Magnet: exposing abusive relationships with interactive narrative

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Abstract. This article is part of a non-finished project whose aim is to highlight the importance and the impact of using interactive narratives to expose and provoke reflection on social issues, and, conjointly, to present the concept of Magnet, an interactive game in development that features a female main character who is trapped in an abusive relationship, approaching the circumstances surrounding this matter

1. Introduction

Every day, several girls and women are subjected to some form of violence in Brazil. According to the Inter-American Commission on Human Rights (IACHR), four women have been killed every day in Brazil in 2019. As reported by the World Health Organization, this violence can happen as harassment, sexual exploitation, rape, assaults, psychological violence, femicide, among others. Besides that, the violence against women can happen at different levels of intensity and often happens by family members or loving partners, who, in theory, should be the ones who offer them love and security. Because of this, many people have difficulty realizing that their relationship is toxic, often when they realize either it is too late or they are so hurt that they do not have the strength to get out of the situation on their own [Bencroft, 2002].

To change this context it is necessary, besides helping the victims to recover from their traumas, to make people aware so that they can be attentive to any sign of violence and prevent it from reaching extreme situations. One of the ways to provoke awareness is through storytelling and narratives. Social science and cognitive research show that stories are more effective than facts, explanations, or arguments when it comes to influencing thinking and behavior because they appeal on a core emotional level and lodge deeply in people's minds [Taylor, 2017].

As maintained by Beede *et al.* (2011), women are vastly underrepresented in STEM jobs and courses. According to Castellini and Amaral (2017), there are several pieces of evidence that prove that women are excluded and their contributions are made invisible, mainly in the areas of science and technology. Due to the lack of representativeness in the context of technology and science, women's issues often are either not addressed or addressed by men. The necessity to approach female, feminist matters is what motivated the present article. This study aims to model abusive relationships through a game called *Magnet*.

Magnet is an interactive narrative system that aims to make people aware of abusive relationships, showing in its narrative that anyone can be toxic, and no matter what the

victim does, the aggressor will not change his behavior. Thus, people, victims of violence or not, can be alert to signs of abusive relationships and seek help.

2. Interactive Narratives

A narrative is a logic chain of events [Silva and Silva, 2020], an exhibition of an occurrence or a set of occurrences somehow linked, fictitious or not, presented in an oral, written, or a visual way. The narrative can be present in all forms of human creativity, art, and entertainment, such as in music, films, television, literature, video-games, theatre, among others.

For a long time, stories have been used as structures to give order and meaning to the world [Neitzel, 2005]. When it comes to digital games, the narrative is fundamental to the process of creating context to the players, motivating them to perform actions, and creating transitions between activities [Silva and Silva, 2020]. Game stories have their own unique characteristics that differentiate them from traditional stories, interactivity being the main one; the ability the players have to interact with the stories [Qin, Rau and Salvendy, 2009]. Usually, the narrative is a linear construction, where the player is a mere spectator of the story, simply following the design. In the modality of digital entertainment called *interactive narrative* — or interactive storytelling —, this passivity is broken and the user gets to decide how the story will develop.

An interactive narrative is a form of digital interactive experience in which users create or influence a dramatic storyline through actions, either by assuming the role of characters in a fictional virtual world, issuing commands to a non-player character or by directly manipulating elements of the fictional world [Rield and Bulitko, 2012].

As stated by Qin, Rau, and Salvendy (2009), involvement in video games has been described as an experience of feeling deeply engaged with it. In the research of those fields, many terms have been developed to try to account for these experiences, such as flow, cognitive absorption, presence, and immersion. These authors sustain that, in the digital game world, players can usually see, hear, and manipulate the environment, just like they do in the real world. This provides the player with a strong visceral and cognitive belief in what is experienced in the virtual context as physical reality.

According to Green (2006, p. S163), "throughout human history, narratives have been used to share information, change beliefs, and inspire action". When it comes to interactive narratives, where the player can clearly and directly guide the course of the story, the feeling of immersion is expressive, given that the purpose of these narratives is to shape the story according to the player's decisions and preferences. Thus the player can feel like they are part of the story. By bringing social issues into interactive narratives, the players can empathize, take the role of someone else and thus be able to perceive some problems that often go unnoticed, or that have been normalized by society.

2.1. Interactive Narratives and Social Issues

Narratives have always had a huge impact on human life. Even before the invention of writing or the rock paints, human ancestors already sat around the bonfires for long and creative narrative sessions [MTC, 2014]. This impact is not only into entertainment but also to drive social change, since stories have the power to shape the way people think and feel about their worlds and how they act into them [Taylor, 2017].

In the narrative environment, the ability to change beliefs and attitudes is called perspective-taking [Cohen, 2001; Todd *et al.*, 2011; Yee and Bailenson, 2006]. Perspective-taking can be defined as the ability one have to look beyond their point-of-view so that they can considerer how may someone think or feel about something. It is argued that beyond inducing more empathic responses, perspective-taking helps viewers recognize the humanizing complexity of others [Cialdini *et al.*, 2013 *apud* Chung and Slater, 2013].

According to Parrot, Capetier, and Northup (2017), getting involved with an interactive narrative may influence subsequent attitudes and emotions concerning to real-world people and issues. This may happen for two reasons: because games are a playful and fun activity that stimulates people's physical, cognitive, intellectual and emotional development in a pleasant and attractive way [Franco *et al.*, 2019], and because games are a human activity that allows people to assimilate and recreate socio-cultural experiences and values embodied in them, thus providing cultural reproduction [Amstel, 2019].

Given the importance and the power that narratives and, therefore, interactive narratives games have in social issues, several works have been done in the field. Parrot, Capetier, and Northup (2017) propose a test of interactive narrative against prejudice; Harrell *et al.* (2018) propose Chimeria, an interactive narrative for provoking critical reflection on gender discrimination; Viganó (2019) proposes a digital interactive narrative in suicide prevention; among others.

3. Abusive Relationships

Abusive relationships can be defined as relationships that have close ties between the victim and the aggressor permeated by acts of psychological, physical, and sexual violence. There is a desire of taking control over the partner. According to Barretto (2015), these relationships are characterized as those that feature an excess of power and control, culminating in the feeling of possession, in the objectification of the other. In the author's perspective, such relationships start in a subtle way and can go beyond the limits of what constitutes healthy.

Some studies indicate that cases of abusive relationships are more frequent among young people. According to the study *Visível e Invisível 2019*, from the Brazilian Public Security Forum, 42% of women between 16 and 24 years of age suffered violence in 2018 in Brazil. Therefore, they have been shown to be potential victims of these types of relationships. In 21st century society, love relationships have been starting earlier, and those are influenced by several factors, such as male chauvinism and jealousy, then adolescents end up reproducing abusive and violent behaviors. According to Zappe and Ramos (2010), young people can be both victims and authors of the most diverse types of violence.

It is important to note that, in most cases, violence in this type of relationship is not physical, especially at the beginning. Arendt (1985) says that an outbreak of violence is the last possible alternative to maintain power over another. Therefore, it usually manifests itself in other ways:

- Moral violence: any conduct that constitutes slander, defamation, injury, and other lies that aim to harm the reputation of another.
- O Psychological violence: any behavior that causes emotional or psychological damage to another person, seeking to degrade them or control their attitudes, beliefs, and decisions. It is done through threats, humiliation, embarrassment,

- insults, blackmail, or any other suspicious deed that causes jealousy or insecurity in the victim.
- O Property violence: the control of income, destruction of personal objects and documents, and property retention. In addition, when a prohibition is created to keep the other person from working, thus making them unable to maintain themself in order to make him depend financially on the partner.
- Sexual violence: when a sexual relationship is carried out through physical force, blackmail, intimidation, bribery, and threats; or requiring the use of other sexual practices that are not pleasing; or denying to use a condom or any other contraceptive method.

Thus, it is evident that violence is not just physical, and that these other ways can be just as harmful. Generally, after suffering any of these types of crime, victims may experience reactions such as general disorientation, panic, the feeling of loneliness, fear of dying. Some battered women state that psychological degradation, fear, and humiliation were the most painful abuse they experienced (Walker, 1984 apud Follingstad et al., 1990).

This way, mechanisms must be created to alert people that they may be victims of this type of abuse, in order to encourage them to seek help as soon as possible and get out of it. Therefore, knowing the types of violence and how they appear can be one of the main tools to fight it.

4. Magnet

Magnet is a game in construction for the purpose of describing an abusive relationship from the very beginning, with the objective to show the players that anyone can be abusive, and how difficult it is for a person to realize that their loved one is toxic and to abandon this relationship. Besides that, Magnet aims to show that violence can manifest in various ways beyond physical violence.

Magnet is being developed according to feminist principles to seek understanding, value, and better represent women since the sciences, art, philosophy and even language itself have silenced women in various ways during human history [Brandão, 2019].

The game features two main characters, a woman and a man who star in an abusive relationship. The woman's name is an input provided by the player, which supports the interactivity feature, while the man's name is randomly chosen from an internal database, which is populated with a large variety of male names from different ethnicities, to reinforce that there is no archetype, anyone can turn out to be a toxic partner.

Studies have shown that the color of the avatars takes a very important role when it comes to the player's identification with the characters [Kao and Harrell, 2016]. Aiming to avoid reinforcing stereotypes and, mainly, to make it easier for the player to identify with the story and the characters displayed, all of them were drawn in a shade of blue, as shown in Figure 1.



Figure 1. A scene extracted from the game

The narrative starts with the two main characters getting to know each other. They quickly start dating and their relationship is purposefully described as a fairytale romance. The story is told from the woman's point of view so that the player can see things through her perspective. At first, the man is romantic and caring, but he slowly becomes abusive. His transformation is very subtle, the female character longs to realize she is trapped in a toxic relationship. In the beginning, the abuses are psychological. The male character tries to control his partner's clothes, companionship, outings. A situation is illustrated in Figure 2. Following, he begins to act extremely jealous, to invade her privacy, to humiliate her, among others toxic behaviors. And, finally, the abuses get physical. When she finally sees that the situation is unhealthy, the damage is gigantic. She has lost her friends and her family support. She became so dependent on her partner that, without him, she does not have resources. She is all by herself. The game is called *Magnet* because abusive relationships, just like magnets, carry a force that attracts the victim, making it hard for them to get away, and that repels others, such as friends and relatives.

The game interface has been designed to look friendly, with the use of pastel shades. Some of the game screens contain drawings while others are purely textual. The visual screens illustrate important scenes from the story, such as the moment when the two main characters meet (Figure 1), or when they go out for the first time. However, when the female character starts to notice that she is being abused, the colors begin to fade, the illustration slowly gets darker. And by the end, there will be no colors whatsoever. This subtle feature can be observed in Figure 2, in comparison to Figure 1.

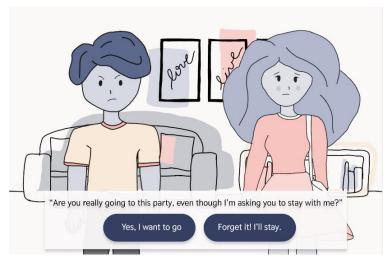


Figure 2. A scene extracted from the game

While some choices will be meant to guide the story immediately, some others collect the player preferences, e.g. if they like parties or not. The data stored will be used in the future when the male character starts to command the woman to stop doing the things she likes. Thus assuming the player inputs that the female character does not like going to parties, and likes to go to the gym instead, the male character forbidding her to go to the gym will feel more personal than if he did this with parties. This feature aims to make the player really empathize with the female character.

One of the main characteristics of this game is interactivity. The fact that the player can choose how they want the female character to act; what she is going to say and what she is going to do. This way, her responses and reactions to the male character's actions are up to the player, and then the narrative will develop accordingly. As seen in Figure 2, at some points, she will be able to choose to contradict her partner or to do his will. Whatever she chooses, the male character will not become decent. This is part of an effort to corroborate that it does not matter what the victim does, her abusive partner will be abusive, for the reason of it is not her fault. Her actions are not to blame, he is the only culprit.

When the player reaches one of the game's endings, the screen will go black and some statistical data on femicide will be displayed, to show that even though the story is fictional, it addresses the reality of many women. However, these statical data will be presented visually, so that most people can understand it, i.e., instead of using data with percentages, the information will be exhibited with graphs and natural language in order to allow less educated people to better visualize and understand the information.

5. Final Considerations and Expected Results

This paper presented the concept of Magnet, an interactive narrative game system that aims to aware people of abusive relationships. The game is being implemented by women only, once it is about a feminist matter, in order to guarantee that the standpoint of women is respected.

Once the game is fully implemented, several user tests will be carried out in order to verify whether the goals were achieved and what reflections the game provoked in the players. Magnet is expected to provoke awareness on the subject of abusive relationships,

making explicit the different ways in which abuses can manifest, how it can, and usually does, take on gigantic proportions and end up in tragedy. Given that one of the main reasons why it is difficult to abandon toxic relationships is that the victim often does not know that they are being abused, making women aware of this issue is a way of attacking the problem.

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