GAM6001-18 Major Project

Core Mechanics and their effect on Development

Assessment Criteria

McDonald, Bradley

1608793

Contents

[Abstract (Do Last) 3](#_Toc4965592)

[1.Background 3](#_Toc4965593)

[1.1 What was your team aiming to do? 3](#_Toc4965594)

[1.2 What was the composition (in skill terms) of the team? 3](#_Toc4965595)

[1.3 What role did you play in the team? 3](#_Toc4965596)

[1.4 What state was your prototype in at the point when this module started? 3](#_Toc4965597)

[2.Introduction 4](#_Toc4965598)

[3.Technical Art 4](#_Toc4965599)

[3.1 A Designer Creating Technical Art 4](#_Toc4965600)

[3.1.1 Brief discussion of relevant literature 4](#_Toc4965601)

[3.1.2 Planning the Tool Creation 4](#_Toc4965602)

[3.1.3 Problems, solutions and evaluation of this work in comparison to research undertaken 4](#_Toc4965603)

[3.2 The second task undertaken(change) 5](#_Toc4965604)

[3.2.1 Brief discussion of relevant literature 5](#_Toc4965605)

[3.2.2 How this work was approached (design etc) 5](#_Toc4965606)

[3.2.3 Problems, solutions and evaluation of this work in comparison to research undertaken 5](#_Toc4965607)

[4. Reflection 5](#_Toc4965608)

[5. Conclusion 5](#_Toc4965609)

[6. Bibliography 6](#_Toc4965610)

# Abstract (Do Last)

This report is to…

# 1.Background

## 1.1 What was your team aiming to do?

The team wanted to create an aspiring 3D platformer with added unique gameplay mechanics whilst also including generic 3D platformer mechanics (such as Walking, Running, Jumping and double Jumping) as to still seem familiar to people who have played 3D platformers before. We decided to add the unique elements as to set it aside from other previously released games in the same genre.

## 1.2 What was the composition of the team?

The team was made up of five people, an artist, a programmer and three designers. Each person would apply skills that would adhere to their role. Whilst branching into artist or programmer depending on workload. The artist would create 3D models, unwrap, texture and import into engine for the designers to place within the game. The Programmer would focus primarily on Enemy AI and fixes bugs when attempting to build the game. The Designers would create tools and polish to the game in the form of particle effects or sound whilst creating and designing multiple levels for the player to navigate in the Unreal Engine (Epic Games,1998).

## 1.3 What role did you play in the team?

The role in the team of which the writer carried out was that of a designer in a small indie team. Which implies to use and learn a range of skills within the project. Rather than being a designer on a large AAA team, where the role would have been more specific. The role of being a generic designer meant going into different aspects of game development, such as; Gameplay Programming, Animating, UI Design, Technical Art and VFX. Constantly learning and using new skills as the development of the product progressed.

## 1.4 What state was your prototype in at the point when this module started?

The prototype was at as stage where the core mechanics were working, there were a small number of visual glitches to do with animations, of which needed polishing. The game itself was playable with one main level. However, with the overall design of the level done and with the better tools developed for level design, it became easier and more apparent to make more levels. Of which the team reorganised with the intent to create more playable areas. This was doing by using HacknPlan to organise individual jobs to the respected individuals responsible to that aspect of development.

## 2.Introduction

As a one of the Designers of the team, many roles had to be undertaken to provide a quality product. The document will go into detail of these roles, what they were, how they were done and what effect these implementations had on development. These effects can range from implementing feedback from testing results, to setbacks in development which led to rework of the original design.

These redesigns relate back to the author’s individual research within the literature review. Specifically, how implementation of new mechanics can change development of the project. This was done several times since the presentation of our prototype. Of which will be discussed in later segments of this document.

# 3.Technical Art

The job of a technical artist is to utilise both art and programming to create a multitude of tools so that Designers can speedily design, create and test level layouts and adjust them easily based on feedback. Be that feedback internal or external.

## 3.1 A Designer Creating Technical Art

## 3.1.1 Brief discussion of relevant literature

## 3.1.2 Planning the Tool Creation

## 3.1.3 Problems, solutions and evaluation of this work in comparison to research undertaken

## 3.2 The second task undertaken(change)

## 3.2.1 Brief discussion of relevant literature

## 3.2.2 How this work was approached (design etc)

## 3.2.3 Problems, solutions and evaluation of this work in comparison to research undertaken

## Reflection

## Conclusion

# Bibliography

Rocksteady Studios (2015). Batman: Arkham Knight [Video Game], London, England: Warner Bros. Interactive Entertainment.

EPIC GAMES. (1998) *Unreal Engine.* [Software] Unreal Engine 4.20.3 Cary, NC: EPIC GAMES.

<http://www.lostgarden.com/search?q=game+mechanics>

Rouse, R. (2005). Game Design: Theory and Practice. 2nd ed. [ebook] Plano: Wordware Publishing, Inc, p.310. Available at: https://gamifique.files.wordpress.com/2011/11/5-game-design-theory-and-practice.pdf [Accessed 20 Nov. 2018].

https://www.gamesradar.com/uk/

<https://www.gamesradar.com/uk/a-lot-of-kratos-journey-is-mirroring-my-own-watch-our-interview-with-god-of-wars-cory-barlog/> – God of war interview 3:45 – 4:25

<https://www.youtube.com/watch?v=cWUiknGt_PA&index=42&list=PLC4v6lyVR1vXWQ8tH6gs-_b1VcAZiyeQK> – Amazing games almost destroyed by terrible mechanics.

http://whatculture.com/gaming/6-amazing-video-games-almost-destroyed-by-terrible-mechanics

<https://www.youtube.com/watch?v=GXdfU2DoF8o&index=41&t=5s&list=PLC4v6lyVR1vXWQ8tH6gs-_b1VcAZiyeQK> – PAX 2011

<https://www.youtube.com/watch?v=JgG--74XExY> – Sonic Adventure 2 - ProJared

<https://www.youtube.com/watch?v=lQRr3pXxsGo&index=42&t=0s&list=PLC4v6lyVR1vXWQ8tH6gs-_b1VcAZiyeQK> – Mechanics of movement

Nintendo Entertainment Planning & Development (2017). Super Mario Odyssey [Video Game], Kyoto, Japan: Nintendo.

Mixamo.com. (2018). Mixamo. [online] Available at: https://www.mixamo.com/ [Accessed 18 Sept. 2018].

Sonic Team (2001). Sonic Adventure 2 [Video Game], Tokyo, Japan: Sega.

Insomniac Games (1999). Spyro 2: Ripto’s Rage [Video Game], Burbank, CA: Sony Interactive Entertainment.

Playtonic Games (2017). Yooka-Laylee [Video Game], Staffordshire, England: Team17 Digital Limited.

<https://www.gdcvault.com/play/1024405/Low-Poly-Modeling-Style-Through?fbclid=IwAR3qbTeOgNm1D0kyHe1g2UMo3zuFIgINisLWS5qxe3T8C-Y8WQIzlxFTmQU> – Polygonal bread crumbing (Ethan, Redd) 2017- 18 min mark

SIE Santa Monica Studio (2018). God of War [Video Game],Santa Monica, CA: Sony Interactive Entertainment.

Nintendo (2007) The Legend of Zelda: Phantom Hourglass [Video Game], Kyoto, Japan: Nintendo.