



From Counter-Strike to Counter-Statement: using Burke's pentad as a tool for analyzing video games

Journal:	<i>Digital Creativity</i>
Manuscript ID:	NDCR-2010-0033
Manuscript Type:	Tutorial article
Keywords:	game studies, dramatism, rhetoric, media literacy



Abstract

As video games increasingly become an important frame of reference and as they are more and more taken seriously in education and research, there is a growing need for a methodological tool for video game analysis. In this paper, rhetorical theory in general and pentadic analysis in particular is introduced as a useful approach to stimulate a critical approach of video games. A case study is presented in which a popular video game (Bioshock) is analyzed using this rhetorical approach. It is argued that pentadic analysis can overcome a number of binary discussions within the contemporary field of video game criticism, and that it offers interesting perspectives for research and education (e.g. as a reflection tool).

KEYWORDS: game studies; dramatism; new rhetoric; procedural rhetoric; media literacy

1 Introduction – Games and procedural rhetoric

As video games are more and more taken seriously in education and research, there are growing concerns about the underlying meaning-making processes in games (Gee 2010, Tanenbaum and Tanenbaum 2010). An important theory within this field is developed by video game researcher and designer Ian Bogost. In *Persuasive Games* (2007) he argues that video game players are subject to a new type of persuasion which he refers to as *procedural rhetoric*. This new type of rhetoric is based on meaning making through the selective simulation of specific rules. Games do not as much persuade players by telling them things (games as representations), but rather by confronting them with the results of their actions through the game rules. Therefore, games provide a perspective on, as Bogost explains, “how things work” (2007. p. 57).

According to game scholars that stress the strong influence of the game rules and procedures, players voluntarily submit to the game rules in order to immerse in the game. In other words, they are “being persuaded to think within the constraints of the game” (McAllister 2004. p. 161). Current research in game-based learning (Buckingham and Burn 2007, Hsu and Wang 2010, Pelletier 2005) therefore focuses on how people can become more reflective and critical about the meanings in games in order to learn something about the dynamics of systems and domains like economy, ecology, history and science (Gee 2010). While Bogost has contributed to the theoretical understanding of these processes, he did not himself offer a practical tool for such critical analysis, although he did point in the direction of the American rhetorician and literary critic Kenneth Burke [1897-1993]. Based upon these suggestions (Bogost 2007, 2008) and the work of numerous other authors (XXXXXX XXXX,

1
2
3 Gee 2006, McAllister 2004, Thompson 2009, Walz 2005), this article examines the potential
4
5 of Kenneth Burke's theory of dramatism and his dramatic pentad as a methodological tool
6
7 to critically analyze perspective taking and meaning making in video games. Firstly,
8
9 rhetorical theory is explored as a framework for understanding video games as a mode of
10
11 human symbol use. Secondly, Burke's Pentad (1969a) is suggested as a tool for analyzing
12
13 video games. Thirdly, this strategy is applied to a popular commercial video game, Bioshock
14
15 (2K Boston and 2K Australia 2007). Fourthly, the benefits of this particular methodology are
16
17 discussed in relation to (a) other methodological approaches and (b) educational perspectives.
18
19
20
21
22 Finally, suggestions for future research are formulated.
23
24
25
26
27
28

29 **2 Kenneth Burke and video games**

30 **2.1 New Rhetoric**

31
32
33
34
35
36 Kenneth Burke is often considered as one of the founding fathers of the "new rhetorical
37
38 tradition" (Enos and Brown 1994 , Foss 2004) . This tradition proposes a change in
39
40 perspective from rhetoric as the practice of "mere" persuasion to rhetoric as "the human use
41
42 of symbols to communicate" (Foss 2004. p. 4). Burke described humans as "symbol-using
43
44 animals" (Burke 1966. p. 16) to indicate that all human action is fundamentally rhetorical,
45
46 because "when we speak, act, dress, eat, and generally conduct our lives we communicate
47
48 and, in doing so, persuade others, including ourselves" (Gussfield 1989. p. 17). Persuasion is
49
50 inevitable, since *using* symbols implies *selecting* some and not other, and this selection
51
52 involves a *choice* that is not without consequences – every way of describing a situation or
53
54 phenomenon (e.g. how things work) is an indication of "how we are perceiving it, the choices
55
56
57
58
59
60

1
2
3 we see available to us, and the action we are likely to take in that situation” (Foss 2004. p.
4
5 384).
6
7
8
9

10 11 12 13 **2.2 New Rhetoric and video games** 14

15
16
17 Within the field of video game studies, scholars have already picked up and adapted Burke’s
18 rhetorical perspective to discuss the identification processes between gamers and their games
19 (Walz 2005, Boone 2008) and to study the ecosystem of creation and play (McAllister 2004).
20
21 More recently, scholars are turning to Burke’s concept of literature and drama as “proverbs
22 writ large” (Burke 1973), to examine whether video games too can help us to name recurrent
23 situations and provide us with strategies for dealing with them (XXXXX XXXX, Gee 2006,
24 Voorhees 2009). XXXXX (XXXX), for example, argued that games can be studied as tools
25 that provide culturally dominant views on social conflicts and ethical dilemmas. In addition,
26 Voorhees (2009) demonstrated that role-play games like the Final Fantasy series can be
27 understood as simulations that “allow players to experiment with different responses to
28 cultural difference” (abstract). From this perspective, video games can perhaps be described
29 as an “equipment for living” (Burke 1973).
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48
49

50 51 **2.3 The dramatisic pentad** 52

53
54
55 To analyze how the use of symbols name recurrent situations and provide strategies for
56 dealing with them, Burke (1966, 1969a, 1969b) developed the *dramatisic pentad*. He
57 demonstrated how the five basic elements of drama (*act, agent, agency, scene, and purpose*)
58
59
60

1
2
3 constitute a pentad of terms that people refer to when they try to explain the world and offer
4 interpretations about their motives for what they are doing. He showed that any mode of
5 human symbol use can be analyzed by answering the questions *who, what, when, where* and
6 *why* in general, but also that such an analysis will become more powerful if these key terms
7 are combined in order to construct *ratios*. These ratios are pairings of two or more terms that
8 explore the influence of one term on another. By systematically combining terms in ratios, it
9 becomes clear which term determines the nature of the other, and thus which term is
10 dominant. In addition, these ratios help to open up a text to multiple perspectives (Blakesley
11 2002).

29 **2.4 The dramatic pentad and video games**

34 Even though Burke developed the pentad based on the study of literature and drama, he did
35 not limit the use of the dramatic pentad to verbal and written language (Brummett 2006).
36 Instead, he opened up the domain of rhetoric to “include nonverbal domains known and yet to
37 be invented or discovered” (Bogost 2008. p. 124). He suggested that the pentad provides an
38 answer to the question of “what is involved when we say what people are doing and why they
39 are doing it?” (Burke 1969a. p. xv) and it is precisely this focus on people’s “talk about”
40 (Burke 1969a. p. 67) that can be read as a stimulus to analyze new media in general and video
41 games in particular (Thompson 2009. p. 67). Not surprisingly, the pentad is increasingly
42 considered as a useful tool for critically examining video games (XXXXXX XXXX, Shields
43 2009, Thompson 2009). This is also due to the fact that the pentad fits the theory of
44 procedural rhetoric (Bogost 2007), since it enables a comparison between the game world
45 rules with real world issues. According to Voorhees (2009), “Burke encourages us to look for

1
2
3 linkages that direct the critic outside of the text to the contemporaneous situations they
4
5 describe”.

6
7
8
9
10 An important concept in the dramatisic model that supports the search for these
11 linkages is that of circumference (Burke 1969a). Burke uses the concept of circumference to
12 suggest that the scope of an analysis can be shifted, enlarged or reduced (XXXXX XXXX).
13 Therefore, “one could easily imagine [studies] in which the Pentadic analyses were gradually
14 telescoped out, from the game, to the playing of the game, to the reading about the playing of
15 the game, to the analysis of readings that talk about the playing of the game, ad infinitum”
16 (Thompson 2009. p. 281). Changing the circumference adds both complexity and ambiguity
17 to the analysis, since it may cause a radical shift in each of the *ratios* – and thus in the
18 interpretation as well. According to Burke this ambiguity is necessary in order to understand
19 the meaning and the range of an isolated argument, because “what we want is not terms that
20 avoid ambiguity, but terms that clearly reveal the strategic spots at which ambiguities
21 necessarily arise” (Burke 1969a. p. xviii).

22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41 The pentad’s ability to deal with ambiguity makes it an interesting tool for use in the
42 field of video game studies. Not only can it help to identify the ideological content and thus
43 engender critical awareness about video games, but the systematic pairing of elements can
44 also help to open up the interpretation of the game to perspectives that would otherwise be
45 ignored: “dramatism enables us to see not only the grounds of these interpretations, but to
46 enable alternative ones by forcing categorical expectations to shift and thus generate new
47 ways of seeing” (Blakesley 2002. p. 41). Therefore, it can serve as a useful tool to compare
48 the perspectives of the designers as reflected in the game with the perspectives of the gamers
49 as for example reflected on popular game websites, but also to contrast the game narrative
50
51
52
53
54
55
56
57
58
59
60

1
2
3 with the interactive character of the game rules. In what follows, a case study is presented in
4
5 which a popular video game – Bioshock (2K Boston and 2K Australia 2007) – is described
6
7 and then analyzed using Burke’s *dramatistic pentad*, illustrating its potential as a tool for
8
9 dealing with ambiguity and stimulating critical reflection.
10
11
12
13
14
15
16

17 **3 Object of analysis**

18 **3.1 Selection of the game Bioshock**

19
20
21
22
23
24 For this case study, Bioshock (2K Boston and 2K Australia 2007) was chosen as the object of
25
26 analysis, mainly for two reasons. The first reason is the popularity of the game. Judging by
27
28 the awards the game has won, its impressive sales figures, and its ranking in the charts, it is
29
30 safe to conclude that Bioshock is a very popular game and thus a representative case. The
31
32 second reason for selecting Bioshock is that it belongs to the genre of the *first person shooter*.
33
34 This genre is notorious because it is argued that exposure to this kind of games would lead to
35
36 an increase of aggressive behaviour. Games like Doom (Id Software 1993) and Counter-
37
38 Strike (Valve Software 1999) are blamed for evoking an epidemic of youth violence, as
39
40 reflected in the massacres in Columbine (United States) and Erfurt (Germany). A lot of these
41
42 accusations stem from the observation that these games combine fast paced action with
43
44 graphically explicit violence, all of which is perceived from a first person perspective: the
45
46 player is looking through the eyes of the main character. Therefore it is not surprising that
47
48 Bioshock, like most first person shooters, is sold in Europe with an 18+ rating and a warning
49
50 for blood shedding, drug references, intense violence, sexual themes and foul language use.
51
52 Precisely the combination of Bioshock’s popularity and the controversy surrounding its genre
53
54
55
56
57
58
59
60

1
2
3 is what makes this game such an interesting case for a rhetorical analysis of the underlying
4
5 processes in video gaming.
6
7
8
9

10 11 12 **3.2 Synopsis of Bioshock** 13 14

15
16
17 In Bioshock (2K Boston and 2K Australia 2007), players take on the role of Jack, a sole
18 survivor of a plane crash in the Atlantic Ocean. While swimming, the players discover a
19 submarine that takes them to the underwater city of Rapture. This city, which is founded by a
20 devotee of the philosophy of objectivism, Andrew Ryan (hence the reference to Ayn Rand
21 who is often referred to as the founder of objectivism, a theory/philosophy of ethical egoism
22 that focuses on humans as self-interested agents), offered a forum to the best scientists, artists
23 and medical doctors to work in absolute freedom. When players enter the city, it becomes
24 clear that something has gone terribly wrong. By means of writings on the walls, radio
25 messages and audio diaries that have been left behind, the players become immersed in the
26 story of Rapture's demise. Whether this collapse was due to an *overdose* of objectivism, or
27 due to *not rigorously following* this philosophy, is unclear to the players. The only certainty
28 they have, is that they find themselves trapped in a maze filled with genetically manipulated
29 and ultraviolent villains. To survive, they will have to equip a good share of fire arms and
30 fight their way through Rapture. But as in most other games, each villain is a little bit
31 stronger than the previous one. In order to keep up with these more powerful enemies, the
32 players are taught how to acquire super powers by injecting themselves with a substance that
33 alters their genetic code: *ADAM*. To become extra powerful, the players will need
34 increasingly more ADAM, which – shockingly – can only be found in little girls. When
35 players are confronted with one of these girls, they have to choose whether they want to
36
37
38
39
40
41
42
43
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

1
2
3 *harvest* or *rescue* them. *Harvest* is a euphemism for killing the girl and extracting a
4
5 maximum amount of ADAM in the process, whereas *rescue* stands for keeping the girl alive,
6
7 but by doing so receiving only a tiny drop of ADAM.
8
9

10 11 12 13 14 15 **4 Pentadic analysis** 16 17

18
19
20 In the next section the confrontation with the little girls is analyzed from both a developer and
21
22 a gamer perspective, as reflected in weblogs, in interviews and on message boards of popular
23
24 game websites, based on the concept of circumference. The terms of the pentad are named
25
26 and combined with each other in order to analyze meaning-making processes and dominant
27
28 cultural beliefs in people's talk about videogames.
29
30
31
32
33
34
35

36 **4.1 Game perspective** 37 38 39 40

41 The first part of the pentadic analysis is based on a number of interviews with members of the
42
43 2K Boston and 2K Australia team, lead by Ken Levine (*agents*). The *scene* in which these
44
45 developers operate is the video game industry, which has become an important and very
46
47 competitive sector within the global economic system. With Bioshock, Levine and his team
48
49 wanted to provide the players an exceptional experience in the genre (*purpose*). For this
50
51 critical analysis, it is interesting to focus on what the developers say they have done in order
52
53 to create this particular experience (*act*), and what techniques they have used (*agency*). In this
54
55 analysis, the focus is on both the representational and on the procedural level. Both can be
56
57
58
59
60 read as two interesting developer *agencies* that are used to intensify the confrontation with the

1
2
3 Little Sisters. With regards to the representational agency, the focus of the analysis is on the
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

Little Sisters. With regards to the representational agency, the focus of the analysis is on the
dramatistic dialogue that is staged for the players before they make their first decision
whether to harvest or rescue the Little Sisters. The conclusions of this analysis are then
confronted with the procedural *agency*, the game rules that regulate the consequences of the
players' choices.

4.1.1 Representational level

At the representational level, the game tells the story of Bioshock using conventional methods
(cut scenes) and methods that were previously unexplored in the video game genre (there are
opportunities for eavesdropping, the player can pick up and listen to audio diaries that have
been left behind...). Particularly interesting is the dialogue that is staged for the players when
they have to decide over the fate of the Little Sisters for the very first time. It is quite clear
that the *purpose* of this dialogue between “Atlas” and “Tenenbaum” is to confront the players
with the likely repercussions of their choice. From a rhetorical perspective, it is interesting to
analyze how this dialogue is staged, by examining the arguments and physical appearance of
the protagonists, Atlas and Tenenbaum.

Atlas – who has been the guide of the player from the beginning of the game – speaks
to the players through a radio. He warns the players that they will need all the ADAM they
can find, given the extreme circumstances of Rapture being under attack by ultraviolent
creatures. Therefore the players should harvest all of the Little Sisters they can find. After
all, as Atlas explains, looks can be deceiving and these girls are not what they look like – they
are “nothing but a means to transport ADAM”. Before the player can blindly follow

1
2
3 ADAM's advice, a woman named Tenenbaum appears on a balcony with an entirely different
4
5 story. She appeals to the humanity of the players and begs the players to keep the little girls
6
7 alive. As an extra incentive, she promises that saving the girls will be worthwhile.
8
9

10
11
12 A pentadic analysis here reveals the dominant perspectives in the argumentation of
13
14 both Tenenbaum and Atlas. Tenenbaum's argument is based on a **purpose-act ratio**. She
15
16 asks the players to use a moral perspective – humanity – as their guide in making the decision
17
18 to either kill or rescue the little girl. Therefore, Tenenbaum appears to be morally superior,
19
20 which is an idea that the game developers have tried to reinforce by addressing a number of
21
22 culturally accepted dominant beliefs. For example, the developers put Tenenbaum in the
23
24 same room as the players. Because of her presence, the players can watch her facial
25
26 expressions, her non-verbal behaviour, etc. This makes her story much more personal than
27
28 Atlas's, who only addresses the player through radio. In addition, Tenenbaum expresses
29
30 dominant beliefs in her argumentation as well –based on the dominance of the purpose. First
31
32 of all, she promises the players she will make it worthwhile to save the Little Sisters, which of
33
34 course resemblances the dominant (religious) discourse of future rewards, that choosing to do
35
36 what is right will yield greater rewards in the future, even if it means that the present is made
37
38 more difficult. In most religions short term thinking is condemned, whereas a *long term*
39
40 *vision* is applauded and rewarded. A second dominant belief expressed by Tenenbaum is that
41
42 it seems hard to resist the myth of the *innocence of childhood*, which refers to the symbolical
43
44 value (“children are sacred”, “children are priceless”) that was attributed to children at the
45
46 time when they were removed from the labour market and thus when they lost their
47
48 economical value (Zelizer 1985).
49
50
51
52
53
54
55
56
57
58
59
60

1
2
3 While Tenenbaum is implicitly pointed at as “good”, the position of Atlas is implicitly
4 condemned for being “bad”. He guides the players through Rapture, hoping that the player
5 will rescue his family in return. When he tells the players to harvest the little girls, he falls
6 back to both a **scene-act** (these extreme circumstances demand an extreme act) and a
7
8 **purpose-agency ratio** (the goal justifies the means). Even though the situation is somewhat
9 more complex, as Atlas presents himself as a family man whose wife and daughter have been
10 kidnapped, these ratios will leave the players with a more negative impression of Atlas as a
11 character. This is further reinforced by his alternative perspective of opting for a short-term
12 solution, and the violation of the positive symbolic value of little children.
13
14
15
16
17
18
19
20
21
22
23
24
25
26

27 4.1.2 Procedural level

28
29
30
31 Given the specificity of video games, it is important to take a look at the game mechanics
32 regarding the harvest-rescue dilemma as well. The ADAM distribution rules are very
33 straightforward, each time the players harvest a little girl they yield 160 ADAM, but when
34 they choose to rescue them, they only receive 80 ADAM. While the extra ADAM can make
35 the game a lot easier, certainly in the early stages of the game, the difference in rewards is
36 reduced to a minimum because the players get an additional reward of 200 ADAM (and some
37 exclusive but non-aggressive extras) each time they save three little girls. Killing the girls
38 thus earns the player 480 ADAM, while saving them results in 440 ADAM plus extras.
39
40
41
42
43
44
45
46
47
48
49
50
51
52

53 Although the game mechanics support the *purpose*-driven rationale which was
54 expressed in the storyline (although it could actually be the case that it is the other way
55 around, that the storyline supports the game mechanics), the pentad reveals an **agency-act**
56 **ratio** in the game rules. The central theme is neither about morality nor objectivism, but
57
58
59
60

1
2
3 about the choice of weapons. Both the ADAM and the extras can be used to obtain plasmids
4
5 and gene tonics, which strengthen the player and – more importantly – improve the range of
6
7 weapons to their disposal. Even though the developers have integrated three different endings
8
9 to the game (good, bad and slightly better) which depend on the decisions of the players
10
11 regarding the Little Sisters, and even though this might lead to the impression that the game is
12
13 about morality and ethical decision making, the game is all about what the player can and
14
15 cannot do in the game.
16
17
18
19
20
21
22
23

24 **4.2 Player perspective**

25
26
27
28
29 The second part of this pentadic analysis is based on players' talk about playing the game – in
30
31 particular their talk about the harvesting or rescuing the Little Sisters – as can be read on
32
33 various internet discussion and personal weblogs. What is interesting is that majority large
34
35 group of players report a change in motivation and actions for their choice between harvest
36
37 and rescue over time.
38
39
40
41
42

43
44 In pentadic terms the players' adventure can be described as a dramatic situation. The
45
46 players (*agents*) find themselves in the ravaged underwater city of Rapture, constantly under
47
48 constant threat of being killed by villains (*scene*). As they want to survive and advance
49
50 (*purpose*), they need enough ADAM in order to keep up with the enemies that get stronger as
51
52 the player progresses through the game. This requires the players to choose between
53
54 harvesting and rescuing the little girls on their path (*act*), since these girls are supposed to be
55
56 the only resource of ADAM. In this sense, the girls are no longer considered as
57
58 the only resource of ADAM. In this sense, the girls are no longer considered as
59
60 (counter)agents, but rather as an *agency*; the means the players use to advance in the game.

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

At first the players seem to respond very emotional, grounding their argumentation on an **agent-act ratio**. Players explain how they decided to save the girls because it's "not in their nature" to kill little children. In other words, the game has become personal for these players. For example, the catholic priest Josh Miller reports on his blog how he was unable to harvest one single girl in the game both as a human being and as a priest. For him, the idea that other people might choose the role of the merciless executioner even makes him feel "uneasy" (Miller 2007).

However, when players comment on their experience in Rapture, they not only situate their choice for rescuing or harvesting the little girls in the *game world scene*, but in the *real world scene* as well. For example, some players argue that the choice between harvest and rescue was indeed emotionally moving at first, but that the emotion was subdued by the curiosity of what would happen next if they had chosen the alternative option. By shifting the scope of the analysis (*circumference*), a different pentad can be described labelling the terms from this real world perspective instead of an in-game point of view, which makes it easier to interpret the ambivalent emotional response of the players.

In the real world circumference, the *act* remains the choice between harvest and rescue, the *scene* changes from the city of Rapture to the room where the player (*agent*) is sitting behind his screen. The agents are playing perhaps because they want to escape everyday routine, because they want to experience certain emotions, or simply because they want to be entertained (*purpose*). Therefore, they use their keyboard and mouse, or simply a controller (*agency*). From within this circumference, the scene clearly dominates the purpose of the player (**scene-purpose ratio**). The choice between harvesting and rescuing the little

1
2
3 girls then appears noncommittal since of course no real child will die every time the players
4
5 press the harvest button. In this sense, Atlas' statement: "You think that is a child down
6
7 there? Don't be fooled," can be interpreted as an example of intertextuality, or to rephrase
8
9 René Magritte famous quote: "Ceci n'est pas une petite fille".
10
11

12
13
14
15 It appears that the relative ease of choosing between harvest or rescue – a single
16
17 mouse click, and the knowledge gathered from the discussion fora certainly affects the
18
19 players' choice. *Agency* becomes the dominant term in their reasoning: what weapons
20
21 influence the game in such a way that it becomes more fun?
22
23
24
25
26
27
28

29 **5 Discussion**

30
31
32
33
34 This article started from the perspective that video games open up a new domain for
35
36 persuasion (Bogost 2007). It was argued that video games can perhaps constitute an
37
38 "equipment for living" (Burke 1973), because they can help us to name recurrent situations
39
40 and provides us with strategies for dealing with them. Pentadic analysis (1969b) was
41
42 introduced as a tool for reflecting critically on the meaning of video games, and for analyzing
43
44 how the use of symbols influences people's thoughts and behaviour.
45
46
47
48
49

50
51 A pentadic analysis of Bioshock was presented, not to suggest the single most
52
53 "appropriate" reading of Bioshock, but rather as a case study of how the pentad allows
54
55 analyzing a game from multiple, sometimes conflicting perspectives. In addition, the case
56
57 study illustrated how the pentad enables a confrontation between what happens in the game
58
59 with real world issues and the culturally dominant accepted ways of dealing with them. Using
60

1
2
3 the concept of circumference, the talk-about of both the game developers of Bioshock and its
4
5 players were analyzed. A mismatch was found between the representational and the
6
7 procedural level of the game. It was found that the developers explain and market Bioshock
8
9 as a “proverb writ large” that names a situation where morality (purpose) is weighed up
10
11 against the precariousness of the situation (*scene*), but that the game experience itself revolves
12
13 more around *agencies*, around finding the best combination of weapons to eliminate the
14
15 enemies and to create a joyful player experience. By consulting the players’ talk-about this
16
17 game as well, it was found that the players’ discussions reflect a similar pattern of
18
19 complexity. At first, players ground their motives for either harvesting or rescuing the Little
20
21 Sisters in their own nature (*agent*), but it’s not long before they *act* counter-intuitively, not
22
23 just out of curiosity about what would happen with the little girls, but rather because they
24
25 want to experience the game using a different set of weaponry. In other words, *agency*
26
27 becomes the central focus of the game for the players as well.
28
29
30
31
32
33
34
35

36
37 Burke’s pentad helped to uncover dominant ways of seeing in Bioshock and in the
38
39 players’ responses to these issues (e.g. innocence of childhood, the morality in long term
40
41 thinking...). Because the analysis opened up the game to multiple and even conflicting
42
43 perspectives, it only partially supports the findings of Tavinor (2009), who reviewed
44
45 Bioshock from a single, narrative perspective and described it as a “masterpiece” because of
46
47 the “thrilling artistic coherence”. Rather, the pentad points at the ambiguity within Bioshock,
48
49 and therefore it is more congruent with the findings of Hocking (2007). In what follows, the
50
51 pentad is discussed in relation to methodological suggestions made within the field of video
52
53 game criticism, after which the merits of using the pentad as a reflection tool in education are
54
55 elaborated upon.
56
57
58
59
60

5.1 Burke's pentad compared to existing methodologies

Over the years, numerous methodological suggestions to study video games have been made. Konzack (2002), for example, argued that an analysis of a video game should include a discussion of at least seven distinct layers: hardware, program code, functionality, gameplay, meaning, referentiality and socio-cultural aspects. Similarly, Consalvo and Dutton (2006) suggested a blueprint for analysis, based on four potentially important perspectives: object inventory, interface study, interaction map and gameplay log (2006). A description of all layers would then lead to a deeper understanding of the game.

However, within video game criticism there is a shift from mere describing game elements to the analysis of actual player experiences. Aarseth (2003) pointed out that a sound methodology requires a clear focus on player experience as well. He therefore proposed three ways to gather knowledge of games: (1) through the creators of the game, (2) through observation of players, and (3) by playing the game. He suggested focusing on the different roles players can take on to counter issues of subjectivity resulting from the single reading of a game session. Similarly, Malliet (2006) suggested to take into account derivative texts such as walkthroughs and forum discussions, because "it becomes very difficult to define what belongs to the 'text' of a game and what not, and consequently, what will be the boundaries of the object of analysis" (2006).

The boundaries of the game constitute a key issue here. Video game scholars face a number of dilemmas due to the dynamic character of video games. Should they analyze the game as it is designed or as it is played (Aarseth 2003)? Do they have to consider games as

1
2
3 representations or as simulations (Konzack 2002, Malliet 2006)? Should an analysis stick to
4 the game or does it have to include derivative texts (Malliet 2006)? Does video game
5 criticism limit itself to the boundaries of the *Magic Circle* (Huizinga 1938 [1952]) or can it
6 address issues within the broader social and cultural context as well (Salen and Zimmerman
7 2004)? An analysis of video gaming as a mode of human symbol use can help to transcend
8 these discussions since the pentad offers “terms that clearly reveal the strategic spots at which
9 ambiguities arise” (Burke 1969a. p. xviii).

10
11
12
13
14
15
16
17
18
19
20
21
22 Kimberling (1982) compares the effect of a pentadic analysis with that of a prism,
23 “bending rays of light in a variety of directions” (Kimberling 1982. p. 19). This ever
24 changing focus has been pointed at as one of the main difficulties in Burke’s theory.
25
26 However, in the case of video games the multiperspectivism is an advantage, as a pentadic
27 analysis does not try to resolve the many discussions in game studies (narratology vs.
28 ludology, representation vs. simulation, reality vs. virtual reality), but rather works with the
29 ambiguities that arise when confronting video games. The case study of Bioshock clearly
30 shows that the pentad can shed some light on the relation between in-game and real world-
31 actions, between intended play behaviour and actual behaviour, between the game and what
32 happens in the broader social context, and between game rules and representation; precisely
33 because it stimulates the analysts to consider their behaviour from different perspectives. By
34 describing the game itself as an *act*, it allows for the combination of elements from all
35 different layers that influence the game experience, while addressing the inherent complexity
36 and ambiguity of integrating all these perspectives, which answers the call of Pelletier (2005)
37 for a more dynamic approach of video game criticism.
38
39
40
41
42
43
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

5.2 Educational perspectives

The call for a reflective and dynamic approach to video games is not particularly new in the field of simulation and gaming. On the contrary, it resembles the concept of *debriefing*: “using the information generated during the experimental activity to facilitate learning for those who have been through the process” (Lederman 1992. p. 147). The importance of debriefing in an educational context is widely acknowledged (Mayer et al. 2002, Peters and Vissers 2004). It stimulates transfer by scaffolding the learning process, by relating the game experience to real-life situations, and by enabling peer discussion about what skills and knowledge were learned from the game experience (Hsu and Wang 2010, Peters and Vissers 2004). The pentad can be used to achieve these goals. In addition, it can open the eyes to multiple and confronting perspectives. This is an important educational merit, because it can make people aware of their customization to familiar ways of knowing and seeing (Blakesley 2002. p. 10) and help them to understand that “every way of seeing is also a way of not seeing” (Burke 1935. p. 70).

Burke described humans as symbol-users that can approach the world either symbol-wise or symbol-foolish (1955. p. 260). Becoming symbol-wise then involves an integration of knowledge, skills, and attitudes in order to understand the “the momentous role that terminology plays in human thought and conduct” (Enoch 2004. p. 276). Somebody who is symbol-wise takes on a reflective attitude by studying all forms of persuasion, in order to “hesitate before making assessments, judgments, or moves to action” (Enoch 2004. p. 287). While Burke (1973) focused on criticism of literature and drama as a way to help students in becoming symbol-wise, he argued that the critics should “use all that there is to use” (p. 23).

1
2
3 In the digitalized world, this suggestion implies that video games should be considered as
4
5 well, because they clearly represent interesting cases of symbolic action.
6
7
8
9

10 In education, numerous calls have been made for stimulating a reflective approach to
11
12 media in general (Jenkins et al. 2006) and to video games in particular (Buckingham and Burn
13
14 2007; Hsu and Wang 2010). However, if teachers want to stimulate a video game wise
15
16 approach, they will need particular strategies – tools – for integrating such a reflective
17
18 perspective in teaching and learning (Hsu and Wang 2010). A pragmatic advantage of using
19
20 the pentad as such a tool is that it builds on something that most teachers and students are
21
22 already familiar with. Over the years, teachers have discussed events and analyzed mediated
23
24 messages using instruments such as the medieval *hexameter* (who, what, where, by what
25
26 means, why and when); and the *journalist's catechism*: who, what, when, where and how
27
28 (XXXXX et al. XXXX, Overington 1977). While this does not constitute a full-fledged
29
30 Burkean analysis on itself, teachers can use it as a foundation to familiarize students with the
31
32 concept of ratios and circumference.
33
34
35
36
37
38
39
40

41 Because studying games in education requires that the resulting knowledge, skills and
42
43 attitudes are transferrable to curriculum related issues, the concept of circumference is
44
45 extremely relevant to education. To stimulate transfer, the circumference of the pentadic
46
47 analysis can be shifted from the game scene to the real world scene in general, and to a
48
49 curriculum related scene in particular. Video games can be analyzed using Burke's pentad,
50
51 dedicating particular attention to the change in ratios when switching the circumference from
52
53 the game world to curriculum related fields. In the case of Bioshock for example, teachers
54
55 might ask students to explore other contexts in which there is a tension between purpose and
56
57
58
59
60

1
2
3 scene, and relate the incentives for action that are offered in the game to those in the real
4
5 world situations.
6
7
8
9

10 In future research the use of the pentad for analyzing video games will need to be
11 empirically examined, as more insight is needed in the specific attitudinal changes caused by
12 (the repeated use of the) pentad. For example, is the effect of pentadic analysis on students'
13 reflective stance temporarily or can it be consolidated? Only when there is enough evidence
14 that this attitudinal change is indeed attained, it can be argued that students have moved from
15 mere playing a game to critically examining it.
16
17
18
19
20
21
22
23
24
25
26
27
28

29 **6 Conclusions**

30
31
32
33 In this article, Kenneth Burke's theory and practice of dramatism, which is based on his early
34 work (e.g. Counter-Statement 1931), is suggested as a useful approach to video game
35 criticism. By analyzing a violent video game like Bioshock, which belongs to the same genre
36 as Doom (Id Software 1993) and Counter-Strike (Valve Software 1999), it became clear that
37 Burke dramatisitic pentad can serve as a tool for opening up video games to multiple, even
38 conflicting perspectives. Precisely because these conflicts are embraced in the analysis, the
39 pentad transcends a number of binary discussions within the field of video game criticism.
40
41 Moreover, by serving as an eye-opener, and by enabling discussion, argumentation and
42 debriefing, the pentad appears a useful tool for educational practice. Educators can introduce
43 pentadic video game analysis as a tool to help their students in becoming symbol-wise.
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

Acknowledgements

This study was supported by the XXXXX, as well as the XXXXX. The authors also want to express their gratitude towards prof. dr. XXXXX, prof. dr. XXXXX, and to the expert panel at the XXXXX for their insightful comments on the preliminary version of this research article.

References

- 2K Boston and 2K Australia, 2007. *Bioshock*. 2K Games.
- Aarseth, E., 2003. Playing research: methodological approaches to game analysis. *spilforskning.dk conference*, 28-29 August. W. Bo Kampmann.
- Blakesley, D., 2002. *The elements of dramatism*. New York: Longman Publishers.
- Bogost, I., 2007. *Persuasive games: the expressive power of videogames*. Cambridge: The MIT Press.
- Bogost, I., 2008. The rhetoric of video games. In: Salen, K. ed. *The ecology of games: connecting youth, games, and learning*. Cambridge, MA: The MIT Press, 117-140.
- Boone, G., 2008. *A Burkean analysis of "World of Warcraft": identity work in a virtual environment*. Doctoral dissertation. Villanova University.
- XXXXX, X., XXXX. XXXXX. *Semiosis as a foundational concept for education*, 17 October 2008 Ghent University, Belgium.
- Brummett, B., 2006. *Rhetoric in popular culture*. London: Sage Publications.
- Buckingham, D. and Burn, A., 2007. Game literacy in theory and practice. *Journal of Educational Multimedia and Hypermedia*, 16(3), 323-349.

- 1
2
3 Burke, K., 1935. *Permanence and change. an anatomy of purpose*. Berkley and Los Angeles:
4
5 University of California Press.
6
7
8 Burke, K., 1955. Linguistic approaches to problems of education. *In: HENRY, N. B. ed.*
9
10 *Modern philosophies and education. The fifty-fourth yearbook of the National Society*
11 *for the Study of Education, Part 1*. Chicago: University of Chicago Press, 259-303.
12
13
14
15 Burke, K., 1966. *Language as symbolic action*. Los Angeles: University of California Press.
16
17
18 Burke, K., 1969a. *A grammar of motives*. 2nd ed. Los Angeles: University of California Press.
19
20 Burke, K., 1969b. *A rhetoric of motives*. 2nd ed. Los Angeles: University of California Press.
21
22 Burke, K., 1973. *The philosophy of literary form*. 3rd ed. Los Angeles: University of
23
24 California Press.
25
26
27 Consalvo, M. and Dutton, N., 2006. Game analysis: developing a methodological toolkit for
28
29 the qualitative study of games *Game Studies: The International Journal of Computer*
30 *Game Research*, 6 (1).
31
32
33
34 Enoch, J., 2004. Becoming symbol-wise: Kenneth Burke's pedagogy of critical reflection.
35
36 *College Composition and Communication*, 56(2), 272-296.
37
38
39 Enos, T. and Brown, S., 1994. *Professing the New Rhetorics: a sourcebook*. New Jersey
40
41 Prentice Hall.
42
43
44 Foss, S. K., 2004. *Rhetorical criticism. Exploration & practice*. Illinois: Waveland press.
45
46
47 Gee, J. P., 2006. Why game studies now? Video games: a new art form. *Games and Culture*,
48
49 1(1), 58-61.
50
51
52 Gee, J. P., 2010. *New digital media and learning as an emerging area and "Worked*
53 *Examples" as one way forward*. Cambridge, MA: The MIT Press.
54
55
56 Gussfield, J. R., 1989. *Kenneth Burke. On symbols and society*. Chicago: The University of
57
58 Chicago Press.
59
60

- 1
2
3 Hocking, C., 2007. *Ludonarrative dissonance in Bioshock* [online]. Available from:
4
5 http://clicknothing.typepad.com/click_nothing/2007/10/ludonarrative-d.html
6
7 [Accessed 1 July 2010].
8
9
- 10 Hsu, H.-Y. and Wang, S.-K., 2010. Using gaming literacies to cultivate new literacies.
11
12 *Simulation & Gaming*, 41(3), 400-417.
13
- 14 Huizinga, J., 1938 [1952]. *Homo ludens. Proeve eener bepaling van het spel-element der*
15
16 *cultuur* Haarlem: Tjeenk Willink.
17
18
- 19 Id Software, 1993. *Doom*. Id Software.
20
- 21 Jenkins, H., *et al.*, 2006. *Confronting the challenges of participatory culture: media education for*
22
23 *the 21st century*. Available from: [http://digitalllearning.macfound.org/atf/cf/%7B7E45C7E0-](http://digitalllearning.macfound.org/atf/cf/%7B7E45C7E0-A3E0-4B89-AC9C-E807E1B0AE4E%7D/JENKINS_WHITE_PAPER.PDF)
24
25 [A3E0-4B89-AC9C-E807E1B0AE4E%7D/JENKINS_WHITE_PAPER.PDF](http://digitalllearning.macfound.org/atf/cf/%7B7E45C7E0-A3E0-4B89-AC9C-E807E1B0AE4E%7D/JENKINS_WHITE_PAPER.PDF) [Accessed 1 July 2010].
26
27
- 28 Kimberling, R. C., 1982. *Kenneth Burke's dramatism and popular arts*. Bowling Green, OH:
29
30 Bowling Green University Press.
31
32
- 33 Konzack, L., Computer game criticism: a method for computer game analysis. *Computer*
34
35 *Games and Digital Cultures Conference*, 2002, Tampere, 89-100.
36
37
- 38 Lederman, L. C., 1992. Guest editorial: After the game is over. *Simulation & Gaming*, 23(2),
39
40 143-144.
41
42
- 43 Malliet, S., 2006. Adapting the principles of ludology to the method of videogame content
44
45 analysis. *Game Studies. The International Journal of Computer Game Research*, 7(1).
46
47
- 48 Mayer, R., Mautone, P. and Prothero, W., 2002. Pictorial aids for learning by doing in a
49
50 multimedia geology simulation game. *Journal of Educational Psychology*, 94, 171-
51
52 183.
53
54
- 55 McAllister, K. S., 2004. *Game work. Language, power, and computer game culture*.
56
57 Tuscaloosa: The University of Alabama Press.
58
59
60

- 1
2
3 Overington, M. A., 1977. Kenneth Burke and the method of dramatism. *Theory and Society*,
4
5 4(1), 131-156.
6
7
8 Pelletier, C., 2005. Studying games in school: a framework for media education. *DiGRA 2005*
9
10 *conference: Changing views - worlds in play*, June 2005, University of Vancouver,
11
12 Vancouver.
13
14
15 Peters, V. and Vissers, G., 2004. A simple classification model for debriefing simulation
16
17 games. *Simulation & Gaming*, 35(1), 70-84.
18
19
20 XXXXX, X., XXXX. XXXXX. Doctoral dissertation. XXXXX.
21
22 XXXXX, X., XXXXX, X. and XXXXX, X., 2010. XXXXX. *British Journal of Social Work*,
23
24 XX(X), XXX-XXX.
25
26
27 Salen, K. and Zimmerman, E., 2004. *Rules of play. game design fundamentals*. Cambridge,
28
29 MA: The MIT Press.
30
31
32 Shields, M. J., 2009. *A pentadic analysis of tropico: dramatism and digital games*. Masters'
33
34 thesis. Oregon State University.
35
36
37 Tanenbaum, K. and Tanenbaum, J., 2010. Agency as commitment to meaning:
38
39 communicative competence in games. *Digital Creativity*, 21(1), 11-17.
40
41
42 Tavinor, G., 2009. Bioshock and the art of rapture. *Philosophy and Literature*, 33(1), 91-106.
43
44
45 Thompson, J., 2009. New media texts of WWII: Kenneth Burke's intersection with computer
46
47 culture. In: Ruggil, J., McAllister, K. and Chaney, J. R. eds. *The computer culture*
48
49 *reader*. Newcastle upon Tyne, UK: Cambridge Scholar's Press, 73-89.
50
51
52 Valve Software, 1999. *Counter-Strike*. Vivendi Universal.
53
54
55 Voorhees, G., 2009. The character of difference. procedurality, rhetoric, and roleplaying
56
57 games. *Game Studies. The International Journal of Computer Game Research*, 9(2).
58
59
60 Walz, S. P., 2005. Delightful identification & persuasion: towards an analytical and applied
rhetoric of digital games. In: McAllister, K. and Moeller, R. eds. *Works and days*.

1
2
3 *capitalizing on play: the politics of computer gaming*. 22(43/44). Indiana, PA: Indiana
4
5
6 University of Pennsylvania, 185-200.

7
8 Zelizer, V., 1985. *Pricing the priceless child: the changing social value of children*. New
9
10 York: Pinceton University Press.
11
12

13
14
15
16
17
18
19
20
21
22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48
49
50
51
52
53
54
55
56
57
58
59
60

For Peer Review Only