Impact case study (REF3b)

Institution: **BRUNEL UNIVERSITY (H0113)**
Unit of Assessment: 36 – Communications, Cultural and Media Studies, Library and Information Management
Title of case study: New understandings of player agency used to improve digital games

1. Summary of the impact (indicative maximum 100 words)

Research on forms of agency in digital games has been directly applied to major game releases in Facebook and social-mobile development, demonstrating substantial and measurable commercial impact with global potential within a highly competitive industry. Specific research insights have affected key aspects of the design of individual games, resulting in higher than usual success rates for the titles involved. These insights have also improved the playing experiences of large numbers of players, as demonstrated by the level of take-up, creating a broader cultural impact. The impact is significant, in substantially improving the performance of games, and has extensive reach via the numbers of players who have benefited from an improved experience.

To date the research has had impact on more than one million players and helped to secure multiple contracts worth more than £2 million for the British game company Mediatonic. It has the potential (based on the user-bases of the companies involved) to reach more than 300 million users. Social-mobile games are at the forefront of the contemporary games industry. Mediatonic is a world leader in this form of gaming and this research has substantially influenced the company's design strategy.

2. Underpinning research (indicative maximum 500 words)

This research was carried out by Justin Parsler, a lecturer in games design at Brunel from 2008. The research, developed over several years in the published material detailed below, offers important insights into the nature of the balance between freedom of action and constraints in digital games. It draws on and informs the formal structures (rules) of such games, providing the first sustained taxonomy of the forms agency can take within digital games. It is a powerful tool for the design of game structures and has been successfully and repeatedly applied to major game releases as well as further works in progress.

Parsler has applied a theoretical approach to game design to better understand how the formal structures of a game create an experience that seems to the player to be 'free' but which – as in inherent in the medium – has significantly to be constrained. The work builds on previous research within game studies that has examined agency (if not always by name) as well as more traditional philosophical perspectives (notably, those related to questions of free will), combined with extensive experience of game design. This combination of insights has enabled the creation of game rules that allow for a particular impression of freedom – a major aspect of gaming pleasure – within a structured experience.

That games constrain players while providing them with space to act within defined parameters is not a new insight. But this is the first work to look closely at what exactly that means at the level of the manner in which formal game structures are created and to offer a sustained analysis of such structures. This approach has produced both a general framework for the understanding of game structures as a whole and, through more focussed application, specific insights into the most appropriate rules to use in certain circumstances.

Such application is wide ranging, but some specific examples include:

- How players perceive non-player characters (NPCs) within games to be individuals in their own right, even when they are functions of the code.

- An understanding of the way ownership of in-game labour, purchase with that labour and in-game consumption are equated with freedom within a digital game setting.

- How the act of creation, even when such creation may well be strongly constrained and not 'real' creation at all, can create a sense of authorship of their experience on the part of the player.

- How value is associated with the acquisition of virtual goods and/or progression within a

game, and how something that feels to the player to have been 'earned' in this manner has much greater value to them than would otherwise be the case.

This research addresses issues relating to the fundamental nature of game design and as such is detailed, nuanced and complex. Much of the research requires it to be applied before its utility becomes apparent. Such application is on-going and, while it has presently been applied mostly to 'freemium' model games, has much wider implication and utility within the gaming industry.

3. References to the research (indicative maximum of six references)

- Parsler, 'May your creations bring joy to those that need them: Crafting in *The Lord of the Rings Online*' in Krzywinska, MacCallum-Stewart and Parsler, eds, *Ringbearers: The Lord of the Rings Online,* Manchester: Manchester University Press, 2012

    http://www.manchesteruniversitypress.co.uk/cgi-bin/indexer?product=9780719082924

- Parlser, 'Illusory Agency in *Vampire: The Masquerade*', *Dichtung Digital*, 2008 (online journal with no issue numbers) (with Esther MacCallum-Stewart) http://www.dichtung-digital.org/2007/Stewart%26Parsler/maccallumstewart_parsler.htm

- Parsler, 'Frail Realities: Design process', Markus Montola & Jaakko Stenros , eds, *Playground Worlds*: *Creating and evaluating experiences of role-playing game*, Finland: Ropecon ry, 2008.

- Parsler, 'The Non-Player Agent in Computer Role Playing Games', *Journal of Games and Virtual Worlds*, vol. 2, no. 2, 2010.

4. Details of the impact (indicative maximum 750 words)

Parsler has applied this research by acting as a senior consulting designer for Mediatonic, a leading player in the field (listed as one of *The Sunday Times* 'top ten tech companies to watch'). The company works with major companies such as Disney, Adultswim, Microsoft, Electronic Arts, CapCom and many more, its games having been played across many platforms by some 60 million people to date.

Parsler's research has directly shaped the design strategy of all of Mediatonic's social or mobile game releases, having been applied to several design briefs, some of which are detailed below. The research was applied directly by Parsler (in authoring game mechanics) and indirectly (in advising others) to eight separate projects, each a significant, well financed endeavour. A full list of the impact achieved by this research would be impossible within the available space. Two notable examples are as follows:

Superbia (Disney, 2012): This game is aimed at early and pre-teens and allows players to personalise their own space while progressing through a series of pre-defined challenges. The whole of the core structure of the game was devised with reference to the research insights detailed above. Specifically, what were deployed in the game were insights into the manner in which a sense of ownership of labour and consumption within game activities can be experienced as amounting to an impression of freedom on the part of the player. This allowed the design to both grant the player the *expected* freedoms (they make ice-cream, get paid, and buy clothes and furniture) but also to grant them some real, deeper, freedoms (as to exactly how they choose to navigate the game and present themselves to others), which ultimately led to a higher level of overall satisfaction and led to the game offering less shallowly 'consumerist' a playing experience than would otherwise have been the case. The game is free to play, has achieved a player base of more than one million in the UK and is being launched across Europe. Games of this kind frequently fail to understand that mere consumption *alone* is not enough to create a meaningful experience (which is vital if players are to engage with it every day for months or years) and fail to achieve any market penetration. Even with the backing of a major corporation, there are hundreds of examples of games of this kind that have failed both commercially and artistically. The success of this example can be attributed specifically to the implementation of the research insights detailed

above.

Amateur Surgeon: Bleed Everywhere (2012): This game is part of Mediatonic's hugely successful Amateur Surgeon franchise (with 65 million + downloads). Following a 'freemium' model, in which players can play the game for free but pay for extra services, the percentage of players that monetise (choose to pay) is one of the most significant industry metrics.

[redacted text]

The game received a 2013 BAFTA nomination for best online browser game and established Mediatonic as a world leader in freemium social gaming.

[redacted text]

The logic of the research in both cases suggested that more value would be associated with rewards for which players were made to work harder than is common practice in such games; and thus that when players were allowed to pay to gain those rewards more quickly, they would pay more money more frequently. The research, which focuses on the formal structures available to implement such a system, informed the specific manner in which the design team created a particular balance in the effort/reward loop.

[redacted text]

The beneficiaries of this research are Mediatonic and the companies for which it has produced these and other successful games, each of which has benefitted commercially; also the wider constituencies of players who have enjoyed an enhanced playing experience as a result of the improvement of game design resulting from the application of the research insights.

5. Sources to corroborate the impact (indicative maximum of 10 references)

1. Director, Mediatonic (http://mediatonicgames.com/) can be contacted regarding the research impact on the design strategies of digital games by Mediatonic.

2. Disney Superbia :

- http://www.disney.co.uk/superbia/about/
- http://www.mysparkleworld.com/book_reviews/35
- http://www.youtube.com/watch?v=YKLZMcZgmBo

3. Amateur Surgeon: apps.facebook.com/amateursurgeon (or search on amateur surgeon from within Facebook, it cannot be accessed from outside Facebook)

http://games.adultswim.com/amateur-surgeon-2-twitchy-online-game.html