LEAVING FANTASY BEHIND IN VIDEOGAMES
THE LIMITS OF THE NARRATIVE PARADIGM

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Abstract: Historically, videogames have been close to popular culture, drawing most of
              its themes from fantasy and science fiction. In this paper I argue that one of the
              reasons why videogames have not yet dealt with human relationships, social
              and political issues is due to the limitations of the narrative paradigm that has
              been taken for granted by both the industry and academia. Additionally, I will
              suggest some alternative approaches based on simulation and on dramatist
              Augusto Boal's work that could be used to develop the techniques that we
              need for crafting non-fantasy videogames.

Key words: computer games, videogames, ludology, simulation, Augusto Boal, Theater of
              the Oppressed, interactive narrative.

1.   Introduction: Playing with Fire

While it is true that videogames have experienced a spectacular
technological growth during the last decades, its genres and themes have
mainly remained unchanged. From its origins, videogames have been highly
influenced by popular culture, especially science fiction -the first videogame,
"Spacewar" featured spaceship combats (Laurel, 1993)- and fantasy–
"Adventure", another classic, was based on fantasy literature and role-
playing games. In addition to these examples, videogames also heavily
reference other forms of popular culture such as comics, cartoons, sci-fi and
war stories. However, videogames have yet failed to explore other non-
fantastic issues, such as personal relationships, social or political topics in a
more adult, non-melodramatic perspective. I am aware that certain games do
deal with personal relationships -girlfriend simulators, Brenda Laurel's

Purple Moon series and "The Sims"- or even political, urban, ecological and economical problems –Maxis' "Sim" series. Nevertheless, the current situation is still far different from what happens in other media, like literature, film or drama, which can easily go into such topics as divorce, solitude, fear of death, racism or political problems. Generally, the first answer that I get when I discuss about "serious" videogames is that nobody yet worked in that direction simply because these games would not be fun to play. Nevertheless, cheerfulness is not a necessary requierement for entertainment as we can see in traditional dramatic narrative. In addition to this, it may also be possible that certain technical, structural and even cultural limitations are in play. In this paper I will explore these potential constraints and argue that, indeed, videogames could handle these subjects only when we stop taking for granted some of the paradigms that have been ruling on game design.

2.   Game, Play and Narrative

Traditionally, videogames has been considered as an extension of narrative. While the comparison may be useful to a certain degree, this is not only inaccurate but it also compromises our ability to create more compelling games. Previously (Frasca, 1999), I have argued that in order to better understand videogames, we need to take a functional approach to non-computer-based games. Just as narratology is the discipline that studies narrative, we need a "ludology" that focuses on the structure, rules and characteristics of games. Some authors have been working on this direction lately, particularly Markku Eskelinen and Jesper Juul.

One of the main tasks of this nascent discipline is to provide a more rigorous terminology. While this is still a work in progress, I have distilled two definitions from such different fields as psychology, anthropology, sociology and philosophy (Frasca, 2001). The first distinction that needs to be made is between two different categories: "play" and "game". Since these terms could be confusing because they can both be a verb or a noun in English language, I will replace them by *paidea* and *ludus* respectively, following Roger Caillois' work (1967). Some examples of *ludus* include chess, soccer and the videogame "Quake". *Paidea* is the form of play generally associated with giving more freedom to the player and it is the main form of play among young children. Examples of *paidea* include: role-playing, dancing, construction games such as Lego or "Sim City". *Ludus* can be defined as "any game that has a rule or a set of rules that define a winning and a losing situation" while *paidea* are simply all the other games that do not comply with this condition. Please notice that even if several authors

claim that the difference between *ludus* and *paidea* relies on the lack of rules of the latter, I agree with anthropologist Daniel Vidart (1995) when he argues that *paidea* games follow very strict rules too. For example, a child who is pretending to be a pilot is following a set of behavioral rules related with pilot activities that are essentially different than the ones that explain how doctors behave. Most videogames (arcade, adventure, shooters) fall into the category of *ludus*, but there are many exceptions (simulators, virtual pets). It is important to notice that *paidea* games generally provide environments that can encourage the player to set up their own *ludus* rules. A flight simulator program is an example of *paidea* because, unless it includes "mission modes", there is no winning scenario: the pleasure lays in flying. However, the player could use that environment to create a *ludus* game that followed this rule: "if I can fly under that bridge, I will win; otherwise, I will lose". Those rules are not hard-coded on the simulation, but they were created on the mind of the player.

Now that I explained the differences between *ludus* and *paidea*, we can move on and compare them to narrative. The structural logic between *ludus* and certain genres of narrative –particularly folk stories, but also most popular genres- is almost identical (Frasca, 1999). Both rely on binary logic: two outcomes are possible in *ludus*: "winning" and "losing". The same applies to folk tales: the hero either wins or loses. This dichotomy not only affects the plot, but also the characters: in folk tales, there are either "good" or "bad" guys. This structural compatibility between *ludus* and folk tales explains why fantasy themes have been so popular in videogames. For example, the following story: "Monster kidnaps princess / Hero fights monster / Hero rescues princess", could be seamlessly translated into a game where the player could either succeed or fail in fighting the bad guy (actually, it serves as the basic premise for Nintendo's Mario series). However, it is essential to notice that even if the structures of *ludus* and certain stories are similar, this does not mean that *ludus* games are stories. The first deals with potential outcomes, while the latter weaves events that already happened.

Certainly, there are other kinds of stories that do not follow the structural rules of folk tales and those are precisely the ones that I would like to see developed into videogames. Modern novels, for example, do not rely so much on a binary logic. Their characters are never 100% good or bad: they depict contradictory human behavior, showing both the character's flaws and limitations. In addition to this, their plot structure is not generally just based on the fact that the protagonist may accomplish her goals or not. Attempting to use a *ludus* approach to deal with these subjects would trivialize them. For example, imagine that somebody wanted to create a game about divorce. While we could consider as a positive thing when a character keeps the children's custody or the household objects, it would be naïve to view it

under a binary win/lose optic because nobody really "wins" in a real divorce case. The rigid binary logic behind *ludus* not only explains why dwarfs, trolls, aliens and monsters are so popular in today's videogames, but also, at least in part, why some "serious" social and interpersonal topics have been neglected by mainstream game design. This is why *paidea* games, which are not based on dichotomies, could provide a better environment for exploring these subjects.

2.1   Paidea and Simulation

Humankind has always relied on representation and narrative in order to explain and understand reality. History, myths and sacred books use stories to describe events and transmit values. However, there is another way of portraying reality that is ontologically different than narrative and has, at least until now, played a secondary role in our civilization: simulation. Simulation existed long before the invention of computers –for example, in the models that the military used to plan battles. It is important to notice that I use the term simulation in a slightly different way than it is generally referred in computer-based simulation theory. Traditionally, these fields have used simulation to predict the behavior of a system, but my interest here is more rhetorical than functional. What follows is a modified version of the Encyclopedia Britannica's definition of "computer simulation" (2001) from which I omitted its references to computers, since simulation can also exist outside these devices. To simulate is "to represent the dynamic responses of one system by the behavior of another system modeled after it [...]". According to this definition, a doll is a simulation of an actual woman. If the doll closes her eyes when horizontal, the system is modeling the human sleeping behavior; the digestive system is being modeled when the doll "urinates" after the player feeds her with water. A doll is essentially different from a traditional representation of a woman. A painting, for example, only describes characteristics and events but the doll is a dynamic system that needs to be manipulated in order to display the behavior of the original system (Frasca, 2001). I do not claim that simulation is a better way of portraying reality; I simply argue that it provides an alternative to representation and narrative. As we know from its use in education, simulation can be of great use for explaining complex systems- such as learning how to fly a plane- and also for creating "microworlds" (Papert, 1985) where students can learn through experimentation.

3.   Against Representation

Even if simulation could hold the key to develop non-fantasy themed videogames, two obstacles are on its way. The first one is technological: it is still impossible to realistically simulate complex systems such as human intelligence. The second obstacle is cultural and might take even longer to overcome. Several myths warn us against simulating life or life-like behaviors (the Golem and Frankenstein are just two examples of this). Additionally, as simulation relies on rules, some players may feel uncomfortable with a medium that portrays human relationships as ruled-based, because this depiction challenges to a certain degree the philosophical notion of freedom of will. When discussing "The Sims" (Wright, 2000) at the recent "Entertainment in the Interactive Age" conference at USC (Los Angeles, 2001), Janet Murray complained that human life should not be constrained to just five simple variables (the characters in "The Sims" are defined by these characteristics: Neat, Outgoing, Active, Playful and Nice). The author, Will Wright, answered that originally he intended to incorporate more variables, but he had not been able to because of both gameplay and technical constraints. A similar potential problem arises in most computer role-playing games (RPG), where characters are described through different characteristics quantified in points.

But these limitations do not necessarily mean that *paidea* cannot be used to craft "serious" games. Actually, these limitations could be simulation's greatest potential.

3.1   The pleasure of breaking immersion

When analyzing the texts produced by a computer story generator, Espen Aarseth (1997) observes that the stories he enjoys the most are the ones that show the limitations of the engine, because they are generally surreal and absurd. When this happens, narrative immersion is interrupted, allowing the reader to take a critical distance from the software while he tries to understand its mechanics. Until now, we have been taking for granted that immersion is a goal that every videogame should attain. This notion has been supported both by the industry –which is always trying to create most realistic audiovisual experiences- and the academia, notably by researcher Janet Murray in her book "Hamlet in the Holodeck" (1997). Nevertheless, the 20th century has a tradition of contesting the notion of immersion –also known as "suspension of disbelief". This trend has been mostly explored in theater, particularly by authors/theorists Bertolt Brecht and Augusto Boal.

Boal is probably one of the most relevant figures of today's drama. He has developed an original set of techniques known as the "Theater of the

oppressed" which literally breaks theater's fourth wall by allowing the active participation of the audience on the stage. One of his most popular techniques, the "Forum Theater" (1992) stages one short play about an oppressive problem –for example, a man who is constantly harassed by his boss. That same script will be played several times, alternatively allowing members of the public to take the role of the protagonist while attempting to perform a solution to the problem. However, the task is not easy, because the rest of the actors will improvise on the opposite direction, trying to prevent him from reaching his goal. Boal's objective is not to create compelling stories, but rather using those short plays to encourage the audience to take a critical attitude towards what is happening on the stage and engage them on a debate. Aditionally, the fact that the play is just 5 minutes long and is usually performed by non-professional actors also helps to break the immersion.

While Boal uses the tools of drama, his work could also be understood as a *paidea* simulation, because he is representing different iterations of a system while modifying certain variables. In other words, he managed to create a computerless simulator in order to analyze personal and social problems. As it happened on the story-generator observed by Aarseth, Boal's Forum Theater is engaging not because it portrays an immersive, realistic simulation, but rather because of its limitations. When compared to a videogame, Boal's game is closer to "Quake's" world-editor than to "Quake" itself, because the pleasure is partly in playing the game but mostly in designing your own "mods" –personal modifications of the game- and sharing and comparing them with your fellow players. While it is true that many videogames include editors, these are always present just as an add-on and not as the main playing activity.

Because of time constraints, Forum Theater does not allow all the participants can play the role of the protagonist. Many members of the audience participate just by watching the plays. But their watching is an active one, because they are constantly criticizing what they are viewing. This leads me to think that Boalian videogames would not necessarily require that every player turn herself into a simulation programmer, but could also participate as an engaged spectator/player.

A Boalian videogame –which, by the way, has yet to be developed- would not be a single game, but rather hundreds of slightly different games modified by its players. Each game would reflect the opinions and ideology of its designer and players should be able to browse, try, experiment and comment each alternative. The pleasure would not be in mastering a single game, but rather in experimenting what would happen if certain variables were changed within the simulated environment.

To return to my previous example, a Boalian videogame about divorce

would provide several models along with the tools to modify them. Some simulations would focus on the material side of the process ("who keeps the car and who keeps the cat"), another would deal with the character's inner feelings, another on the point of view of the children and so on. Players should be able to program behaviors for their characters –for example, what would happen if the wife was a feminist? The trick is that every player would have a different idea of what feminism is and if everyone programmed a "feminist behavior", part of the pleasure of the game would reside in experimenting with them and discovering the ideology behind each one. Boal's paradigm could be used as a starting point for exploring the issues concerning the design of non-fantastic videogames dealing with complex human topics, a possibility that I have explored with more detail in a previous work (Frasca, 2001). Rather than taking the *ludus* approach, which is based on the dichotomy of right and wrong, Boalian games should be viewed as a *paidea* environment for social and personal experimentation.

4. Conclusion

The ultimate goal of this paper, which articulates most of my research work since 1995, is to show the need for a more developed videogame theory that would help to better understand the possibilities and limitations of videogames as a medium. Again, my objective is not to disdain fantasy-themed videogames, but rather to show that other possibilities could be explored.

In order to better understand *paidea* videogames, we need to improve our knowledge on the representational issues concerning simulation and create a vocabulary that describes both the similitude and differences between simulation and narrative.

As I previously said, simulation has played a secondary role in our cultures, mainly because of technological limitations. Augusto Boal's work is a brilliant exception that manages to provide a solution to the problem of simulating personal relationships, social, philosophical and political issues. Nevertheless, I am certain that the future will provide other alternatives that would expand, complement or maybe even refute Boal's method. Videogames are a wonderful field of experimentation for understanding the mechanics and the power of modeling reality.

Master storyteller Honoré de Balzac used narrative to create his "Human Comedy", an enormous set stories that described the complexities of France's 19th century society. In the 21st century, videogames have the potential of accomplishing a similar task but from a different perspective: by creating simulations that serve as experimental laboratories where players

could enjoy themselves while exploring the question that only true art provides: what does it mean to be human.

5.   References

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