Big Huggin' Affection Gaming for Alternative Play

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ABSTRACT

Big Huggin' is an alternative interface game designed to critique the way we play. It is offered as part of the ongoing Critical Gameplay project. Instead of firing toy guns or gesturing abstractly, players must hug a large stuffed animal to win the game. The game has been played by more than 2000 people at 8 venues in North America, South America and Europe.

Author Keywords

Affection Games, Critical Design, Critical Gameplay, Hugging Games, Device Affection

ACM Classification Keywords

K.8.0. Personal Computing Games

INTRODUCTION

Big Huggin' is a unique gameplay experienced designed by applying Critical Design methodologies to the implementation of a video game. Critical Design is an exercise in critique through which social-cultural values are exposed[1]. The process involves examining socio-cultural trends and producing artifacts that heighten awareness to their attributes. The ongoing application of Critical Design practiced in the Critical Gameplay project seeks not only to offer alternative play, but to highlight assumptions players have about what types of games are interesting, engaging and even worth creating[2]. In this way, Critical Gameplay combines the goals of Critical Design with the Captology. Catpology is the study of computers as persuasive technology [3]. Critical Gameplay aims to change the way people play by offering alternative ways to play.

Games in which players are awarded for offering affection are available, although they are largely provided as online play and commonly of a sexual nature[4]. There are also interfaces which have experimented with kissing [5], although such interfaces and their result are intimate or sexual.

The Critical Gameplay project games have the potential to provide solutions to a myriad of training and psychological challenges. While these potentials are acknowledged, it is not the primary goal of such work. Instead, the goal is to provide researchers, practitioners and consumers demonstrative work for intellectual consumption. As stated in early Critical Gameplay work, the goal is not financial profit, but intellectual profit.

GAME SYSTEM

Big Huggin' is comprised of two basic parts, hardware and software. The software is a Windows based solution which has all the basic elements of a traditional platform game. Players manipulate an onscreen player character which moves at a constant rate across a scrolling screen. Players control the player character by hugging a stuffed animal. The stuffed animal is a 30" teddy bear which has been fitted with 12 analog buttons in the bear's chest. The bear controller connects to any standard Microsoft Windows computer through USB. The game system is depicted in figure 1.



Figure 1. Big Huggin' System on display in Paris, France

When a player hugs the bear the buttons are pressed. The game software registers the number of buttons pushed simultaneously and the milliseconds for which they have been pressed. This allows for reasonable accuracy in discerning an embrace which is hard and fast from one that is light and slow and the degrees between. The controller works as a durable sensor for detecting contact. In its simplest, the more complete the hug, the more buttons are pressed over a sustained amount of time. Well timed hugs lift the player character off the ground adding points to the game score. When the player lets go, the bear falls gently forward.

The game has 6 levels each with increasing difficulty. The first

two levels depict a verdant world, the second 2 offer a cold, snowy world, the last 2 are dark, basements. Each level requires increasingly nuanced hugs that require better timing and are less forgiving to poor timing. Play is light-hearted and progressively challenging.

In concept, every time the player hugs the teddy bear, the player character surmounts an obstacle. If there is a hole or boulder in the player character's way, the player can help them rise above it.

The game has been played by a conservatively estimated 2000+people at 8 venues in the United States, Europe, and Brazil. The game has been show at events with as many as 350,000 attendees to as few as 250. Venues include large scale free art festivals[6], academic art galleries [7], human computer interaction showcases [8], and independent game arcades [9]. Player age ranged from 2 years to 65+. The game has also visited a children's hospital and pediatric practice for testing with sick children. The game has also received funding from a Kickstarter.com project to place it in hospitals.

CRITICAL DESIGN ELEMENTS

Big Huggin' is designed to critique the conventions of computer mediated game interactions. The three key points of critique are scenario, game verb and texture. The game is designed to offer an alternative, pro-social scenario set towards an adversarial environment instead of an adversarial non-player character. In terms of game verb, players are required to hug to make their player character surmount obstacles. Lastly, the game is physically textured with tactile furriness in direct contrast to the plastic and metal interfaces which abound in computer games. The following sections outline the specifics of these critical design elements and theory behind them.

Big Huggin' seeks to critique the assumption that there is need for an adversary or force of adversarial conflict. The player has full control of the player character and the only conflict comes from inanimate objects which are in the player's way. In short, if the player fails, they have only themselves to blame. The assumption is that a player can not lay blame on a rock or hole that has always been there. The ideal for this player-centered conflict and management design is twofold. First it is designed to make the player own their own mistakes. There is no blaming the rock or hole for being in the wrong place at the wrong time. Secondly, players need only focus on their own very simple goal – getting to the other side of the level. This simplicity of design facilitates easy understanding of acceptance of the rule set.

Game verbs are the conceptual units through which players address their conflicts in games. Games abound with elimination as conflict resolution, commonly dispensed through the game verb shoot. Other common verbs include jumping, moving, taking, and leaving. The primary game verb in the Big Huggin' game is hug. The player hugs the controller to lift the player character on screen. This is intended as promotion of a pro-social interaction. Instead of eliminating obstacles through some type of shooting, players are practicing passing obstacles with the one thing their player character can do well – get past an obstacle by rising above it.

From an informal survey of alternative interfaces it is clear that many computer mediated interactions have a few common tactile characteristics. Most hardware is encased in plastic and metal, with some prototypes and early designs using treated wood. One point of critique is the rarity of fabric textures (save for wearable computing). Furry, soft, warm, or squishy are adjectives rarely applied to the objects mediating people's interaction with computers. By wrapping a controller in a large stuffed animal, Big Huggin' aims to provide counterpoint for intellectual reflection and social critique.

CONCLUSION

This project combines the history of arcade game interaction with the social critique of Critical Gameplay. It describes an implemented game in which players hug a large teddy bear to aid a virtual avatar through obstacles. This project endeavors to demonstrate the opportunities in alternative play provided through a revision in the way games are played. It combines the history of arcade games with experimentation in creating emotion in games. It attempts to bridge the gap between affectionate play and computer entertainment. It does so by combining the iconic giant teddy bear given as a prize on the midway, with the gesture of hugging to accomplish tasks. The research seeks to critique play conventions by demonstrating alternative ways to play.

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