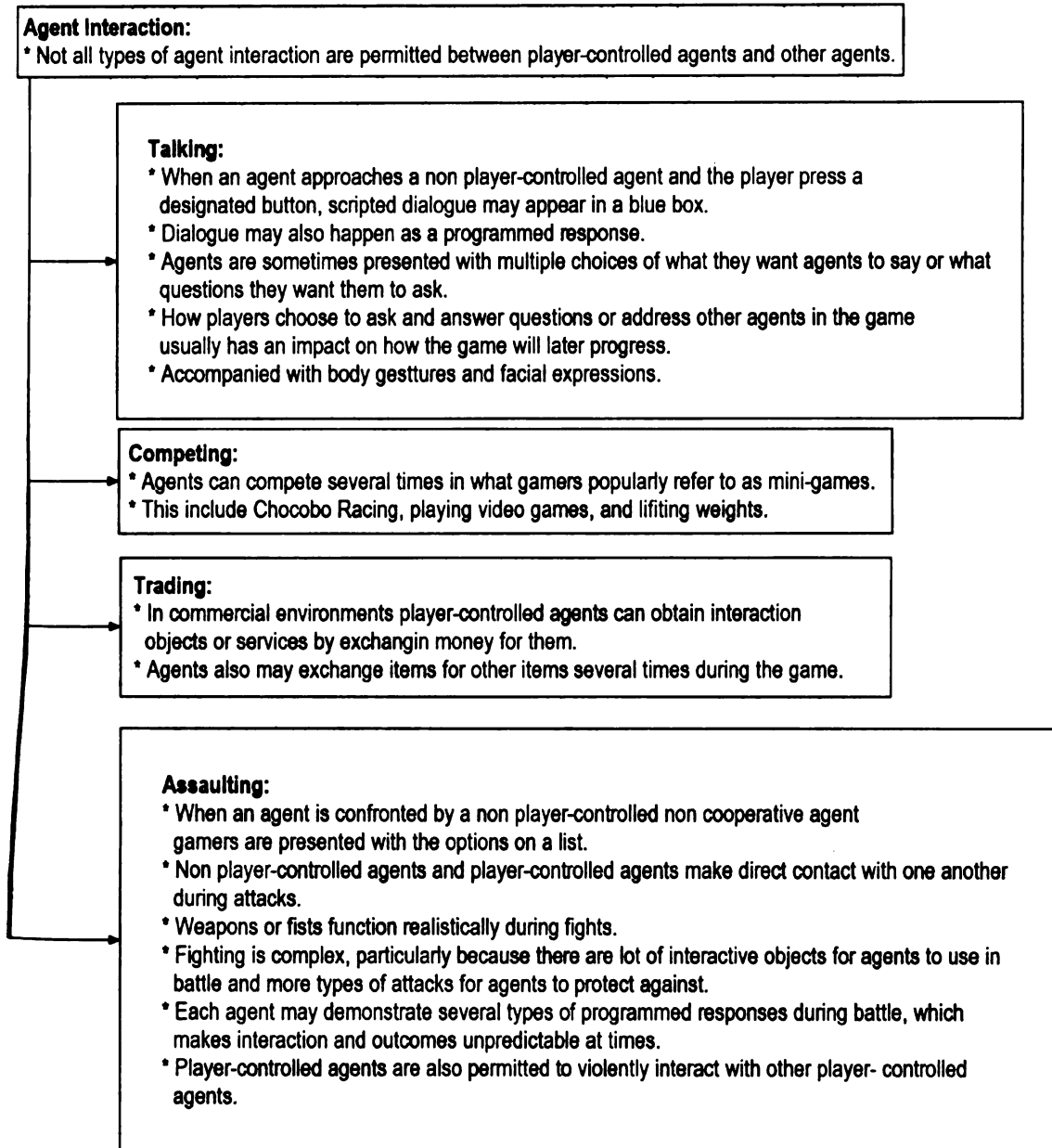
Figure 3.10: *Final Fantasy VII* Commonly Depicted Interactions Continued

Commonly Depicted Programmed Responses:
* Several programmed responses may be linked togethor.
* If the depiction of these reponses includes motion, this motion may appear either fluid or mechanical, and may incorporate simple literal sounds.

Cut Scene Response:
* Several cut scenes.
* Many cut scenes are full motion video clips that depict the results of the interactivity, or a continuation of the interactivity.
* This includes depictions of power reactors exploding, chase scenes, etc.

Ambient Object Response:
* Ambient objects that appear to be solid matter, such as walls or mountains, halt maneuvering at their borders.
* Oceans and streams also halt maneuvering.
* If an agent is in a maneuverable object, ambient objects may be traversed.
* Maneuvering into the door of a large freestanding structure or the image of a city triggers a programmed response that changes the screen to depict the interior of the structure.

Facilitating Object Response:
* Money may be debited or credited.
* A tool/commodity may be transfered.
* The supply of a commodity may decrease or increase.

Agent Response:
* Agents may suffer physcial damage, usually a loss of hit points (health).
* If the hitpoints of an agent reach 0, the agent will die.

Non Player-Controlled Agent Response:
* A commonly depicted interaction may be triggered depnding on the function of the agent.

Player-Controlled Agent Response:
* If the hitpoints of all player-controlled agents participating in a fight reach 0, the game will be over.
* If player-controlled agents kill non player-controlled agents, player-controlled agents are rewarded with money and receive points toward increases in physical prowess.
* If a commodity is used by a player-controlled agent, that same agent, or another designated agent, may receive the effects.
* If materia was inserted into a weapon or a piece of armor worn by a player-controlled agent, the characteristics of that player-controlled agent will change.
* Command materia allows agents to do things such as steal or throw.
* Independent materia allows agents to counterattack or protect other characters.
* Magic materia allows agents to cast spells such as comet or cure.
* Summon materia allows agents to summon mystical beings such as Bahamut or Shiva to come and help them in battle.
* Support materia allows players to enhance their effectiveness by absorbing magic points from enemies or becoming otherwise energized.
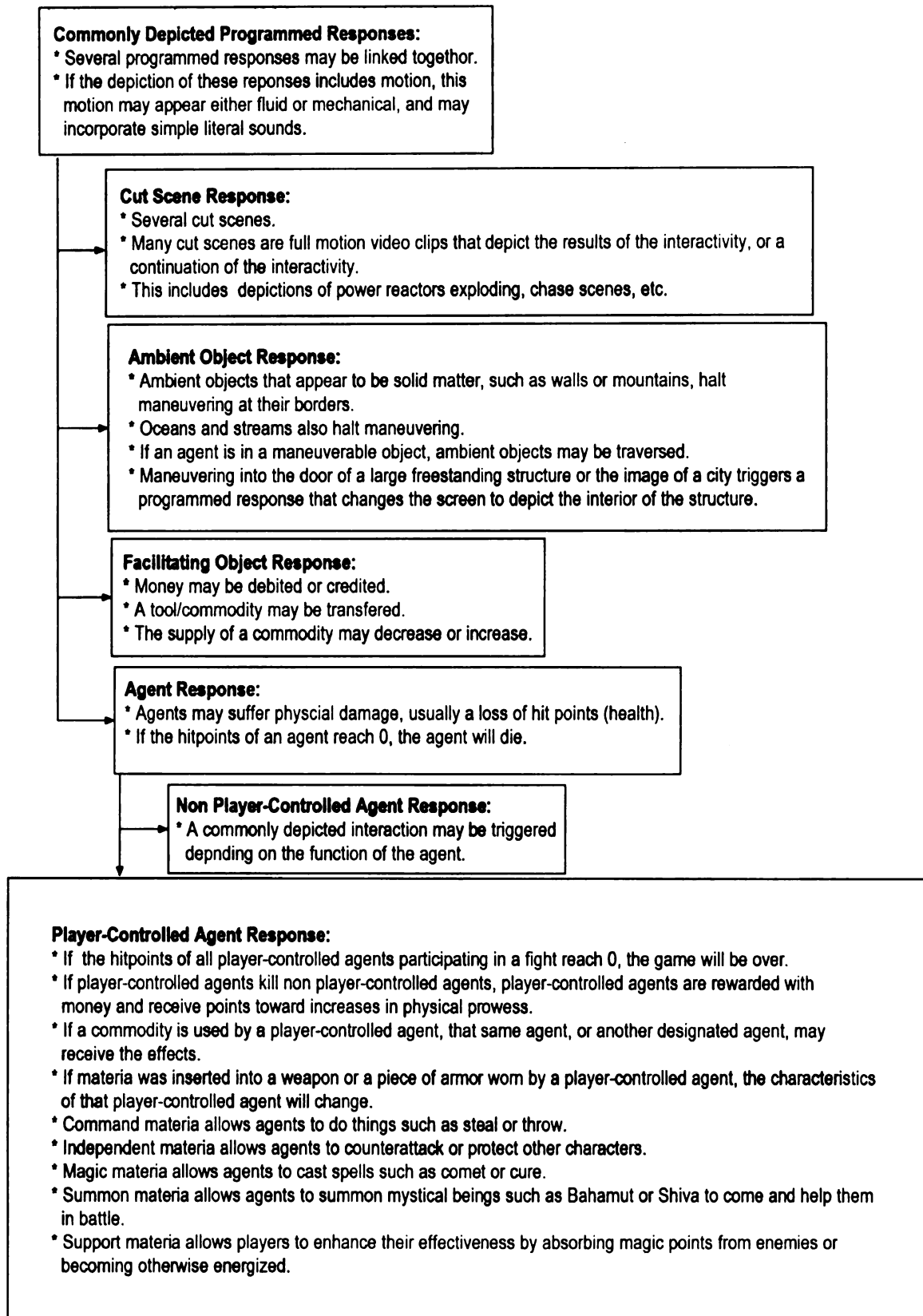
Figure 3.11: *Final Fantasy VII* Commonly Depicted Programmed Responses

content for narratological studies. There are also several near lifelike Full Motion Video

clips that might be analyzed using various theories form film studies. Because responses

of the player-controlled agent to the use of facilitating objects vary significantly from one

another, scholars might also study these responses in conjunction with the agent that is

being affected. This might provide some insight into the stereotypical depictions of race,

class, and gender in *Final Fantasy VII*.

All Previous Parts of the Model

Video Game Scenes:
* Each type of scene is accompanied by a CD quality non-literal orchestral soundtrack.
* Environments are denoted with hundreds of ambient objects, include both player-controlled and non player-controlled agents, and depict semi-complex responses, which typically include several lines of dialogue or a battle.
* Many scenes are about exploration, physical confrontation, friendship, or history.
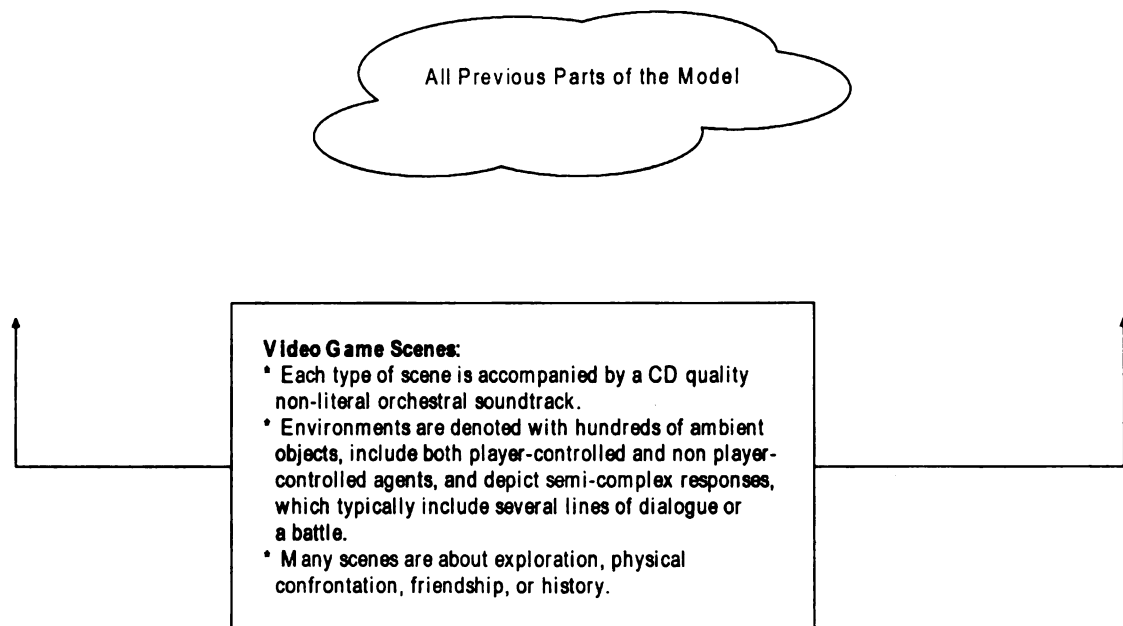
Figure 3.12: *Final Fantasy VII* Video Game Scenes

As is noted on Figure 3.12, the scenes in *Final Fantasy VII* are visually and

textually complex and the non-literal soundtrack echoes this complexity. Unlike the first

Final Fantasy, the complexity of scenes in *Final Fantasy VII* might make it worthwhile

to study the composition of scenes using film studies and media studies theories. From

studying the environments, agents, interaction and responses that are listed on the various

figures throughout this discussion of the base of *Final Fantasy VII*, common themes for

scenes can be inferred, and these might suggest different types of video game studies.

Obviously, the potential for studying video games increased exponentially with

the technological and software developments that took place in the early nineties. As will

be demonstrated in the next section, this trend continued at the beginning of this new

century, and the video game base of *Final Fantasy X* permits an almost limitless amount

of scholarly studies.

Final Fantasy X

Building on the concept of the Playstation, in 2000 Sony introduced the

Playstation 2, referred to by gamers as the PS2.[72] According to the official Sony

Playstation 2 specs, "Under the Hood," the futuristic black box boasts a 300 MHz

processor with a bus bandwidth of 3.2 GB per second. The configuration of the PS2

provides roughly "four times the performance" of PCs built on the "the PC-100

architecture." The PS2 is also capable of outputting Dolby Digital 5.1 theater-quality

sound.[73] The drive used to read the Playstation 2 software discs is a CD/DVD disc drive,

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[72] Nintendo eventually switched to optical disc media in 2002 with the Nintendo Game Cube. The Game Cube, which incorporates a custom IBM Power PC "Gekko" and operates at 485 MHz, uses a special 3 inch disc which can hold 1.5 GB of data ("GCN Detailed Specs"). Although the size of the media made illegal pirating of games more difficult, it unfortunately meant that Nintendo games could not be as expansive as games produced for other platforms that use full-size discs.

[73] The PS2 could display 66 million Polygons per second, at a resolution from 256 x 224 to 1280 x 1024.The PS2 also uniquely incorporates two USB ports, one S400 i.LINK port, one AV Multi Out port, one Digital Out (Optical) port, and an expansion bay to hold a hard drive and network adaptor. In addition the PS2 is also backward compatible with the original PlayStation games, which means gamers can play their old favorites alongside their new favorites ("Under the Hood"). This is something not offered to gamers since the Sega Genesis, which allowed for a special adapter so that Genesis owners could play Sega Master System games. As an added bonus, without adding any peripherals, the PS2 permits DVD movie, and CD playback. People playing games on their home PC might argue that they had enjoyed similar performance for several years. However, this was on much more expensive machines which often required

which means that DVD media can be used to store games. Because DVDs can store

approximately four times more data than a CD, and the hardware is capable of processing

lots of graphic data, games produced for this platform could be more expansive and have

better graphics and audio tracks than anything previously produced.[74] As the official PS2

website states, "The quality of the resulting screen image is comparable to movie 3D

graphics in real time."

The PS2 was also obviously designed with the intention of connectivity to several

peripherals.[75] By purchasing some of these peripherals, consumers can play video games

in cooperative online environments, or turn their PS2 into a Linux video game

development platform. In other parts of the world the PS2 can also be used to surf the

internet. Such additional functionality causes one to wonder how this will effect future

video game development.

Although *Final Fantasy IX* was released in the United States in 2000 after many

people already had a PS2, the game was designed for the original Playstation console. It

wasn't until December 2001 that *Final Fantasy X* was released in the United States and

became the first *Final Fantasy* game to be released for the PS2.[76] This game, as its

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a considerable amount of technological know-how. The PS2, which initially retailed for $299, simply required players to insert a disc and hit one button to start a game. This price point and ease of use made high quality gaming available to everyone.

[74] At the time the only machine remotely close to the processing power offered in the PS2 was the Sega Dreamcast. This was a good machine, with outstanding graphic capabilities, a built in modem and internet software. Unfortunately, like the Sega Master System, the console never really took off in the US. This was Sega's last attempt at producing a game console. It has since begun producing its games for other platforms.

[75] Peripherals are devices that can be attached to a piece of hardware to add expanded functionality to the hardware. On game consoles peripherals typically include controllers, steering wheels, light guns, fishing poles etc. and usually plug into a controller port.

[76] When *Final Fantasy X*, was released in the United States it was at the time according to Square, the final edition in the *Final Fantasy* series to be released as a single player role-play game. However, rumors of a sequel to *Final Fantasy X* have been a popular topic in periodicals devoted to video games. The sequel to *Final Fantasy X*, called by gamers *Final Fantasy X-2*, will be a unique addition to the series.

predecessor *Final Fantasy VII*, did an excellent job of showcasing the technical

possibilities for games on the PS2. Like other games in the series, *Final Fantasy X* has a

complex plot that takes a lot of thought to understand. Fortunately, gamers are aided for

the first time with spoken dialogue as well as the typical subtitles. The graphics are also

near-life-like and their quality makes deciphering the details of the game world a bit

easier. Agents are more defined, and the actions in a scene can include more subtle detail,

including facial expressions and hand gestures.

The Video Game Base of *Final Fantasy X*

Following the precedent set by previous games in the *Final Fantasy* series, the

quantity, depiction, and functions of objects increased in *Final Fantasy X* (see Figure

3.13). In addition there is a substantial amount of audio and controller vibrations attached

to various objects, so these functions might also be studied, in addition to the quantity,

quality, and function of an object. As a result of the increased quantity and quality,

gamers were presented with environments realistically filled with ambient objects.

Furthermore, as noted on Figure 3.14, because the depiction of environments is

accomplished with a moving simulated camera presence, ambient objects and

environments in *Final Fantasy X* are ripe to be studied with theories from film studies.

Again, as was the case in *Final Fantasy VII*, facilitating objects are composed of

function, image, and text, but may also be accompanied by sound and vibration.

Unfortunately, facilitating objects are still mainly presented in lists and during fighting

scenes, which means that there is not much aside from use value and exchange value that

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Until now no game has had a sequel, although some agents and themes overlap; each game in the series has
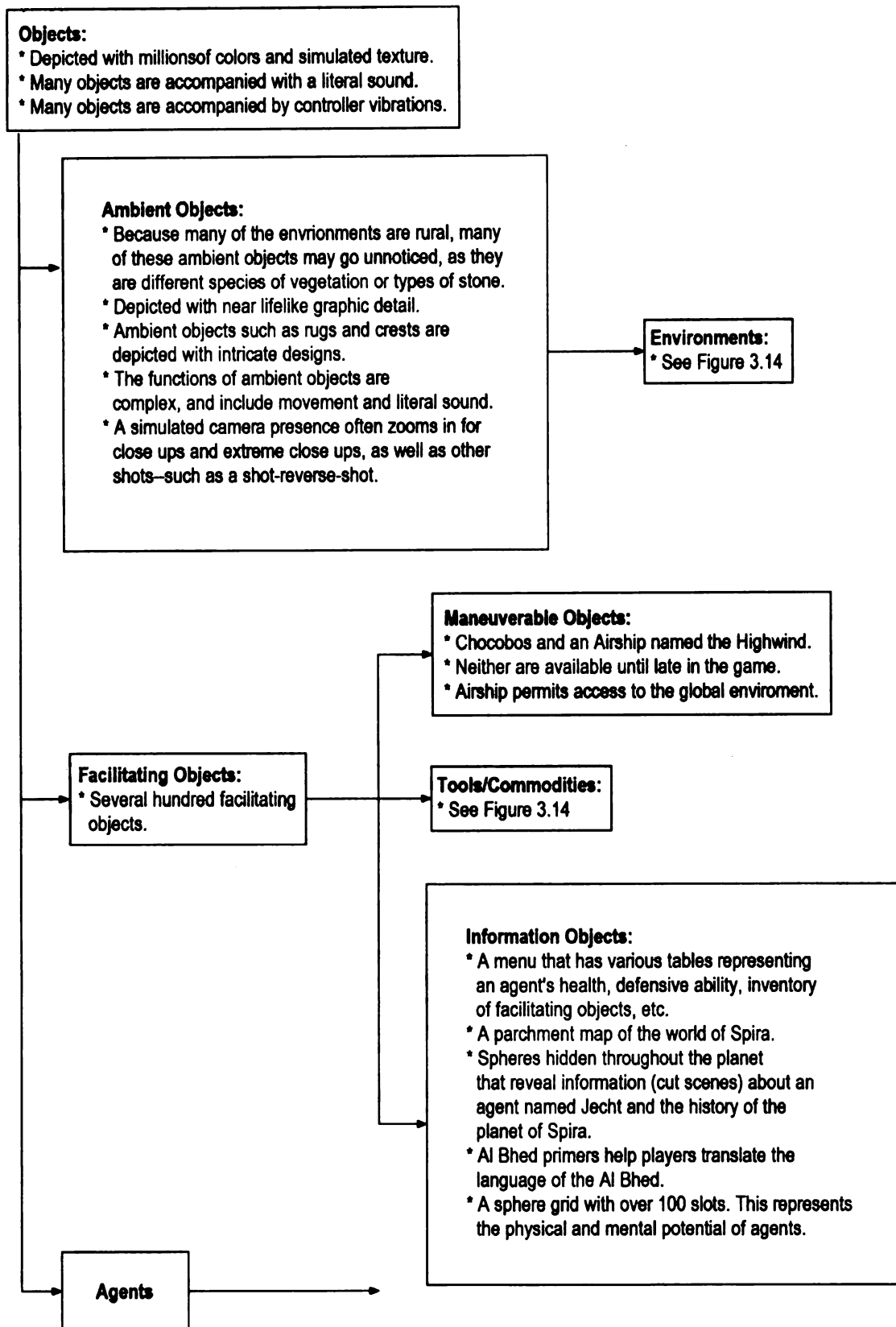had an independent and unique narrative.

Objects:
* Depicted with millionsof colors and simulated texture.
* Many objects are accompanied with a literal sound.
* Many objects are accompanied by controller vibrations.

Ambient Objects:
* Because many of the envrionments are rural, many of these ambient objects may go unnoticed, as they are different species of vegetation or types of stone.
* Depicted with near lifelike graphic detail.
* Ambient objects such as rugs and crests are depicted with intricate designs.
* The functions of ambient objects are complex, and include movement and literal sound.
* A simulated camera presence often zooms in for close ups and extreme close ups, as well as other shots—such as a shot-reverse-shot.

Environments:
* See Figure 3.14

Maneuverable Objects:
* Chocobos and an Airship named the Highwind.
* Neither are available until late in the game.
* Airship permits access to the global enviroment.

Facilitating Objects:
* Several hundred facilitating objects.

Tools/Commodities:
* See Figure 3.14

Information Objects:
* A menu that has various tables representing an agent's health, defensive ability, inventory of facilitating objects, etc.
* A parchment map of the world of Spira.
* Spheres hidden throughout the planet that reveal information (cut scenes) about an agent named Jecht and the history of the planet of Spira.
* Al Bhed primers help players translate the language of the Al Bhed.
* A sphere grid with over 100 slots. This represents the physical and mental potential of agents.

Agents

Figure 3.13: *Final Fantasy X* Objects

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can be studied. Conversely, the increased amount of information objects in *Final Fantasy X*, as is demonstrated on Figure 3.13, especially begs to be studied. In particular, these information objects suggest that knowledge has as significant a role in the game as material objects. For example, the sphere grid allows for the direct development and customization of an agent in complex ways, and this presents video games studies with the possibility of asking some ontological questions as well as some ideological questions about the content of *Final Fantasy X*.

Environments:
* The global enviroment is designed to fit all on one screen, and designed to look realistic. This is only accessable while agents are on the airship. There are no structures visible from the altitude so navigation is more difficult.
* 6 urban environments.
* 9 rural communities tucked away in remote locations and within these are some residential environments and commercial environments.
* Commercial environments are limited to Rin's Travel Agencies, which are scattered throughout the planet. There are also many independent merchants--especially O'Aka XXIII--who seem to make every environment a commerical environment.
* Few governmental environments, and those that do exist such as the Maester's palace in Guadosalam, also serve as residential and religious environments.
* The most prominent environments throughout the game are the 7 religious environments; each consists of a temple and cloister of trials. Each temple and cloister is different and reflects the surrounding geography.
* Connecting each of these enviroments are 5 well-traveled paths.
* There are more than 10 misc. environments. These include a salvage ship, a spaceship, and a sports arena.

Tools/Commodities:
* Tools include weapons, items and spheres (used to activate nodes on the sphere grid).
* Approximately 1,000 different types of weapons and armor, 100 misc. items, and 30 spheres.
* 120 different functions can be assigned to weapons and armor.
* Some items are specific to a culture, such as an Al Bhed potion used primarily by Al Bhed agents.

Figure 3.14: *Final Fantasy X* Objects Continued

While race, class, and gender distinctions were apparent in *Final Fantasy VII*, these distinctions are even more apparent in *Final Fantasy X* (see Figure 3.15). As noted on Figure 3.14, for the first time in the *Final Fantasy* series the dialogue of agents is spoken and this also contributes to our ability to make distinctions between agents. In

Final Fantasy X, more so than any game in the *Final Fantasy* series, race, class and gender can be studied.

More significantly, gamers are permitted to customize player-controlled agents and directly alter the physical and mental abilities of agents by using the sphere grid, noted on Figure 3.13 and Figure 3.15. Even though each player-controlled agent starts on a different spot on the grid, it is possible for an agent to move all over the grid learning and growing. The ability of gamers to freely alter agents might provide more insight into both the way that identity is constructed within the game, and also the ideological allegiance of this construction.

As with other games in the *Final Fantasy* series the correlation between image, function, and dialogue of non player-controlled agents may be studied as well as the ways in which both main and sub agents contribute to the realistic depiction of environments. Because the content is so complex there are no doubt many different types of analysis that can be performed, but also given that there are two very prevalent and competing cultures in the game, both with extensive histories, and strong religious beliefs, there may be ample opportunities for anthropological, cultural, and religious studies of the game. As in *Final Fantasy VII*, the images and dialogue of the non player-controlled agents in *Final Fantasy X* may change several times throughout the game. Non player-controlled agents may also reemerge several times throughout the game. The ever-changing presentation and presence of these agents may make it difficult to discuss them with any authority.

As noted on Figure 3.15 and more specifically on Figure 3.16 and Figure 3.17, the complexity of the functions of agents in *Final Fantasy X* is similar to those of *Final*

Agents:
* Agents visually and vocally represent distinct genders, races, and ethnicities.
* Agents in this game are depicted in such detail that subtleties of skin color, facial features and hair color are even noticeable.
* Clothes reflect cultural differences.
* Regional dialects are also evident from the spoken dialogue.

Cooperative Agents:
* Parents and concerned friends of the player-controlled agents.
* These include: Belgemine, a summoner who tests Yuna; and Maechen, a scholar who knows the history of the planet.
* Reveal valuable information, give facilitating objects, or challenge players to improve.

Non Player-Controlled Agents:
* Appearance, attacks, and dialogue all change throughout the game.

Non Cooperative Agents:
* Composed of ex-friends, competitors, and insane despots.
* The primary villian is Sin, a flying whale like monster that destroys cities and Maester Seymour.
* Confrontations with these agents are usually violent, time consuming, and difficult.
* These agents may keep re-emerging throughout the game, more powerful than before.

Main Agents:
* Approximately 25.
* All are named, look unique, and have a significant role in the game.
* Dialogue may last several minutes.

Sub Agents:
* Most numerous catagory of agents.
* Dialogue is limited to a few lines.
* Their presence adds reality to the game world.

Cooperative Agents:
* Include concerned friends of the player-controlled agents.
* For example: Rikku's brother, and Clasko and Elma, two Chocobo Knights
* Provide extra information about the world and the narrative.

Player-Controlled Agent(s):
* Begins with only one player-controlled agent, Tidus.
* 8 other agents later join the party.
* Only 3 agents are allowed in battle at a time, but a player can tag agents in and out of battle as they please.
* 9 different Aeons, can be summoned by Yuna and become player-controlled agents after they are summoned.
* Abilities of player-controlled agents vary depending on decisions made by a players while interacting with the sphere grid.

Non Cooperative Agents:
* Include agents such as: Adamantoise, Chimera, Chocobo Eater, Condor, Dingo, Great Malboro, Grendel, Warrior Monk.
* Nearly 300.
* May be encountered anwhere.
* Attack player-controlled agents randomly or when commanded to by other non player-controlled agents.
* Usually not very powerful.
* Each may appear several times in the game.

Figure 3.15: *Final Fantasy X* Agents *Fantasy VII*

Fantasy VII. Player-controlled agents can maneuver, interact with both ambient and facilitating objects, and talk, compete, trade with and assault other agents. As is discussed in Figure 3.15, the non player-controlled agents also perform all of these functions. While the types of commonly depicted interaction may be the same, the commonly depicted interactions in *Final Fantasy X* are much more fluid and precise than any game in the *Final Fantasy* series.

Not only can gamers direct agents to move about in these new graphically rich environments; agents are also permitted in many environments to move along the "z-axis" which is toward or away from the player/simulated camera and into these spaces (Zettl 375). With the increased graphic detail and precision of motion the interaction of agents also subtly reflects the differences between agents, as noted in Figure 3.15. The precision with which agents maneuver may thus be studied as socially symbolic action. This provides yet another venue for the study of race, class, and gender in video games as one might study ideological biases inherent in the depiction of maneuvering. When agents talk to one another, the interaction is also often accompanied with movement, which may be gestures or even facial expressions. Combined with the increased choices for dialogue discussed in Figure 3.15, there is ample content for communication studies to focus on in *Final Fantasy X.*

Because competition in *Final Fantasy X* has a more significant role in the game, and is at times an integral part of the narrative, this might provide content for cultural studies or sports scholars. The increased graphics of *Final Fantasy X* also make violent agent interactions more explicit, which gives video game violence scholars more content to study.

Commonly Depicted Interactions:
* Interactions are depicted with fluid agent movement and incorporate lifelike literal sound.

Maneuvering:
* Takes place in every enviroment.
* Maneuvering requires going around, over, under, or through ambient objects and environments.
* Maneuviring is linked to a shifting three dimensional camera perspective.
* Players can move very easily in any direction along the x, y, or z-axis.
* Most environments require agents to maneuver on intricate paths from location to location and through towns.
* Mis-maneuvering is not a fatal infraction, it usually only delays the game.
* Player controlled agents can run if a gamer presses a designated button
* Maneuvering is limited by the constraints of the ambient objects that make the terrain.
* After receiving use of the airship players can access a global view of the planet and move more freely to different locations using the ship. This maneuvering must take place by entering coordinates for the airship to fly to.

Fascilitating Object Interaction:
* Gamers may select commands from menus (infromation objects) within the game and direct agents to buy, sell, or use a facilitating object.
* This facilitating object may be directed at other objects, agents, or the enviroment.
* The agent Rikku has the ability to combine facilitating objects in hundreds of different ways.
* Agents place spheres (facilitating objects) in a monstrous rhizomatic sphere grid (infromation object) that has over one hundred nodes.

Ambient Object Interaction:
* Happens most often when an agent maneuvers.
* Agents can walk into, up, down, or through these objects.
* Objects such as doors and chests may be opened.
* Ambient object interaction is very complex in special relgious environments termed within the game a cloister of trials. Agents must manipulate ambient and facilitating objects within these environments in order to conquer the cloister and be released from it.

Agent Interaction:
* See Figure 3.17

Figure 3.16: *Final Fantasy X* Commonly Depicted Interactions

Agent Interaction:
* Not all types of interaction are permitted between agents.
* Agent interaction is fluid and often inlcudes lifelike literal sounds.

Talking:
* When a player-controlled agent approaches a non player-controlled agent and the player presses a designated button scripted dialogue will be spoken by an agent.
* Spoken dialogue may also happen as a programmed response.
* Agents are sometimes presented with multiple choices of what they want agents to say or what questions they want them to ask.
* How players choose to ask and answer questions or address other agents in the game usually has an impact on how the game will later progress.
* When agents engage one another in conversation, they often react physically and expressively.

Competing:
* Player-controlled agents may, if they choose, participate in blitzball games (underwater soccer) and invite other non player-controlled agents to join their team.
* Player-controlled agents may capture non player-controlled agents and take them to a special arena to compete against them for prizes.

Trading:
* In commercial enviroments player-controlled agents can obtain facilitating objects or services by exchanging money for them.
* Agents also may exchange items for other items during the game.

Assaulting:
* The elimination of the world map means all confrontations are initiated and take place in the actual location, although there are still transitions to a special battle scene.
* When a player-controlled agent is confronted by a non player-controlled non cooperative agent gamers are presented with the options on a list.
* Non player-controlled agents and player-controlled agents make direct contact with one another during attacks.
* Weapons or fists function realistically during a fight.
* Each agent may demonstrate several types of programmed responses during battle, which makes interaction with agents unpredictable at times.
* Fighting is complex, particularly because there are an abundance of objects for agents to use in battle and more types of attacks to protect against.
* Player-controlled agents are also permitted to violently interact with other player-controlled agents.

Figure 3.17: *Final Fantasy X* Commonly Depicted Interactions Continued

In general the programmed responses in *Final Fantasy X* are similar to those of earlier games in the series and incorporate systems for rewarding successful combat, debiting or crediting money for buying or selling objects, and revealing narrative.

However, in *Final Fantasy X* these programmed responses are much more complex than in any earlier game in the series. For example, it is very difficult at times to distinguish full motion video cut scenes from regular game play in *Final Fantasy X*. In addition, ambient objects respond more realistically, as do agents, whose facial expressions, gestures and dialogue respond according to specific types of interaction. The responsiveness of player-controlled agents to the input on the sphere grid is also an attempt at realistically complicating the development of player-controlled agents. Combined, the programmed responses of *Final Fantasy X* allow for the study of the way that reality is presented in video games, not just in the types of interaction permitted player-controlled agents, but the responses of the game to this interaction. Because previous games in the series were noticeably less realistic, considering the reality of these previous games would have been trite.

The scenes in *Final Fantasy X* are by far the most complex of any scenes in the *Final Fantasy* series, and among the most complex scenes in any video game to date. While these scenes, because of their form and themes, can be studied from perspectives such as film studies, and post colonialism, the complexity of these scenes and realistic depictions might also warrant that scenes be studied as virtual reality. For example, scholars might attempt to understand the way that all of the elements of the video game base combine to create a simulated reality in which players can direct agents to interact. While this topic might have been broached with earlier games in the *Final Fantasy* series, the simplicity of the games did not warrant such a focus.

Commonly Depicted Programmed Responses:
* Several programmed responses may be linked together.
* If these responses include motion,the motion is fluid.
* Responses are often accompanied by lifelike literal sounds and controller vibrations.

Cut Scene Response:
* Cut scenes are integrated frequently and seamlessly with game play.
* Many full motion video clips depict the results of the interactivity, or a continuation of the interactivity.
* Video clips range from sporting events to romantic music videos.

Ambient Object Response:
* Ambient objects that appear to be solid matter, such as walls, mountains, or forests halt maneuvering at their borders.
* Oceans and streams allow maneuvering, but not very far into them.
* Maneuvering into the door of a large freestanding structure triggers a programmed response that changes the screen to depict the interior of the structure.

Facilitating Object Response:
* Money may be debited or credited.
* A tool/commodity may be transferred.
* The supply of a commodity may decrease or increase.

Agent Response:
* Agents may suffer phsycial damage, usually a loss of hit points (health).
* If the hitpoints of an agent reaches 0, he or she will die.

Non Player-Controlled Agent Response:
* A commonly depicted interaction may be triggered.
* A merchant may change prices depending on the amount of money invested by an agent in his business and how many items an agent buys.

Player-Controlled Agent Response:
* If the hitpoints of the player-controlled agents engaged in battle reaches 0, the game will be over.
* If player-controlled agents kill non player-controlled agents, they are rewarded with money and receive points toward increases in physical prowess.
* If a commodity such as a potion is used by a player-controlled agent, that same agent or another designated agent may recieve increased hitpoints.
* If a sphere is placed in the sphere grid by a player-controlled agent, then that agent will be affected with an in increase in: strength, magic, agility, ability, luck, skills, hitpoints, magic points, defense, evasion, or accuracy.

Figure 3.18: *Final Fantasy X* Commonly Depicted Programmed Responses

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Video Game Scenes:
* Each type of scene is accompanied by a CD quality non-literal orchestral soundtrack.
* Environments are denoted with hundreds of ambient objects, include both player-controlled and non player-controlled agents, and depict complex responses, which typically include several lines of spoken dialogue or a battle.
* Many scenes are about physical confrontation, friendship, spiriturality, or romance.

Figure 3.19: *Final Fantasy X* Video Game Scenes

Comparative Analysis

Over the last fifteen years, the platforms, quality, and content of games in the

Final Fantasy series have significantly changed, and gamers have increasingly been

presented with more possibilities to tailor the individual gaming experience. It is obvious

in this brief history and analysis that in the period of a decade and a half, a medium that

was formerly simple, became complex and then extremely complex. Throughout the

Final Fantasy series there has been a continual increase in the number of objects included

in the video game base, the quality of the depiction of these objects, and the function of

these objects. The realistic depiction of objects has not only facilitated a gamer's ability

to achieve presence, but has also provided video game studies with several new types of

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content to study. Ambient objects can be studied not only visually, but also audibly, and tactilely, and the filmic qualities of this depiction may also be considered. Tools and commodities that were originally depicted in the first *Final Fantasy* have advanced from having relatively simple functions united with textual labels to having complex functions, images, sound, and vibration. This has meant that not only can scholars study use value, and exchange value, but also representation and stimulation. Information objects, which were are as simple as menus and maps, have become much more complex, contain more information, and also have begun to be represented in more complex graphic ways within the game--such as the sphere grid. The sphere grid in particular foreshadows a development in video games that has until now been lacking—how to incorporate and allow for the customization of largely unquantifiable characteristics such as knowledge or emotion.

Over all, in the development of the *Final Fantasy* series the agents have gone from being depicted with a handful of colored pixels to being depicted with near life-like quality with appropriate dialogue and facial expressions to match. Correspondingly, the agents now represent different genders, races, ethnicities, as well as different values, occupations, and socioeconomic status. Gamers have also been able to customize the physical and mental qualities of these agents. The combination of all these changes has made analysis of how identity is formulated within video games an important consideration, as well as permitted ideological analysis along the lines of race, class, and gender.

At the same time that player-controlled agents have grown to become more complex, non player-controlled agents have also become more complex. Not only are not

main and sub non player-controlled agents graphically and audibly rich, but their depictions in the *Final Fantasy* series, unlike player-controlled agents, may change and more notably their dialogue may be different depending on the point in the game they are encountered. Thus analysis of these agents cannot simply stop at first impressions as was possible when studying non player-controlled agents in the first *Final Fantasy*. The complexity of non player-controlled agents in later *Final Fantasy* games warrants a significant amount of attention from disciplinary perspectives from cultural studies to psychology.

Whereas commonly depicted interactions in the first *Final Fantasy*, with the exception of maneuvering, involved very little to no actual depicted interaction between agents and the objects that made up the world of the video game, there was a significant amount of detailed and precise interaction in later *Final Fantasy* games and in particular *Final Fantasy X*. This has meant that the study of interaction in the series, which might have begun with applied media aesthetics, could also be approached from race, class, or gender studies, more generally cultural studies, communication studies, etc.

This situation was very similar regarding commonly depicted programmed responses, which began simple and predictable in the first game in the *Final Fantasy* series. However, the commonly depicted programmed responses in *Final Fantasy X* are realistically complex, even incorporating vibrations to simulate the feel of the environment. This has been further complicated with cut scenes that are indistinguishable at times from gameplay. The complexity of scenes, created from the combination of all of these components of the base, is realistic; ultimately, while the video game scenes may be studied for the way that they represent reality using film studies methodologies, scenes

may also be studied according to the way that they create a new reality, a virtual reality in which gamers can customize agents, shape an agent's identity, and direct him or her to interact in the world of the game.

Stepping back from the specifics of the video game base for a moment, the trend seems to gravitate toward more and more realistically depicted ambient objects, facilitating objects, and agents. The functions of these objects and agents have also become more realistic and complex, and not only are gamers permitted to customize their agents, but also permitted to direct these agents to interact in more ways with these objects and within the environments presented to them. While all this means a more immersive experience for gamers, it also means that there is more confusion, and more epistemological and ontological questioning and formulation that must take place as gamers decide what they know, how they know it, who they are, what they are doing, and then act accordingly. Given the complexity of the video game base presented in this chapter, one may wonder how gamers ever uncover embedded narratives--if they are present, stay alive, or negotiate the video game interface. In the next chapter, I theorize how gamers are encouraged to identify and interact within video games, and elaborate on the connection this has to narrative and survival.

Conclusion

The purpose of the analysis in this chapter has been to demonstrate that my proposed terminology and grammar can help video game scholars distill the multifaceted content of games so that it can be accurately conveyed to audiences, facilitate interdisciplinary video game studies by informing scholars of the relative significance of

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their studies, and at the same time, unite video game studies with a common terminology.

As demonstrated in this chapter, in order to use this grammar one might first acquaint

herself with the terms and definitions that I provided and look for content within the

video game base that fits these definitions. One might then note the presence, quantity,

and significance of the content that comprises the video game base, possibly even noting

some examples of this content, and identify the most appropriate venues for analysis.[77]

To be sure, one could go into much greater detail with this analysis presented in this

chapter; however, more detail would not be practical here, as the task at hand has been to

test the effectiveness of my proposed terminology and grammar, not impart a total

mastery of *Final Fantasy* games.

While this grammar may help us understand video game content, it does not

provide video game studies with a method for understanding why gamers direct player-

controlled agents to interact with this content in the ways that they do. For example, there

are multiple scenarios permitted by the video game base of the first *Final Fantasy*. If

gamers want, they can prevent player-controlled agents from buying facilitating objects

such as weapons, and then direct the player-controlled agents to walk from forest to

forest defeating non player-controlled, non cooperative agents with their fists. Gamers

might have also decided, while being assaulted by a non player-controlled, non-

cooperative agent, to allow three of their fellow light warriors to perish, and then

complete the game alone as a single light warrior. While theorists such as Ted Friedman,

Mark Wolf, and Lev Manovich have noted that the rules of the game are complicit in a

process of influencing the choices that a gamer makes, Friedman simultaneously notes

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[77] Unquestionably, this is time consuming. In preparing the analysis of *Final Fantasy* video games in this chapter, I played each game several times and took extensive notes.

that players can deploy several strategies for "winning" a game such as *Civilization*. This is problematic because neither Friedman nor anyone else has proposed a way for understanding why players choose between one successful strategy and another—or even choose an unsuccessful strategy. One might argue that there is no reason for the decisions that a gamer makes, that the decisions are arbitrary. However, (inter)action without motive is not possible. As elaborated by Burke in a *Grammar or Motives* all action is motivated, if an action is not motivated then it is no longer action, it is simply motion. Because all action has motive, we can attempt to understand the motive that stimulated this action.

While the grammar of video games gives video game studies important insight into what might be potentially revealed to gamers, this grammar does not explain the process by which gamers are encouraged to make choices within the video game base as they play a game. Earlier video game studies have equally failed to address this topic. To begin filling this void, in the next chapter I propose that video games are "rhetorically structured" to induce gamers to identify and act within the world of the video game in certain ways depending on the partisan interests with which a player-controlled agent or gamer identifies.

Throughout this next chapter the terminology and grammar of video games developed over the last two chapters gives us a language to use in the discussion of this rhetoric, and the relationships between the terms provides my discussion of the rhetoric of video games with a definite, albeit abstract, context. Furthermore, the grammar of the *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X* discussed in this chapter also provides a context for testing my proposed rhetoric of video games in chapter five.

CHAPTER 4

THE RHETORIC OF VIDEO GAMES: THE STRUCTURE OF IDENTIFICATION AND INTERACTION IN VIDEO GAMES

As video games progressed technologically in the eighties and nineties, a medium that was initially simple became complex and then extremely complex. In the period of a decade and a half, changes in the amount and quality of the content that could be incorporated in a video game provided those who wished to study video games with a significant amount of new content to be analyzed. At the same time gamers were presented with more possibilities for tailoring the individual gaming experience. And, as was previously said, the text of the played video game was further complicated because video games increasingly depended on the choices made by gamers. Due to the almost limitless possibilities for interactivity, discussing a video game in its pre-played state can only reveal what a gamer might see or hear.

At the same time, although players are presented with almost limitless possibilities, during the course of playing a video game many gamers somehow manage to reveal the embedded narrative[78] within a game if there is one, win the game if winning is possible, and in general, manage to keep player-controlled agents alive and themselves playing the game. The presence of these common outcomes, what might be considered preferred playings (readings), suggests that we can attempt to understand the ways in which gamers are encouraged through the content of the video game base to cause their agents to interact within a video game in certain ways.

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[78] A scripted pre-existing narrative that is written by the developers of the game and that is intended to be unveiled through playing the game.

In this chapter I propose that the components of the video game base often combine in such a way as to present gamers with regulating configurations, embedded narratives, and social systems; I refer to these structures as *orienting systems*.[79] If present in a video game, these orienting systems are pervasive and require gamers to define their player-controlled agents within the world of the video game in relationship to these systems. In the end of this chapter I propose that these orienting systems constitute the rhetorical resources of video games and I also briefly return to the impetus of this dissertation and theorize about the connection between the rhetoric of video games and the communication of ideological frameworks to gamers.

Regulatory Configurations

Several theorists[80] have suggested that the interaction of gamers with the video game base may be directed through a system of reward and reprimand,[81] which attempts to regulate the commonly depicted interactions of a gamer; I have termed such systems *regulatory configurations*. For example, according to Wolf in the *Medium of the Video Game,* unlike other media, "in the video game, the player is called upon not just to watch but to act." For Wolf this action, which we have already discussed as commonly depicted interactions, is not haphazardly initiated. When gamers note in a video game "how

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[79] Similarly, according to Julian Stallabrass in *Gargantua,* video games are "distinct" from other media because they are interactive and a "player's actions have a direct, immediate consequence on the virtual world." In order to interact within these worlds, players must learn to negotiate the interface and learn how to interpret the "game's visual presentation" (85).

[80] Similarly Stallabrass also says, "In computer games, the player not only identifies with the image but controls it in obedience to strict rules of conduct or else! And the sanction is usually a virtual death sentence so conformity has been extended from assent to action" (89).

[81] Unfortunately, all of these formulations assume that players wish to be successful in the game world, that they wish to enter cybernetic loops of give and take, in order to reach the end of the game, reveal narrative, receive higher scores, stave off death, or play the role provided them in the game. None admit that the cognizance or agency of the gamer might be different than or counter to these previously mentioned goals.

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actions are followed by outcomes and consequences," what Wolf calls "an inherent

worldview" is transmitted. Wolf says success in the game is dictated by a player's ability

to identify with the worldview and become "attuned to the design of the game and the

algorithms by which it operates."[82]

In early video games regulatory configurations were simple. Perhaps the best

example of an early regulatory configuration can be seen in the game *PONG*. In this

video game, gamers control an agent that appears as a vertical line. Gamers are permitted

to maneuver this player-controlled agent along the vertical axis and may choose to deflect

a circle (facilitating object) that bounces randomly about the screen. If a gamer deflects

this object in such as way that it passes another agent, which appears as a line on the

opposite side of the screen, the player-controlled agent will be rewarded with a point.

However, if the player-controlled agent fails to deflect the facilitating object and, instead,

permits to ball to pass by and beyond the limits of the screen, then one point will be

rewarded to the other agent. The first agent to obtain a designated number of points wins

the game. Thus, in *PONG* a gamer is given incentive for performing one type of

commonly depicted interactions, and indirectly penalized for not performing this

interaction. Accordingly, gamers often try to score points and prevent points from being

scored by others.

In recent games regulatory systems are presented to gamers in the context of a

narrative and complex social contexts and regulatory configurations alone do not seem to

adequately explain the motives of gamers. For example, in *Metal Gear Solid 2: Sons of

Liberty*, the primary player-controlled agent named Solid Snake is deployed on missions

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[82] Unfortunately, as Wolf notes, "the illusion of freedom" may "obscure the points of view and assumptions" that must be embraced in order to successfully interact in the world of the game.

by the United State government. These missions place him in environments inhabited by non cooperative non player-controlled agents and allow him to maneuver freely through these environments, with one exception. If Solid Snake is spotted by one of the non player-controlled non cooperative agents, an alarm will be sounded in the global environment, and an announcement made about the location of Solid Snake. Several non player-controlled non cooperative agents will hunt for Solid Snake and attempt to kill him. Unless they wish to have their player-controlled agent hunted, gamers will likely experiment with various ways to keep their player-controlled agent out of the sightline of non player-controlled non cooperative agents. At the same time, there is an inherent reward in the lack of punishment. If they direct Solid Snake to successfully avoid non player-controlled agents, gamers will be able to maneuver him more freely and rapidly through the various environments in the game and more quickly complete missions.

The question begs to be answered, beyond the regulatory configurations how does Solid Snake's mission influence the ways in which gamers control the agent Solid Snake? While regulatory configurations seem to be adequate for simple games, video game studies must consider that as narrative and social contexts become standard fare in video games, these additions might also act to orient gamers.

Narrative

In his article "The History of Square," Skyler Miller asks, "What makes gamers willing to spend days and nights obtaining every piece of armor and completing every side quest?" The answer he candidly presents is that players do this because they are

presented with a "compelling story" (Miller).[83] While Miller's answer is not always correct--as not every video game incorporates an embedded narrative, embedded narratives have become increasingly present in video games and are often intricately depicted through various programmed responses. More generally, though, the revelation of embedded narrative, if it is present, results from the interaction of agents in scenes with other agents, ambient objects, and facilitating objects, and the preprogrammed responses or specific outcomes of this interaction.[84]

While gamers can often direct player-controlled agents to interact in any number of ways, not all commonly depicted interactions reveal parts of the narrative. Accordingly, gamers are often times directly told through the programmed responses within the game how to unravel the embedded narrative, or some variation of this narrative. This is often cleverly communicated to gamers through ideological state apparatuses. As conceptualized by Louis Althusser, ideological state apparatuses are those institutions such as homes, churches, media outlets, and educational systems directly interpellate individuals as subjects and attempt to impart in them a certain ideology. In video games, these ideological state apparatuses often consist of carefully constructed environments, appropriate non player-controlled agents, information objects, and programmed responses that interpellate player-controlled agents by directly telling gamers how player-controlled agents should interact in the world of the game. For example, in *Final Fantasy VIII* agents attend schools called gardens where they are

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[83] While Miller is likely referring to the gripping nature of the narrative, the word *compelling* is a unique choice as it has the alternate meaning of persuasiveness, and the narrative in video games is indeed persuasive--even coercive.

[84] While one could interpret the commonly depicted interaction as in some ways conveying narrative events, commonly depicted programmed responses are the most common way that embedded narrative is revealed.

trained how to participate in the world of the game by non player-controlled cooperative agents. If gamers have questions they can direct their agents to consult a school wide intranet, via information objects in the form of computer terminals, or direct their agents to talk to the non player-controlled faculty.

If gamers are not directly told how to reveal the narrative through an ideological state apparatus, the type of interaction necessary for revealing narrative might also be revealed through repressive state apparatus. According to Althusser, repressive state apparatuses, [85] such as the military, police, or other agents of the state, underwrite the ideological state apparatuses and attempt to ensure compliance among those who do not consensually agree with the instructions of the ideological state apparatuses. As in the regulating systems, learning what not to do can instruct gamers on what they should do. For example, in *Grand Theft Auto III* if a gamer directs a player-controlled agent to commit a crime in the presence of a police officer, that agent will receive a star that represents his/her wanted level. The greater the social infraction the more stars an agent will receive and the more dogged the police will be in pursuit. Indeed, some of a gamer's motivation to control his/her agents can be gleaned from the ways in which repressive state apparatuses are used to coerce, or silence those who refuse to give their consent. Obviously, committing crimes in the presence of police officers thwarts the revelation of narrative.

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[85] Among the most prevalent repressive state apparatuses in video games is the military. As Julian Stallabrass says, much of the video game base we consume has its origins in "the military-industrial complex" (95). Conversely, according to Stallabrass, the military has subsequently taken on many of the characteristics of the virtual military presented in video games. This is "not in its consequences" but more in its "remote manner of delivery, in the judgment of its effect and most of all in the attitudes of those who use it and those who urge them on" (95). A more involved discussion of the symbiotic relationship between the military complex and video games can be found in Paolo Palladino, "We Are Not Playing Some Stupid Arcade Game: War in the Age of the Videogame."

More often than not, gamers are given clues and required to weigh the information they have already been given, consider what they have not been given, anticipate how the narrative might progress, and then interact accordingly. If a gamer's formulation of the narrative was correct, more of the narrative is revealed through programmed responses.

The application of reader response theory to new media proposed by Barbatsis, Fegan, and Hansen in their essay "The Performance of Cyberspace: An Exploration of Computer Mediated Reality" may be useful for understanding how gamers may be encouraged to formulate the information presented by the video game base and predict narrative. In this essay, Barbatasis, et. al. use reception theory, particularly the theories of Wolfgang Iser, to examine cyberspace as "an ideational object." According to Barbatisis, et al.'s formulation of Iser's theories, the material aspects of a media exist independently of an audience and are present even when the media is "sitting as it were, on a book shelf, broadcasting to an empty room, or loaded on a hard drive." While the material presented is potentially "symbolic," the meaning is inert until activated by an audience. Again drawing on and quoting Iser directly, Bartbatsis et al. advance that "what is not said" in the material words, images, sounds, etc., as much as what is said, directs audiences how to interpret the words, images, and sounds that may be provided. The space between the provided content and the not provided content creates a "gap" which encourages "ideation."[86] According to Barbatsis, et al, this is where cyberspace exists[87] and the

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[86] In the reading of Iser presented by Barbatsis, et al., ideation can either "open up connections between elements of the text as blanks" or conversely can "shift the reader from one perspective to another within the text as negations." One could envision an alternate model whereby the combination of blanks and negations in the ideational process informed gamers of acceptable and non-acceptable gameplay.

[87] I propose that in video games, because we are presented with an opportunity to formulate the meaning of the blank and then act on this formulation, the act becomes a form of déjà vu that makes simulacrum reality. Barbatsis, et al. make a special note of the power of this ideation and the presence of

remainder of their essay attempts to understand the ways that computer "media" present this space.

When these reader response theories are applied to video games we can easily see that the video game base provides the content with which players make the reality of a video game. Perhaps it is through a system of what is provided and is not provided within this content that gamers are encouraged to interact in certain ways within a game, particularly to reveal narrative. One example of the way that this directs gamers to control a player-controlled agent can be seen in the game *Final Fantasy*. Early in the game, if gamers direct their player-controlled agents to talk with the King in Coneria Castle (a non player-controlled cooperative main agent), gamers will learn that the princess is being held captive in the Temple of the Fiends, which lies to the northeast of the castle. While the majority of non player-controlled agents in the game tell player-controlled agents to revive the power of the orbs, none tell the player-controlled agents how to do this. At the same time, the king, a non player-controlled agent in a noticeable position of power, asks the player-controlled agents to go to a very specific spot to perform a very specific task. The absence of any other directions and the presence of this very specific request might encourage the gamer seeking to reveal narrative to direct his/her player-controlled agents to save the princess—this commonly depicted interaction does indeed reveal another plot point in the narrative.

When present, the desire to reveal an embedded narrative may account for some of a gamer's motivation; however, the narratives in contemporary video games have

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the gamer in the game. Citing an earlier essay from Barbatsis, the authors write that the ideations are "are actual, if not material, realities. As such, they are positioned, theoretically, to take precedence over one's simultaneously occurring physical reality." Other theorists might refer to this as presence. A thorough discussion of presence can be found in Matthew Lombard and Theresa Ditton "At the Heart of it All: The Concept of Presence."

progressed so far that they are not only becoming non linear, but even optional. This means that while there may be an embedded narrative present, gamers may choose to direct their player-controlled agents avoid this narrative. Thus, narrative cannot be the only orienting system.[88] There also seems to be some obvious overlap between the regulatory configurations and narrative, particularly in their ability to cause gamers to cause their player-controlled agents to perform commonly depicted interactions. After all, the revelation of narrative can viewed as a reward for particular types of commonly depicted interaction, and the withholding of narrative as a penalty for not performing the correct interaction. A simple example of how narrative can both orient players and participate in a regulatory configuration is the game *Dragon's Lair*. This particular game was one of the earliest to utilize high capacity optical storage and in fact was based solely on video clips. In the game, gamers are presented with a programmed response in the form of a video sequence and then required to maneuver the player-controlled agent Dirk in the direction of the appropriate interaction they wish him to perform. For example, when presented with scene that contained a non player-controlled non cooperative agent Dirk could be maneuvered toward the agent. If this were the incorrect interaction to progress the narrative, a programmed response would display another video clip to show Dirk getting killed by the non cooperative agent. If a gamer chose an option that resulted in the death of Dirk a gamer would be given up to three additional chances. Thinking players would not attempt the same interaction again if they wanted to stay alive, and if

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[88] As Jenkins says in "Nintendo and New World Travel Writing: A Dialogue," "although...child's play is framed by narrative logic, it remains largely uncontrolled by plot dictates." In this particular essay Jenkins says that gamers are instead oriented by their desire to explore. In later essays, his emphasis shifts to video games as virtual play spaces.

they wanted to see the narrative progress. Thus, in this game, the revelation of the narrative is directly linked to reward and reprimand.

Social Systems

In his essay "Complete Freedom of Movement': Video Games as Gendered Play Spaces," Henry Jenkins points out that in a society that has turned traditional children's play spaces into subdivisions, gamers engage video games as new sites for play. According to Jenkins, "Video games constitute virtual playing spaces," which Keith Feinstein has said allow children to "explore," "combat," and "struggle" without great consequence. At the same time video games present the illusion that consequence is present. Similarly, as Rune Klevier craftily points out in his essay "Defense of Cut Scenes," gamers want to do more than play; they also "want to play make-believe." Klevier says that this is the "contradiction" of video games—gamers are presented with the myth of freedom and simultaneously have the desire to interact with and complete a specific life-narrative. In order to facilitate this play, a video game may present gamers with "a complete cultural configuration of a world — as much as it offers a specific ludic challenge." This revelation does not seem so startling, as psychological studies of video games have noted that video games teach gamers various social scripts. Roland Barthes pointed out in *Mythologies* that toys are usually heavy with myths of the adult world, such as the military or medical institutions, and in playing children are prepared to enter this world as soldiers, doctors, firefighters, cops, mothers, or whatever else they play at.[89] Accordingly, I propose that many video games are inscribed with social systems that

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[89] Jenkins also notes that the world presented to children in video games is a "world made by adult companies and sold to children."

gamers identify and orient their player-controlled agents in relationship to, and perhaps serve a secondary function as tools of socialization. In video games, the most prevalent of these social systems are culture, politics, and economics.

Gamers are often presented with several different cultural formations within which to direct agents to interact and role-play.[90] While there are many definitions of culture, the one being used here is Raymond Williams' social definition, which calls culture "a description of a particular way of life which expresses certain meanings and values not only in art and learning but also in institutions and ordinary behavior" ("The Analysis of Culture" 48). Social culture in video games encompasses the parameters and depiction of objects, the clothes worn by agents, the types of interaction, and programmed responses, and the total combination of all things in the environment of the video game and the "meanings and values" reflected at each of these sites. By prizing some artifacts and accomplishments and devaluing others, the culture within a video game creates the conditions for an economy of culture. If gamers want to interact with and within the culture of the video game, they are often required to recognize the values of the culture in which they wish to participate, or suffer the consequences of not belonging to that culture. For example, in the popular game *Hitman 2* in order to gain easy access to a Mafia boss' compound, a gamer must dress his/her player-controlled agent in clothes that are non-threatening to non player-controlled non coopertive agents.

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[90] According to Raymond Williams, culture can be categorized at least three different ways: the ideal, the documentary, and the social. For Williams all three categories have a "significant reference" in culture and accordingly, any "adequate theory of culture must include the three areas of fact to which the definitions point" ("The Analysis of Culture" 50). In short, Williams makes a case for the persistence of each category by defining its strengths and weaknesses when compared to the others. In addition, Williams also identifies three different levels to culture: the "lived culture of a particular time and place" which can only be accessed by those living at "that time and place," the "recorded culture, of every kind, from art to the most everyday facts", and lastly, a factor (people) which connects "lived culture and period cultures, the culture of the selective tradition" (54).

Player-controlled agents are given the option to wear a delivery man's outfit, a mailperson's outfit, or another outfit if they can find one. Player-controlled agents may also choose to walk through the front gate wearing their black suit and sunglasses, but of course this outfit, when worn by a stranger, immediately draws suspicion.

The various cultural commitments in video games also often manifest political groupings of people united to promote a common cause. While political allegiances in video games do not necessarily denote political parties, or power structures such as ideological state apparatuses and repressive state apparatuses, these may be examples of political organizations in video games. In its most basic form in video games, politics is often manifested as collectives of agents united for the common good and collectives of agents united to perpetrate various forms of self-serving evil. Political lines often fall along cultural, religious, economic, racial, or gender similarities or various combinations of these as depicted in the various environments and agents, and these same distinctions almost always denote and dictate who is ally and who is enemy within the world of a game. In some video games, particularly multi-player online games, there may be several different political alignments, sometimes overlapping. As in the real world, a video game's politics and territory are closely linked to one another, with different political groups either vying for the control of space, or being assigned to protect or take control of a certain space. More simply, depiction of an agent, and the presence of an agent in a particular territory often denote political affiliation, and agents are encouraged to act in the interests of their political grouping in interactions with this outside other.

Not surprisingly, much of the culture and politics presented in a video game is also linked to the economics within a game; indeed, many of the cultural values and

political groupings smooth the progress of production, distribution, consumption and labor. Video games often present gamers with familiar economic structures with which to interact, and the economic systems are possibly the most complicated of all orienting systems in video games.

In its most basic form, economics involves the production, distribution, and consumption of goods. Notably, one or all of these components is present in many video games and gamers are often presented with an ideal market in which there are always enough objects produced and almost no limits on resources. For example: in the recent game *The SIMS*, agents can purchase ambient objects with which to decorate their virtual houses—indeed this is one of the main interactions within the world of the game. These ambient objects are inexhaustibly available so long as the agent has enough money to purchase them.

Because some facilitating objects are consumable and players rely on the consumption of these objects, markets or opportunities for acquiring these objects nestle everywhere; the opportunity to buy objects was present in the games released in the mid-eighties and has been increasingly present since. For example, in the 1986 Sega Master System game *Alex Kidd in Miracle World*, players were given the opportunity at the beginning of every other level to enter a shop in which they could purchase objects ranging from helicopters to extra lives. *Final Fantasy*, produced for the Nintendo Entertainment System, also incorporated such opportunities, of course with different objects. In more recent games, such as *Ultima Online* or *Final Fantasy VII*, the cities are filled with shops for agents to purchase objects.

Of course, then, players are allowed to acquire and use or consume these objects. For example, in the game *Twisted Metal*, objects appear randomly throughout the battle arena, and agents need only maneuver over the objects in order to possess them. In *Grand Theft Auto III*, for example, an agent can walk in to an "Ammu-Nation" store, and after buying a weapon, choose to use or not use it. It is also often the case that these objects, which are usually "mass-produced consumer goods," are "ranked on a common arithmetical scale in which every quality is tradable" (Stallabrass 91) and frequently have a monetary or point value. It is also usually the case that the more expensive the object, the better it performs. In fact, in *The SIMS* the happiness of the agent is in part contingent upon a player's ability to acquire the best objects for his or her house or yard.

Although objects may be mass produced and abundantly available, this does not prevent them from being fetishized in the world of a video game. Indeed in some games players labor to earn money or collect objects simply for the status of having collected them. For example, in the game *Hitman 2* agents can collect facilitating objects such as guns as they progress throughout the game and hang them on a special display wall. The weapons that have not been acquired are shown in silhouette on this wall. While it is not necessary to acquire all of these facilitating objects, especially as some are clearly inferior to others, the vanity of possessing a complete collection provides incentive to participate in this system.

Seed money is available as a gift at the beginning of many video games. More often, however, in order to consume, players are required to direct player-controlled agents to labor at the work of the game--whatever this may be--in order to earn money to participate in the economic systems of the game. The labor, in the guise of game play,

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usually entails some form of competitive or violent interactivity, but may also include

mundane gathering, escorting, or repetitious assembling activities. For example, games

such as *Final Fantasy VII* and *Grand Theft Auto III* reward players who explore the

world of the video game and conquer others by allowing them to take the assets,

especially money, of those they defeat. Main agents can thus participate in the capitalist

system of the game by purchasing weapons and items that help them get stronger and

more powerful. Like the worker who needs to work to survive and is given incentive

enough to maintain his/her existence, so is the player-controlled agent given enough

incentive to consume.

As Stallabrass points out, the players are presented with capitalist utopias where

"work is always available and...opportunity can always be grasped." It is an "ideal,

nostalgic vision of the marketplace" in which "all players start from the same point and

with the same resources" and direct player-controlled agents to work for or exchange

money for objects or for other physical or mental abilities (91). This ideal market allows

for the continual advancement of player-controlled agents and often permits them to

perform alternate types of labor, take on more powerful enemies, or engage in labor that

has greater rewards.

There is a noticeable melding of these social systems with systems of regulatory

configurations; the reward and reprimand that takes place in close conjunction with these

social systems can be viewed as hegemonic.[91] According to Antonio Gramsci, hegemony

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[91] No framework has been proposed to explain the hegemonic organization of video games; however, the word has surfaced a handful of times in video game studies to refer to the connection between the culture outside of the game and the world inside the game. For example, Dennis Redmond argues that, like other popular media, video games are capable of having "all sorts of politics" --shareware games in particular. For Redmond who focuses particularly on 3D video games, the commercial computer game *Half-Life* was the first game "to truly transcend the hegemonic narrative forms of the Cold War era...by disrupting the monopoly-national tropes of the Cold War media culture with multinational ones".

is the way in which a dominant power leads by gaining consent and dominates through coercive force those who do not consent.[92] For example, the presence of social culture in game such as *The SIMS* encourages players to identify and participate in the culture of the game, where the incentive may be belonging, or excelling. Strategy games such as *Command and Conquer*, *Starcraft* and *Diablo* make the power of political hegemonies particularly apparent. Political membership in a collective encourages players to identify with the decisions associated with that collective of agents. Membership not only denotes belonging but also the power, safety, and ability that comes with membership. Perhaps the most ubiquitous venue for the exercise of hegemonic power is the economic system within a video game. In a game such as *Big Mutha Truckers*, a game based on long-haul truck driving, economic hegemony encourages players to participate in this system in order to ensure the prosperity of the dominant capitalist order, to give players something to do—the work of the game, and notably provide incentive for advancing the narrative.

While gamers are presented with hegemonic orders and encouraged to cause their player-controlled agents to consent to these orders, players can refuse to play the game in accordance with the hegemonic guidelines—after all gamers are not automatons but complex, changing beings, and they may react in unpredictable ways. In any hegemony the potential penalty for such refusal is coercive force, which may be acceptable for some gamers. The ability of agents to dissent within the hegemonic orders of a video game may not be immediately apparent and is seldom mentioned in any video game studies. Perhaps this is because the hegemonic systems in video games are so effective at inducing gamers to identify and act that a gamer is unaware that there are other possibilities for interaction

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[92] According to Terry Eagleton, hegemony is the sum of all "practical strategies by which a dominant power elicits consent to its rule from those it subjugates" (196).

within the world of a video game besides those encouraged by the hegemonic order. As Raymond Williams says, hegemonic systems are "lived at such a depth" that they "saturate the society" and, quoting Gramsci, these systems "even constitute the substance and limit of common sense for most people under [their] sway" (Williams, *Problems in Materialism and Culture* 37). Still gamers are often times free to actively dissent from the hegemonic order. While this dissent may bring with it penalties such as lack of resources and greater vulnerability in life endangering situations, or even death, the challenge, satisfaction of curiosity, or exhilaration of dissent may be worth the penalty.

Orienting Systems and Rhetorical Systems

The explanation in this chapter of the ways in which gamers are encouraged to define their player-controlled agents in relationship to orienting systems can also be viewed as an examination of the rhetoric of video games.[93] While rhetoric is often simply conceptualized as the art of persuasion, Kenneth Burke's account of rhetoric, which theorizes how individuals come to identify with various partisan groups and simultaneously participate in a "larger unit of action," is much more useful for understanding video games as a rhetorical medium.

In his book *A Rhetoric of Motives*, Burke says that because of human nature individuals are fundamentally "at odds with one another" (22).[94] However, through sharing "common sensations, concepts, images, ideas, attitudes" individuals can become "consubstantial" with one another, or, in other words, come to identify with one another

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[93] As Rune Klevier says in his essay "In Defense of Cut Scenes," video games are "not just a set-up for play, but also an object of desire, a rhetorically structured illusion."

[94] The existence of rhetoricians is manifest confirmation of this division; after all, the sole function of a rhetorician is to bridge the inherent natural division between human beings.

(21). In light of this, Burke conceptualizes rhetoric as the ways in which "individuals" "become identified with groups more or less at odds with one another" (22) and he particularly focuses on the "use of language as a symbolic means of inducing cooperation in beings that by nature respond to symbols" (43). A speaker who talks the "language" of an audience in "speech, gesture, tonality, order, image, attitude, idea" is able to persuade an audience by making the audience aware of a particular consubstantiality, which in turn encourages the audience "to identify…the speaker's interests" as their own (55).

There are at least two ways Burke's conception of rhetoric can be adapted for video game studies, the differences between these two applications of Burke's definition arise from the ontological ambiguity of whether the aim of video games as a rhetorical medium is to achieve consubstantiality with player-controlled agents, with gamers, or with both. In rhetorical terms this is fundamentally a question of whom a video game addresses?

In this first application of Burke's definition of rhetoric, let us assume that player-controlled agents are the audience of a video game. As with individuals, identification between a player-controlled agent and a game is not automatic, if it were there would be no need for orienting systems or gamers—the game would play itself. Orienting systems are thus present in a video game for the same reason Burke says that rhetors are present in society: there is a division between individuals that must be overcome--this division in video games is between the player-controlled agent(s) and the game.[95] Orienting systems constitute the rhetorical resources of a video game, and these orienting systems composed of objects, agents, and programmed responses, which are in turn composed of image,

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[95] To be sure, the fact that agents exist within the video game base makes them to some extent always already consubstantial with the video game; after all, these agents are imbued with the ability to perform commonly depicted interactions that can be used to comply with orienting systems.

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text, speech, etc., attempt to induce player-controlled agents to identify with the game. [96]

Consubstantiality with the game is achieved when the commonly depicted interactions of

a player-controlled agent comply with an orienting system, whatever this may be,

because it is at this point that the player-controlled agent has identified their interests with

the interests of the game.

Granted this formulation is a bit ideal, as there is of course an individual existing

outside of the game who controls the player-controlled agent. However, understanding

this rhetorical relationship is important for video game studies because it suggests that

video games do not strive for gamers to identify themselves with orienting systems.

Instead, video games may only strive for gamers to recognize the extent to which player-

controlled agents can be identified with these systems. For example, a gamer may

associate herself with non-violence, but through the rhetoric of a video game come to

identify a player-controlled agent with violence. This does not mean that she has

identified with the violence, only that she has directed her player-controlled agent to

identify with violence.

Conversely, a video game may rhetorically address the gamer. In this second

formulation there is still a division between two individuals, except in this case the

individuals are the game and the gamer. The orienting systems presented through the

video game base are still the rhetorical resources of the game; however, they are now

used to encourage gamers to recognize their consubstantiality with the game. The player-

controlled agent in this formulation becomes a tool of gamers to achieve consubstantiality

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[96] This presupposes that video games have interests, and they do in so much as there is content in the video game base designed to be revealed by gamers, otherwise there is no reason for the existence of this content—this in an admittedly egotistical formulation.

with the game, whereas in the previous formulation the gamer was a tool to help the player-controlled agent become identified.

While orienting systems encourage gamers to influence agents to perform individual types of interaction, the domain of rhetoric is also the process by which individuals come to identify themselves, or the agents they control, with a "larger unit of action." As Burke says, individuals are "not motivated solely by the principles of a specialized activity" (27). This is because specialized activity "is [not] free from identification with other orders of motivation extrinsic to it," such activities are always complicit in "a larger unit of action." Burke gives the example of a shepard who cares for sheep and at the same time is identified with the greater order of preparing sheep for market.

When we think of video games as rhetorical we might see that gamers also identify with orienting systems in their entirety and even several systems simultaneously. To be sure, the rhetorical nature of video games also uses the overlap and conflicts between orienting systems to motivate gamers to identify with more specialized systems, beyond those orienting systems defined here. For example, as will be demonstrated in the next chapter, the particular combination of culture, politics, and economics in *Final Fantasy VII* may encourage gamers to identify themselves, or their agents, with environmentally friendly green-capitalism. If gamers identify themselves, or the agents they control, with this greater system, this may influence the ways in which a gamer directs their agents to interact within orienting systems in a game.

This second formulation of video games as rhetorical is particularly troubling to some. Indeed, many people have warned against the dangers of gamers' identifying with what I have termed here *orienting systems*. For example, Ted Friedman [97] says that in order "to win" players of video games must "internalize the logic of the program" so that they can "predict the consequences of each move, and anticipate the computer's response" and then respond accordingly. In this way the computer works with players and becomes an extension of them. When players figure out the rules of the game and begin "responding as automatically as the computer, processing information as effortlessly, replacing sentient cognition with the blank hum of computation," players "aren't just interacting with the computer, but melding with it." This "melding," Friedman says, forms a "cybernetic loop," which ushers gamers into a cyborg state[98] and the "unfamiliar pleasures of rote computation." As the player enters this cybernetic loop, which in Burke's terms may be a state of near-perfect consubstantiality, the interaction with the machine becomes almost automatic and these new "structures of thought" give way to a changed "perception." [99] The "dynamic of depersonalization" thus created desensitizes gamers to the "military units who fight and die," and the "native peoples who defend their homelands" become "inconveniences," "barbarian hordes to be quickly disposed of." [100] In Friedman's formulation, which clearly assumes the presence of regulatory

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[97] According to Friedman, the interaction with WebPages, for example is "incremental" while the interactivity of video games is fluid and allows "full immersion." In "The Semiotics of *SimCity*" and in other essays Friedman discusses video games as the best examples of "cybernetic circuits."

[98] Here Friedman cites Donna Harraway.

[99] Similarly, Friedman notes in his essay "Semiotics of *SimCity*" that "Learning and winning...is a process of demystification: one succeeds by discovering how the software is put together. The player molds her or his strategy through trial-and-error experimentation to see 'what works' - which actions are rewarded and which are punished."

[100] Lisbeth Klastrup who studies textuality in massively multiplayer online gaming has similarly noted that "the production of tellable events," the substance of narrative, takes place "within a framework of more or less directed interaction with social impact related to community of the [game] world."

configurations in video games, the implication of a video game's rhetorical nature is that if gamers enter the "cybernetic loop," they themselves may unknowingly consume the same ideological content as their agents.

Lev Manovich also theorizes about the ideological implications of digital media. In his essay "On Totalitarian Interactivity," Manovich says that in digital interactive art,[101] such as video games, the opportunities for interactivity are dictated to the audience according to the author's design and can only yield preexisting results, such as the next picture, or linked page. He says, "in what can be read as a new updated version of Althusser's 'interpellation,' we are asked to mistake the structure of somebody's else mind[102] for our own."[103] According to Manovich, while those in the West might prize interactive digital media as the "perfect vehicle for the ideas of democracy and equality"[104] those in the East might view this supposed freedom as "manipulation," whereby "the artist uses advanced technology to impose his / her totalitarian will on the people." Translated into the terms of this dissertation, Manovich's warning is that the guise of freedom in video games may veil the fact that dissenting within orienting systems is also rhetorically structured and gamers may ignorantly adopt ideological frameworks even as they refuse to acquiesce to orienting systems.

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[101] According to Manovich, "All classical, and even more so modern art was already 'interactive,'" because an audience member needed to provide the "missing parts" or "move his / her eyes...or the whole body" depending on the type of art, text, film, sculpture.

[102] While Friedman speaks more about identifying with systems, he also acknowledges in a footnote that "In some sense, one could describe playing a computer game as learning to think like the programmer, rather than the computer. On the basic level of strategy, this may mean trying to divine [a programmer's] choices and prejudices, to figure out how he put the game together so as to play it more successfully." Wolf also suggests in his foreword that players are required to think like programmers (Wolf 4).

[103] For example, according to Manovich, the hyperlink is an "externalization" "of human thinking which involves connecting ideas, images, memories."

[104] Accordingly he is not so optimistic about the digital revolution and sarcastically writes: "Workers of the World, Connect."

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Conclusion

While gamers are often given several choices as to how they want their agents to interact with complex video game content, through the use of "symbolic means," such as orienting systems, gamers are induced to direct their player-controlled agents to interact in certain ways. As discussed in this chapter, this process of identification can be viewed as rhetorical, and orienting systems can be considered the rhetorical resources of a video game. The rhetoric of video games may simultaneously address both audiences and player-controlled agents, leaving it up to the gamer to decide who is being addressed, and this will be further explored in the following chapter. In the next chapter, I use the model proposed in this chapter, in conjunction with the grammar of *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X* discussed in the previous chapter, and my own experience playing these games, to test the limits of this rhetoric of video games. Through testing this rhetoric in the following chapter, I further demonstrate the relationship between the elements of these orienting systems and their usefulness for studying video games as rhetorical.

CHAPTER 5

RHETORICAL ANALYSIS: IDENTIFICATION AND INTERACTION IN THE *FINAL FANTASY* SERIES

In this dissertation I propose a model for video game studies derived from existing video game studies scholarship and my player's knowledge of video games. The first part of this model is a grammar of video games designed to help video game scholars distill and discuss complex video game content. As explained in the second chapter of this dissertation, the game-play of many current video games is dynamic; thus any study that presents video game content can in fact only present contingencies. Accordingly, I proposed that any methodological framework for discussing video games begin with a thorough understanding of what players are given to work with and within. I have termed this the video game base. As described in the second chapter, the video game base consists primarily of objects, agents, commonly depicted interactions, commonly depicted programmed responses and video game scenes. These components and their relationships to one another constitute the grammar of video games.

In the second part of my model I identify three orienting systems that may be presented to gamers through the combination of the elements of the video game base. These include: (1) regulatory configurations, (2) embedded narrative, and (3) social systems. Because this part of the model sorts out the ways that video games encourage players to identify and interact with the orienting systems of the video game, I have termed the second part of my model for video game studies a rhetoric of video games.

In this chapter, I draw on the previous analysis of the video game base of *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X* conducted in chapter three, and attempt

to test the soundness of the rhetoric of video games presented in the previous chapter. For each game discussed, I spend several paragraphs describing and analyzing the orienting systems. Because all of the games in the *Final Fantasy* include complex embedded narratives, I begin each discussion by considering the narrative orienting systems; this is followed by discussion of social systems. Within the context of each of these orienting systems I also discuss the overlap with regulatory configurations. So as to demonstrate the ways in which these systems function rhetorically, I then briefly recount my experience playing these games.

If the test in this chapter is successful, my model should give video game scholars a feasible way to discuss the rhetoric of a game without giving a lengthy recounting of the game. Such analysis might also more fully demonstrate the mutual dependence of (overlap between) each orienting system and complicate the rhetoric of video games proposed in the previous chapter. Returning to the ideological impetus for this dissertation, it is my greatest hope that this test will give video game studies significant insight into some of the ideological allegiances presented to gamers while playing video games.

Orienting Systems in *Final Fantasy*

The embedded narrative in the first *Final Fantasy* is revealed to gamers through the combination and sequential revelation of the elements of the video game base. While the combination of ambient objects into various environments denotes the setting in *Final Fantasy*, and the commonly depicted interactions of player-controlled agents are the most frequently depicted events, the embedded narrative is most regularly communicated to

gamers through the programmed dialogue responses of non player-controlled agents. These responses frequently result when non player-controlled agents are engaged in communication by player-controlled agents.

In the beginning of *Final Fantasy*[105] a gamer will learn from a programmed response in the form of a cut scene that the world of *Final Fantasy* is slowly being destroyed on all fronts: land, air, and water. The only hope for the survival of the planet is the fulfillment of an ancient prophecy, revealed in the same cut scene, which tells of four light warriors who will come to stop the decay. In *Final Fantasy* gamers control the interactions of four light warriors (player-controlled agents), and battle four fiends (non player-controlled non cooperative main agents) who control the elemental orbs of the earth. Ultimately, if the player-controlled agents reach the end of the game they will combat Chaos, the non player-controlled non cooperative main agent who controls the fiends.

The story of *Final Fantasy* is fairly simple until near the end of the game when the blanks in the narrative that are usually filled with a revelation are, instead, filled with a very confusing negation. Players are told in a programmed response from a non player-controlled cooperative main agent named Luhkan, that the true evil, Chaos, lies 2000 years in the past and must be defeated in the past. The story sounds simple enough as

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[105] The games in the *Final Fantasy* series typically have complex embedded narratives. The embedded narratives in *Final Fantasy I-V* center on four elemental orbs that are stolen, destroyed, or harnessed for or by some evil force. Although the resulting narratives of the played video game are often complex when summarized, the video game bases presented to gamers to interact within these early games are rather simple (compared to the most recent games), as are the orienting economic, cultural, political, and ideological systems. In *Final Fantasy VI-X* the evil forces present in earlier editions of the series are replaced with corporations, military schools, religion based monarchies, etc., and the elemental orbs as the intermediary between evil forces and the earth are replaced by statues in *Final Fantasy VI* and then removed from games *VII-X*. The forces of the earth are either represented by mysterious gasses or do not play a significant role in the game. Instead, the conquest of people or territory through chemicals, spiritual forces, the monopolizing of resources or mass production and capitalism, or technology, in lieu of harnessing the symbolic power of natural resources, becomes the central motivation of evil forces.

described here. However, because of the sparse explanation of this part of the narrative by Luhkan, this time loop is very confusing for gamers who must then direct their player-controlled agents to travel to the past in order to defeat Chaos and complete the game.[106]

If gamers want to participate in the unraveling of the narrative, either for their own benefit or the benefit of the player-controlled agents, a gamer will need to direct player-controlled agents to read the dialogue of non player-controlled agents and do what they request or deduce from this dialogue which type of commonly depicted interaction will advance the narrative. Throughout the game the programmed responses of non player-controlled cooperative sub agents, who say things such as "Revive the power of the Orbs!" continually remind gamers of the role player-controlled agents are expected to play in the narrative.

In addition to narrative, there are also cultural, political, and economic systems within the video game base that help gamers orient their player-controlled agents. While the urban environments in *Final Fantasy* range from the medieval town of Coneria to the cavernous Elf Village, the cultures within *Final Fantasy* do not reflect this diversity. Regardless of the environments, there is very little difference between the artifacts of each culture and most non player-controlled agents hope that order will be restored so that economic progress can resume. Notably, each culture also has one unique problem that is plaguing it, such as a kidnapped princess, a pirate invasion, or troublesome vampire. Because of these problems a premium is also clearly placed on self-defense, and the majority of buildings within a city are commercial environments designed to sell facilitating objects that serve this purpose. As a consequence, if gamers wish to have their

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[106] Complex and even confusing narratives similar to this became the trademark of *Final Fantasy* games.

agents participate in the culture, there is little else they can do but outfit their player-controlled agents with the appropriate facilitating objects, especially tools/commodities (artifacts of the culture) such as swords. If gamers do not recognize that arming oneself is a cultural value and direct player-controlled agents to do so, the player-controlled agents will be unprepared to interact in a violent world of the game and will likely be killed.

As a side note, there is a strong link between participating in the daily culture of these inhabitants and the narrative. Many times in *Final Fantasy* if gamers wish to reveal or participate in the embedded narrative, they must actively resolve these smaller unrelated conflicts that trouble non player-controlled cooperative agents. Otherwise, player-controlled agents will not receive the facilitating objects from these non player-controlled agents that are necessary to gain access to narratively significant areas.

The presence of player-controlled and non player-controlled agents as well as cooperative and non cooperative agents denotes the presence of political groupings of agents in *Final Fantasy*. The two basic groupings in the game are the light warriors and the four fiends headed by Chaos. The light warriors, as the prophecy dictates, are united to rescue the orbs and revive the planet, while the four fiends are united to use the power of the orbs to destroy the planet. Of course because the player-controlled agents are the light warriors, identification with this group by players is likely. According to their membership in this political grouping, gamers are compelled to act in accordance with the expressed beliefs that unite this group. The way the game is constructed may allow players to identify briefly with other political groupings and, for example, refuse to fight certain non cooperative agents; however, at times when the narrative is revealed through interaction with the fiends or Garland there is no other option presented. In such

situations the only political membership available is one that is in direct opposition to the fiends or death. Another penalty may be restricted movement or interaction. For example, if the player-controlled agents fail to defeat non-cooperative agents the player-controlled agents will not receive the facilitating maneuverable objects necessary to explore beyond the constraints of certain ambient objects, such as mountains or oceans.

As previously noted there are a considerable number of environments within *Final Fantasy* concerned with the economic processes production, distribution, and consumption of goods and services. A significant number of these environments are designed for the distribution of goods that facilitate game play; indeed, the most obvious utility of each town is the distribution of goods and services for that help player-controlled agents defeat non player-controlled non cooperative agents and fulfill the prophecy. Because there are no other objects to divert agents' energies, if players opt to have their agents participate in the economy, players will simultaneously be preparing their agents for fulfilling the prophecy and resolving the narrative.

An incentive to participate in the consumption of goods is that it is much easier for player-controlled agents to interact in the world of the game if they make use of these goods and services. If players choose to buy facilitating objects and use them while assaulting non player-controlled non cooperative agents, player-controlled agents will usually be successful and rewarded with money, which provides a subtle incentive to continue consuming, continue conquering, continue exploring, and continue the progression of the narrative. If players do not consume, they are coerced by the violent and deadly attacks of non cooperative agents on the world map, which they will be unable to ward off if they are unarmed. Unless a player wishes to risk death, he or she

will participate in this economy and buy facilitating objects. At the same time, in a round about way, the reliance of players on consumer products reaffirms the need to avert the destruction of the economic base, as the total destruction of the economic system would mean that agents would be unable to protect themselves with tools and/or commodities. Since players start the game with just enough money to equip their agents with armor, weapons, spells, etc., it would be irrational for player-controlled agents not to buy some of these objects. Although subtly so, this allotment of money at the beginning of the game acts as an added incentive—there is nothing else to do with this money except to spend it on these objects.

The Rhetoric of *Final Fantasy*

When I first played *Final Fantasy* as a teenager, I was captivated by the narrative; I wanted to know why the planet was being exploited and what would happen after the orbs were restored. Even though it was not very detailed, the dialogue revealed by each non player-controlled agent added one more piece of missing information to the narrative, and I directed my player-controlled agents to talk to every non player-controlled agent they encountered. My hope was that these agents would reveal some piece of information about the back-story, or tell me how I should direct my agents to progress so that a successful resolution would be reached. At the time, the detailed embedded narrative in *Final Fantasy* was a bit of a novelty and I did not want to miss any of it, so I also directed my player-controlled agents to maneuver, trade, talk, and assault other agents as directed by the programmed responses in the game, and in accordance with the hegemonic nature of the social systems. Every commonly depicted interaction

that I directed my player-controlled agents to perform was with explicit motive of revealing the narrative. Accordingly, in this situation I was clearly the audience of the video games as a rhetorical medium, and was willfully trying to identify with the game. I did not care what happened to player-controlled agents as long as they helped me unravel the narrative.

Returning to the narrative in *Final Fantasy* over a decade later, I now find that the narrative no longer compels me. Perhaps this is because I now know how the game will be cryptically resolved, or in light of the games I now play, the narrative is too simple to entertain me. Today, outfitting player-controlled agents with the various objects sold in a particular environment and directing player-controlled agents to defend themselves with these objects while exploring different environments is perhaps my greatest pleasure in playing the game. At the same time, I still direct player-controlled agents to engage in revealing the narrative because I know that in order to have new areas for exploration opened to my player-controlled agents, or to have my player-controlled agents be rewarded with facilitating objects, they must trigger certain programmed responses that reveal the narrative. Despite my desire to avoid it, the narrative of *Final Fantasy*, is still orienting the way in which I direct my player-controlled agents to interact in the world of *Final Fantasy*. It seems that as long as I am actively orienting my player-controlled agents with any of these orienting systems, narrative will be revealed.

In this more recent experience playing *Final Fantasy* there are two major differences from my earlier experiences. The first difference is that I no longer concentrate intensely on the narrative orienting system and instead focus more on directing player-controlled agents to participate in the social systems, especially the

political and economic systems. The second difference is that I attempt to identify player-controlled agents more with the game than I attempt to identify myself with the game. In fact, my response to the orienting systems suggests that I am trying to actualize player-controlled agents within the world. In this example it is likely that I am interpreting the rhetoric of the video game as addressing the player-controlled agents and not me.

Orienting Systems in *Final Fantasy VII*

The narrative of *Final Fantasy VII* is revealed similarly to the way the narrative of the first *Final Fantasy* is revealed; however, there are some exceptions. The environments and programmed responses in the video game base of *Final Fantasy VII* are more numerous and incorporate greater graphic detail. Through the lengthy programmed responses of non player-controlled agents, which often include motion, typed dialogue, and detailed cut scenes, which include full motion video clips, gamers are presented with an incredibly complex and detailed narrative.

While there are many sub plots, as there are in the first *Final Fantasy*, the basic narrative of *Final Fantasy VII* involves a global corporation named Shinra that extracts energy, or life force, from the planet and sells it to consumers to power appliances, heat houses, fuel cars, etc. The disastrous side effect of this exploitation of natural resources is that life on the planet, which is directly linked to the energy stored within, begins to die. The corporation, as the player-controlled agents later find out, is also responsible for the biological engineering of super humans to use as guards, henchmen, soldiers etc. The most powerful of these super humans, a non player-controlled non cooperative main agent named Sephiroth, plots to destroy the world by summoning a meteor from space.

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The Shinra Corporation is balanced in *Final Fantasy VII* by a small group of para-military environmental activists named AVALANCHE. This group is opposed to using natural resources in the way that Shinra does, for fear that such abuse will destroy the planet. Within the game gamers control a mercenary for hire named Cloud Strife and, at times, his revolutionary AVALANCHE friends. In order to reveal the narrative, players are encouraged through programmed response to stop first the exploits of the Shinra Corporation, then the evil henchman Sephiroth, and ultimately the destruction of the earth. Unlike the first *Final Fantasy*, to further encourage players to identify and consent to this narrative, players are not given the freedom to explore the different environments until they have completed several terrorist attacks against the Shinra Corporation. During the course of these attacks, which may take several hours to complete, the intricate plot of the game is revealed to gamers.

In *Final Fantasy VII* there is a prominent media state apparatus controlled by the Shinra Corporation that subtly attempts to orient players within the narrative. This media state apparatus is revealed to gamers in the form of some full motion video reports, in ambient objects that advertise Shinra products, and lastly through non player-controlled agents who tell the player-controlled agents the propaganda that they heard in the media. The ideology communicated by Shinra through the media state apparatus is best characterized by consumption. For example, some advertisements report that Shinra is devoted to bringing consumers the latest and greatest modern conveniences such as automobiles.

The pervasiveness of the Shinra Corporation in the market has equally made Shinra pervasive in the government and military and the prominent repressive state

apparatus in *Final Fantasy VII* underwrites the hegemonic system for the agents in the game. The CEO/President of the Shinra Corporation appears simultaneously to be the political head of the world, the leader of the military, and owner of the media outlets. The military state apparatus is present in almost every urban environment and even in some rural environments as is evidenced by the non player-controlled non cooperative sub agents in blue military uniforms and helmets that patrol these areas. When maneuvering through environments with a heavy Shinra military presence, such as the city of Midgar, encounters with these non player-controlled non cooperative agents are common, and these encounters act as a deterrent for exploring these areas. At the same time, for gamers who wholly identify with the political group AVALANCHE and wish to save the planet from Shinra, these encounters are welcome because battling Shinra is the appropriate action for agents identified with AVALANCHE.

Just at the narrative is more complex due to the technological advances, so are the social systems. Foremost, the cultures within *Final Fantasy VII* are diverse, as is exhibited by the many different species, races, and ethnicities of agents within the game. This diversity is also evident in the architecture, clothes, and non-literal leitmotivs that accompany various scenes. Unfortunately, one of the side effects of Shinra's production is that some species of agents have already died off and the society has borne the consequence of this system, which are environments filled with prisons, slums, impoverished or unemployed residents, technological failures, and pollution. With the exception of the members of AVALANCHE, agents in the game are largely unaware that the Shinra Corporation is systematically destroying the environment and that many life forms have already become extinct. Thus, the culture of the game directs agents to

consume and presents player-controlled agents with several environments in which to do so. At the same time the sub-culture of AVALANCHE directs player-controlled agents to destroy capitalist organizations that exploit natural resources without replenishing them.

As in the first *Final Fantasy*, in *Final Fantasy VII* the heart of all social systems is economic. There are many forests, green plains, oceans, intercontinental waterways, mineral resources, and even beasts of burden called chocobos (maneuverable objects); these resources are all depicted in multiple environments, especially the global environment. The agents who inhabit the planet have harnessed the natural resources of the planet, particularly the energy resources, and combined them with effective management in a capitalist system to create an abundance of urban and rural environments, as well as a diverse range of ambient and facilitating objects.

Again, as with the first *Final Fantasy*, the majority of the objects for sale are facilitating objects intended for use during commonly depicted interactions in which agents are assaulting one another. The consequences for not recognizing the cultural value of purchasing facilitating objects, is that player-controlled agents might have a more difficult time interacting in the world of the game, particularly when assaulting another agent, or being assaulted. Unique to *Final Fantasy VII*, there is also one environment in the game devoted to hyper-consumerism; this is a miscellaneous environment in the game named the Golden Saucer. Player-controlled agents are permitted to maneuver through this environment, which is a casino/arcade, and can also interact with the majority of ambient objects, which include video games and carnival games; there is even a haunted house. Player-controlled agents that have accumulated

enough money can even buy a lifetime pass to this virtual carnival so that they may return, as they like, to play games.

Such areas are characteristic of economic systems that have a superfluity of wealth, and the existence of the Gold Saucer in *Final Fantasy VII* instigates a particular political complexity in *Final Fantasy VII*. The player-controlled agents can be directed by gamers to enjoy the commodities and technology characteristic of mature capitalists systems or conversely be directed to avoid these areas entirely. Although the political lines of the game are set up between the Shinra Corporation and the player-controlled agents who, by their membership in AVALANCHE, are opposed to them, the implications of this political membership depend largely on the commonly depicted interactions of the player-controlled agents. If player-controlled agents patronize the Golden Saucer, their political relationship might appear less economically motivated and more environmentally motivated. On the other hand if player-controlled agents are directed to avoid the Golden Saucer, and other clearly capitalist diversions, the political allegiance might also appear economically motivated.

The Rhetoric of *Final Fantasy VII*

Final Fantasy VII is considered by many to have the strongest narrative of any *Final Fantasy* game. Because the plot is so compelling, after gamers finish the missions that require them to participate in the narrative and are given the freedom to direct player-controlled agents to explore the global environment freely, many gamers may be unable to resist actively unraveling the embedded narrative. Indeed, in my first experience

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playing *Final Fantasy VII* I shared the controller with a friend. The narrative was so strong neither of us minded watching the other play.

Once again, while playing this game I considered myself the audience of the game as a rhetorical medium, and the relationships of player-controlled agents to orienting systems did not matter to me as long as the narrative kept progressing. The narrative was so strong that I did not want to direct player-controlled agents to participate in the social systems of the game, particularly the politics of the game, which could become time consuming and repetitive. Accordingly, when presented with the choice to direct player-controlled agents to engage or not engage in commonly depicted interactions with non player-controlled non cooperative agents in the game, I usually directed agents to maneuver in the opposite direction unless I thought that this interaction was necessary for revealing narrative.

The second time I played the game I was distracted by the social systems in the game, so much so that this distraction worked to the detriment of revealing the narrative. Given that there are over one hundred facilitating objects in the game, many of which have unique functions, the quest for these facilitating objects, or for the money to purchase them, became an unintentional diversion for me. Indeed, I spent hours performing menial tasks in order receive a slightly better sword or special materia crystal. Each facilitating object that I purchased, found, or desired, was something additional for me to tinker with, use to customize the abilities of player-controlled agents in the games, or interact in the game in a different way. As in the first *Final Fantasy* my fixation with participating in the economic system required that I direct player-controlled agents to participate in the narrative in order to have new areas open for exploration and

consumption. At the same time because there was so much content in the video game base, the narrative progressed much more slowly than it did the first time, by a margin of about 20 hours. In fact, after I gained lifetime access to the Golden Saucer I quit participating in the narrative all together and never finished the game.

Unlike my replay of the first *Final Fantasy*, in which I considered the player-controlled agent as the subject of the rhetoric of the video game and tried to actualize them in the world of the game, my replay of *Final Fantasy VII* was much more selfish. In this replay I considered myself the audience and tried hard to see and experience every part of the video game base. I did not really care if my player-controlled agents lived or died so long as they were accumulating objects.

Orienting Systems in *Final Fantasy X*

As discussed on the charts that accompany chapter three, the objects in *Final Fantasy X* are abundant, and the commonly depicted interactions of player-control agents are depicted with millions of colors and, at times, shifts seamlessly to commonly depicted programmed responses. The significance of this for the narrative of *Final Fantasy X* is that the narrative is no longer only revealed through the dialogue of non player-controlled agents, although this dialogue is still substantial. In addition, the narrative in *Final Fantasy X* is also heavily dependant on the visual representations in the game and the spoken dialogue of non player-controlled agents. The improved detail of programmed responses no doubt makes the game play in *Final Fantasy X* more immersive and contributes to the ability of narrative to orient gamers.

In *Final Fantasy X* gamers learn from non player-controlled agents that the game takes place on the planet of Spira, which was once a thriving, technologically advanced planet fully integrated with machina--technology. Unfortunately, this machina was also used for evil, and wars broke out between the inhabitants of the planet. Two large cities, Zanarkind and Bevelle, went to war with one another. Zanarkind was losing the war, and the ruler of Zanarkind, Yu Yevon, sacrificed the entire city and turned the inhabitants into fayth (spirits capable of dreaming and manifesting their dreams into reality). The fayth together created Sin, a destructive flying monster, and inside of it dreamed collectively of Zanarkind as a dream-reality. As the scouts for Bevelle approached the ruined city, Sin appeared and chased them. The people of Bevelle were so scared of Sin that they erected temples to Yu Yevon and made his teachings the official religion--a basic premise of which was the rejection of the use of technology and a method for destroying Sin which involved a pilgrimage and a ritual sacrifice, after which Sin only remained vanquished for a ten-year period during which time his power grew and he then returned to wreak havoc. This way of worship and cycle of destruction has continued for 1,000 years. In *Final Fantasy X*, players assume the identity of Tidus, a Blitzball player from the world of Spira who falls out of the dream Zanarkind inside of Sin and is encouraged to embark on a mission to destroy Sin for good.

When they begin a game, gamers are not privy to all of this information. Instead, players begin the game controlling the player-controlled agent Tidus as he walks to a Blitzball stadium to compete in an underwater soccer-like game. During the game, the city is attacked and destroyed by a large flying creature and Tidus is somehow carried 1,000 years in the future. If gamers want to figure out how to get Tidus back to his world,

or how Tidus came to arrive in the future, they must participate in unraveling the narrative.

As with *Final Fantasy VII*, during the first few hours of game play gamers are not given much freedom to deviate from the embedded narrative. While the initial environments are graphically and audibly rich, there are not many facilitating objects and the freedom to maneuver beyond the boundaries of the immediate environment is constrained. In other words, commonly depicted interactions that results in the revelation of narratively significant events are forced upon gamers.

The most dominant ideological state apparatus in *Final Fantasy X* is the religious ideological state apparatus. The non player-controlled cooperative main agents in the game are often prominent religious leaders, and at the same time they are responsible for telling gamers acceptable ways for player-controlled agents to interact in order to reveal the embedded narrative. The basic tenant of the Yevon religion requires special devotees of the religion called summoners to go on pilgrimages in order to become spiritually powerful enough to destroy the monster Sin. Player-controlled agents must complete this pilgrimage if they wish to reveal the narrative.

The social systems in *Final Fantasy X* are also dictated by the religion. In the social culture of the game, most environments have some sort of religious significance. In fact, Yevon is so fully integrated into the culture that its prayer position becomes a greeting of sorts. Yevon controls which tools will be used for production, entertainment, war, etc. The only technology that is accepted is technology affiliated with the sport of Blitzball, and the cultural importance of organized sports is intimately tied to the religion. While there are several different species of beings that inhabit the planet of Spira, each

with very distinct dwellings, clothes, and weapons, etc., the cultures are limited by the culture of Yevon. For example, while the Ronso are muscular, blue, and lionfaced beings that live on the snowcapped peak of a mountain, their way of life conforms to the strict guidelines of the Yevon religion. In *Final Fantasy X* there is just one distinct culture that is not subject to Yevon. In direct opposition to the teachings of Yevon are the Al Behd people who use and resurrect old technology, have different governing bodies, a different religion, language, and other goals that include permanently destroying Sin. These cultural/religious differences are cause for an intense prejudice against the Al Behd people from members of Yevon.

There are three distinct political groupings in *Final Fantasy X*: followers of Yevon, members of the Al Behd, and Sin and his spawn. Player-controlled agents begin the game politically aligned with Yevon and are required to go on a pilgrimage from temple to temple. At the same time the player-controlled agents are continually confronted with Sin spawn, which are non player- controlled non cooperative sub agents that break off Sin's body and attack player-controlled agents. During the game, player-controlled agents cooperate with members of the Al Behd, though non player-controlled agents often make derogatory comments about them. However, by the end of the game, the Yevon religion seems to have a corrupt governing body, the Al Behd leaders are the only living relatives of the player-controlled agent Yuna, and Sin--in an odd twist--turns out to be Tidus's father. This means that gamers, who were compelled to begin in alliance with Yevon, must shift the political allegiances of their player-controlled agents, and more importantly change there commonly depicted interactions accordingly.

Final Fantasy X, as with the earlier *Final Fantasy* games, is set in a world that has

an abundance of natural resources and beasts of burden. As the graphics are immensely

better, the lushness of the environment is even more apparent. Much like the first *Final*

Fantasy, in *Final Fantasy X* past civilizations that occupied the planet were able to

harness the natural resources and out of them create complex environments. Whereas in

the first *Final Fantasy* the world is in a constant state of decline and the environment is in

direct danger, in *Final Fantasy X* the natural resources are never allowed to be used long

enough to deplete them, and according to the visual depiction, the planet is surprisingly

lush. For one of the first times in the *Final Fantasy* series the world is not being exploited

or in danger of having its natural resources destroyed through consumption. Accordingly,

the goal of the game for players is not to prevent the loss of the environmental

components of the productive base as much as it is to prevent the destruction of the

human made components of the productive base.

Because there are not many developed cities, there are not many developed

commercial locations. Also, religious restrictions on technology relegate citizens to living

on remote islands to happily weaving using primitive looms. Yet the simplicity of the

societies does not mean that there is not a complex economic configuration for gamers to

interact with and within. In *Final Fantasy X* there are other establishments that double as

commercial environments, such as Rin's travel agency, and several independent

merchants such as O'aka, who appears in odd places throughout the game and offers to

sell player-controlled agents facilitating objects.

The Rhetoric of *Final Fantasy X*

To be sure, when I first began playing *Final Fantasy X*, I wondered how and why the creature Sin carried Tidus to the future, and the continual presence of this creature through the first few hours of game play kept me curious about the narrative. Of course, the fact that I had very few options for controlling my player-controlled agent Tidus during the first few hours of gameplay, except to have him participate in unraveling the embedded narrative, did keep me steadily revealing the narrative. The narrative orienting systems had once again captured my attention and I prepared to play the game in my usual selfish way.

However, as the game progressed, the Yevon religion became so overwhelming that I forgot that I was participating in the narrative. It was also often the case that the cultural, political, and economic orienting systems were so connected to the Yevon religion that I never recognized my participation in these orienting systems as such. If one were to ask any gamer why they were playing *Final Fantasy X* in the way that they were, it would be highly likely that the gamer would frame the answer in relationship to Yevon—I know I did. Thus, while playing *Final Fantasy X*, I did not attempt to align player-controlled agents with the narrative orienting system, but instead with a specific part the narrative orienting system--the religious state apparatus.

On closer consideration, when playing *Final Fantasy X* the lack of commercial environments and similarities among the facilitating objects that can be purchased also deterred me from orienting my player-controlled characters in relationship to the economics in the game. Unlike *Final Fantasy* and *Final Fantasy VII*, when playing *Final Fantasy X*, I was never concerned with the amount of money possessed by my player-

controlled agents because there was never really anything that I felt compelled to direct

them to buy. Instead, I was much more interested in facilitating objects such as spheres

that could be used to change the physical and mental abilities of player-controlled agents.

While these spheres are clearly facilitating objects, they are probably more closely linked

to the political orienting system in *Final Fantasy X* than the economic system, because in

order to actively seek these objects a gamer must direct player-controlled agents to

assault non player-controlled non cooperative sub agents. Regardless, while playing *Final*

Fantasy X, for me, the audience of the game was clearly the player-controlled agent, and

my role as a gamer was to identify my player-controlled agents properly as directed by

Yevon.

Conclusion: Rhetorical Insights

As Burke says in *A Rhetoric of Motives*, the specialized activity "is [not] free

from identification with other orders of motivation extrinsic to it"; instead, such activities

are always complicit in "a larger unit of action" (27). To be sure, the rhetoric of video

games relies on overlap between each of these orienting systems (regulatory

configurations, embedded narrative, and social systems) and uses this overlap to motivate

gamers to comply with the rhetoric of the game. For example, as was discussed in the

previous chapters, there is a strong connection between the social systems and narrative

in *Final Fantasy* games. It is often the case that if agents want to participate in unraveling

the narrative of a game, they need to participate in the economy of the game by

purchasing objects and using or consuming these objects. As gamers uncover parts of the

embedded narrative, they are often rewarded with more money or objects so that they

may continue participating in uncovering the narrative. If gamers do not participate in the economy of the game, they will likely be unable to reveal the narrative of the game, and the withholding of narrative events becomes the coercive recourse of not participating in the economic system.

Conversely, gamers might wish to participate in the economy of the game and ignore the narrative. However, they must participate in the narrative to receive the goods they desire. In many cases, if a gamer does not participate in the narrative, access to commodities is withheld. In another, more specific example, the entire focus of a gamer when playing *Final Fantasy X* has the potential to become reoriented around playing Blitzball; player-controlled agents are permitted to participate in Blitzball games whenever they want and are also allowed to constitute Blitzball teams from non player-controlled agents that they meet throughout the game. Some gamers only participate in unraveling the narrative of *Final Fantasy X* in order to allow player-controlled agents to meet new teammates. Such gamers are nonetheless required to unravel the narrative and correspondingly adhere to the teachings of Yevon—or else they will not have new environments and new teammates made available to them.

In short, looking at the individual act is not enough when studying a video game. Video game studies must attempt to understand how each act is complicit in a greater system. In light of this, perhaps popular topics such as violence in video games can be readdressed in their rhetorical context. Doing so, might demonstrate that an individual act of violence, which usually happens in some political guise, may ultimately serve some other economic, or cultural function. In the context of the narratives of the *Final Fantasy* series, this violence may in some cases even be renamed self-defense, patriotism,

terrorism, competition, etc. In the narratives of the *Final Fantasy* series, for example, the violence of most political conflicts is often connected in several ways to the salvation of the planet. The rhetorical overlap between orienting systems might also suggest that no one orienting system is more salient than the others.

Without a doubt one of the most notable advantages of discussing the rhetoric of video games via the orienting systems is that doing so contextualizes much of the information revealed from my earlier inquiry into the grammar of video games. The study of the rhetoric of video games also reveals information about the content of the video game base that further helps scholars referee the relationship between the significance of content and an appropriate theoretical approach. For example, in *Final Fantasy VII* gamers may be asked to align themselves politically against a large capitalist monopoly, but culturally and economically gamers are given incentive to consume the goods and services produced by mature capitalist societies. This intersection might prove a fruitful avenue of study for various Post-Marxist approaches. The fact that the rhetoric of video games can help us become aware of this contradiction is another testament to the appropriateness of my model.

As demonstrated in this chapter, identifying these orienting systems is not a simple task and it requires the person writing the analysis of the video game base and orienting systems to have an extensive knowledge of the video game he or she is writing about; rhetorical analysis of a video game cannot be conducted haphazardly. Within *Final Fantasy*, *Final Fantasy VII*, and *Final Fantasy X* there are several orienting systems that encourage gamers to direct their agents to interact in certain ways and coerce agents (and gamers) to consent if they refuse to interact as encouraged. These orienting

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systems exist in entire networks of objects, programmed interactions, and programmed responses. In the *Final Fantasy* games, since the video game base is increasingly more complex as (largely a result of more advanced technology), the orienting economic, cultural, and political systems are much more complex. Correspondingly this complexity means that the rhetorical nature of video games is increasingly difficult to study. In the next and final chapter, I evaluate the effectiveness of my proposed grammar and rhetoric for distilling video game content and providing a context for discussing the ideological allegiance(s) of a video game. In this concluding chapter I will also propose other ways that this model may be used in video game studies.

CHAPTER 6

THE FUTURE OF VIDEO GAME STUDIES: IDEOLOGY, POSTMODERNITY, AND AGENCY IN VIDEO GAMES

Undoubtedly, studies of violence[107] in video games emerged as one of the earliest and most popular topics within video game studies—particularly in psychological and sociological studies. As with other media produced during the Cold War era, many early video games such as *Battle Zone* and *Missile Command*, then *Contra* and *Metal Gear*, had overtly violent and often militaristic themes. With the end of the Cold War, video games began reflecting post Cold War military themes in games such as *Half Life* and *Smuggler's Run*. Today, such games account for a considerable amount of the violent content found in video games, but do not account for all of it. Exploration, colonization, competition, rescue and "violence for violence sake" are other popular video game themes that frequently bring with them violent content. As the 2001 study conducted by researchers at Children Now uncovered, of the top selling games on all platforms "89% contained violent content, almost half of which was serious in nature" ("Fair Play?"). Such a high number suggests that violent content is not the exception but the standard and is worthy of being studied.

Yet violence is not the only characteristic of video games, and video game studies have grown to include and address other topics. Unfortunately, as has been stated several times in this dissertation, the interdisciplinarity of video game studies, while strengthening video game studies with an openness to new theories, has caused several divides that prevent scholars from successfully studying the medium of the video game in

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[107] The connection between media and violence is a popular subject. Indeed, "Since the early 1960's, over a thousand studies have indicated a relationship between sustained exposure to violent media and real-life aggression in some children" ("Fair Play").

a comprehensive way. First, with scholars coming from and publishing in diverse disciplines, it is difficult to find video game scholarship; much of the most recent scholarship surfaces in a wide range of journals and online publications. Because there are no comprehensive readers and only a handful of books on the subject of video games, the lack of an academic center is especially felt. The newness of video game studies has also permitted video game scholars to develop their own terminology but, unfortunately, the terminology is often culled from diverse disciplines or popular culture. We have yet to develop an appropriate and logical terminology and our failure to do this has made it difficult to understand, reuse, and build on scholarship. Lastly, because video games themselves have been approached in a piecemeal fashion, to date no comprehensive model for distilling video game content has been proposed, and consequently video game scholars have no way to make manageable the varied content of a video game and distinguish between the different types of content. In short, because video games are continually advancing and no one has attempted to combine the multiple directions taken within field of video game studies, video game studies are at the moment in disarray and the potential of video game studies has not been actualized. While the problems presented by interdisciplinarity will likely be worked out over time, our ability to discuss video game content waits patiently to be developed as games continue to become more complex and more difficult to study.

To be sure, I do not propose jettisoning the interdisciplinary nature of video game studies. I agree with scholars such as Bolter and Grusin who propose in the end of their book *Remediation* that it would be a mistake to separate new media from old media. Video games can be studied from multiple perspectives; indeed, as video games

appropriate the conventions of other media, video games simultaneous make themselves available to serve audiences with the same or a similar function, whether this be a narrative, game, information, etc. The perspectives brought from other disciplines to video game studies give video game scholars a starting point. However, as much as video games represent the convergence of new media, they are also simultaneously asserting themselves as something entirely different from other media. Consequently, distinctions do need to be made, and video games studies needs a terminology that more accurately reflects the video game medium. Video game studies also needs models to distill content and understand how playing a video game is rhetorically structured. What is needed now is a remediation of video game studies itself in order to develop a common grammar and rhetoric of video games. This dissertation has been one such attempt.

The grammar and rhetoric I propose for studying video games is not exhaustive, and is best thought of as a starting place for further discussing video game content and the ways players are encouraged to identify and interact with this content. It is apparent by looking at my analysis of three games in the *Final Fantasy* series that the terminological framework I proposed can be applied to name the content of video games regardless of their complexity. This cross section also chronologizes, through examples and sheer numbers, the types of changes that have occurred in the video game base over the last fifteen years. Were these changes plotted on a chart, this trajectory might give video game studies some insight into the trends and future of video games. It is also apparent from reading the analysis of the rhetoric of each game that studying orienting systems is a fruitful way of discussing the multiple types of consent and coercion used in video games to motivate gamers to control their agents in specific ways and as suggested.

Lastly, the most important revelations seem to come from looking at the combination of the grammar of a video game's base and the rhetoric of its orienting systems. By combining these two frameworks, narrative is not depicted as the central element of the video game, but, more aptly, is seen as a result of the way a gamer works within orienting systems to combine the elements of the video game base. In addition, the narrative summaries I provide no longer are abstracted from the agency of the player, but seem to logically arise from his or her agency

There are also several secondary benefits that come with the proposed model. The proposition of a common terminology and grammar permits video game scholars to easily identify those parts of the video game base or orienting systems that they wish to study, and accordingly the proposed terminology and grammar might make it easier to make connections across video game studies or identify areas that need more attention. Through looking at the intersection of terms, several more ways to study video games might also be proposed. For example, one might study non player-controlled agents, or the interaction between non player-controlled agents and main agents.

Admittedly, there are some weaknesses in my proposed model. One limit I have already identified is that while the model is designed to be speculative, it is not speculative enough. More specifically, one weakness of my model as it is presented here is that it focuses on the immediacy of what is presented, and does not consider that activity can be equally motivated by what is not presented (i.e. the absence of coercive force may be as powerful a motivating factor as the presence of coercive force). Also, although I tried to develop a framework that can be universally applied, some games, particularly simple games, do not seem to benefit much from the application of the

model. But then again, applying this model to simple games is akin to using literary criticism to theorize about a *Dick and Jane* book. I am also particularly concerned about the categories of orienting systems that I proposed. While at the moment these seem like the most logical systems to begin with and appear to be general enough to incorporate other orienting systems within their boundaries, I am hesitant to say that these are the only orienting systems. I am also troubled by the inherent ideological bias that comes by implicating these systems. Alas, the model needs to be used and tested more to specifically identify its weaknesses and places where it needs to be refined.

The true test of the proposed grammar and rhetoric of video games is whether the combination of both parts of this model provides a good context for discussing ideological content. As I have stated throughout this dissertation, I am particularly concerned with the ideological allegiances of video games and the fact that our inability to accurately assess video games has also caused an inability to asses the ideological allegiances of video game content. Video games are produced and played in a complex cultural context and as with other forms of "media culture," video games have become a popular site for "key social groups and competing political ideologies [to] struggle for dominance" (Kellner 2). While the images, text, and dialogue can no doubt be studied as ideological, video game theorists have also proposed that ideology is imparted through specific types of interactivity during game play. Yet, though the interactivity of the gamer is posited, the freewill of the gamer is not, and the ideological content within video games is often presented in video games studies as being an immutable part of a video game. In my assessment, because the model attempts to be objective and comprehensive, without predetermining the action of a gamer, it might inform video game studies about

the relative significance of parts of the video game base, as well as the ideological

structures that may be embraced through the granting and not granting of consent by the

gamers. Thus, my proposed model provides a context for discussing ideological content

which is only speculative, being contingent as it is on the interaction of the gamer.

The discussion of video games in this dissertation and the model proposed to

study video games in many ways frame video games as perfect postmodern texts,[108] and

this suggest that the ideology imparted by these texts might also be aligned with the

ideology of postmodernity.[109] Among the many things that can be said about postmodern

texts are that they often prize ambiguity, have fragmented or playful narratives, present

the forgotten perspective of the marginal, take as subjects popular culture, and often

include a meta-cognitive awareness and ontological questioning. The end result of any

combination of these postmodern tendencies is that texts are increasingly unstable,

meaning is precariously contingent, and readers have to interact more with the text, and

work harder to understand it. Indeed, video games are often presented non-linearly, and a

player's understanding of the narrative is often tenuous, even after completing the game.

This is largely because the games are long and the narratives complex. One game can

range from several hours to forever, with many games taking from 12 to 120 hours to

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[108] Gottschalk says something similar in his essay "Videology: Video-Games as Postmodern Sites/Sights of Ideological Reproduction."

[109] Perhaps the openness of this framework can help us understand not just ideology but multiple simultaneous ideologies—a postmodern version of ideology. After all as Terry Eaglton has pointed out, postmodern theories "have conspired to discredit the classical conception of ideology." As the world changed in the middle 20th century, the relationship of people to literature changed, as did the texts that were produced. The Vietnam War, a bustling economy, and institutional changes at universities all helped make post secondary education more accessible. At universities enrollments swelled with students who were prepared to give a "fierce critique of all academic hegemonies" (Easthope 19). At the same time, as Easthope notes "from 1960 on popular culture – music, film, television, advertising-- came to permeate everyday experience" (Easthope 19). Thus, increasingly the texts produced confronted a world that is not only increasingly materialist and depersonalized, but also over commercialized, sexualized, technologized, and hyper-formalized. A surge in Marxist and feminist thought, also demanded attention be given to works which had previously been considered marginal because of their form, subject matter, or the author's position in the culture. In short, the culture for the production and consumption of texts changed drastically.

complete. Information is communicated largely through textual dialogue gathered by random encounters with non player-controlled agents, as well as from interpreting detailed visuals. Indeed, players are frequently presented with new and exciting scenes to explore, as Jenkins has noted, and they must continually ask themselves "Which world is this? What is to be done in it? Which of my selves is to do it?" In video games the narrative that results is often a direct result of the way players choose to answer these questions within the given constraints.

The ideology of postmodernity encourages militarism and late market capitalism. Indeed, Jameson asserts that postmodernity is the characteristic culture of late-market global capitalism and is capable of reaching parts of the world that militarism or capitalism alone cannot (5). Jameson adds[110] that postmodern is politically an extension of American global military and economic domination. In its totalizing pervasiveness postmodernism fulfills Marx's prophecy in the Communist Manifesto that, "The need of a constantly expanding market" will cause capitalism to "nestle everywhere, settle everywhere, establish connections everywhere" (Marx). In no uncertain terms Jameson says "the underside" of postmodernity is "blood, torture, death, and terror" (5).

Jameson's insight into postmodernity also seems to make good sense, particularly in light of what Adorno[111] and Horkheimer say in their discussion of the culture industry. Only an industry in a figurative sense of the word, the culture industry refers to the complex system of production and distribution of products for mass consumption which

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[110] Indeed McRobbie argues that "Postmodernism has therefore served this function of shifting the paradigms in cultural studies and sociology, doing the kind of intellectual work which inevitably provokes controversy and protest, all the more so when what seem to be at stake are precisely those terms like history, society, and politics that have substance and direction to the kind of work we do as teachers and researchers and the reasons why we do it" (McRobbie 2).

[111] Because of the apparent lack of agency on behalf of the consumer who appears only as an easily duped appendage, Adorno's theories have received much criticism.

came into being as a result of modern industry and media. The mode of production caused the culture industry to impress "the same stamp on everything" particularly "films, radio, and magazines" (Adorno 8). Unfortunately, in the middle of the century a "homogenized consciousness" was no longer productive for expanding markets. So in order to stimulate "new needs for new commodities," conflicting ideological forces were introduced into the market economy and sales increased (20). Today, as John Fiske says, not only do manufactures strive for product differentiation they also "try to identify social differences and then construct equivalent differences in the product so then that social differentiation and product differentiation become mapped onto each other[112]" (Fiske, *Understanding Popular Culture* 6). This is in essence how postmodernity functions in late market global capitalism: it legitimizes and values almost all cultural expressions so long as they are economically viable. According to Jairo Lugo, Tony Sampson and Merlyn Lossada, "like other cultural industries, the video games industry tends to reproduce the political economy of the system of relations in both the structure (economical level) and superstructure (ideological level)" particularly, "inducing further integration of the entertainment, computer and military industries,"

A Final Proposition

Specifically, though video game studies can speculate about the ideological content of a video game, and the video game base and orienting systems may be

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[112] This can be noted in the external reality of video games, as well as the internal realities of video games. As artifacts/commodities of late market capitalism video games are produced internationally and localized globally for different markets, grafting into each release the difference of the market they are entering into. Both hardware and software companies struggle to differentiate themselves form one another in an attempt to earn a greater market share. This is especially effected though the use of other popular media outlets.

produced with ideological allegiance grafted onto them, there is no guarantee that video games are consumed wholly in the way intended—remember the gamer has some agency. As discussed earlier, scholars cannot assume the individual activity of a video game player; such assumptions do not accurately impart the breadth and significance of a video game to readers, nor do they recognize that the player has any agency while playing a video game. Of course preferred—or more likely—playings (readings) can be suggested; however, they are not objective, and often cater to narratological studies. Were one to tape record someone playing a video game for several hours, the individual utterance of the played video game might reveal ideological allegiances much different from the way a video game scholar might depict a preferred playing. Increasingly, gamers are given the choice of how to tailor their individual game experience, and the ideological content of a "played video game" is directly linked both to the content that gamers are given and the way they choose to interact with this content.

Although a video game may be produced with obvious allegiances grafted onto/into it, there is no guarantee that any video game will be consumed wholly in the way intended by its creators. As John Fiske argues, through the process of "excorporation" members of a subordinate group use the resources produced by a dominant group, i.e. the culture industry, to produce popular culture (15) which "is relevant to the immediate social situation of the people" (25). In a similar vein, De Certeau cites the example of indigenous peoples who mixed their native religion with Christianity in order to preserve their religion during colonization. Their usage of Christianity was not an unthinking consumption; instead, "their usage of the dominant social order deflected its power, which they lacked the means to challenge; they escaped

it without leaving it" (xiii). In order to study and understand the way we accept and struggle against dominant cultural forces, Fiske proposes that we focus both on the products of the culture industry and the ways that people appropriate these products (20). In the final pages of this dissertation I would like to suggest that the proposed grammar and rhetoric of video games be used to this end.

Indeed, the possibilities for excorporative game play, although always possible, have exponentially increased in modern video games. For example, in *Grand Theft Auto III*, a game with a rather complex embedded gangster narrative, gamers are not required to participate in the narrative. In fact, gamers can freely explore the city and may choose to rescue people with an ambulance, go on police calls, or give taxi-cab rides. Without a doubt, as video games have become more complex, there is the potential for players to excorporate the texts and produce played games with ideological content that runs counter to what preferred readings might yield. As Carsten Jessen says in his essay "Computer Games and Play Culture," "Games become what they are in use, through reception." This means that the game's "text," as it appears on the screen, is only to be regarded as a kind of sheet music which only becomes a "computer [video] game" in its realization. Accordingly, he says, "The first question that has to be asked is therefore not what the computer and the games do to children, but the opposite: what do the children do with the computer and the games?"[113] For example, in his essay "Voices from the Combat Zone: Game Grrlz Talk Back" published in *Barbie to Mortal Kombat: Gender*

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[113] Similarly, after some speculative comments about the future of video game studies, Klevier says that:

> we need speculative concepts and theories which make relevant hypotheses about what is actually going on when people play, theories addressing questions of understanding, identity and ideology. We must try to understand what happens when play meets mediation. The puristic ludological approach will leave us relatively helpless, forcing us to conclude that players are stupid, that they have been duped by the industry, or that they do not really like games.

and Computer Games, Jenkins compiles editorials from women who "never felt left out of the digital realm and [who] take pleasure in beating boys at their own games." Contrary to other feminist game movements, the Game Grrlz movement acknowledges the agency of women to shape games by "refusing to accept the constraints of stereotypes, not those generated by clueless men in the games industry or those generated by the girls game researchers" (Cassell and Jenkins 328). They do this by "asserting their own pleasures in playing fighting games like Quake" (328). The agency of the female player is increasingly highlighted on this terrain as video game theorists slowly discover that interactivity matters. For example, in "Lara Croft: Feminist Icon or Cyberbimbo? On the Limits of Textual Analysis," Kennedy begins with what has become the typical feminist critique of video games and analyzes "Lara primarily as an object of representation--a visual spectacle--and then moves on, considering the ways in which the act of playing *Tomb Raider* as Lara disrupts the relationship between spectator and "spectacle." Kennedy's study is the type of study championed in this dissertation, because it considers the identification and agency of the player.

Yet, though the act of playing a video game may be ideologically subversive, perhaps the agency in the act of playing a video game, particularly along subversive lines, is a carefully structured illusion. As Baudrillard says in *For a Critique of the Political Economy of the Sign*, "The mass media are anti-mediatory and intransitive. They fabricate non-communication—this is what characterizes them" (169). In light of video games, while there is the immediate appearance that exercising agency in playing a video game is subversive, the extent of the communication only reaches as far as the machine. What makes playing a video game subversively any different from shouting at the

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television? Both are equally subversive and both have little significance, unless the

perspective that gave rise to such commentary and the knowledge learned from this

interaction are carried to the world beyond the video game. The possibility for a more far

reaching agency has recently changed with the proliferation of massively multiplayer on

line games. Subversive game play can be seen by others, as well as experienced, and

perhaps online gaming is where the real potential of subversive game play lies.

Accordingly, analyses of video games would be incomplete if they did not also

take into consideration "what the cultural consumer 'makes' or 'does' during this time

and with these images" (Fiske, *Understanding Popular Culture* xii). In short, if we want

to study ideological content, then we must understand what players are given to interact

with, how they are encouraged to interact, and finally what they actually do. Further

analysis must take the individually played video game into consideration[114] and attempt

to understand the ways in which game-play results in accordance or dissonance with

various hegemonic structures within the game. This might mean studying several played

games using the proposed model and closer analysis of the distilled content each of

played video game, using methods already proposed or relevant disciplines such as

feminism. In the context of previous parts of the proposed model this can reveal what

structures players possibly identified with or rallied against and what secondary

production may have occurred.

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[114] Some studies of this type are being done. For example in "Creative Player Actions in FPS Online Video Games: Playing Counter-Strike," Paul Breidenbach, Eric Boria, and Talmadge Wright analyze "patterns of in-game talk and behavior among *Counter-Strike* players and the social significance of that talk." This was done by referencing "log files" "used by players to check their kill/death ratios and to examine game action." Although this is a good start, it seems that the resulting study could benefit from contextualizing this conversation as previously proposed in this dissertation.

Conclusion

Over the last few years, development of video games has not halted long enough for theorists to catch up, and the ability of scholars to discuss video games and to re-present video game media is becoming increasingly difficult. I would like to conclude by formulating a rounded statement about what is required for developing a total critical media literacy of video games: First, we must understand that players make the reality of a video game from the "conditions which they find at hand." I have termed this the video game base. Working within this context, I propose that the base provides the content for orienting systems that direct a player's interactivity within the world of the game and often promote completion of the narrative—thus effectively organizing a dynamic game environment. The combination of the base and the orienting systems imparts a specific worldview, and I subsequently propose that comparative analysis between the base, rhetorical structures, and the played video game text can inform us about some of the identifications that took place as an individual game was played and the world view communicated. If I am correct, many games may have strong allegiances to postmodernity.

APPENDIX

In order to impart the significance and number of choices presented gamers in contemporary video games, in the next few paragraphs I will briefly describe the choices presented gamers within the first few minutes of *Final Fantasy*. This brief description should also make obvious the difficulties of comprehensively discussing video game content, and the impracticality of discussing an entire game point by point.

The first *Final Fantasy* begins with a prophecy that "When the world is in darkness Four Warriors will come---." When a gamer presses a designated button on the controller, the prophecy disappears, and the choice to continue a previously started game or to start a new game is displayed on the screen. If a player chooses a new game, a black screen with four agents, framed in blue boxes, appears. While this is a single player game, a gamer will control four agents, and the images of all four agents must be chosen and named for the game to begin. After the fourth agent has been chosen, the screen then changes to the image of the first agent selected standing facing the right in the middle of a green area, which gamers might assume is grass from its color and its contrast to surrounding images that resemble trees and water.

If a player navigates a player-controlled agent(s) to explore this area, non-player-controlled non-cooperative agents will likely randomly attack, and the screen will transition to a battlefield scene. The four player-controlled agents will appear standing head to toe on the right side of the screen in order to simulate the depth of their standing side by side. The non player-controlled, non cooperative agent(s) will appear similarly lined up on the left side of the screen. Options for the interaction appear at the bottom of the screen and include attacking, fleeing, magic, using items, etc. If the player-controlled

agents kill all of the non cooperative agents before they themselves are killed, the surviving player-controlled agents will be rewarded with experience points and money and be transported back to the open green area. If all four player-controlled agents die, the game is over.

Immediately north of the green space the agent is initially placed on the opening screen is a miniature representation of a gray city and a castle. If gamers navigate their agents north and inside the walls and onto the image of the city, the screen will then change to a close-up two dimensional representation of the inside of the city, showing several buildings, a fountain, and cobblestone paths. Upon closer inspection, all the gray buildings are differentiated with signs. For example, weapons on a crest hang on the front of one building. If a player-controlled agent is navigated into this building, the screen transitions to the interior of the building. A blue box also appears and presents the option to buy or sell. Depending on the choice made, the weapons that the agent would like to buy or sell are selected from a player's inventory or from the merchant's inventory, and a pre-designated sum of money is either credited to or debited from a player's account. In the beginning of the game, agents are given a small amount of money and have no weapons to sell, so their choices are limited. In the town there is also a white magic shop, a black magic shop, a doctor's office, and a shop to buy items having restorative properties. Medical treatment or rest at a hotel can also be purchased in a similar way. There are also a handful of people in the town that can be interacted with by navigating player-controlled agents near them and pressing a designated button. Most of these non-player-controlled agents will only say a few words or a short sentence such as "Revive

the Power of the ORBS" or "Please! Save the Princess!" Interactions are similar

throughout the entire game--that is, if a player chooses to interact.

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