# The Magic Game Circle as a model and tool

#### **Abstract**

Who are most efficient and effective learners you can think off? Children are, they need to learn a lot to be able to live independently and cope with daily life, and they learn mainly by play. In play exploration, trial and error in a safe environment is vital to educate knowledge, skills and behavior. Games are often being dismissed as "It's only a game!" and not taken seriously as a strong pervasive tool to engage people and achieve more than "just" for fun only. To know, learn, investigate and prove how games can be properly used as an educational tool or for behavior change we need to investigate the context of a game thoroughly by using the Magic Game Circle as a model. Estimated 3 billion hours are spent playing weekly worldwide. Gaming is a fast growing industry, evolving from the entertainment industry there now is a serious growth of applied gaming companies and research and education on gaming is growing fast. Nowadays games are recognized en presented in museums and regarded as cultural heritage, but still no solid conclusion is made on this promising concept of play.

# Defining a game

When creating applied games, or using games as a medium to achieve something in real life, we have to distinct the borders of the game and real life while trying to control or overlap these. These borders might appear vague, dynamic, translucent and semi permeable but these still can be defined and discussed if we would be able to use a working model or framework to get a grip on a topic that has been discussed for decades. Many attempts have been done to grasp the concept 'play/game' and these are still being discussed in a variety of disciplines, which displays many misunderstandings today. Below some attempts to define games to illustrate the importance or need for a new model;

"Definition of playing a game = the voluntary effort to overcome unnecessary obstacles" [Philosopher Bernard Suits: Grasshopper; games, life and utopia 1978]

"Summing up the formal characteristics of play we might call it a free activity standing quite consciously outside 'ordinary' life as being 'not serious', but at the same time absorbing the player intensely and utterly". [Johan Huizinga: Homo Ludens 1938]

"A game is as an activity that is voluntary and enjoyable, separate from the real world, uncertain, unproductive in that the activity does not produce any goods of external value, and governed by rules" [R. Caillois: Man, Play and Games 1961]

"There is no fixed set of features that define a game. As a game is a form of play, with emphasis on rules. Games are human constructs or artifacts" [Ludwig Wittgenstein: Philosophical investigations 1968]

"A game is a system in which players engage in an artificial challenge, defined by rules, that result in a quantifiable outcome" [Katie Salen + Eric Zimmerman: Rules of play 2004]

Thornton and Cleveland (1990) noted that the essential aspect of a game is interactivity. Felix and Johnston (1993) suggested that the structural components of a game, including dynamic visuals, interaction, rules, and a goal, are the essential features. Gredler (1996) stated that the essential elements are a complex task, the learner's role, multiple paths to the goal, and learner control. Malone (1981) argued that there are four characteristics of games that make them engaging educational tools: challenge, fantasy, complexity, and control. Thomas and Macredie (1994) claimed that the core characteristic of games is that actions have no realworld consequences. Baranauskas, Neto, and Borges (1999) stated that the essence of gaming is challenge and risk. Crookall, Oxford, and Saunders (1987) cited game features such as rules, strategy, goals, competition/cooperation, and chance.

The variety of perspectives and interpretations are wide. The need for a common language or understanding is needed. What appears to be so obvious -since every single person knows about play, has played and has seen games being played- has yet proven to be complex, multi-interpretable and quit interdisciplinary. People can have extended conversations while talking parallel about play, toys, playful experiences and gaming without realizing the differences in interpretations. People appear to have a very different meaning on the topic since everyone has individual experiences in very disparate contexts.

"To grasp the meaning and potential of gaming is an important goal for a variety of disciplines, each of which use different theoretical backgrounds and methodologies. This diversity of approaches results in a many-sided image of gaming and it makes building bridges between particular perspectives both necessary and difficult." [Jan Klabbers: The Magic Circle: Principles of Gaming & Simulation 2000]

This attempt to propose a new model is not to define an absolute or narrow definition for a game, but to look at the context of playful experiences, including the individuality of a player in his real life context. Games tend to be an interweaving of elements that are related strongly; take one out of its game context and the game might be destroyed instantly. Learning from games and play in its widest

and rich occurring contexts will create opportunities for proper research and stretch the use of each game element one by one, or in (new) combinations. When games are acknowledged and properly designed in their context we might be able to enlarge the trust in gaming as a medium to educate or change behavior. A more holistic view or perspective is needed. Johan Huizinga firstly mentioned the term 'the magic circle' as "a state in which the player is bound by a make-believe barrier created by the game".

From there many people referred, interpreted and argued the magic circle; "The magic circle of a game is the space within which a game takes place. Within the magic circle, the game's rules create a special set of meanings for the players of a game" [Katie Salen + Eric Zimmerman: Rules of play 2004]

Jan Klabbers created an ontological framework based on the Magic Circle and spoke: "...for the idea of the micro cycle I use Huizinga's concept of the Magic Circle, because when you enter a game you enter a magic circle, you might say a social organisation on a temporary basis, you assume your roles and then you play the game of that social system which becomes your playground. Then you see social systems and games are very intertwined" [Jan Klabbers: The Magic Circle: Principles of Gaming & Simulation 2009]. From this original concept and the interpretations of the Magic Circle a new model (the Magic Game Circle) is proposed which might be able to build an interdisciplinary bridge to facilitate future gamedesign and research and might help implementing play as a medium for many more purposes then only entertainment.

## The Magic Circle

First a variety of playful moments to visualize the aspects concerning game and play in context are chosen to illustrate a state of play;

# 1- Player meets game/game meets player

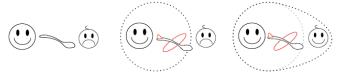
When space, timing, motivation, trust and context are proper a player might engage to a game, to commit to the rules, when action takes place, when the game 'returns' feedback/interacts with the player a play-state is recognized, a magic circle appeared.



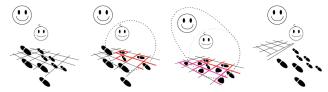
#### 2 - A mother is

**trying to feed her baby** while it refuses to eat. The mother creates a virtual world of a crashing airplane, the baby's mouth is the only emergency landing area, and oh-o the plane (in reality a spoon with food) must land soon! The surrealistic situation is created with the purpose for the child to be distracted form her discom-

fort and to enjoy the feeding ritual instead, the baby laughs and smiles, mother enjoys the smile and a solid game circle is detected (theoretically) when this child does not cooperate, it chose not to get into the magic circle.



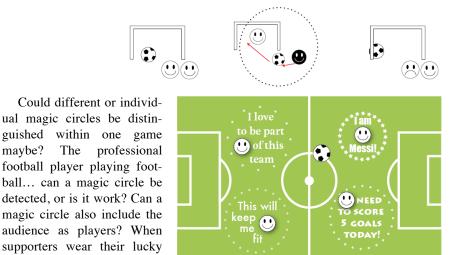
**3 - A child walking on the pavement alongside the mother** is playfully deciding not to step or touch the border between the stones.... this child created a magic circle around him for that moment, challenging his moves. He created a goal and rules the moment he gave meaning to his interaction with the pavement and its features. When his mother got curious about his moves, she chose to get into the magic circle with him, by joining the challenge. When the pavement ends, or they got distracted by something, the magic circle disappears.



**4 - In a theatre play** all actors commit to rules, roles and context which are abstracted from real life. (the audience might be defined as a game element, or as a player. They do not commit to these same rules as the players do, but do 'play' a role in this magic circle).



**5 – Playing football** excited and anxiously trying to compete and win from the other team. Borders, goal, interactions even timing are all defined by the rules of play. These rules do not exist in real life. We tend to see football only as a sport not as a game. While it is actually quit a serious game; when playing football a player learns; skills, behavior of the ball, gravity, consequences of strength of movements or maneuvers, strategy, social interaction, deal with setbacks and success, learn to recognize the different individual talents. These and more is learned for personal growth, progress and self-esteem is gained by playing football inside the magic circle. Consequences from within the magic circle are clearly taken outside.



hope for their team to win, aren't these recognizable as elements which contribute to the game experience? Can a supporter be included in a game circle and became a player without touching a ball, or would he be creating a personal magic circle?

maybe?

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6 - A gamer playing a video game on the verge of an epic win. He is interacting with a gameconsole, his mind is very much focused and absorbed, he is in a flow. His character whom he identifies with 100% is walking in a virtual world, interacting with other characters and the game mechanisms. He is immersed in the game, feels completely in control. As a person/user he can step outside the game any time when going to the toilet for instance, no longer interacting with the console and the game (he himself might identify with his character continuously thinking of strategies in the toilet but this would be an imaginary magic circle, since no interaction is taking place).



7 - Role play in a sales training one person is being exposed to an extremely difficult customer, that moment roles and rules are defined, a virtual world is created/simulated and players commit to these rules. A magic circle can be detected (and is being used as a tool/medium for a different outcome then entertainment only).

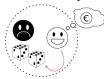






**8- Gambling** is being discussed to be defined as a game or not since in-game concequences have effect in real life, therefor argued not to be a game. While the players do create a magic circle when they commit to the rules, and roles. The magic (circle) is defined by the space and time, and the consequences within the magic circle is only a score, winner and a loser. The consequences of this winning or losing inside results outside the magic circle with real money.







**9 – Just a dice** might instantly be recognized as a game element and bring up the suggestion of a magic circle, even game-experiences might be experienced or remembered instantly. But as long no player is interacting with the dice, when no rules, meaning, goals are related to the dice, there is no magic circle detected (yet).



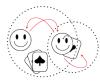




10 - Cheating – most interesting situations occur concerning the semipermeable border of a magic circle when someone tries to cheat in a game. This might create another magic circle, maybe within another circle, or overlapping someone else's magic circle. Or this can destroy the magic circle... (depending on the other players and the rules).





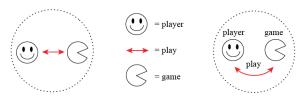




# The Magic Game Circle

To make a summary of the game circles appearance and features from these examples; A magic game circle is defined by;

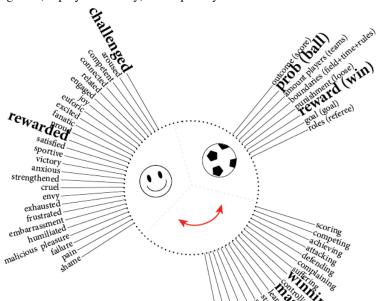
- a player (= the person interacting)
- a play (= interaction including the meaning the player gives/feels in the goal and rules)
- a game (= the definition of the rules and goals)



The user relates (meaning) to a game (element) and commits or engages to interaction becoming a player, when interacting the magical game circle appears or is being created, the player experiences play (which includes emotions). Without play (interaction) there is no magic game circle, without player, there is no magic game circle, without game (broad defined, as a rule, meaning, goal or also 'play') there is no magic game circle. (This model is strongly related to the existing model: product - interaction - user which is well know and used a lot in industrial design, interaction design and product design [Don Norman, The Design of Everyday Things]. Each magic game circle has different elements inside, in belonging to one of these three categories;

- 1- Player elements describe the emotions that player's feel when they play. Within a game both positive and negative emotions can increase the overall enjoyment in the game. We emphasize this point by subdividing the player elements into positive and negative emotions. These player emotions are the most important element in a magic circle, because they seem to have the largest impact on transfer outside the circle. From a taxonomic perspective a game element can be preceded by "I feel...(thrilled, anxious, challenged)"
- **2- Play elements** concern all interaction, activity, gameplay, or effect of the deployed game elements. Both game element and player are necessary. A play element is passive or active. A player can undergo specific types of gameplay/interaction/behavior and a player can interact/play/behave with the game elements. From a taxonomic perspective a game element can be preceded by "I am...(collecting, shooting, emerging, disguising)".
- **3- Game elements** are the items that product designers or game developers directly control. They not only consist of tangible elements like a ball, dice, or joystick. When designing for play, intangible elements like rules, goals, and roles play a vital role. This makes a game (or playful activity) a complex system of tan-

gible and intangible game elements. From a taxonomic perspective a game element can be preceded by "it is... (a rule, a context, a control, a dilemma)".

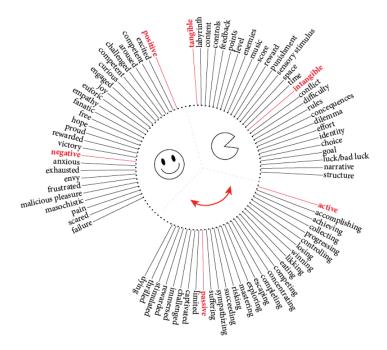


This illustration is an example of the magic game circle model in use to discuss football. When the model is being filled collectively many firstly overlooked but relevant elements arise. By prioritizing elements or when emphasized many different perceptions and perspectives on the same game can be created.



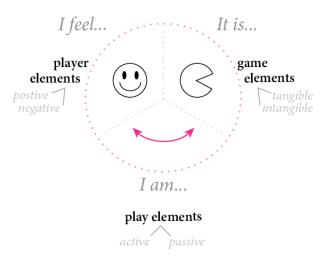
A game is not only about enjoyment, but this is strongly related to frustration and failure. Learning to enlarge and balance these contrast makes us more able to learn how to facilitate the magic game circle and design effective games. Research proved: higher effort (frustration) resulted in increased engagement [Tom Chat-

field]. The positive and negative player-elements need to be balanced well, to help a player to stay in the flow which is the narrow area between making a player overly anxious or bored which causes him to leave or destroy the magic game circle [ref: Mihaly Csikszentmihalyi: Beyond Boredom and Anxiety: Experiencing Flow in Work and Play 1975]. While using the "I feel frustrated, anxiety, anger, envy" opposite to "I feel succeeding, rewarded, in control, confident and victory" in the model helps balancing the significant contrast while designing games. Next illustration visualizes the magic game circle model for Pac-man including the suggested sub categories;



The Magic Game Circle as a model is an abstract 'condition' which can not be fully controlled or designed, but being able to recognize its existence and its features makes us able to determinate and discuss "play". By realizing how the elements in relation to the other elements or/and their position or/and their function relate, we might create opportunities to facilitate a magic circle to be created by the player(s)...

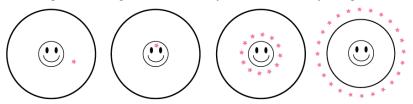
Freedom, safety and trust are most important matters to take in account when designing games or attempt to facilitate a magic game circle for a user to



get in a state of play. Does he feel safe to play, is he able to play, does he understand the game, does he trust the rules or game, does he experience freedom to play?

# Conclusion

In applied game- design and research the aim is for a player to learn a skill, knowledge or behavior change inside the magic game circle for the user to bring these learning's outside the playful state to real life. The aim to invite a user for continuous play or be able to regard life as a game requires knowledge and methods to distinguish the magic circle and its dynamic character by using the model.



The magic game circle as a model might appear less magical however it does preserve the magical motivational character of the playful state, we will never be able to control the magic circle and it's vague, translucent character nor control a player (when you force a user to play, it will be a task, no magic circle will appear and its motivational properties will be ineffective). The model reminds us the player is in control of the magic circle appearing, maintaining and disappearing, we can facilitate this only by design.

By using the magic game circle as a model we are able to create more understanding how to change behavior or educate and train people on knowledge, skills and attitude in the power of play. Even in the ongoing complex discussions on stigmas on gaming like addiction, violence and gambling this model can be used to put these topics in different perspective.

If we are able to design games in its wider context of being played by different player-types within an even wider context of real life we might be able to provide games as a sustainable intrinsically motivational tool for people to become players to learn to cope with life playfully.



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**Illustrations**Illustrations by Ellis Bartholomeus