Positioning Yourself by Reframing the Context

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1 The Problem of Games Research

Positioning yourself within a field can be a daunting endeavour. Anyone else would probably have started this discourse with outlining their work (either planned or ongoing), the foundation of their PhD work, or even the research area. For myself, I start with a discourse regarding what I think is the problem of Games Research.

Warpefelt describes how there are, essentially, two camps within Games Research [1]. The *What* camp looking at the technological part of games – often focusing on the artefacts – and the *Who* camp that looks at the players and social part of games. In his paper he presents the bridge of *How*, researchers who, with one foot in either camp and with informed decisions based in both camps, focus on "...*How* the *What* enables the activities of *Whom*". An idea of this can be seen in Figure 1. Here, the *How* is represented with a dotted line, as it is described by Warpefelt to be a sliding scale between the two camps.

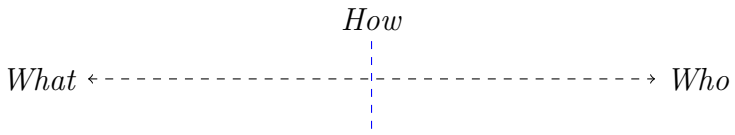

Figure 1: *What* represents the game research camp looking at technological parts of a game, while the *Who* represents the players and social parts of a game. The *How* is the design, bridging the gap between these two camps.

However, there is one part of this that I fondly disagree with, and that is the focus on game prototype development within academia. Warpefelt [1] focuses heavily on how these two *Academic* camps drives the area of Games Research forward through using "the activity-based understanding from the *Who* camp, and to realize it using artifact-based understanding from the *What* camp." – with the implementation details inside the *What* camp and the user details within the *Who* camp. The *How* is then related to game design – that is to say, *How* games are designed [1].

However, the focus upon pure academic game development misses a very important aspect of games; consequences. Development inside academia does not face the same consequences or rules that games created "in the wild" [2] and, as such, both the *What* and the *Who* camps, and in extension the *How*

bridge, presented by Warpefelt [1] misses a crucial element; the practice of the game development conducted "in the wild". As such, I would propose a different way to see it, putting the *What* and the *Who* camps as opposing vertices of a triangle, and adding the missing vertex: *Practice*, see Figure 2.

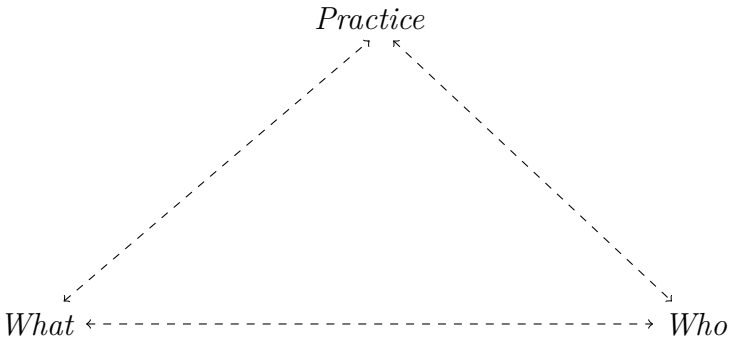

Figure 2: A reframing of the framework proposed by Warpefelt, adding *Practice* to cover the practical parts of game development "in the wild" as described by Engström [2].

The *How* as described by Warpefelt [1] would then simply be a representation of research focusing on the dotted line connecting the *What* and the *Who*, without (a lot of focus) upon the camp regarding *Practice*. However, this would then only be one of three bridges, as both the *What* and *Practice* as well as *Who* and *Practice* are interconnected through bridges themselves. The *How*, then, becomes not a sliding scale between *What* and *Who*, but rather either a point inside the triangle positioned depending upon how much inspiration the researcher takes from each of the three camps, see Figure 3, or as a representation using a radar chart, see Figure 4. The *How* is no longer a bridge, but a connecting point or an representation of a researcher's intended focus.

There is an argument to be made that the *Practice* camp, does not exists as an academic field. In a way, that is true – however, there is a point to be made here regarding *tacit knowledge* [3]. Game developers contribute to sharing and promoting knowledge in a multitude of ways. Most famous would be Game Development Conference (GDC), GamaSutra (now GameDeveloper) and GameBiz [4]. In fact, these have been used in a multitude of studies within both the *What* and the *Who* camp identified by Warpefelt [1].

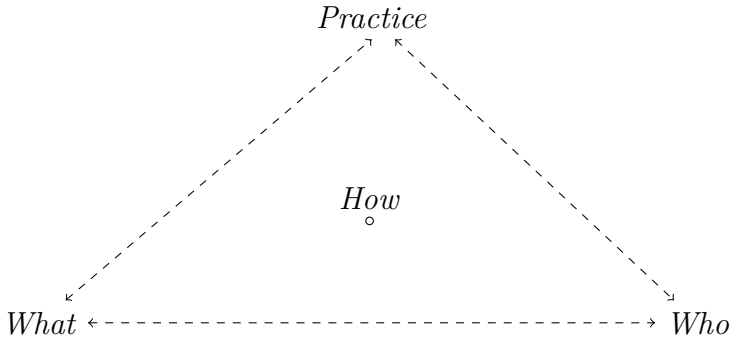

Figure 3: The *How* of the framework presented by Warpefelt [1] reframed in the framework presented here – as a *barycentric point* based on how much influence the *How* has from the three vertices *What*, *Who*, and *Practice*.

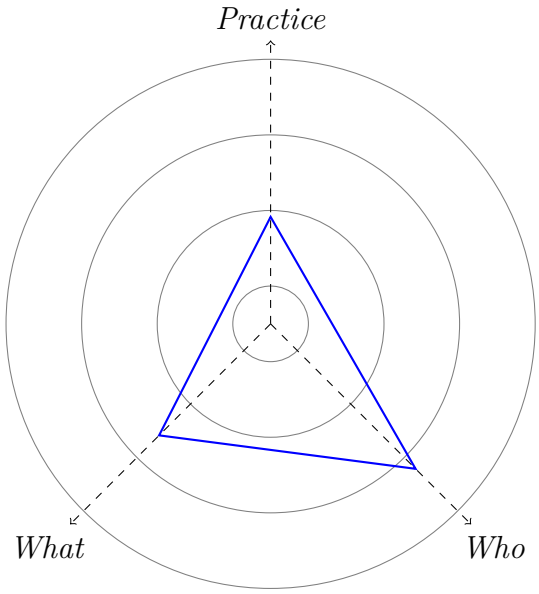

Figure 4: An alternative reframining of *How*, now as a *radar chart* showing how much influence the *How* has from the three vertices *What*, *Who*, and *Practice*. This can also be seen as an *Intent*.

However, the research done in this revenue seems to mostly be observatorial studies, looking at post mortems, interviewing developers, or studio stud-

ies wherein a researcher join the room – but not the development – as part of a research. *Practice* can also be seen as *Tacit Knowledge* amongst the practitioners of the game development community – that is to say, knowledge gained through implicit learning [3]. This knowledge can be hard to verbalise, and as such hard to formalise in a way suitable for "mainstream research".

Through the addition of *Practice* introduced here, the framework is akin to the *Applied Game Design Studies* presented by Deterding [5] as one of the possible futures for game research. That is to say, transform the research area to an application-oriented field able to uphold itself through both research and education. This framework is as an extension to Warpefelt's framework, perhaps novel – in my literature search I have not found anything besides Engström's book [2] touching upon this dimension. However, the idea in and on itself is far from novel.

Only going back to 2018 is enough to find the disparity between academia and industry in a published research paper by Passarelli et al. [6]. In this study, most of the game developers interviewed reported: a) feeling distant from academic research, b) the academic language inaccessibility, c) that the research was not applicable for the marketing/saleability of a game, d) the slow cycle of academia, and e) differentiating communication channels (academic conferences as opposed to websites like GameDeveloper), as obstacles for the usability of games research in the game development sector. One of the action points proposed in this paper is to "*develop research-production partnerships*" – not a lot unlike what I have presented above.

This problem is not uniquely represented in the paper by Passarelli et al. [6]. Pfau, Smeddinck, and Malaka [4] discuss how industry professionals sees the usability within video games for an AI developed within an academic context. The short version of their conclusion is, if you read between the lines, that *academia do not understand the context video games are developed in and the limitations that guides the usable technologies*. With this in mind, and my small discourse regarding the problem with Game Research out of the way, I think it is time to talk shortly about my own work.

2 The area of my PhD

Formally speaking, the research I am to conduct is – and I quote from the project application description my PhD is part of – focusing "...on the development of AI-based tools with a specific focus on the potential application of AI in game testing.". As part of this PhD, I am to look into not only how playtesting works in the industry, but also how to use different methodologies to train artificial players to play the games to identify errors, shortcomings, and other kind of problems with the games. The goal is to create a versatile testing tool which is easily integrated into a development pipeline – even without technical personel.

This, in and on itself, sounds in many way, shapes, and forms like traditional research within the field. In Warpefelt's framework, it would be quite firmly placed in the *What* camp, with a small *How* bridge towards the *Who* camp due to the player-modelling needed to be done. In the earlier purposed framework, it would lie at a barycentric coordinate akin to that which can be seen in Figure 5, alternatively as the area which can be seen in Figure 6. Here, the weight of the *Practical* vertex is due to the need for the tool to have some form of integrability within existing – and most likely diverse – development pipelines.

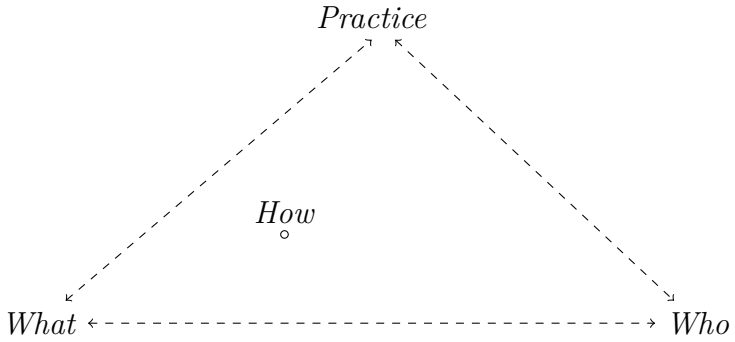

Figure 5: My positioning, as defined by the project I am part of, within the framework.

There exists another dimension to the PhD journey I am embarking on, which may cast new light over the start of this positional paper – the needs of actual developers. As part of the project, I am assumed to not only promote awareness and interest in the potential of using AI tools for playtesting

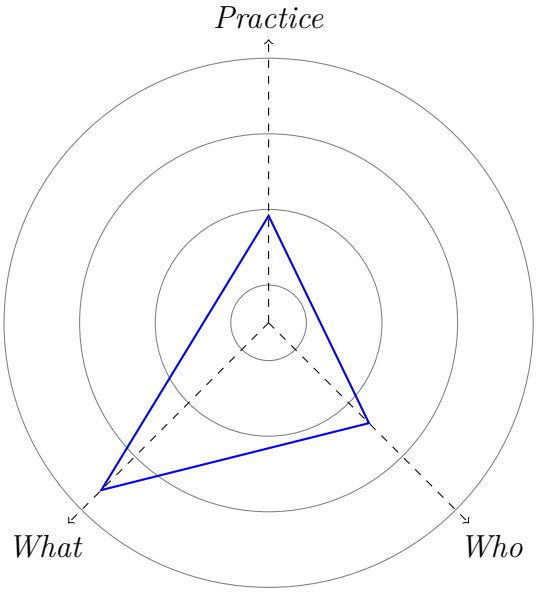

Figure 6: My intent, as defined by the project I am part of, within the framework.

through workshops, but to do punctual contact with startups to verify that the tools align with actual needs for the development conducted in the companies. That is to say, the companies are to define their own testing needs; it is not for me to decide. As such, a crucial part of my PhD will be to engage in the developers own processes and actually understand them in depth. This will need other methodologies than simple surveys or interviews, but there will not be enough to simply engage by watching and listening during roundtable discussions or attending a few workshops here and there. No, the best way for this to be conducted and worked on would be direct co-development with the companies themselves.

The acute reader have probably already guessed where I wish to position myself during my PhD; on my self-defined hill of *Practice*, informed by the *What* and the *Who* camps. Through collaboration focusing on active participation from game development companies, I hope to add to this field and contribute to the didactic of a true interdisciplinary field.

3 My knowledge claim

Although the goal of my PhD, at least the first years as part of the Game Tech Academy project, is to develop a playtesting tool for indie game developers, I do not think that my knowledge claim will ultimately be the tool itself. The tool, framework, and related knowledge I may produce as part of the PhD will perhaps be state-of-the-art for a little while, but in the end it will be overshadowed by new tools, frameworks, and knowledge claims. I do, as all researchers should, believe that I will further the field of automatic playtesting – especially for indie game developers. Perhaps I will even help democratising a few practices related to gameplay testing and help the indie game scene develop further.

However, the knowledge I hope to ultimately claim is something completely different. New ways for academia and industry to collaborate, fostering a paradigm shift towards swift, iterative co-development and co-research focusing on shared ownership, trust, and mutual benefit. A reframing of how game development research, and game research at large, is conducted. Quite the small aim, would you not agree?

3.1 On the idea of Collaborative Research

Cornish et al. [7] mention that if a community have been treated as the subject or passive object of research they may be suspicious of further research or other researchers. While this statement is in relation to marginalised communities being used to further produce knowledge for ”a distant elite”, I would reflect that this suspicion on both research and researchers also exists within the game development sphere – although not to the same degree. This may, of course, be a localised problem in the game development sphere wherein I have had discourse with developers, but there seem to be few voices regarding the positives of research and more on the negatives. Some of these are reflected in the study by Passarelli et al. [6], highlighting that learning from your peers is more important than learning from publications and that there exists a scepticism and mistrust towards academia within the industry. Learning from your peers, who most likely have learned from their own experience, ties back into collaborative research; one of the main principles of collaborative research is that those that live in a system also have more expertise through their experiences [7].

Another thing to take note of when it comes to collaborative research,

is that the methodology can be mistrusted by the academic institution [7]. As the focus may not be on generalisable knowledge gathering as science all to often is portraid as, it is easy to see that it can be problematic. In fact, for collaborative research, the transformative process of the research itself can be as interesting, or more, than the actual outcome. The research is unpredictable, cyclic, and adheres to an air of "learning by doing" – much like game development itself. In fact, part of collaborative research can be for the researcher to teach participants how to conduct research – analysing data, critically go through information, and more – while the participants in turn teach the researcher more about the context they work within. This kind of local knowledge transfer may be seen as non-generalisable and niche. In fact, the biggest limitation to apply collaborative research is often institutional [7].

3.2 On the Subject of Institutions

That institutions oppose limitations upon research is not unbeknownst for most game researchers. As game research is highly interdisciplinary, promotions and tenure opportunities may be limited or hard to achieve [8]. Lawley argues that the reason for the narrowing of scholars within the game research is because of the expectation that culture and norms associated with promotions and tenures are to be honoured – unlike what Deterding proposes in his work [5] where he claims that it is natural after the legitimisation of the field. Furthermore, there also the question of evaluating the contribution of a work to a research field, which may further harm an interdisciplinary field like game research [8]. Lastly, different institutions may expect different – perhaps even contradicting – citation standards. If the standard used for one publication expects the first author to be the one with the most senior role while another publication uses a standard where the authors are listed alphabetically, a researcher in an institute where the first author is the main contributor may find it difficult to advance in their career.

4 Tying it Together

Ultimately, my PhD will focus on the development of a tool for automatic gameplay testing. However, by also focusing on the collaborative focus of research, I hope to achieve a project that actually ties into needs. The crass reality is that I believe the tool to be both feasible and useful once completed – but it will be overshadowed. The knowledge claim that I aim for and have presented in this work – tying in the practice of game development through collaborative research – will be a bigger, more important, contribution; should it be successful.

My hope is to build upon work done in other fields, stealing their frameworks and methodologies (as you do in interdisciplinary research according to Deterding [5]) and incorporating these in game research as a way to not only bridge a gap, but create true connecting points within a multitude of research angles. Perhaps, in the future, we can see collaborative spaces, open for researchers and developers, where dedicated researchers are integrated in game development processes for joint ownership, knowledge creation, and the furthering of not only the field of games research, but also the success of game development communities.

As such, I will end this positional paper with a last recall to the framework I presented. In Figure 7 and Figure 8, I have presented my own intent inside the framework presented. My aim is to place my *How* further towards the *Practical* vertex than any other, guided towards the co-creation of knowledge with industry practitioners.

Perhaps I dream to big?

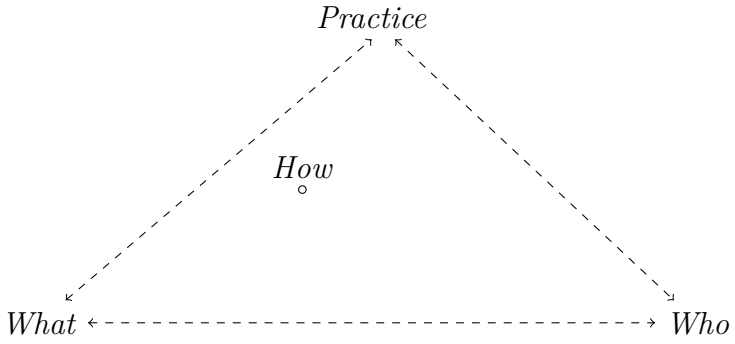

Figure 7: My final positioning, as defined by this positional paper, within the framework.

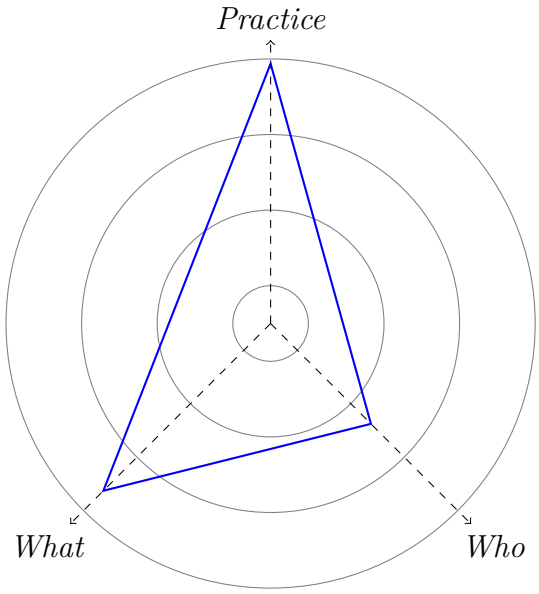

Figure 8: My final intent, as defined by this positional paper, within the framework.

5 Declaration of AI Usage

Through the writing of this positional paper, ChatGPT has been used in different ways to identify shortcomings, analyse the text for errors, brain-

storming and as a general source of inspiration to work forward with. All answers have been critically analysed and own research in the areas pointed out by ChatGPT has been done – most of the ideas generated from ChatGPT prompting were discarded. All text written in this positional essay is written by the author, Andreas Jonasson, without any generation of ChatGPT or other generative AI. This is also true for any and all work done towards the addition of *Practice* to Warpefelt's framework, which was decided and written long before the inclusion of ChatGPT as a tool. However, small changes to the text and extra clarifications has been added due to suggestions from the tool.

References

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