Game Design & Dev - Planning - Dramatic Elements

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A brief intro to a consideration of dramatic elements for initial game design and development.

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Intro

We may consider many of the elements and concepts that create a game we recognise, effectively the formal elements often associated with the underlying structure of a game. However, we also need to consider those elements that create a sense of emotion, engagement, and challenge for our players. What are we creating in our game that encourages an emotional connection, and the simple desire to invest time and effort in gameplay.

Such *dramatic elements* help create a sense of context to a player's experience with our game. They provide a backdrop, an overlay of sorts, that combines the many disparate formal elements of our game logic and development into a conceptually meaningful experience for the player.

We may start with universal concepts for such dramatic elements, including challenge and play, and then branch out into more complicated, and often subtle, considerations of elements such as,

• characters, premise, story

Each of these will be used, to a greater or lesser extent, by most games we design, develop, and play. They are also used to form the core for explaining many of the more abstract elements of a game's formal system. In effect, they help create a more engaging, and deeper, sense of connection between the game and its players.

A clear understanding of such elements and patterns also helps us consider new game ideas, concepts, and stories for designing future games.

Gaming challenge

Challenge, and an associated sense of accomplishment, is fundamental to many players' definition of gaming, and a worthwhile gaming experience.

However, challenge alone, or the perception of battling against an environment, task, or difficulty, is often no different from daily work, chores, and issues.

So, one of the key requirements for us as designers and developers is to try to find a happy balance to challenge and reward. In effect, we need to consider tasks that are satisfying to complete, thereby requiring a subtle balance between work, which creates the sense of accomplishment, and the resultant enjoyment and fun.

However, we're also inherently limited by the abilities and skills of an individual player. So, challenge may also become an individual perception and characteristic of a player. For example, consider the inherent difference between a beginner player, possibly young, and a more experience player. Perceptions of challenge will vary greatly between these two skill levels and abilities.

dynamic challenge

Challenge may also be considered *dynamic*. A player's ability will adapt and improve, hopefully, as they learn and progress through a game. A challenging early task may become considerably easier as the player progresses to subsequent levels and areas within a game. As a player learns these skills, they will often enjoy the opportunity to demonstrate the fruits of their labours. So, incremental modifications and updates to earlier, completed challenges provides a quick and easy option for the player to balance challenge with reward.

So, as designers and developers, we need to abstract such issues to consider *challenge* that is not necessarily defined by individual experience.

So, we need to think carefully about how to design our games to effectively consider *challenge* that is defined and restricted by individual experience. Each experience can, therefore, take advantage of an appropriate level of challenge.

A well-known example we may consider is commonly referred to as a state of flow.

Flow

The term **flow** refers to a mental state of being completely focused on a given activity.

a sense of flow

The concept of *flow* was developed by the psychologist **Mihaly Csikszentmihalyi**. He wanted to identify concepts and elements that might help define enjoyment for a given task. He studied the experiences and similarities of various tasks for different people. In effect, he was trying to discern similarities of experience for these tasks, users, and in our case players.

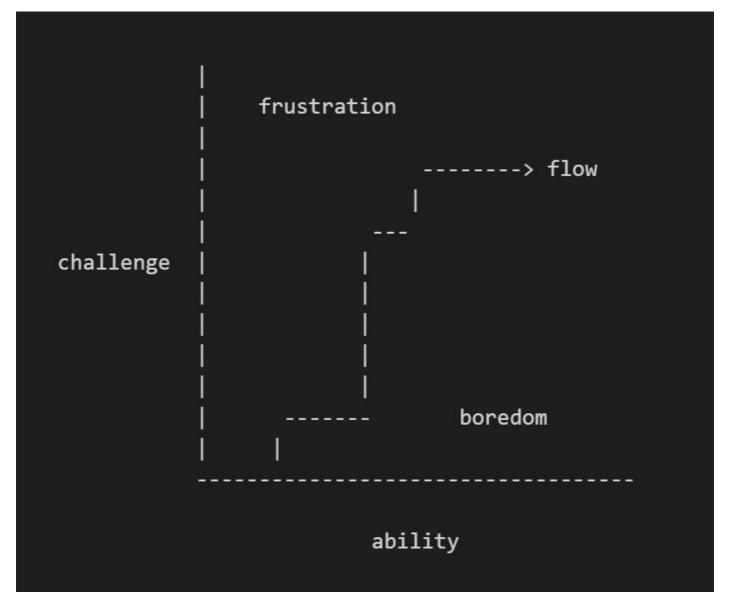
His research noted a distinct lack of traditionally perceived bias for what we consider *fun* and meaningful tasks. There was a noticeable lack of general bias based upon age, social standing, gender, and so on. Many people simply described their perception of enjoyable activities in a similar manner. Regardless of the activity itself, which often included disparate pursuits such as music, painting, and playing games, the words and concepts people used to articulate this sense of fun was largely the same.

For each of these tasks, certain conditions became recurrent and popular for describing pleasurable activities. In effect, each user and player was entering into a state of **flow**, which allowed for this heightened sense of achievement, and associated *fun*.

A player who is in a state of flow may exhibit the following characteristics:

- A player's creativity, ability, and general awareness are high. Therefore, performance of the activity occurs naturally and unconsciously.
- A player experiences deep concentration and immersion in their current activity. In effect, a player is both alert and relatively relaxed.
- Living in the moment or the sensation of being so engrossed in an activity that a player is simply unaware of the passage of time
- Balancing interest and challenge for example, there needs to be sufficient difficulty in the activity to match a player's skills, and effectively maintain their interest, but not too much to create a sense of dread and inevitable failure. It is also important that the task is not too mundane, otherwise inevitable boredom will set in.
- A player is confident and exhibits a sense of control over their current situation
- A player is working progressively towards achieving a specific goal. For example, in games this might be as simple as getting to the next level, completing a mini-challenge, or just mastering a particular mechanic for their current character. The restraints of Luigi's Mansion, and the need to master the use of a vacuum cleaner come to mind, for example.

Image - A State of Flow



As shown in the above diagram, we start to notice that as a player begins a particular challenge or task, their relative ability is normally low. If the difficulty of the challenge is correspondingly high, a sense of frustration will naturally start to occur for the player.

As the player advances, and learns, their ability will likewise increase. However, this improvement in ability needs to be met by challenge to avoid a sense of boredom.

Therefore, we need to achieve a careful, progressive balance between challenge and ability to help promote a sense of *flow* for a given task within our games. If this sense of challenge rises in step with ability, our player will remain in the centre of our graph, achieving a careful and healthy balance between challenge and ability. This is what we're striving for with *challenge* in our games.

An underlying sense of proportion to challenge and ability.

consider skills

So, we need to start introducing challenges and associated activities into our games that require definable skills. These may be a mixture of assumed or learnt skills, applicable to the current game.

For flow, Csikszentmihalyi describes it relative to activities that are considered,

goal-directed and bounded by rules...

• Csikszentmihalyi, M. Flow: The Psychology of Optimal Experience. Harper & Row. New York. 1990. P.49.

Such activities may not customarily be achieved or completed without the proper requisite skills. These skills may include various examples, including standard motor skills for controls and interaction, problem solving, social interaction with other players, and so on. Challenges, and the development of skills, need not necessarily be limited by simple clicking of buttons, and the resultant moving of pixels.

A common trick to manipulate such skills is the introduction of doubt or variance. Imagine a challenge or task where the ending is not known or guaranteed. Perhaps a player's character walking along a ledge, which may be wet underfoot, the perception of wind blowing from any direction, random mob objects falling, and varying time due to health status. The underlying motor skills, for example, are the same for the player's character, but the end result has now been challenged and thrown into doubt. Will the player be able to make it along without falling, being hit from above, and so on.

A story and premise

The wrapper or container that we use to create a sense of context for such challenges, skills, and fun is, of course, a sense of story. More importantly, perhaps, a perceived **premise** for the game. Each game we design and develop will include such a *premise*. It might be a single concept, or a detailed dramatic backdrop, but our games will often leverage a few well-known dramatic elements to help create a player's connection and interest in a game's formal elements.

We can use *premise* to help identify the game's formal elements within a setting or a metaphor. Without this context and setting, we run the distinct risk of abstracting the mechanics, gameplay, and skills too far to allow a sense of fun for our player.

For example, imagine the following example game,

- an app loads, and presents a drawn rectangle of pixels in the game window as a representation of a defined object
- a group of objects, random in path updates and axis of rotation, animate pixel by pixel on both the x and y axis in the game window
- a player initiates an interaction event that requires a listener
 - this listener updates the logic for the app, thereby causing the rectangle of pixels to be modified and redrawn along the x-axis
- data is temporarily stored in data structures to record removed objects from the group of objects
- data is compared against a known value for the player
- if this player value remains positive, the game loop continues to update and run
 - otherwise, the game will end...and so on.

By wrapping this outline in a premise or backstory, we start to introduce a semablance of meaning and context that promotes fun and flow.

characters

As we define our game's story, and the premise for its structure, gameplay, &c. a core consideration is the nature of our game's characters. These characters form the route, conduit, or agent through whom a player may experience the game. This identification becomes an important consideration for our design, as it helps promote a sense of immersion and internalisation that is otherwise difficult to achieve with other means.

A player will often start to empathise with a character, their role in the game, and their inherent need to often resolve the game's story.

From a pyschological standpoint, a dramatic character is often perceived as an extension of fears and desires often projected by a reader, viewer, or player in our context. Such characters will also often embody certain characteristics, both good and bad, which may be associated with a greater goal or need of the player. Socially aware games play on this concept to promote their message and ideal.

Obviously, the type of character will also be influenced by the type or genre of game being designed and developed. It's often why we encounter certain stereotypes and pre-conceived character types for a given genre of video game. It often helps lessen the need to deconstruct the game's story, effectively making it easier to accept the premise of the game.

A game's main character, its protagonist, will often help drive a sense of conflict and challenge by engaging with a defined problem or series of related problems. It's this sense of conflict that will help drive the story. A game will often feature a counterpoint to the main character, its antagonist. The antagonist may be another character, or a simple feature of the game's logic. In both cases, we use the antagonist to push back against our game's protagonist. Without it, our game will often lack the necessary dramatic counterpoint and any semblance of depth to the gameplay.

considerations of game characters

Characters in our games may also exhibit certain traits that are often unique to an interactive gaming environment. For example, the sheer ability of a protagonist to become an agent in the game, and channel empathy from a player.

The traits of a character, in particular a game's protagonist, need to be considered at each stage of a game's design and development. They will help us question motivation for a particular aspect of a game, perhaps a backstory that leads to a mini-challenge for our character. So, we need to consider how the character as agent enables our player to complete this mini-challenge. Likewise, what is the justification for including this mini-challenge in our game.

If we start to simply add challenges, conflict, or perhaps obstacles, without a consideration of *agency* or *motivation*, the game will simply become disjointed and lack *flow* for the experience. Basically, the story, its characters, and the gameplay itself will not make sense to the player.

It's also interesting to consider that such characters need not necessarily be preconceived or developed by the game's designer. Avatars may also play a role as agent within a game, for example in Blizzard's *World of Warcraft*.

Such avatars will often be created, designed, and managed by a player. Players may invest a great deal of time, energy, and resources into such avatars to the point where the agency and empathy provided by these characters will fuel their actual gameplay and social role in a gaming environment. In fact, it has long been argued that such empathy may be increased with greater player engagement with such avatars.

characters and classes in Diablo

One of the interesting and fun aspects of the original Diablo game was the introduction of *classes* for characters. Instead of simply providing a single option for the protagonist, *Diablo* provided three options, the *Rogue*, *Sorcerer*, and the *Warrior*. This has since been expanded to six classes for Diablo III with the use of various expansions, and should be extended to seven classes in 2017.

Each of these character classes provides different attribuutes, skills, and agency for the game. It's not simply a matter of providing different types of characters and skills, the game also allows different players to empathise in varying ways with the game. No sense of one size fits all, instead the player is provided with different ways to enjoy and complete the game.

This choice of game agent may also introduce variant paths through the game. In effect, the player is provided with different perspectives on the story, challenges, and general gameplay.

characters and emergent systems

We may also add a semblance of *free will* to our characters, which creates a noticeable variant to standard player control.

A traditional character's agency will be directly influenced, monitored, and controlled by the player. This may have the side-effect of limiting the personality traits and characteristics a protagonist, for example, may exhibit. Finite controls have often been required from a purely logic based perspective, otherwise the game will become increasingly complex for both the developer and the player.

However, with a more free sense of control, our defined *free will* for example, such control limitations may no longer apply. Al-controlled characters, or emergent systems, may now start to exhibit examples of autonomous behaviour. The potential for interesting conflict may arise as a simple result of expected player control, and this sense of limited *free will* for certain characters.

The Sims is a good example of this use of *free will*. Many of these autonomous actions are driven by needs in the game, but some are simply added for fun. A bit like Sonic tapping his foot in frustration at the player.

Games and narrative structure

In traditional drama, we may often perceive the following categories as useful options for conflict

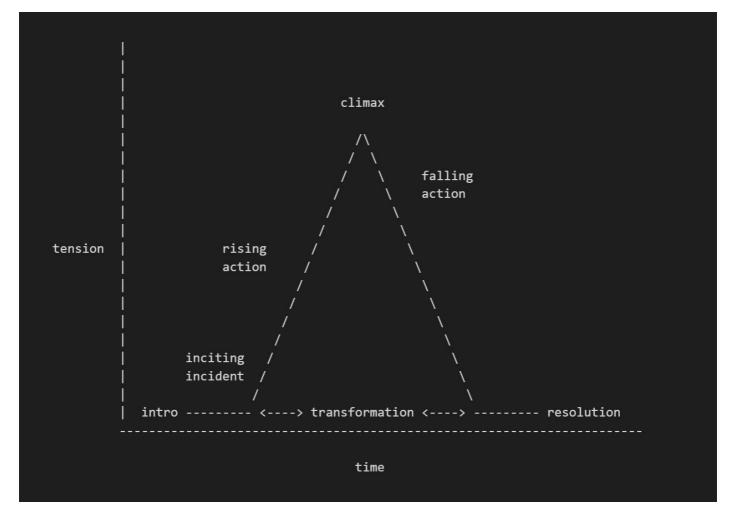
- a single character vs another single character
- a single character vs their environment
 - a character battling the forces of nature &c.
- a single character vs a machine
 - many examples in movies...
- a single character vs their own inner demons
 - a consideration of experience, morals, insanity &c.
- a single character vs perceptions of fate
 - something is inevitable, bound to happen, can't be changed &c.

A game will employ similar categories for its players, in particular for the protagonist with simple variants such as

- a single player vs another single player
- a single player vs the game
- and so on...

However, as these categories are played out in our games, the sense of conflict they create will usually follow a discernible pattern that escalates to a final resolution. This escalating conflict will create a sense of tension in the gameplay, which should be matched and reflected in the story. The one should respond to the other, along with corresponding elements such as music, visuals, speed, and a sense of risk. Such tension will also tend to get worse, or more dramatic, before it is resolved and gets better. This is a classic **narrative structure or arc**, and it is a useful tool for storytelling in games. Effectively, it forms the framework and support for all dramatic media, and is not excluded for games.

Image - Narrative Structure



* Source - [Building An Arc: Bringing Narrative Structure To Your DJ Sets](http://blog.dubspot.com/building-an-arcbringing-narrative-structure-to-your-dj-sets/)

As shown in the above diagram, a standard narrative structure will begin with an introduction or exposure of a game's settings. Its characters, backdrop, and various concepts that will help set the tone and structure for the game. In effect, anything that might be perceived useful or important for the upcoming action.

The conflict may then be introduced as the protagonist is opposed by some force in the game. This could be another character acting as the antagonist, various game forces, or a mixture as appropriate to the story and gameplay. This conflict, and the associated attempts at resolution by the protagonist will normally cause a chain of events that lead to rising action. The protagonist becomes proactive, perhaps, in trying to solve a problem and thereby resolve the conflict.

This increase action will normally lead to a climax in the conflict and any associated tension. For better or for worse, the action will now start to fall, and a semblance of resolution will be introduced to the game.

Journey to a narrative structure

A recent example of narrative structure in gaming was the 2012 release *Journey*. Designed by *ThatGameCompany*, and directed by Jenova Chen, its underlying design and story was inspired by *The Hero's Journey*, a structure and outline for myth and story telling prescribed by Joseph Campbell.

Campbell defined twelve stages on the *Hero's Journey*, and set a structure that follows the narrative arc along the path of the story.

The initial incident is an effective acknowledgement of the limits of the current environment, the encompassing world for the hero. The hero must now leave this environment, this comfort zone of sorts, and embark into unknown,

commonly dangerous territory.

This *journey* will normally include many trials and tests, the challenges we expect to introduce to many games. These trials are not simply physical, but may also include aspects of temptation, mental reasoning, and emotional dilemmas. The player will normally be expected to reach a defined low point on the journey, the *abyss* that defines and shapes the counterpoint to the story and game.

This introduction of an extreme low point, the *abyss*, allows the character to metaphorically die, and then be reborn ready for the final challenges of the journey.

The hero will then return to a point of calm and resolution, transformed and free of the issues, fear, and doubts that initially defined them.

Chen wanted to use this general pattern of a hero's journey to help shape the narrative structure and arc for the game.

However, instead of relying solely on narrative to define the game's story, the journey is characterised and articulated with shapes and architecture, colour usage, sound effects and music, and a subtle shift in the nature of the game's mechanics. Each part of the game, which created the sense of the narrative structure and arc, was considered against the emotional state of the hero, and the effect of such states on the player. So, expected emotional state considered against certain milestones in the hero's journey.

The game's use of a fantastic soundtrack, composed by Austin Wintory, certainly helped create this sense of emotion and engagement with the game's arc.

References

- Bogost, I. Persuasive Games: The Expressive Power of Videogames. MIT Press. Cambridge, MA. 2007.
- Bogost, I, The Rhetoric of Video Games. in The Ecology of Games... Salen, E. MIT Press. Cambridge, MA. 2008.
- Bogost, I. Unit Operations: An Approach to Videogame Criticism. MIT Press. Cambridge, MA. 2006.
- Csikszentmihalyi, M. Flow: The Psychology of Optimal Experience. Harper & Row. New York. 1990.
- Huizinga, J. Homo Ludens: A Study of the Play-Element in Culture. Angelico Press. 2016.
- Murray, J. Hamlet on the Holodeck: The Future of Narrative in Cyberspace. Free Press. New York. 1997.
- Poundstone, W. Prisoner's Dilemma. Touchstone. New York. 2002.
- Salen, K. & Zimmerman, E. Rules of Play: Game Design Fundamentals. MIT Press. 2003.

Games

- Diablo Wikipedia
- Diablo III console
- Journey ThatGameCompany
- Journey PS3
- Journey Wikipedia
- World of Warcraft