Empathy at Play: Embodying Posthuman Subjectivities in Gaming

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In this paper, we address the need for a posthuman account of the relationship between the avatar and player. We draw on a particular line of posthumanist theory associated closely with the work of Karen Barad, Rosi Braidotti and N. Katherine Hayles that suggests a constantly permeable, fluid and extended subjectivity, displacing the boundaries between human and other. In doing so, we propose a posthuman concept of empathy in gameplay, and we apply this concept to data from the first author's 18-month ethnographic fieldnotes of gameplay in the MMORPG *World of Warcraft*. Exploring this data through our analytic of posthuman empathy, we demonstrate the entanglement of avatar-player, machine-human relationship. We show how empathy allows us to understand this relationship as constantly negotiated and in process, producing visceral reactions in the intra-connected avatar-player subject, as well as moments of co-produced in-game action that require 'affective matching' between subjective and embodied experiences. We argue that this account of the avatar-player relationship extends research in game culture, providing a horizontal, non-hierarchical discussion of its most necessary interaction.

Keywords

Introduction

'Bricka's heart would skip a beat. Or was it mine? Does it matter?' (Sundén, 2012: 168).

In this paper, we provide an account of posthuman subjectivity through gameplay. Gameplay has always been

understood as having an immersive effect on the player (see Cairns et al., 2004 for review). Although the

empathetic interaction in the avatar-player assemblage has been explored by some (see Tronstad, 2011;

Belman and Flanagan, 2010; Smethurst, 2015 for examples) we believe a closer analysis of empathy could

deepen accounts of the subjective effects of gaming, especially when applied through a posthuman lens. Our

aim in providing such an account is to reveal how the avatar-human relationship is a subjectivity created

through an intra-active[i] relationship between subject and screen, where 'the screen looks back at the viewer

not only with ideologically specific images, but with its own eye or its own definition of visuality' (Clough,

2000: 56).

In demonstrating this posthuman empathy, we have taken insight from Sundén's (2012) research on

World of Warcraft. In her autoethnographic study, Sundén and her avatar, Bricka, form a romantic

relationship with another avatar, Slap. Sundén's (2012) analysis of this human-machine relationship explores

the interconnections between herself, her avatar, and the avatar of the other player, suggesting that the

relationship complicates notions of one body and one subjectivity, given the multiplicity of performers that

took part in the romance. Reflecting on her desire for the other avatar-player, Sundén (2012: 169) asks: '[w]as

it her, regardless of the game? Was it her through the game? Was it her through the orc woman and the ways

in which she moved and talked and somehow managed to reach out to me and touch something within me

through the screen?'. The mediation of digital romantic attachments through the psychical bodies that control

their movements means that spaces between subjectivities refuse clear separation between player and avatar:

'"Hi Jenny and Bricka! I smile. Slap grins. We flex our muscles"' (Sundén, 2012: 174).

Sundén's (2012: 177) own relationship to her avatar-self is described as '[p]art identification, part

desire'. Sundén explains her connection to Bricka as both an inseparable sameness and fascinated difference:

this incorporation being 'an intriguing part of game experiences' (2012: 177). Along with Sundén and others

(e.g. Filiciak, 2003; Gee, 2008), we also argue for a horizontal, intra-dependent avatar-gamer relationship:

what is new in our work is the alignment of this with posthuman theory (see for exception to this gap in the

scholarly literature Boulter (2015) on how gaming enacts and narrates posthuman themes). What is created

and hosted by the game is a particular example of posthuman subjectivity that blends the embodied

materiality of the gamer with the informational avatar.

Where the romantic relationship between avatar-player and another avatar-player might seem

remarkable, these experiences have become increasingly everyday. In the "networked society" personal lives

are increasingly co-constructed through technological interaction with a screen (McCarthy, 2001). Recent

approaches document the very embodied, emotional and connected meanings of technologically enabled

subjective experiences (Taylor, 2006). In game studies, for example, Filiciak (2003) notes how gameplay

actions shape subjectivity, and so constitutes an important part of their experience. He suggests these

connections bring us closer to new sets of interrelated subjectivities that are not bound in the same way by

traditional territories or industries (e.g. local villages or venues for consumption). Shinkle (2012) too notes

how interaction between player and screen creates a connection, not only of excitement and awe, but also

repetition, boredom, and frustration: for example, when the machine crashes or fails to load properly. Not

necessarily utopian or remarkable, such emotional accounts of digital culture demonstrate the capacity for

feelings of belonging (Ferreday, 2009), affective responses (Karatzogianni and Kuntsman, 2012) and

embodied, visceral ways of interacting with the screen (Hillis, 1999). However, although much research has

demonstrated the extensions of the body through an online, digital and networked society, few have drawn a

close conceptual link between gaming and posthuman subjectivity.

In this article, we contribute to recent empirical research that explores the application of posthuman

subjectivity to lived experiences. Using empathy as our analytical concept, we apply a posthuman reading to

fieldnotes produced during gameplay in *World of Warcraft*. Before doing so, we document our understanding

of posthuman subjectivity below, showing how this body of thought could develop understandings of the

relationship between gamer and avatar in gaming culture research.

The posthuman gamer

Posthuman subjectivity is a heavily contested term. Notions of posthuman subjectivity are not homogeneous,

nor easy to define, and a vast body of work has explored various "posthuman" accounts as a response to a

highly mediated twenty-first century and as evidence of a more substantial shift in the meaning of being. Of

these accounts, many have gained critical attention for proposing a version of disembodied, high-tech,

transcendental subjectivity. Borrowing heavily on codes from science-fiction, these accounts tend to lead to

non-human notions of "the posthuman" (see Herbrechter, 2013 for a genealogy of posthumanism and the

posthuman). Caricatured as either utopian, allowing us to overcome, for example, categories of age, gender,

class, race (e.g. Plant, 1997; Haraway, 1991), or dystopian, where the cyborg-self becomes inhuman and

emptied of feeling (e.g. Turkle, 2011), we suggest both exaggerations limit what the notion of 'posthuman

subjectivity' can do.

With this caveat in mind, we draw on a notion of "the posthuman" that posits new forms of subjectivity have been emerging in technologically mediated societies, which nevertheless only serve to highlight already existing forms of subjectivity that are not necessarily high-tech, disembodied, or historically recent (Braidotti, 2013; Hayles, 2006; Herbrechter, 2013). Instead, a view of subjectivity emerges that resists subjectivity as singular, unchanging and self-contained, rejecting ideas implicit in the concept of the liberal human subject (e.g. autonomy, self-determination and individualism). Although not explicitly associated with the posthuman, Blackman's (2012) account of 'immaterial bodies', for example, suggests understanding the self as constantly permeable. She provides examples of this permeability from early psychology, where suggestion, hypnosis and 'mental touch' trouble notions of separate, bounded bodies. In another example, crowd mentality represents a concept ripe for the interdependence of one body with another, and is clearly evident in a range of spaces, such as festivals, dance and clubbing spaces (Blackman, 2012; Thrift, 2008). The experience of these spaces is not of an individual, unified body, but is rather felt collectively and affectively.

From this viewpoint, Haraway (1991: 178) pointedly asks, '[w]hy should our bodies end at the skin, or include at best other beings encapsulated by skin', when subjectivity is defined so much by experiences that happen beyond the body. This is a not a refusal of the flesh: rather than *transcending* the body we instead *extend* our embodied awareness (Braidotti, 2013; Hayles, 1999). Contra accounts of posthuman subjectivity as anti- or dehumanising, we might instead posit a subjectivity whereby 'we are no less human than the first time an ancestor picked up a stick to extend an arm' (Tufekci, 2012: 34). Taking into account the further studies into affect, embodiment, and permeability, not to mention the different subjectivities that we inhabit, the idea of the "rational" and autonomous being becomes outdated, and hence a posthuman model that accommodates a more fluid understanding of "being" can be usefully employed. The singular subject is

replaced by the view of subjectivity as a flow and a fold, where our materialities are shaped by others in our environment, who may be both human and non-human.

As clear distinctions between self and other begin to collapse, we should also consider what Braidotti terms a "posthuman ethics". She states that the non-unitary subject includes 'an enlarged sense of inter-connection between self and others, by removing the obstacle of self-centred individualism' (Braidotti, 2013: 49-50). We do not want to propose a gaming exceptionalism, neither do we see it as a particular technological effect: however, gaming does provide a strong example where we see a 'relationship between organism and the machine' (Toffoletti, 2007: 2) that challenges any clear distinction between them and where posthuman subjectivity can emerge from the amalgamation of human and informational entities. As Boulter (2015: 2) points out, 'gaming enacts [...] a practical realization that the human is a fluid, dynamic, unstable, discontinuous entity. The digital game thus, in its radical critique of the idea of a transparent, unified self, becomes a site of interrogation and sustained philosophical analysis'. Gaming therefore might provide us with a good ground on which to ask, "what does posthuman subjectivity do?"

Game research has already recognised the effects of gameplay experiences. The concept of the cyborg as a metaphor of human-machine hybridity (Haraway, 1991) has been used extensively by game research to understand new subjective experiences enabled by the game. O'Riordan (2001), for example, explores her relationship with Lara Croft as one cyborg-subjectivity activated by human agency, and so moves us away from dystopian constructs of technological determinism. Drawing on the cyborg, research has also shown interconnections between real life and game life (e.g. Taylor, 2006), and technology and culture (Crogan and Kennedy, 2009). Research has paid attention to how gaming allows a heightened experience of the cyborg-body, through for example rumble packs and gameplay visuals (e.g. where the avatar's experience of blindness or blurred vision is re-presented on screen) (Lahti, 2003). Such research usefully demonstrates

the promise of the cyborg as mythical, showing how notions of the transcendental body overlook that we are still located in gender, class and race structures (Lahti, 2003).

The cyborg provides one way of understanding the self through gameplay. But for some, this approach positions the avatar as merely a vessel waiting for the player to inhabit, and not a relationship that flows both ways. O'Riordan's (2001) emphasis on human agency, for example, focuses too much on human capacity in the gaming relationship. Similarly, Farrow and Iacovides (2012: 5) state that '[w]e do not relate to bodies in virtual world… in the same way that we relate to our own corporeality… phenomena are experienced as representation, not as subjective experience'. Our understanding of gameplay is a counterpoint to such perspectives. Banks (2015), for example, has suggested that gaming research has assumed a parasocial relationship between player and avatar, where the avatar only exists for the psychological needs of the player. By contrast she proposes a social relationship exists, whereby gaming is a fully embodied, emotional and shared experience. We side with Banks' (2015) critique of avatar-gamer research, and attempt to move away from a one-directional hierarchical and wholly separate embodiment that moves from gamer to avatar. We do not suggest that we live in the body of a machine, but instead consider how a posthuman subjectivity is something that arises from a *mutual* reciprocation from entwined entities previously defined as distinct.

Gee (2008: 259) suggests that the avatar allows for a 'projection' of the player's own desires and intentions. However, Gee (2008) also suggests this is a two-way process, where the player also conforms to the desires and intentions of the game. Gaming thus becomes an exchange, allowing for negotiation between avatar and player. Tronstad (2011: 254) takes this further, suggesting that 'the capacities of the character and those of the player are experienced as being in perfect balance… The character now becomes an extension of the player while still being perceptible as a separate identity with which the player may identify through either embodied or imaginative empathy (or both)'. Taylor (2009) too explores gameplay as an assemblage, an

interrelationship between various components that flattens out hierarchies between player and avatar and where agency exists outside of any particular agent (see also Filiciak, 2003; Shinkle, 2012). A more seamless entanglement between avatar and player is proposed here, which opens spaces for thinking of the relationship between "human" and "machine". This, to us, comes closer to the kinds of posthuman subjectivity that we suggest is engendered by Sundén's (2012) research, allowing a romantic relationship that is neither completely embodied by avatar nor player.

Thus, posthuman subjectivity can be easily used to define gameplay, as a fluid, horizontal and relational experience between human and machine. But it does not explain what facilitates this subjectivity, especially if we understand posthuman subjectivity existing everywhere, as a general state of 'humanness' (Braidotti, 2013). Nor does the definition of gameplay as posthuman make sense of the very visceral emotions that take place, such that one avatar-player assemblage can fall in love during gameplay with another avatar-player. In this paper, we propose that a posthuman concept of empathy develops such thinking by opening up ways of analysing the posthuman condition and permitting a more horizontal relationship between avatar and player. We argue that empathy is a useful tool in exploring the connection with the non-physical other that is simultaneously imaginative, embodied and cognitive. Our understanding of empathy is intentionally fluid, where the binary between the cognitive and corporeal break down and the two intertwine.

That said, empathy is not an unproblematic concept to bring to posthuman analysis. Therefore we outline our concept of posthuman empathy below, before applying it to our data. In our analysis we demonstrate the usefulness of this concept through fieldnotes that reflect the embodied, emotional and permeable experiences of *World of Warcraft*. We conclude by suggesting that gaming research could further contemporary thinking on posthuman subjectivity by developing accounts of the constantly negotiated and

fluid intra-action between avatar and gamer. We believe that such a concept could have wider application in

game research, and for others interested in the relationship between the subject and the screen.

Methods

The data presented here is part of a broader 18-month immersion in *World of Warcraft*, with fieldnotes that

have been collected during the first author's gameplay. In the context of the broader project, the aim has not

been to explore the social aspects of the game (although social interactions, of course, do appear in the

fieldnotes). Instead the focus has been to explore experiences of gameplay as one instance of posthuman

subjectivity.

We have drawn on approaches that emphasise the researcher as both object and subject of study

(Ellis et al., 2010; Davies, 1999). In taking this approach we recognise the difficulties of using self-reflection

for research on posthuman subjectivity. If "the subject" is no longer located at the centre of experience, the

collection of fieldnotes, by contrast, suggests self-knowledge and self-mastery: it would mean the researcher

could think rationally about themselves enough to *write the self*. A similar claim could be made about theories

of affect: is it possible to collect fieldnotes about the pre-discursive and visceral? In addressing these claims,

we contend that fieldnotes are not in themselves a true reproduction of gameplay experience, nor could they

be: they are, like this article, constructed. They do however capture the sense of gameplay as 'a fully

embodied, sensuous, carnal activity' (Crick, 2011: 267) that we view as congruous with posthuman

subjectivity. We also maintain that the fieldnotes are not in themselves a demonstration of self-coherence and

bounded uniqueness, but are fragments, not least because collecting fieldnotes is messy and open to revision.

As with traditional ethnographic research, the data analysis has been a process of cycling: applying

and reapplying theory, and returning to the field to explore instances and themes in more depth (Van Maanen,

1988). Our analytic of empathy emerged when we recognised a theme concerning the connection between the

first author and her avatar, Etyme. In recognising this theme, we then took it back to the field, to think

through these experiences with our concept of posthuman empathy. Below we briefly explore our

understanding of posthuman empathy.

Posthuman empathy

A relatively recent shift in critical theory to notions of "affect" has emphasised the importance of empathy as

an emotional interaction with another. For Braidotti (2013: 78) empathy has the potential to encompass

posthuman ideals, through its capacity as a selfless quality and its focus on the emotional rather than the

"rational" being of humanism. However, we suggest that a *posthuman* empathy needs to be wary of the

problematic humanist traits that the term "empathy" might indicate. In the Merriam-Webster dictionary, for

instance, empathy is defined as 'the imaginative projection of a subjective state into an object so that the

object appears to be infused with it'. For us, this definition is insufficient, given that it proposes a one-

directional and hierarchical empathy. In her account, Coplan (2011: 5) suggests that common uses of

"empathy" have made definitions ambiguous, often co-existing with similar terms and states. With this in

mind, she aims to provide a clarification in terminology that is, as she terms it, 'conceptually cleaner'

(Coplan, 2011: 6). Informed by psychological and neuroscientific research, Coplan (2011: 5) defines empathy

as a 'complex imaginative process in which an observer simulates another person's situated psychological

state while maintaining clear self-other differentiation. To say that empathy is 'complex' is to say that it is

simultaneously a cognitive and affective process'.

Coplan's (2011) definition of empathy has been, for us, a useful starting point. We were interested in

understanding gameplay as an example of posthuman subjectivity, and such definitions are suggestive of a

notion of empathy that complicates simple mind/body dualisms by refusing the singularity of cognitive or affective processes. Equally, we were drawn to Coplan's (2011) definition of empathy given the centrality of imagination, which we recognised in our fieldnotes. And yet in another sense, Coplan (2011) states that empathy is a 'human-to-human' concept that requires 'simulating' the other's 'psychological state' but 'maintaining clear self-other differentiation'. This means that the empathic subject would remain distinct, maintaining the problematic discrepancies implicit with the concept of the unified, liberal human subject. Therefore, this use of the term "empathy" is one that we work both with and against throughout this paper.

Recognising empathy as an imperfect analytic tool, our definition of a *posthuman* empathy would include: a) recognising the empathetic capacity of others who are non-human, including the empathetic capacity of the avatar, which is in keeping with our discussion of posthuman subjectivity and b) acknowledging that such empathy only works through the network along a complex range of assemblages in multiple relationships with other actors (in this case avatar-gamer assemblages). We are not suggesting that the avatar is an empathetic subject with the capacity for imagination in and of itself. This capacity only exists intra-actively in relation to other parts of the assemblage, including the player-avatar one. A posthuman empathy would mean recognising that there is no primary subject, but that empathy is always already an interconnected network of dynamically intra-acting forces, or agencies. This aligns well with traditional concepts of empathy, where empathy can occur viscerally between subjects, while sympathy, for example, might be understood as more one-directional. It is also important to state that whilst empathy might be enhanced, we would disagree with claims that it is only "projected" – this would imply some degree of humanistic, conscious "control" over the empathy that is experienced. A posthuman empathy refutes such anthropocentric understandings, instead considering empathy as an affective, intra-active encounter.

The notion of more than one empathetic subject engenders our first criteria of posthuman empathy. Although research has explored our capacity to empathise with biological others (e.g. Rogers, 1975; Hoffman, 2000; Coplan and Goldie, 2011), our focus here is empathy between the material human-gamer and the pixelated technological avatar. This is a very specific other to share an empathetic relationship, and it should be noted that the following arguments are based on the avatar as a characterised, humanoid form – i.e. a "being" with 'human characteristics, identities, personality traits and personal history' (Martin, 2013: 318). Therefore, rather than simply viewing the avatar as only a "tool", we also perceive the avatar as 'capable of inducing empathy' (Martin 2013: 318).

As suggested above, our concept of empathy is not complete, fixed or static. Nor would we argue that the empathy we explore in this paper is limited to the avatar-gamer relationship. Context necessarily shapes the cognitive-affective construct of empathy - which we demonstrate with the example of the remote control. The television-remote-human assemblage could be easily understood as an extension of the human hand (in the McLuhan sense). However, a more complicated picture is required if we think of empathy as a decentred experience. The electrical current, the batteries in the remote, the sensors on the TV, and so on, would all need considering alongside the human hand, so that all are acting with empathy towards each other for the event (switching on the television) to take place, creating a different cognitive-affective relationship than the one in gameplay. This aligns with Bennett's (2010) analysis of the vibrant life of matter. Where different materialities have historically been understood as passive in their engagement with the world, Bennett (2010) proposes a vitalism where objects are able "to act": for example, in the above the electricity may blow, preventing that actant from engaging in the empathetic relationship that's needed for the TV to come on. Far from a naive, wholly intentional or conscious agent, objects nevertheless have an effect on the world, with both 'always perform an intricate dance with one another' (Bennett, 2010: 31). Considered in this

light, a posthuman empathy might include, in the case of gameplay, the gameplayer-neurons assemblage,

where 'the response of mirror neurons to the game's audio-visual information activates the player's motor

systems, recreating the conditions of the virtual world in the body' (Martin, 2013: 317-318). Our argument

isn't that empathy exists between the avatar and player. Rather, an empathetic relation emerges through the

avatar-player assemblage.

In exploring empathy as avatar-player, we take up Sundén's (2012) position of inseparable sameness

and fascinated difference, but view this as a horizontal relationship, where both avatar and player coexist. On

occasion, empathy is experienced as complete incorporation. This is seen in our data when the self/avatar

become inseparable, with I/Etyme being used interchangeably. But at other times the "I" makes observations

about Etyme, and vice versa. For example, in an equal and opposite way, Etyme responds when the keys are

pressed; and yet elsewhere she separates from the player by complaining that there's "nothing to target", or

proclaiming "I'm not ready". In total incorporation, we might not find these effects. But if we understand

empathy as a posthuman affect, we can read it as distributed, meaning that empathy is no longer a concept to

explain "putting ourselves in someone else's shoes" only to return to the "safety" of our own bodies. Empathy

instead demonstrates how humans and non-humans are intertwined through their ability to affect and be

affected by circumstances, environments, and feelings (Bennett, 2010). Likewise, our understanding of the

avatar as active, agentic, and empathic recognises the vibrancy of non-human agency.

We use this concept of posthuman empathy below. In the first section of the analysis, we explore

how a posthuman empathy creates moments of embodied experience, which appear to take place almost-

instinctively. Our second section describes how these empathetic relations are connected to others within the

gaming environment. Finally, we suggest that this concept of posthuman empathy can be put to use when

understanding the avatar-gamer relationship, where the interaction between self and machine is more than

incorporation of body and subjectivity. Where Sundén's (2012) work has shown how the player empathises

with another player through the body of the avatar, we aim to take empathy further, through the empathetic

relationship that is generated by the avatar-player assemblage.

Empathy as embodied experience

Empathy can be broadly understood as an affective response to what another is experiencing. In gaming this

is often an immersive act: the avatar body becomes what we navigate the world through. It is therefore felt not

only to be an object of perception, but also a means of perception (Martin, 2013) that involves an empathetic

relationship where our eyes, for example, see through the avatar, but where equally the avatar sees through us

(Clough, 2000). An instance of this would be how the avatar's position in gameplay highlights the potentials

in the gameworld landscape that are interactive (e.g. objects, avatars, NPCs) and "sees" the value and

prospects that engagement with the interactive elements of the game could provide. Put simply, the player

cannot act on or progress in the game without the avatar, but neither can the avatar do so without the player.

The visual field is therefore intra-dependent, opening up the complexity and heterogeneity of the perceptual

and agential circuits through which posthuman subjectivity is experienced.[ii] Similarly, when the gaming

environment or monsters (known as "mobs") affect the avatar body, our "human" bodies affected along those

channels of feeling: '[a]s any player knows, the rush you get from a good game is not confined to the space of

the screen; it is a subrational, bodily thing as well' (Shinkle, 2005: 22).

In our data, for example, the extract below captures a sense of the interconnectedness of the gamer-

avatar's embodied experience. Empathy emerges at the most instinctive of "human" acts: holding your breath

underwater.

I'm completing a quest underwater, diving for relics in a deep, wide lake. I'm absorbed in my task, deep beneath the water where the colours and sounds are dulled and I am lulled into that ethereal state of being. Etyme's air supply seems ample – until suddenly it doesn't and I am forced to ascend. I begin to worry when I don't break the surface – I hadn't realised I was so deep. I need to get Etyme to the surface and I find myself holding my own breath, a worried look adorning my face as I watch the air supply dwindle and watch her body rise… I make it, and breathe again[iii].

In this extract, the avatar was experienced through a visceral reaction in the body of the gamer. We could make sense of this embodied empathy in two ways. One way we can analyse this form of empathy would be through Blackman's (2012: 82) description of affect as nonconscious mimicry or 'attunement', which is 'not about conscious recognition but about forms of bodily affectivity'. When one human smiles at another, the "instinct" is to smile back; likewise, in gameplay Etyme's experience of being underwater is enacted through mimicry on the body of the gameplayer. The avatar-gamer relationship creates the space to react in ways that are not only imitation, but happen beyond conscious recognition. More than this, the gamer's experience is one of being underwater - *I'm absorbed in my task, deep beneath the water* - while re-emerging similarly engenders a shared avatar-human reaction - *I make it, and breathe again.*

A second way we could explain the complex forms of empathy at play when the avatar-player extend into one another is Coplan's (2011) 'affective matching', which she lists as an essential feature of empathy. In Coplan's (2011: 7) definition, 'this matching must come about in a particular way, namely through other-oriented perspective-taking', where perspective-taking is more than nonconscious mimicry, so that emotional contagion alone does not constitute empathy. Instead, 'affective matching occurs only if an observer's

affective states are qualitatively identical to a target's […] The observer must therefore experience the same

type of emotion (or affect) as the target' (Coplan, 2011: 6). She continues:

> One of the key differences between emotional contagion and empathy is that contagion is a direct,
>
> automatic, unmediated process. Empathy is never fully unmediated since it requires perspective-
>
> taking. Roughly, perspective-taking is an imaginative process through which one constructs another
>
> person's subjective experience by simulating the experience of being in the other's situation (Coplan,
>
> 2011: 9)

Gameplay empathy, by its nature, is never unmediated. And although the fieldnotes certainly demonstrate

instances of emotional contagion, such that there is automatic imitation of one another in the avatar-gamer

relationship, we argue that the extract above demonstrates more than this. Holding one's breath is instinctive;

but in this instance there is also concern and panic. In the empathetic intertwining of embodied, affective and

cognitive, such fieldnotes demonstrate a reaction to the situation, including recognition of what the

consequence of the immediate danger is: for instance, drowning. We expand on how this perspective-taking is

facilitated through the game below. In this extract, empathy emerges directly through the mechanics of the

game, which produces an embodied reaction in the avatar that directly affects the player.

> *I am "disorientated" – this is both a spell that hits me and an actual feeling! The disorientation spell*
>
> *forces the person hit with it to run off in the wrong direction, changing suddenly at a tangent, and*
>
> *then again, and again. It is a brilliant "spell" for the fact that it is subjectively experienced exactly*

as intended - it is completely disorientating and I'm totally thrown by it, having no idea where I have

ended up when the spell is over.

As we have discussed above, empathy is more than the impulse to repeat, but is a deeply felt perspective-taking that produces affective reactions and extends the feeling of self. In the above, this shared perspective between Poppy and Etyme is enhanced by a sudden change during gameplay.

The "disorientation spell" creates a seamless experience between player and avatar, whereby one, the avatar, physically reacts to it, and the other, the player, feels it. The account given refutes traditional boundaries between player and avatar and the lines between physical reaction and the feeling of disorientation intermingle, shaping the holistic experience of the disorientation spell. We could take this analysis even further: while we cannot ever know what Etyme *feels*, this is true of all other human and non-human objects. At the very least, the intra-action between avatar and player demonstrates a distributed empathy, whereby the body has the capacity to affect and to be affected, so that both have a vibrancy that deems the relationship between the two horizontal, non-hierarchical and heterogeneous (Bennett, 2010).

Reading the concept of empathy through Coplan's (2011) notion of 'affective matching' and Blackman's (2012) nonconscious mimicry, we would argue that the embodiment of gameplay represented by the extracts above is a *post*-biological one: 'both organic and inorganic, living and non-living, material and immaterial' (Blackman, 2012: 13-14). This takes gameplay beyond the view of the avatar as a tool.

Empathetic connections in pride, skill and achievement

I realise I feel really proud of these achievements, like me and Etyme have become a more

formidable team, working together and eliminating our foes.

The empathetic relationship, however, goes beyond moments of shock or bodily affect, but is also produced

through a cognitive matching. In the note above, distributed cognition experienced by the gamer becomes

clear (e.g. "me and Etyme") and the empathetic direction less so. Is the player experiencing empathy for the

avatar's achievement, or vice versa? Just as Boulter (2015: 65) asks, 'who is playing? Who is *being* played?',

we could ask: who is achieving? Who is being achieved? The sense of achievement is distributed, and the

source of either achievement or rightful "ownership" of the achievement is unclear, becoming in "human"

terms an example of "good teamwork".

Therefore, in addition to empathy facilitating the experience of an extended body, the narrative of the

game also elicits emotional responses that engender imaginative empathy, especially in the shared

experiences of the avatar-human as the two co-develop. Although "imaginative" might suggest these

empathetic connections are fictional, we would argue that a posthuman empathy would not require a

distinction between the "real" and the "imagined". The broad field of posthumanism has already identified the

problems that occur from creating or enforcing binary positions such as machine/human, real/virtual,

man/woman to name but a few, and to consider gaming as an experience outside of "real life" ignores it as a

situated, embodied practice.[iv] In gaming, the emotional reactions that empathy provokes are experientially

real, although admittedly with less longevity or consequence than some out-of-game scenarios.

As with our above analysis of shared embodiment, this imaginative empathy between avatar-player

can at first occur as affective embodied reactions to events in ways that demonstrate the interconnections

between mind, body and cognition. The extract below retells a moment where Poppy and Etyme experienced something unexpected, which challenges their concept of skill and provokes a desire for retribution.

> *I round a corner at one point, climbing a tower, and suddenly encounter a mob which, for one reason or another, I wasn't expecting. "Whoa, fuck!" I involuntarily gasp, my heart lurches and I quickly scramble to regain equilibrium and kill off the offending mob. It is unlikely that it would actually succeed in killing me but there is a particular kind of vengeance I feel towards it for having taken me by surprise and I dispatch it quickly - in my mind brutally. It panicked me, disrupting my equilibrium and shaking me from my perceived skill and feeling of prowess. I take a moment, and vow to be more diligent as I scrutinise the remaining enemies below. I drop down on them from above, and unleash my anger in efficient blows.*

In the above, we see a similar pattern emerging, where a seamless and nonconscious reaction to the game produces a visceral affective response – *"Whoa, fuck!"*. In addition, however, there is also an imaginative, emotional engagement with the game, which cannot be reduced to the body alone. Instead cognitive and affective experiences expand embodied awareness through their different operations (Braidotti, 2013; Hayles, 1999). Here, for example, the avatar-player reaction to this moment of gameplay produces an emotive reaction, retold as vengeance, pride and anger. The perception of anger being unleashed in "efficient blows" seems to indicate a projected empathy from the part of the avatar, responding to the anger of the player and externalising it through action. Part of these emotions are facilitated by the affordances of MMORPGs, which enable both player vs. environment and player vs. player gameplay, meaning that the experiences of the game are in some way mediated by the existence of other avatar or avatar-player bodies. The further denomination

of these "others" as either Alliance or Horde creates a social context through which various power relations are shaped (Chen, 2009; Williams et al., 2006). Recognition of the avatar-player self, expressed above as being skilled, having "prowess" and an ability to land "efficient blows", means that, like all forms of subjectivity, self-awareness is formed through recognition (and misrecognition) of the self as separate to others (both human and non-human), thereby imagining these others to also have self-awareness.

Emotions during gameplay are therefore not asocial or individual, but are entangled with in-game objects. For us, the emotional entanglement of avatar-player has been most evident in fieldnotes collected during player vs. player scenarios and battlegrounds. Emerging as events that occur when Alliance and Horde factions meet, battlegrounds facilitate empathetic relations to emerge between avatar-player and other avatar-players, and encourages the feeling that gameplay has a real, meaningful impact on the environment.

I enjoy the sense of achievement which I get in battlegrounds, as it makes your proficiency public. It's basically an opportunity to show off, highlighting how much of a performance it is as it serves as an opportunity to display to others how skilful you are, how good you look. You are rewarded by conquering your foes and collecting on the achievement points, ultimately winning the battle. At the end of each battleground the achievements for each player are displayed, further accentuating this public moment of glory - or failure.

***

There is such a level of pent up excitement on these battlegrounds, and even when you spend much of your time dead (as I do) this is made more obvious through the forced procedure of waiting the

allotted amount of time before you can resurrect and get back to the fight. At one point I engage in

one-on-one combat with another hunter: we both circle each other slowly, our awareness of the

space reduced to that which flows between us and ignoring all of the other players who flow around

us. Our ranged attack on each other is interrupted by the end of the battleground.

Above, the first author recounts the emotions of pride, excitement, glory and impatience in gameplay, which

are again coupled with affective embodied reactions such the temporal feeling of time passing when waiting

to "resurrect", or in losing spatial awareness and getting lost in the moment. Unlike earlier extracts from the

fieldnotes, the narrative retelling often appears without "Etyme", with both avatar and player becoming "I"

and the events within gameplay affecting this "I". This has already been noted by Hand (2005: 215) as an

element of gaming-language that 'reveals how the multiple dialects – external versus internal, objective

versus subjective, active versus passive and so on – are complicated in the worlds of performance and

gaming'. Moreover, the former extract also demonstrates the potential emotional payoffs within social

interaction. The empathetic connection between avatar-player are so intertwined as to create another form of

empathy, where the avatar-player joins into the assemblage of other avatar-players. We would suggest that in

this interaction there is a continuous affective flow, where the avatar-player are not only one posthuman

subjectivity, but are actively affective and affecting other objects (including other avatar-players) in their

environment, creating a vast network of posthuman subjectivities.

Human-non-human

We have argued gameplay empathy creates a range of posthuman subjectivities by shaping cognitive and

affective extensions of the avatar-player assemblage and emotional perspective-taking with other players. The

avatar-player subject is integral: they feel together through the body, while the existence of other feeling

avatar-players means that this posthuman embodiment is shared, distributed and connected, creating the space

for emotions such as pride, skill and achievement. We suggest this is both a conscious and nonconscious

extension in a human-machine world that has co-evolved (Hayles, 2006), and that the two "objects" - avatar

and human - are inseparable subjects. In our fieldnotes, this is provoked when empathy entwines one subject

with another through the very human fear of death:

> *Etyme falls from a great height and I gasp. It is completely involuntary, I am in that moment, her,*
>
> *falling, perhaps to her/my death. It is a ridiculous concept because even if Etyme were to die I would*
>
> *be fine, and it would take just moments to run my spirit through the graveyard to find her body and*
>
> *resurrect. Note the my/her complications. The boundaries are blurred. She is not me but she is not*
>
> *not-me. Just as Daboo (2007: 264 and 271) notes as actors create characters who they 'both are-*
>
> *and-are-not [...] It is both me-and-not-me at the same time'.*

Although the gamer is in no danger, the perceived threat against the avatar is felt empathetically through the

holding of a breath, a gasp, a "lurch" in the heart. Such instances demonstrate the displacement of boundaries,

where gamer-avatar are experienced as enmeshed, because they put into practice the fundamental fear of

impermanence. Such experience allows for a body-subject that operates with and through technical extensions

and enables a flow of bodily being whereby:

> The term 'body' is usually replaced by the concept of body-subject […] which displaces a mind-
>
> body dualism but does not reduce bodies to material (physiological, neurological, biological)

processes. The incorporations enacted by a body-subject include technical, material extensions which

articulate the body in new ways. (Blackman, 2012: 9)

We would take Blackman's (2012) suggestion of the body-subject further, and would argue that empathy

allows for a state that is neither wholly about distributed embodiments nor distributed emotions, but a concept

that allows for the dynamic interaction between the two: an 'ontological inseparability of agentially intra-

acting components' (Barad, 2007: 33). In Poppy's own self-reflections on gameplay, this dynamic also means

that to be *both me-and-not-me* involves something more than becoming Etyme, demonstrating that posthuman

subjectivity is not only about living in the body of the machine. Etyme herself is a necessary part of this

empathetic relationship. At times, Etyme dying can be experienced as the player dying (or provoking the fear

of death); at other times, gameplay can feel like a negotiation (or even struggle) between two separate-but-

connected subjects. By refusing the boundary between human and non-human and rethinking this relationship

as one which is in a constant state of becoming, we can conceptualise the avatar differently, capable of an

affective exchange with the gamer, and creating resonance between avatar and gamer.

Conclusion

As suggested, much theoretical work has been carried out with a view to describing subjectivity as

"posthuman" through the relation of the human to, variously, the animal, the machine or the environment. In

this paper, we specifically considered one example of posthuman subjectivity engendered by the techno-

informational aspects in the game world. Whilst the incorporation of machinic elements are not always

necessary to posthuman subjectivity and other domains of experience could also be defined as posthuman, we

have nevertheless used this example to illuminate the ways in which an intra-dependence between

traditionally separate elements can form a non-hierarchical assemblage.

Our deployment of empathy, we would argue, also moves concepts of posthuman subjectivity

beyond an account of what the subject is, and allows us to provide a methodological framework from which

to provide an empirical analysis of posthuman intra-active subjectivity. Our concept of a posthuman empathy

is decentralized: it is not "owned" by either player or avatar/game but rather emerges out of their relation in

the process of playing the game. We have explored how the empathetic relationship between avatar-player

actively makes problematic any clear distinctions between human and machine. We have deployed the use of

empathy in a more fluid understanding of the experience, expanding the concept to include an

acknowledgement of the empathetic capacity of the avatar in an assemblage and a rhizomatic understanding

of the different agencies at play. Our "posthuman empathy" blends the principles of posthumanism (e.g. in a

post-anthropocentric acknowledgement of the permeability of beings) with the principles of empathy (e.g. a

dynamic interaction of cognitive and affective responses).

In this respect, the idea of "the posthuman" does not need to elicit fear of the change in "the human",

but rather celebrates the prevalence of the emotional, embodied and permeable throughout different contexts.

For example, in our analysis, the relationship between Poppy and Etyme is one of care, concern and

connection, despite the avatar's pixelated, technological form. Such avatar-human relationships are testament

to the deep intra-connections between human and machine. Our empathetic relationship with the avatar is

indicative of the very real experience of being (always already) connected with others, in ways that do not

fight for dominance of human over machine but accept the equality of both player and avatar: a principle

central to posthuman ethics (e.g. Braidotti, 2013; Bennett, 2010). What emerges is 'a more relational ontology

that explores how entities emerge from intra-actions consisting of human and non-human agencies'
(Blackman, 2012: 174).

The shifting flows between self and other are complex yet easily apparent in the fieldnotes – for
example in the switches between "I", "we" and "Etyme". The relationship is a continuous negotiation
between the avatar and player, as the desires of one cannot be achieved without the actions of another, so that
each part must be receptive to the goals of the other. This empathy is further facilitated by the game
mechanics which constantly seek to bring the avatar and player together and allow a spectrum of feelings to
proliferate, demonstrated above through feelings from disorientation to pride. Connecting with the avatar
demands an emotional and embodied connection in order to succeed at the game, and using empathy we have
been able to acknowledge these particular moments in order to demonstrate the intra-dependence at the centre
of avatar-gamer relationships.

Empathy has therefore been used as one analytic for how posthuman subjectivity has arisen from/out
of the relationship between the player and avatar in *World of Warcraft*. We have demonstrated how empathy
helps to conceptualise the connection between a human and non-human other, in a way that shares
perspectives and bodies along channels of affective feeling. The experience is one that shows how human and
machine are undeniably fused, retaining emotional and embodied feelings in a permeable way. As such we
have shown how "being posthuman" is as complex as being "human" ever was.

Notes

[i] We take inspiration from Barad's (2007: 33) concept, where 'in contrast to the usual "interaction," which
assumes that there are separate individual agencies that precede their interaction, the notion of intra-action
recognizes that distinct agencies do not precede, but rather emerge through, their intra-action'.

[iii] See Wilde, 2015 for more examples of the data.

[iv] Additionally, in the traditional sciences, empathy itself has been shown to make use of the same neuronal pathways, regardless of whether the events are 'fictional' or 'real life' (Kemp, 2012: xviii), so that the biological body empathetically reacts in chemically similar ways to characters in books and films as it would to another material body.

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Empathy at play: Embodying posthuman subjectivities in gaming.

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Abstract

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In this paper, we address the need for a posthuman account ofin the relationship between the avatar and player. We draw on a particular line of thought in posthumanist theory associated closely with the work of Karen Barad, Rosi Braidotti and N. Katherine Hayles that suggests a constantly permeable, fluid and extended subjectivity, displacingwhich blurs the boundaries between human and othernon-human. In doing so, we propose a posthuman concept of empathy in gameplay, and we apply this concept to data from the first author's 18-month ethnographic fieldnotes of gameplay in the MMORPG *World of Warcraft*. Exploring this data through our analytic of posthuman empathy, we demonstrate the entanglementinterdependence of the avatar-player, machine-human relationship. We show how empathy allows us to understand this relationship as constantly negotiated and in process, producing visceral reactions in the intra-connectedinterconnected avatar-player subject, as well as moments of co-produced in-game action that require 'affective matching' between subjective and embodied experiences. We argue that this account of the avatar-player relationship extends research in game culture, by providing a horizontal, non-hierarchical discussion of its most necessary interaction.

Introduction

'Bricka's heart would skip a beat. Or was it mine? Does it matter?' (Sundén, 2012: 168).

In this paper, we provide an account of posthuman subjectivity through gameplay. Gameplay has always been understood as having ~~an~~a ~~particular~~ immersive effect on the player (see Cairns et al., 2004 for review). Although the empathetic interaction in the avatar-player assemblage has been explored by some (see Tronstad, 2011; Belman and Flanagan, 2010; Smethurst, 2015 for examples) we believe a closer analysis of empathy could deepen accounts of the subjective effects of gaming, especially when applied through a posthuman lens. Our aim in providing such an account is to reveal how the avatar-human relationship is a subjectivity created through an intra-active[i] relationship~~interdependence~~ between subject and screen, where 'the screen looks back at the viewer not only with ideologically specific images, but with its own eye or its own definition of visuality' (Clough, 2000: 56).

In demonstrating this posthuman empathy, we have taken insight from Sundén's (2012) research on *World of Warcraft*. In her autoethnographic study, Sundén and her avatar, Bricka, form a romantic relationship with another avatar, Slap. Sundén's (2012) analysis of this human-machine relationship explores the interconnections between herself, her avatar, and the avatar of the other player, suggesting that the relationship complicates notions of one body and one subjectivity, given the multiplicity of performers~~, both human and nonhuman,~~ that took part in the romance. Reflecting on her desire for the other avatar-player, Sundén (2012: 169) asks: '[w]as it her, regardless of the game? Was it her through the game? Was it her

through the orc woman and the ways in which she moved and talked and somehow managed to reach out to me and touch something within me through the screen?'. The mediation of digital romantic attachments through the psychical bodies that control their movements means that spaces between subjectivities refuse clear separation between player and avatar: '"Hi Jenny and Bricka! I smile. Slap grins. We flex our muscles"' (Sundén, 2012: 174).

Sundén's (2012: 177) own relationship to her avatar-self is described as '[p]art identification, part desire'. Sundén (2012: 177) explains her connection to Bricka as both an inseparable sameness and fascinated difference: this incorporation being 'an intriguing part of game experiences' (2012: 177). Along with Sundén (2012) and others (e.g. Filiciak, 2003; Gee, 2008), we also argue for a horizontal, intra-dependent interdependent relationship in avatar-gamer relationshipinteraction: what is new in our work is the alignment of this with posthuman theory (see for exception to this gap in the scholarly literature Boulter (, 2015) on how gaming enacts and narrates posthuman themes). What is created and hosted by the game is a particular example of posthuman subjectivity that blends the embodied materiality of the gamer with the informational avatar.

Where the romantic relationship between avatar-player and another avatar-player might seem remarkable, these experiences have become increasingly everyday. In the "networked society" personal lives are increasingly co-constructed through technological interaction with a screen (McCarthy, 2001). Recent approaches document the very embodied, emotional and connected meanings of technologically enabled subjective experiences (Taylor, 2006). In game studies, for example, Filiciak (2003) notes how gameplay actions shape subjectivityhave a real effect on the subject, and so constitutes an important part of their experience. He suggests these connections bring us closer to new sets of interrelated subjectivities that are not bound in the same way by traditional territories or industries (e.g. local villages or venues for consumption).

Shinkle (2012) too notes how interaction between player and screen creates a connection, not only of excitement and awe, but also repetition, boredom, and frustration: for example, when the machine crashes or fails to load properly. Not necessarily utopian or remarkable, such emotional accounts of digital culture demonstrate the capacity for feelings of belonging (Ferreday, 2009), affective responses (Karatzogianni and Kuntsman, 2012) and embodied, visceral ways of interacting with the screen (Hillis, 1999). However, although much research has demonstrated the extensions of the body through an online, digital and networked society, few have drawn a close conceptual link between gaming and posthuman subjectivity.

In this article, we contribute to recent empirical research that explores the application of posthuman subjectivity to ~~real~~ lived experiences. Using empathy as our ~~main~~ analytical concept, we apply a posthuman reading to fieldnotes produced during gameplay in *World of Warcraft*. Before doing so, we document our understanding of posthuman subjectivity below, showing how this body of thought could develop understandings of the relationship between gamer and avatar in gaming culture research.

The posthuman gamer

Posthuman subjectivity is a heavily contested term. Notions of posthuman subjectivity are not homogeneous, nor easy to define, and a vast body of work has explored various "posthuman" accounts as a response to a highly mediated twenty-first century and as evidence of a more substantial shift in the meaning of being. Of these accounts, many have gained critical attention for proposing a version of disembodied, high-tech, transcendental subjectivity. Borrowing heavily on codes from science-fiction, these accounts tend to lead to non-human notions of "the posthuman" (see Herbrechter, 2013 for a genealogy of posthumanism and the posthuman). Caricatured as either utopian, allowing us to overcome, for example, categories of age, gender, class, race (e.g. Plant, 1997; Haraway, 1991), or dystopian, where the ~~non-human~~ cyborg-self becomes

inhuman and emptied of feeling (e.g. Turkle, 2011), we suggest both exaggerations limit what the notion of 'posthuman subjectivity' can do.

With this caveat in mind, we draw on a notion of "the posthuman" that posits new forms of subjectivity have been emerging in technologically mediated societies, which nevertheless only serve to highlight already existing forms of subjectivity that are notneither necessarily high-tech, nor disembodied, or historically recent (Braidotti, 2013; Hayles, 2006; Herbrechter, 2013). Instead, a view of subjectivity emerges that resists subjectivity as is not singular, unchanging andor self-contained, rejectingand so rejects ideas implicit in the concept of the liberal human subject (e.g. autonomy, self-determination and individualism). Although not explicitly associated with the posthuman, Blackman's (2012) account of 'immaterial bodies', for example, suggests understanding the self as constantly permeable. She provides examples of this permeability from early psychology, where suggestion, hypnosis and 'mental touch' trouble notions of separate, bounded bodies. In another example, crowd mentality represents a concept ripe for the interdependence of one body with another, and is clearly evident in a range of spaces, such as at festivals, dance and clubbing spaces (Blackman, 2012; Thrift, 2008). The experience of these spaces is not of an individual, unified body, but is rather feltexperienced collectively and affectively.

From this viewpoint, Haraway (1991: 178) pointedly asks. '[w]hy should our bodies end at the skin, or include at best other beings encapsulated by skin', when subjectivity is defined so much by experiences that happen beyond the body. This is a not a refusal of the flesh: rather than *transcending* the body we instead *extend* our embodied awareness (Braidotti, 2013; Hayles, 1999). Contra accounts of posthuman subjectivity as anti- or dehumanising, we might instead posit a subjectivity whereby 'we are no less human than the first time an ancestor picked up a stick to extend an arm' (Tufekci, 2012: 34). Taking into account the further studies into affect, embodiment, and permeability, not to mention the different subjectivities that we inhabit,

the idea of the "rational" and autonomous being becomes outdated, and hence a posthuman model that

accommodates a more fluid understanding of "being" can be usefully employed. The singular subject is

replaced by the view of subjectivity as a flow and a fold, where our materialities are shaped by others in our

environment, who may be both human and non-human.

As the clear distinctions between self and other begin to collapse, we should also consider what

Braidotti terms a "posthuman ethics". She states that the non-unitary subject includes 'an enlarged sense of

inter-connection between self and others, including the non-human or "earth" others, by removing the

obstacle of self-centred individualism' (Braidotti, 2013: 49-50). We do not want to propose a gaming

exceptionalism, neither do we see it as a particular technological effect: however, gaming does provide a

strong example where we see a 'relationship between organism and the machine' (Toffoletti, 2007: 2) that

challenges any clear distinction between them and where posthuman subjectivity can emerge from the

amalgamation of human and informationalnon-human entities. As Boulter (2015: 2) points out, 'gaming

enacts [...] a practical realization that the human is a fluid, dynamic, unstable, discontinuous entity. The digital

game thus, in its radical critique of the idea of a transparent, unified self, becomes a site of interrogation and

sustained philosophical analysis'. Gaming therefore might provide us with a good ground on which to ask the

question, "what does posthuman subjectivity do?"

Game Gaming culture research has already recognised the subjective effects of gameplay

experiences. The concept of the cyborg as a metaphor of human-machine hybridity (Haraway, 1991) has been

used extensively used by game research to understand new subjective experiences enabled by the game.

O'Riordan (2001), for example, explores her relationship with Lara Croft as one cyborg-subjectivity activated

by human agency, and so moves us away from dystopian constructs of technological determinism. Drawing

on the cyborg, research has also shown interconnections between real life and game life (e.g. Taylor, 2006).)

and technology and culture (Crogan and Kennedy, 2009). Research has paid attention to how gaming~~the way the game~~ allows a heightened experience of the cyborg-body, through for example rumble packs and ~~the~~ gameplay visuals (e.g. where the avatar's experience of blindness or blurred vision is re-presented on screen) (Lahti, 2003). Such research usefully demonstrates the promise of the cyborg as~~is~~ mythical, showing how notions of the transcendental body overlook that we are still located in gender, class and race structures (Lahti, 2003).

The cyborg provides one way of understanding~~is helpful in recognising~~ the ~~temporality of the extension of~~ self through gameplay. But for some, this ~~is an~~ approach positions~~whereby~~ the avatar as~~is~~ merely a vessel waiting for the player to inhabit, and not a relationship that flows both ways. O'Riordan's (2001) emphasis on human agency, for example, focuses too much on human capacity in the gaming relationship. Similarly, Farrow and Iacovides (2012: 5) state that '[w]e do not relate to bodies in virtual world… in the same way that we relate to our own corporeality… phenomena are experienced as representation, not as subjective experience'. Our understanding of gameplay is a counterpoint to such perspectives. Banks (2015), for example, has suggested that gaming research has assumed a parasocial relationship between player and avatar, where the avatar only exists for the psychological needs of the player. By contrast she proposes a social relationship exists, whereby gaming is a fully embodied, emotional and shared experience. We side with Banks' (2015) critique of avatar-gamer research, and attempt to move away from a one-directional hierarchical and wholly separate embodiment that moves from gamer to avatar. We do not suggest that we live in the body of a machine, but instead consider how a posthuman subjectivity is something that arises from a *mutual* reciprocation from entwined entities previously defined as distinct.

Gee (2008: 259) suggests that the avatar allows for a 'projection' of the player's own desires and intentions. However, Gee (2008) also suggests this is a two-way process, where the player also conforms to

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the desires and intentions of the game. Gaming thus becomes an exchange, allowing for negotiation between

avatar and player. Tronstad (2011: 254) takes this further, suggesting that 'the capacities of the character and

those of the player are experienced as being in perfect balance… The character now becomes an extension of

the player while still being perceptible as a separate identity with which the player may identify through either

embodied or imaginative empathy (or both)'. Taylor (2009) too explores gameplay as an assemblage, an

interrelationship between various components that flattens out hierarchies between player and avatar and

where agency exists outside of any particular agent (see also Filiciak, 2003; Shinkle, 2012). A more seamless

entanglementinteraction between avatar and player is proposed here, which opens spaces for thinking of the

relationship between "human" and "machine". This, to us, comes closer to the kinds of posthuman

subjectivity that we also suggest is engendered by Sundén's (2012) research, allowingand which allows a

romantic relationship that is neither completely embodied by avatar nor player.

Thus, posthuman gameplay could be easily described as 'posthuman' (Shinkle, 2012). Posthuman

subjectivity can be easily used to define gameplay, as a fluid, horizontal and relational experience between

human and machine., Bbut it does not explain what facilitates this subjectivity, especially if we understand

posthuman subjectivity existing everywhere, as a general state of 'humanness' (Braidotti, 2013). Nor does the

definition of gameplay as posthuman make sense of the very visceral emotions that take place, such that one

avatar-player assemblage can fall in love during gameplay with another avatar-player. In this paper, we

propose that a posthuman concept of empathy developsmight help develop such thinking by opening up ways

of analysing the posthuman condition and permitting a more horizontal relationship between avatar and

player. WeIn this paper, we argue that empathy is a useful tool in exploring the connection with the non-

physical other that is simultaneously imaginative, embodied and cognitive. in our connection with the non-

physical other. Our understanding of empathy is intentionallypurposefully fluid, whereby the binary between the cognitive and corporeal break down and the two intertwine.

That said,But empathy is not an unproblematic concept to bring to posthuman analysis. Therefore we outline our concept of posthuman empathy below, before applying it to our data. In our analysis we demonstrate the usefulness of this concept through fieldnotes that reflect the embodied, emotional and permeable experiences of *World of Warcraft*. We conclude by suggesting that gaming research could furtherdevelop contemporary thinking on posthuman subjectivity by developing accounts of the constantly negotiated and fluid intra-actioninteraction between avatar and gamer. We believe that such a concept could have wider application in game gaming culture, and in research. and for others interested in the relationshipspace between the subject and the screen.

Methods

The data presented here is part of a broader 18-month immersion in *World of Warcraft*, with fieldnotes that have been collected during the first author's gameplay. In the context of the broader project, the aim has not been to explore the social aspects of the game (although social interactions, of course, do appear in the fieldnotes). Instead the focus of the project has been to explore experiences of gameplay as one instance of posthuman subjectivity.

We have drawn on approaches that emphasise the researcher as both object and subject of study (Ellis et al., 2010; Davies, 1999). In taking this approach we recognise the difficulties of using self-reflection for research on posthuman subjectivity. If "the subject" is no longer located atin the centre of experience, the collection of fieldnotes, by contrast, suggests self-knowledge and self-mastery: it would mean that the researcher could think rationally about themselves enough to *write the self*. A similar claim could be made

about theories of affect: is it possible to collect fieldnotes about the~~something that is arguably~~ pre-discursive and visceral? In addressing these claims, we ~~would~~ contend that fieldnotes ~~discussed here~~ are not in themselves a true reproduction of gameplay experience, nor could they be: they are, like this article, constructed. They do however capture the sense of gameplay as 'a fully embodied, sensuous, carnal activity' (Crick, 2011: 267) that we view as congruous with posthuman subjectivity. We ~~would~~ also maintain that the fieldnotes are not in themselves a demonstration of self-coherence and bounded uniqueness, but are fragments, not least because collecting~~the collection of~~ fieldnotes is messy and open to revision.

As with traditional ethnographic research, the data analysis has been a process of cycling: applying and reapplying theory, and returning to the field to explore instances and themes in more depth (Van Maanen, 1988). Our analytic of empathy emerged when we recognised a theme concerning the connection between the first author and her avatar, Etyme. In recognising this theme, we then took it back to the field, to think through these experiences with our concept of posthuman empathy. Below we briefly explore our understanding of posthuman empathy.

Posthuman empathy

A relatively recent shift in critical theory to notions of "affect" has emphasised the importance of empathy as an emotional interaction with another. For Braidotti (2013: 78) empathy has the potential to encompass posthuman ideals, through its capacity as a selfless quality and its focus on the emotional rather than the "rational" being of humanism. However, we suggest that a *posthuman* empathy needs to be wary of the problematic humanist traits that the term "empathy" might indicate. In the Merriam-Webster dictionary, ~~In her account,~~ for instance, empathy is defined as 'the imaginative projection of a subjective state into an object so that the object appears to be infused with it'. For us, this definition is insufficient, given that it proposes a

one-directional and hierarchical empathy. In her account~~example~~, Coplan (2011: 5) suggests that common uses of "empathy" have made definitions ambiguous, often co-existing with similar terms and states. With this in mind, she aims to provide a clarification in terminology that is, as she terms it, 'conceptually cleaner' (Coplan, 2011: 6). Informed by psychological and neuroscientific research, Coplan (2011: 5) defines empathy as a 'complex imaginative process in which an observer simulates another person's situated psychological state while maintaining clear self-other differentiation. To say that empathy is 'complex' is to say that it is simultaneously a cognitive and affective process'.

Coplan's (2011) definition of empathy has been, for us, a useful starting point. We were interested in understanding gameplay as an example of posthuman subjectivity, and such definitions are suggestive of a notion of empathy that complicates simple mind/body dualisms by refusing the singularity of cognitive or affective processes. Equally, we were drawn to Coplan's (2011) definition of empathy given the centrality of imagination, which we recognised in our fieldnotes. And yet in another sense, ~~empathy could be understood as fundamentally at odds with posthuman subjectivity.~~ Coplan (2011) states that empathy is a 'human-to-human' concept that requires 'simulating' the other's 'psychological state' but 'maintaining clear self-other differentiation'. This means that the empathic subject would remain distinct, maintaining the problematic discrepancies implicit with the concept of the unified, liberal human subject. Therefore, this use of the term "empathy" is one that we work both with and against throughout this paper.

Recognising empathy as an imperfect analytic tool, our definition of a *posthuman* empathy would include: a) recognising the empathetic capacity of others who are non-human, including the empathetic capacity of the avatar, which is in keeping with our discussion of posthuman subjectivity, and b) acknowledging that such empathy only works through the network along a complex range of assemblages in multiple relationships with other actors (in this case avatar-gamer assemblages). We are not suggesting that

the avatar is an empathetic subject with the capacity for imagination in and of itself. This capacity only exists intra-actively in relation to other parts of the assemblage, including the player-avatar one. A posthuman empathy would mean recognising that there is no primary subject, but that empathy is always already an interconnected network of dynamically intra-actinginteracting forces, or agencies. This aligns well with traditional concepts of empathy, where empathy can occur viscerally between subjects, while sympathy, for example, might be understood as more one-directional. It is also important to state that whilst empathy might be enhanced, we would disagree with claims that it is only "projected" – this would imply some degree of humanistic, conscious "control" over the empathy that is experienced. A posthuman empathy refutes such anthropocentric understandings, instead considering empathy as an affective, intra-active encounter.

TheBut the notion of more than one empathetic subject engenders our first criteria of posthuman empathy. Although research has exploredfocuses on our capacity to empathise with biological others (e.g. Rogers, 1975; Hoffman, 2000; Coplan and Goldie, 2011), our focus here is empathy between the material human-gamer and the pixelated technologicalimmaterial avatar. This is a very specific othernon-human to share an empathetic relationship, and it should be noted that the following arguments are based on the avatar as a characterised, humanoid form – i.e. a "being" with 'human characteristics, identities, personality traits and personal history' (Martin, 2013: 318). Therefore, rather than simply viewing the avatar as only a "tool"," we also perceive the avatar as 'capable of inducing empathy' (Martin 2013: 318).

As suggested above, our concept of empathy is not complete, fixed or static. Nor would we argue that the empathy we explore in this paper is limited to the avatar-gamer relationship. Context necessarily shapes the cognitive-affective construct of empathy - which we demonstrate with the example of the remote control. The television-remote-human assemblage could be easily understood as an extension of the human hand (in the McLuhan sense). However, a more complicated picture is required if we think of empathy as a

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decentred experience. The electrical current, the batteries in the remote, the sensors on the TV, and so on, would all need considering alongside the human hand, so that all are acting with empathy towards each other for the event (switching on the television) to take place, creating a different cognitive-affective relationship than the one in gameplay. This aligns ~~well~~ with Bennett's (2010) analysis of the vibrant life of matter. Where different materialities have historically been understood as passive in their engagement with the world, Bennett (2010) proposes a vitalism where objects are able "to act": for example, in the above the electricity may blow, preventing that actant from engaging in the empathetic relationship that's needed for the TV to come on. Far from a naive, wholly intentional or conscious agent, objects nevertheless have an ~~e~~affect on the world, with both~~: the human and non-human~~ 'always perform an intricate dance with one another' (Bennett, 2010: 31). Considered in this light, a posthuman empathy might include, in the case of gameplay, the gameplayer-neurons assemblage, where 'the response of mirror neurons to the game's audio-visual information activates the player's motor systems, recreating the conditions of the virtual world in the body' (Martin, 2013: 317-318). Our argument isn't that empathy ~~only~~ exists between the avatar and player. Rather, an empathetic relation emerges through~~However, in this paper, we focus specifically on the empathy within and between~~ the avatar-player assemblage~~relationships~~.

In exploring empathy as avatar-player, we take up Sundén's (2012) position of inseparable sameness and fascinated difference, but ~~we~~ view this as a horizontal ~~and interdependent~~ relationship, where both avatar and player coexist. On occasion~~At times~~, empathy is experienced as complete incorporation. This is seen~~For example, at times~~ in our data when the self/avatar become inseparable, with I/Etyme being used interchangeably. But at other times the "I" makes observations about Etyme, and vice versa. For example, in an equal and opposite way, Etyme responds when the keys are pressed; and yet elsewhere~~at other times~~ she separates from the player by complaining that there's "nothing to target",~~."~~ or proclaiming "I'm not ready". In

total incorporation, we might not find these effects. But if we understand empathy as a posthuman affect, we

can read it as distributed, meaning that empathy is no longer a concept to explain "putting ourselves in

someone else's shoes" only to return to the "safety" of our own bodies. Empathy instead demonstrates how

humans and non-humans are intertwinedpermeable through their ability to affect and be affected by

circumstances, environments, and feelings (Bennett, 2010). Citing Deleuze, Bennett (2010: 21) suggests that

'the power of a body to affect other bodies includes a "corresponding and inseparable" capacity to be

affected'. Likewise, our understanding of the avatar as active, agentic, and empathic recognises the vibrancy

of non-human agency.

We use this concept of posthuman empathy below. In the first section of the analysis, we explore

how a posthuman empathy creates moments of embodied experience, which appear to take place almost-

instinctively. Our second section describes how these empathetic relations are connected to others within the

gaming environment. Finally, we suggest that this concept of posthuman empathy can be put to use when

understanding the avatar-gamer relationship as a continuum, where the interaction between self and machine

is more than incorporation of body and subjectivity. Where Sundén's (2012) work has shown how the player

empathises with another player through the body of the avatar, we aim to take empathy further, through the

empathetic relationship that is generated byshared within the avatar-player assemblage.

Empathy as embodied experience

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Empathy can be broadly understood as an affective response to what another is experiencing. In gaming this

is often an immersive act: the avatar body becomes what we navigate the world through. It is therefore felt not

only to be an object of perception, but also a means of perception (Martin, 2013) that involves an empathetic

relationship where our eyes, for example, see through the avatar, but where equally the avatar sees through us

(Clough, 2000). An instanceexample of this would be how the avatar's position in gameplay highlights the potentials in the gameworld landscape that are interactive (e.g. objects, avatars, NPCs), etc.) and "sees" the value and prospects that engagement with the interactive elements of the game could provide. Put simply, the player cannot act on or progress in the game without the avatar, but neither can the avatar do so without the player. The visual field is therefore intra-dependentinterdependent, opening up the complexity and heterogeneity of the perceptual and agential circuits through which posthuman subjectivity is experienced.[ii1]. Similarly, when the gaming environment or monsters (known as "mobs") affect theis avatar body, we find our "human"own bodies affected along those channels of feeling: '[a]s any player knows, the rush you get from a good game is not confined to the space of the screen; it is a subrational, bodily thing as well' (Shinkle, 2005: 22).

In our data, forwe find evidence for the interdependence of embodied experience. For example, the extract below captures a sense of the interconnectedness of the gamer-avatar's embodied experience. Empathy emerges at the most instinctive of "human" acts: holding your breath underwater.

> *I'm completing a quest underwater, diving for relics in a deep, wide lake. I'm absorbed in my task, deep beneath the water where the colours and sounds are dulled and I am lulled into that ethereal state of being. Etyme's air supply seems ample – until suddenly it doesn't and I am forced to ascend. I begin to worry when I don't break the surface – I hadn't realised I was so deep. I need to get Etyme to the surface and I find myself holding my own breath, a worried look adorning my face as I watch the air supply dwindle and watch her body rise… I make it, and breathe again[iii].*

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[1] We would like to thank the reviewers of this paper for their helpful comments here.

I'm completing a quest underwater, diving for relics in a deep, wide lake. I'm absorbed in my task, deep beneath the water where the colours and sounds are dulled and I am lulled into that ethereal state of being. Etyme's air supply seems ample – until suddenly it doesn't and I am forced to ascend. I begin to worry when I don't break the surface – I hadn't realised I was so deep. I need to get Etyme to the surface and I find myself holding my own breath, a worried look adorning my face as I watch the air supply dwindle and watch her body rise… I make it, and breathe again[2].

In this extract, the avatar was experienced through a visceral reaction in~~through~~ the body of the gamer. We could make sense of this embodied empathy in two ways. One way we can analyse this form of empathy would be through Blackman's (2012: 82) description of affect as nonconscious mimicry or 'attunement', which is 'not about conscious recognition but about forms of bodily affectivity'. When one human smiles at another, the "instinct" is to smile back; likewise, in gameplay Etyme's experience of being underwater is enacted through mimicry on the body of the gameplayer. The avatar-gamer relationship creates the space to react in ways that are not only imitation, but happen beyond conscious recognition. More than this, the gamer's experience is one of being underwater - *I'm absorbed in my task, deep beneath the water* - while re-emerging similarly engenders a shared avatar-human reaction - *I make it, and breathe again*.

A second way we could explain the complex forms of empathy at play when the avatar-player extend into one another is Coplan's (2011) 'affective matching', which she lists as an essential feature of empathy. In Coplan's (2011: 7) definition, 'this matching must come about in a particular way, namely through other-oriented perspective-taking', where~~. In her view, this~~ perspective-taking is more than nonconscious mimicry,

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[2] ~~See Wilde, 2015 for more examples of the data.~~

so that emotional contagion alone does not constitute empathy. Instead, 'affective matching occurs only if an observer's affective states are qualitatively identical to a target's [...], though they may vary in degree. The observer must therefore experience the same type of emotion (or affect) as the target' (Coplan, 2011: 6). She continues:

> One of the key differences between emotional contagion and empathy is that contagion is a direct, automatic, unmediated process. Empathy is never fully unmediated since it requires perspective-taking. Roughly, perspective-taking is an imaginative process through which one constructs another person's subjective experience by simulating the experience of being in the other's situation (Coplan, 2011: 9)

Gameplay empathy, by its nature, is never unmediated. And although the fieldnotes certainly demonstrate instances of emotional contagion, such that there is automatic imitation of one another in the avatar-gamer relationship, we argue that the extract above demonstrates more than this. Holding one's breath is instinctive; but in this instance there is also concern and panic. In the empathetic intertwiningblurring of embodied, affective and cognitive, such fieldnotes demonstrate a reaction to the situation, including recognition of what the consequence of the immediate danger is: for instance, drowning. We expand on how this perspective-taking is facilitated through the game below. In this extract, empathy emerges directly through the mechanics of the game, which produces an embodied reaction in the avatar that directly affects the player.

> *I am "disorientated" – this is both a spell that hits me and an actual feeling! The disorientation spell*
> *forces the person hit with it to run off in the wrong direction, changing suddenly at a tangent, and*

then again, and again. It is a brilliant "spell" for the fact that it is subjectively experienced exactly as intended - it is completely disorientating and I'm totally thrown by it, having no idea where I have ended up when the spell is over.

As we have discussed above, empathy is more than the impulse to repeat, but is a deeply felt perspective-taking that produces affective reactions and extends the feeling of self. In the above, this shared perspective between Poppy and Etyme is enhanced by a sudden change during gameplay.

The "disorientation spell" creates a seamless experience between player and avatar, whereby one, the avatar, physically reacts to it, and the other, the player, feels it. The account given refutes traditional boundaries~~any boundary~~ between player~~human~~ and avatar~~non-human~~ and the lines between ~~the~~ physical reaction and the feeling of disorientation intermingle~~merge~~, shaping the holistic experience of the disorientation spell. We could take this analysis even further: while we cannot ever know what Etyme *feels*, this is true of all other human and non-human objects. At the very least, the intra-action~~interaction~~ between avatar and player demonstrates a distributed empathy, whereby the body has the capacity to affect and to be affected, so that both have a vibrancy that deems the relationship between the two horizontal, non-hierarchical and heterogeneous (Bennett, 2010).

Reading the concept of empathy through Coplan's (2011) notion of 'affective matching' and Blackman's (2012) nonconscious mimicry, we would argue that the embodiment of gameplay represented by the extracts above is a *post*-biological one: 'both organic and inorganic, living and non-living, material and immaterial' (Blackman, 2012: 13-14). This takes gameplay beyond the view of the avatar as a tool.

Empathetic connections in pride, skill and achievement

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I realise I feel really proud of these achievements, like me and Etyme have become a more formidable team, working together and eliminating our foes.

The empathetic relationship, however, goes beyond moments of shock or bodily affect, but is also produced through a cognitive matching. In the note above, distributed cognition experienced by the gamer becomes clear (e.g. "me and Etyme") and the empathetic directionlines less so. Is the player experiencing empathy for the avatar's achievement, or vice versa? Just as Boulter (2015: 65) asks, 'who is playing? Who is *being played*?', we could ask: "who is achieving? Who is being achieved??". The sense of achievement is distributed, and the source of either achievement or rightful "ownership" of the achievement is unclear, becoming in ""human"" terms an example of ""good teamwork"".

Therefore, in addition to empathy facilitating the experience of an extended body, the narrative of the game also elicits emotional responses that engender imaginative empathy, especially in the shared experiences of the avatar-human as the two co-develop. Although "imaginative" might suggest these empathetic connections are fictional, we would argue that a posthuman empathy would not require a distinction between the "real" and the "imagined". The broad field of posthumanism has already identified the problems that occur from creating or enforcing binary positions such as machine/human, real/virtual, man/woman to name but a few, and to consider gaming as an experience outside of "real life" ignores it as a situated, embodied practice.[iv3] In gaming, the emotional reactions that empathy provokes are experientially *real*, although admittedly with less longevity or consequence than some out-of-game scenarios.

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[3] Additionally, in the traditional sciences, empathy itself has been shown to make use of the same neuronal pathways, regardless of whether the events are 'fictional' or 'real life' (Kemp, 2012: xviii), so that the

As with our <u>above</u> analysis ~~above~~ of shared embodiment, this imaginative empathy between avatar-player can at first occur as affective embodied reactions to events in ways that demonstrate the interconnections between mind, body and cognition. The extract below retells a moment where Poppy and Etyme experienced something unexpected, which challenges their concept of skill and provokes a desire for retribution.

> *I round a corner at one point, climbing a tower, and suddenly encounter a mob which, for one reason or another, I wasn't expecting. "Whoa, fuck!" I involuntarily gasp, my heart lurches and I quickly scramble to regain equilibrium and kill off the offending mob. It is unlikely that it would actually succeed in killing me but there is a particular kind of vengeance I feel towards it for having taken me by surprise and I dispatch it quickly - in my mind brutally. It panicked me, disrupting my equilibrium and shaking me from my perceived skill and feeling of prowess. I take a moment, and vow to be more diligent as I scrutinise the remaining enemies below. I drop down on them from above, and unleash my anger in efficient blows.*

In the above, we see a similar pattern emerging, where a seamless and nonconscious reaction to the game produces a visceral affective response – *"Whoa, fuck!"*. In addition, however, there is also an imaginative, emotional engagement with the game, which cannot be reduced to the body alone. Instead cognitive and affective experiences expand ~~our~~ embodied awareness through their different operations (Braidotti, 2013; Hayles, 1999). Here, for example, the avatar-player reaction to this moment of gameplay produces an emotive

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~~biological body empathetically reacts in chemically similar ways to characters in books and films as it would to another material body.~~

reaction, retold ~~here~~ as vengeance, pride and anger. The perception of anger being unleashed in "efficient blows" seems to indicate a projected empathy from the part of the avatar, responding to the anger of the player and externalising it through action. Part of these emotions are facilitated by the affordances of MMORPGs, which enable both player vs. environment and player vs. player gameplay, meaning that the experiences of the game are in some way mediated by the existence of other avatar or avatar-player bodies. The further denomination of these "others" as either Alliance or Horde creates a social context through which various power relations are shaped (Chen, 2009; Williams et al., 2006). Recognition ~~The recognition~~ of the avatar-player~~human~~ self, expressed above as being skilled, having "prowess" and an ability to land "efficient blows", means that, like all forms of subjectivity, self-awareness is formed through recognition (and misrecognition) of the self as separate to others (both human and non-human), thereby imagining these others to also have self-awareness.

Emotions during gameplay are therefore not asocial or individual, but are entangled~~constituted through the interaction~~ with in-game objects ~~in the game~~. For us, the emotional entanglement of avatar-player has been most evident in fieldnotes collected during player vs. player scenarios and battlegrounds. Emerging as events that occur when Alliance and Horde factions meet, battlegrounds facilitate empathetic relations to emerge between avatar-player and other avatar-players, and encourages the feeling that gameplay has a real, meaningful impact on the environment.

I enjoy the sense of achievement which I get in battlegrounds, as it makes your proficiency public. It's basically an opportunity to show off, highlighting how much of a performance it is as it serves as an opportunity to display to others how skilful you are, how good you look. You are rewarded by conquering your foes and collecting on the achievement points, ultimately winning the battle. At the

end of each battleground the achievements for each player are displayed, further accentuating this

public moment of glory - or failure.

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There is such a level of pent up excitement on these battlegrounds, and even when you spend much of

your time dead (as I do) this is made more obvious through the forced procedure of waiting the

allotted amount of time before you can resurrect and get back to the fight. At one point I engage in

one-on-one combat with another hunter: we both circle each other slowly, our awareness of the

space reduced to that which flows between us and ignoring all of the other players who flow around

us. Our ranged attack on each other is interrupted by the end of the battleground.

Above, the first author recounts the emotions of pride, excitement, glory and impatience in gameplay, which

are again coupled with affective embodied reactions such the temporal feeling of time passing when waiting

to "resurrect", or in losing spatial awareness and getting lost in the moment. Unlike earlier extracts from the

fieldnotes, the narrative retelling often appears without "Etyme", with both avatar and player becoming "I"

and the events within gameplay affecting this "I". This has already been noted by Hand (2005: 215) as an

element of gaming-language that 'reveals how the multiple dialects – external versus internal, objective

versus subjective, active versus passive and so on – are complicated in the worlds of performance and

gaming'. Moreover, the former extract also demonstrates the potential emotional payoffs within social

interaction. The empathetic connection between avatar-player are so intertwined as to create another form of

empathy, where the avatar-player joins into the assemblage ~~other perspective~~ of other avatar-players. We

would suggest that in this interaction there is a continuous affective flow, where the avatar-player are not only one posthuman subjectivity, but are actively affective and affecting other objects (including other avatar-players) in their environment, creating a vast network of posthuman subjectivities.

Human-non-human permeability

WeSo far we have argued gameplay empathy creates a range of posthuman subjectivities by shaping cognitive and affective extensions of the avatar-player assemblage and emotional perspective-taking with other players. The avatar-player subject is integral: they feel together through the body, while the existence of other feeling avatar-players means that this posthuman embodiment is shared, distributed and connected, creating the space for emotions such as pride, skill and achievement. We would suggest this is both a conscious and nonconscious extension in a human-machine world that has co-evolved (Hayles, 2006), andso that the two "objects" - avatar and human - arebecome inseparable subjects. In our fieldnotes, this is provoked when empathy entwinesconnects one subject withto another through the very human fear of death:

> *Etyme falls from a great height and I gasp. It is completely involuntary, I am in that moment, her, falling, perhaps to her/my death. It is a ridiculous concept because even if Etyme were to die I would be fine, and it would take just moments to run my spirit through the graveyard to find her body and resurrect. Note the my/her complications. The boundaries are blurred. She is not me but she is not not-me. Just as Daboo (2007: 264 and 271) notes as actors create characters who they 'both are-and-are-not [...] It is both me-and-not-me at the same time'.*

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Although the gamer is in no danger, the perceived threat against the avatar is felt empathetically through the holding of a breath, a gasp, a "lurch" in the heart. Such instances demonstrate the displacement~~blurring~~ of boundaries ~~that occurs in gaming~~, where gamer-avatar are experienced as enmeshed~~permeable~~, because they put into practice the fundamental fear of impermanence. Such experience~~experiences of permeability~~ allows for a body-subject that operates with and through technical extensions and enables a flow of bodily being~~,~~ whereby:

> The term 'body' is usually replaced by the concept of body-subject […] which displaces a mind-body dualism but does not reduce bodies to material (physiological, neurological, biological) processes. The incorporations enacted by a body-subject include technical, material extensions which articulate the body in new ways. (Blackman, 2012: 9)

We would take Blackman's (2012) suggestion of the body-subject further, and would argue that empathy allows for a state that is neither wholly about distributed embodiments nor distributed emotions, but a concept that allows for the dynamic interaction between the two: an 'ontological inseparability of agentially intra-acting components' (Barad, 2007: 33). In Poppy's own self-reflections on gameplay, this dynamic also means that to be *both me-and-not-me* involves something more than becoming Etyme, demonstrating that posthuman subjectivity is not only about living in the body of the machine. Etyme herself is a necessary part of this empathetic relationship. At times, Etyme dying can be experienced as the player dying (or provoking the fear of death); at other times, gameplay can feel like a negotiation (or even struggle) between two separate-but-connected subjects. By refusing the boundary between human and non-human and rethinking this relationship

as one which is ~~in a constant state of becoming~~constantly in flux, we can conceptualise the avatar differently, capable of an affective exchange with the gamer, and creating resonance between avatar and gamer.

Conclusion

As suggested, much theoretical work has been carried out with a view~~done~~ to describing~~understand~~ subjectivity as ~~variously~~ "posthuman" through the relation of the human to, variously, the animal, the machine or the environment. In this paper, we specifically considered one example of posthuman subjectivity engendered by the ~~non-human,~~ techno-informational aspects in the game world. Whilst the incorporation of machinic elements are not always necessary to posthuman subjectivity and other domains of experience could also be defined as posthuman, we have nevertheless used this example to illuminate the ways in which an intra-dependence~~interdependence~~ between traditionally separate~~human and non-human~~ elements can form a non-hierarchical assemblage.

Our deployment of empathy, we would argue, also moves concepts of posthuman subjectivity beyond an account of what the subject is, and allows us to provide a methodological framework from which to provide an empirical analysis of posthuman intra-active subjectivity. Our concept of a posthuman empathy is decentralized: it is not "owned" by either player or avatar/game but rather emerges out of their relation in the process of playing the game. We have explored how the empathetic relationship between avatar-player actively makes problematic~~blurs~~ any clear distinctions between human and machine. We have deployed the use of empathy in a more fluid understanding of the experience, expanding the concept ~~of empathy~~ to include an acknowledgement of the empathetic capacity of the avatar~~non-human elements~~ in an assemblage and a rhizomatic understanding of the different agencies at play. Our "posthuman empathy" blends the principles of

posthumanism (e.g. in a post-anthropocentric acknowledgement of the permeability of beings) with the

principles of empathy (e.g. a dynamic interaction of cognitive and affective responses).

In this respect, the idea of "the posthuman" does not need to elicit fear of the change in "the human",

but rather celebrates the prevalence of the emotional, embodied and permeable throughout different contexts.

For example, in our analysis, the relationship between Poppy and Etyme is one of care, concern and

connection, despite the avatar's pixelated, technological~~immaterial~~ form. Such avatar-human relationships are

testament to the deep intra-connections between human and machine. Our empathetic relationship with the

avatar is indicative of the very real experience of being (always already) connected~~connecting~~ with ~~non-~~

~~human~~ others, in ways that do not fight for dominance of human over machine but accept the equality of both

player and avatar: a principle central to posthuman ethics (e.g. Braidotti, 2013; Bennett, 2010). What emerges

is 'a more relational ontology that explores how entities emerge from intra-actions consisting of human and

non-human agencies' (Blackman, 2012: 174).

The shifting flows between self and other are complex yet easily apparent in the fieldnotes – for

example in the switches between "I", "we" and "Etyme". The relationship is a continuous~~constant~~ negotiation

between the avatar and player, as the desires of one cannot be achieved without the actions of another, so that

each part must be receptive to the goals of the other. This empathy is further facilitated by the game

mechanics which constantly seek to bring the avatar and player together and allow a spectrum of feelings to

proliferate, demonstrated above through feelings from disorientation to pride. Connecting with the avatar

demands an emotional and embodied connection in order to succeed at the game, and using empathy we have

been able to acknowledge these particular moments in order to demonstrate the intra-

dependence~~interdependence~~ at the centre of avatar-gamer relationships.

Empathy has therefore been used as one analytic for how posthuman subjectivity has arisen from/out of the relationship between the player and avatar in *World of Warcraft*. We have demonstrated how empathy helps to conceptualise the connection between a human and non-human other, in a way that shares perspectives and bodies along channels of affective feeling. The experience is one that shows how is undeniably fuses human and machine are undeniably fused, retaining emotional and embodied feelings in a permeable way. As such we have shown how "being posthuman" is as complex as being "human" ever was.

Notes

[i] We take inspiration from Barad's (2007: 33) concept, where 'in contrast to the usual "interaction," which assumes that there are separate individual agencies that precede their interaction, the notion of intra-action recognizes that distinct agencies do not precede, but rather emerge through, their intra-action'.

[ii] We would like to thank the reviewers of this paper for their helpful comments here.

[iii] See Wilde, 2015 for more examples of the data.

[iv] Additionally, in the traditional sciences, empathy itself has been shown to make use of the same neuronal pathways, regardless of whether the events are 'fictional' or 'real life' (Kemp, 2012: xviii), so that the biological body empathetically reacts in chemically similar ways to characters in books and films as it would to another material body.

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