

'Blind Faith'. An Experiment with Narrative Agency in Game Design

Deb Polson^(✉) and Vidhi Shah

Queensland University of Technology, Musk Avenue, Kelvin Grove,
Queensland 4079, Australia
{d.polson, vidhi.lalitshah}@qut.edu.au

Abstract. This paper reports on the current field of narrative-based game design through case study analysis with a particular focus on balancing high narrative agency with low production resources.

Keywords: Game design · Narrative agency · Design-based research · Case study analysis · Context review · Aesthetics · Mechanics · Dynamics

1 Introduction

Traditional narrative devices such as cliff-hangers, plot twists, character redemption, flashbacks and forwards in entertainment media have for a long time been exclusively associated with television and cinema. More recently, game designers have adopted these devices, but with varying levels of success. In 2011 *Grand Theft Auto 5* was pitched as the “most ambitious game Rockstar has yet created”, carving out “a bold new direction in open-world freedom... (and) storytelling” [1]. Even more pertinently, *Heavy Rain* was promoted as an “evolving psychological thriller filled with innumerable twists and turns, where choices and actions can result in dramatic consequences on the story” [2].

Designers of such dynamic game narratives will typically focus on producing a cinematic story world where players can respond intelligently to various scenarios and explicitly recognise the impact of their decisions on character development and plot progression. Providing the player with a high level of narrative agency typically requires a number of different possible endings, or a very intelligent system that allows players to actually experience the narrative world from within. As a result, only large commercial game studios have been able to raise the capital required to support the production of narrative worlds comparable to common cinematic experiences. However, regardless of substantial investments in technology and asset production, fans and critics discussing the narrative aspects of these games remain unconvinced [3].

On the contrary, independent (Indie) games are increasingly gaining respect both critically and commercially for recently producing innovative and diverse narrative-based games. Indie games are “usually produced by a small group, if not a single individual, in charge of designing, developing, and releasing the game” [4]. Telltale Games is an indie company that has recently experienced great growth due to the successful release in 2012 of *The Walking Dead* game, which won over ninety

'Game of The Year' awards with the New York Times reporting, "these moments have more sadness and subtlety in them than other games muster in 40 h" [5]. *The Walking Dead* uses the comic book and TV show franchise to situate the game within the same world. The game is released in episodes having cliff-hangers, flashbacks and open endings similar to that of the television show and comic books.

This new breed of indie game companies, including Telltale Games, The Fullbright Company and House on Fire, have become significant contributors to innovation in game design despite having fewer resources for production. This raises interesting questions about the relationship between production costs and narrative opportunities, suggesting that one does not necessarily depend on the other. This paper suggests a new model for the analysis of recent narrative games that specifically locates them in a scale between low to high narrative agency and high to low production efforts to identify design strategies that may support emerging and independent game designers.

2 Design-Based Research

This project team adopted a Design-based Research (DBR) methodology, which emerged from the Learning Sciences, but has key attributes that can be applied to the design of any interactive artifact. In the original context, it is critical for a DBR project to explicitly improve educational practices through collaboration among researchers and practitioners and subsequently, lead to contextually-sensitive design principles and theories [6]. By adapting a DBR approach, we adopt the main tenets of the DBR project in a game design context as being in situ, collaborative, iterative, player focused, and most importantly, results in design artifacts essential for peer and public participation, scrutiny and reflection.

The relationship between theory and design is pivotal in DBR, as design experiments allow theories to be problematised, explored, tested, adapted and advanced through analysis in their naturalistic contexts [7]. HUB Studio [8] is a new initiative offering small teams of graduate students who excel in disciplines cognate to game development. In the case of the Blind Faith project, a small team of a designer, artist, animator, sound designer and programmer was formed and over twelve weeks produced a polished prototype. To support the production, an initial case study analysis was undertaken to refine design specifications that would ensure the project brief was within the scope of the teams' abilities and resource availability.

This paper reports on the formation of a case study analysis model that best serves the tenants of a DBR practice within the context of a small game studio with limited resources. More specifically, a case study model that produces results that can explicitly contribute, support and sustain a shared vision for creative collaboration and rapid production by demonstrating key project intentions such as the aesthetic and mechanic style and production scope. Consequently, this model had three main phases; case study selection, analysis and presentation.

3 Model for Case Study Selection, Analysis, Presentation and Application

This project is guided by the principle that the effective direction of a new project is strengthened by an initial context review in the form of a customised case study analysis. The works analysed previous to the commencement of production were selected based on their impact in the field of narrative-based indie games and are discussed by combining, adapting and extending a number of existing theoretical models.

The results of the case study analysis informed the iterative design process, as the findings became a critical communication device to demonstrate and focus the small production team on the intended outcomes of the project.

3.1 Main Selection Criteria

The key characteristics for selection included release dates, production scope and both critical and commercial acclaim. All games selected can be located in a scale between high narrative agency for effective player immersion and low resource requirements for feasible production.

Recently Released: The games selected for this study were released within the last two years to show current trends in narrative-driven games. It is essential to this study and creative process to understand the current tools and techniques available and how peers in the field have adopted them to achieve the best possible outcomes for narrative presentation and agency within certain limitations typical of independent designers.

Independently Produced: Each of the works were produced by small indie development companies, often without the benefits of publisher support [9] with focus on innovation in game design rather than technology as they have limited resources and are commonly known to be using standard equipment, free-to-use software, and digital distribution [10]. Unlike major commercial developers that typically have large capital investment, over 200 employees, and access to state of the art equipment such as motion capture and virtual reality (VR) technologies that allow a capacity for technical innovation such as inventive game engines.

Critical and Commercially Acclaimed: In addition to the production value, the critical acclaim each game received for their emotive narrative components, was also considered as criteria for selection. Awards, nominations, official online reviews and ratings have been used to measure the critical acclaim of the game. Popularity has been determined by user reviews, comments on social media sites, user ratings and sales.

Agency and Resource Scale: Each game considered for analysis was first placed on a graph with two intersecting axes; the horizontal axis starts at low and ends in high player agency and the vertical axis begins with low and ends in high production value. The games most relevant to this study can be found in the second quadrant of this graph representing a range of projects perceived to have low resource requirements with high

narrative agency. This exercise resulted in a group of works that became a focus for analysis and demonstration of the scope and style of game.

At the commencement of this study, there were a growing number of games that best suited this set criteria such as *Papers Please* by Lucas Pope, released in 2013, *Silent Age* by Fireproof Games, in 2012 and the *Walking Dead*, by Telltale Games, in 2012. For example, *The Silent Age* is the debut release of indie developers, Fireproof Games and has achieved both critical and public acclaim with a 4.5 /5 star rating on the iTunes store with an estimated app worth of \$1,015,740 [11]. Produced by a team of only six developers, *The Silent Age* uses a simple side-scrolling, point and click mechanic that employs a unique minimalistic 2D art style and is released episodically as income is generated by funds procured from the initial chapters. These qualities contribute to maintaining a low demand on production resources while resulting in high public participation and impressive revenue.

3.2 Combining, Adapting and Extending Analysis Models

A significant effort to examine certain aspects of narrative games had been applied during the selection phase. Subsequently, a broader contextual understanding of the defined field was achieved well before games were short-listed for deeper consideration. The analysis of the final selected works was framed by a combination, adaptation and extension of existing models and concepts adopted by this study.

Game World, Play and Rules: A slight adjustment to Aarseth's [12] original description of the 'three dimensions that characterize every game' being game play, game structure and game world. Game world refers to the fictional content of the game, including the narrative and/or events, the setting, characters and all of the sensorial qualities, such as visuals and audio. Gameplay refers to participants' actions, strategies and motives, determining specific situations and events in an effort to maintain the momentum of the game. Gameplay can also refer to the resulting social relations, players' knowledge, in-character and out-of-character communications. Game rules refers to the structural limitations set by the programmatic game conventions designed to assist and limit player progress.

This model is particularly helpful when identifying the primary features of a game and preparing a general game description, incorporating all of the main characteristics of an interactive narrative experience such as where a player is, what they do while they are there, and how they progress and ultimately win.

The MDA Model: Attention is given to understanding the relationship between the mechanics, aesthetics and dynamics of a game and how certain aspects of each are elaborated or compromised depending on the possible resources limitations influencing design decisions and player enjoyment. According to Hunkie [13] 'Mechanics' describes the particular components of the game, at the level of data representation and algorithms; 'Dynamics' describes the run-time behavior of the mechanics acting on player inputs and each other's outputs over time; and 'Aesthetics' describes the desirable emotional responses evoked in the player, when he/she interacts with the game system.

Papers, Please is a puzzle-thriller game focusing on the emotional struggle of an immigration officer on the border of fictional countries that had recently been at war with one another. Papers, Please is the work of one man over nine months. Using the lens of the MDA model, it is clear that disproportionate effort has gone into creating a complicated interaction mechanic to mimic the complex issues and difficult decisions involved in processing immigration. There are two modes available to the player, 'Story' and 'Endless'. The Story mode is mostly scripted with twenty different possible endings. On completing the story mode, players can switch to endless mode, where they then select one of three game-types namely, Timed, Perfection, or Endurance. Each game-type has a different scoring system where the player can also choose from four different rule sets for any game-type. A rule set determines which border checkpoint laws are in effect and which documents are required for travellers. This is an innovative way to extend narrative agency by allowing the player to exercise different decisions with a variety of consequences in the same game world. However, with limited resources, Pope made cuts in the aesthetic components such as the visual and sound assets of the game [14]. The low-resolution art style is evocative of first generation games of the 1980s and 1990s and conveniently takes advantage of the current nostalgia for games of this era [15]. The other consequential effect of exploiting a nostalgic aesthetic style is that it automatically sets a lower expectation of narrative agency than initially anticipated based on previous experience of games of this aesthetic quality.

Narrative Agency: Narrative agency in games can be rendered in multiple ways and supported by structures ranging from simple linear to complex emergent ones. Linear narratives always feature a plot where their authors have complete control [16]. However, when a player is able to influence a world that responds to player action – or seems to do so – they can experience a more rewarding feeling of agency [17]. These outcomes can be either local (immediate), where the player receives an instant impact of his or her choices in game, or global, where the player's choices impact the overarching plot of the game. This allows user interactions that can influence storylines while still delivering a meaningful experience. This team focused on how player agency can be presented and facilitated through the exploitation of both aesthetic and structural narrative devices that are feasible for small teams to produce.

The Walking Dead takes place over five episodes, each one using narrative elements such as cliff-hangers to keep players interested in returning to complete each season. The Walking Dead is a traditional 'point and click' adventure game where the player moves around each scene interacting with characters and objects, solving puzzles and participating in dialogue with other characters.

In contrast to Papers, Please, The Walking Dead episodes are primarily linear stories with limited narrative agency over how the story resolves. However, there is a high sense of narrative agency over how the story unfolds, as the player is forced to make decisions based on limited options in limited time that can dramatically impact the way a player encounters and interacts with characters immediately or much later in another episode. This focuses the players' narrative engagement on the local rather than the global impact by concentrating on dramatic interactions with the characters rather than ultimately controlling the story ending. This has two major benefits. The first being that this mechanic allows the game designers to maintain the integrity of the

original and very popular comic book series and television show, while still offering the player a dynamic and emotional experience within the narrative world. Secondly, by limiting the availability of multiple endings, the production demands would have been considerably lower.

3.3 Case Study Presentation

In the context of a studio environment it is imperative to articulate a projects key objectives in terms that aid production and collaboration in small and larger teams. An effective team building technique is to present relevant case studies early in the project design process to demonstrate and discuss influential aspects of each significant work. This assists the team to understand and contribute to a shared vision of the aesthetic qualities and to appreciate the intended project scope. Subsequently, an initial session was arranged to summarise and present the key findings of a case study analysis to the small team of a designer, programmer, artist, animator and sound designer:

It is imperative that the presentation and discussion of selected games is part of an iterative process. For the first presentation, the games are introduced and the various models for analysis are demonstrated. The game world, play and rules can be best illustrated through screen grabs or recorded play-throughs. The researchers then demonstrate how game aesthetics, mechanics and dynamics are employed and manipulated. The critical and commercial impact can be partly calculated by referencing reviews and statistics of a games success.

As available production resources determine how all components of a game are considered and resolved, the initial presentation and discussion focuses on the resources used and development process undertaken by the creative teams of the selected games. This information is more available now than in the past as many of the indie developers report on their tools, process and progress in the form of blog posts, Facebook updates and twitter mentions. For this project, it was also helpful to contact independent game designers directly via email and various other online profiles.

The second discussion with the entire team occurred a week after the first presentation everyone time to play the selected games and undertake individual research that relates more closely to their various roles in the team. For example the programmer concentrated on identifying the tools and techniques used to develop each game and evaluate the influence this may have on the approach taken to develop Blind Faith.

A significant result of the case study process was that the team was well versed in the way that they articulated their game design intentions and were able to consult with the industry mentors effectively and with deliberate aims for advancing their project. The mentor sessions were scheduled at key milestones of production and were hosted at both the mentors studio or at our HUB Studio as demonstrated in Figs. 1 and 2. It was found during the feedback sessions with industry mentors, that the style and techniques used to create Blind Faith, were recognized and the mentors often referred to the games that were analysed by the team and other games that were similar in terms of aesthetics, mechanics, dynamics and scope. This indicated that the shared case study analysis had been effectively utilized by the team.



Fig. 1. The team met with industry mentor John Passfield, the Director of Right Pedal Studios

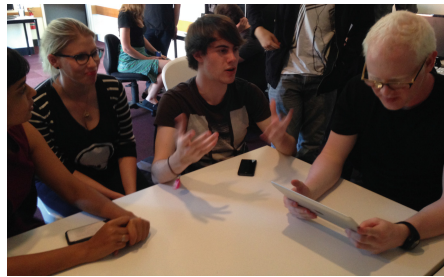


Fig. 2. Dan Vogt, the co-founder of Halfbrick Studios, speaking in detail to the team offering valued advice about the effectiveness of the game mechanics in a late prototype of Blind Faith.

4 Blind Faith. a Synthesis of Contextual Design

As illustrated in Figs. 3 and 4, The Silent Age was had the greatest influence on the aesthetic and mechanic qualities of our Blind Faith game. Both games are comparable examples of the quality of work that can be produced with a team of 6 people and minimal access to production resources. Since both games follows a linear narrative, the story and art production can be tweaked and scoped in unison without the complication of also considering the impact of every decision on the ultimate outcome of the game. The Silent Age uses a unique minimalistic art style in a 2D environment, having low production demands. To assist on controlling the scope of production, a number of familiar literary and cinematic tropes such as time travel mechanics, flashbacks and cliffhanger endings are adopted.

In the tradition of The Silent Age, Blind Faith is a 2D side scrolling, point and click adventure game where the player assumes the role of Nina Renner, a young systems analyst. The game is set in the year 2029, during an era in which the afterlife has undergone privatisation. At the game's introduction, Nina finds herself waking up in what appears to be her afterlife, and which is, unbeknownst to her, a simulated version of consciousness set up by The Company. Due to a glitch in the system, Nina has awoken into this consciousness before all of her memories had the chance to be uploaded. It is up to Nina (the player) to move backwards in time to restore the missing memories, unlocking the firewall of her mind.



Fig. 3. A screen grab of the Blind Faith game



Fig. 4. A screen grab of The Silent Age Game

In this world, The Company offers services where people can upload their memories before they die and create a consciousness in which they may continue to exist for eternity. The player protagonist Nina Renner is introduced as she wakes up at the scene of a major car crash, whereupon she finds she is suffering from memory loss. By inspecting the environment and collecting objects, Nina, and by proxy the player, begins to learn more about the desolate world in which the game is set.

At the end of this first chapter, the protagonist meets Henry, a scientist who used to work for The Company and is living his afterlife in this augmented reality. He acts as a friend, partner and guide through the game, where they develop a unique bond which

leads to his helping her to escape this world as the player progresses. Certain objects trigger flashbacks; these memories include areas accessible to Nina, which she may investigate in aid of reobtaining her memory. They hold clues about her life, provide an insight into her past, and also contain artifacts that may be required to move forward in the present timeline. The challenge for the player lies in aligning these clues in a way that unfolds the narrative and allows Nina to progress through the world towards the player objective. This objective is to unlock Nina's memories, escape the augmented world and unfold The Company's secrets before people affiliated with The Company become aware of her consciousness and kill her physical body in the "real" world in order to trap her inside their constructed afterlife.

The game interaction is limited to three actions: tap, tap and hold, and swipe. The player can move across the screen by tapping once for walking, or use multiple taps to run faster. An inventory (Nina's satchel) is provided in which re-useable objects and clues are held. The player can interact with multiple objects by dragging them on top of each other. Nina can move in and out of memories by clicking on certain objects that act as portals between the world. A minimal interaction pallet is provided for the players to allow them to have more time to immerse themselves in the narrative, allowing it to remain the focal point of the game. This interaction can be replicated on a computer, laptop, tablet and mobile device, making the game accessible on multiple platforms, however the game has been designed for optimum experience on a tablet.

References

1. Rockstar. <http://www.rockstargames.com/newswire/article/19471/grand-theft-auto-v-official-announcement.html>
2. Quantic Dream. <http://www.quanticroam.com/en/#!/en/category/heavy-rain>
3. Short, E.: Heavy Rain's Storytelling Gaps (2010). http://www.gamasutra.com/view/news/27972/Analysis_Heavy_Rains_Storytelling_Gaps.php. Accessed on 24 January 2014
4. Ruffino, P.: Narratives of independent production in video game culture. *J. Can. Game Stud. Assoc.* **7**(11), 106–121 (2012)
5. Sullentrop, C.: Putting the Guilt Back in Killing: Game Features Zombies With a Little Soul (2012). http://www.nytimes.com/2012/05/09/arts/video-games/walking-dead-game-departs-from-zombie-cliches.html?_r=0. Accessed on 24 January 2014
6. Wang, F., Hannafin, M.J.: Design-based research and technology-enhanced learning environments. *Educ. Technol. Res. Dev.* **53**(4), 5–23 (2005)
7. Barab, S., Squire, K.: Design-based research: putting a stake in the ground. *J. Learn. Sci.* **13**(1), 1–14 (2004)
8. HUB Studio. <https://www.facebook.com/hubgames>
9. Bates, B.: *Game Design*, 2nd edn, pp. 252–253. Premier Press, Boston (2004). Thompson Course Technology
10. Gril, J.: The State of Indie Gaming (2008). http://www.gamasutra.com/view/feature/3640/the_state_of_indie_gaming.php. Accessed on 20th June 2014
11. Metacritic: The Walking Dead Season 1 User Reviews. <http://www.metacritic.com/tv/the-walking-dead>. Accessed on 20th March 2014
12. Aarseth, E.: Playing research: methodological approaches to game analysis. In: *Proceedings of Melbourne DAC*. University of Bergen (2003)

13. Hunicke, R., LeBlanc, M., Zubek, R.: MDA: a formal approach to game design and game research. In: Proceedings of the AAAI Workshop on Challenges in Game AI, p. 04 (2004)
14. Pope, L.: Road to the IDF: Lucas Pope's Papers, Please (2014). http://www.gamasutra.com/view/news/209905/Road_to_the_IGF_Lucas_Popes_Papers_Please.php. Accessed on 1st March 2014
15. Sloan, R.J.S.: Videogames as remediated memories: commodified nostalgia and hyperreality in far cry 3: blood dragon and gone home. Games and Culture (2014)
16. Linssen, J.: A discussion of interactive storytelling techniques for use in a serious game. Technical report TR-CTIT-12-09, Centre for Telematics and Information Technology. University of Twente, Enschede (2012)
17. Mataes, M., Stern, A.: Façade: An experiment in building a fully-realized interactive drama. In Game Developers Conference – Game Design track, vol. 2 (2003)