# User Experience Research in Games

#### Overview

# 1st Module: Introduction to Games User Research (60 min)

- Introductions and definitions, evaluating games, challenges in GUR
- Exercise 1: Choosing a GUR scenario (20 min)

#### Overview

# 2nd Module: Methods, frameworks and validity (60 min)

- Methods review, frameworks, validity and bias
- Exercise 2: Identifying problems in user testing (20 min)

#### Overview

#### 3rd Module: Analytics and reporting (50 min)

- Analytics, report structures and process
  Exercise 3: Analysis and reporting on quantitative data (30 min)
- Summary and thank you

### Takeaways

- The basis for UX work in games and the core challenges associated with evaluating experiences in games
- The context for the application of user research in game development
- The method space for games UX and the many dangers to result validity.
- The relationship between UX and Analytics (behavioral telemetry)
- Best practices in game UX reporting and playtest structuring

#### What is GUR

Games user research is a core part of game development, which helps games reach their design goals by understanding players.

The practice of playtesting is probably the most well-known. In playtesting players are observing playing a prototype or pre-release game and detailed notes on their behaviour, are taken and compared against the designers intended behavioural responses.

#### What is GUR

Games User Research is also an academic area which seeks to better understand what motivates players, how their actions can be explained or predicted, or even just to find new ways to capture and use data about players to help with game design.

Games User Research relates to psychology, human factors and ergonomics, user experience design, interaction design, computer science, and many other fields. Games User Researchers in all of these fields, inside and outside of academia, come together around a love of gaming, players, and making awesome games.

### Games vs. productivity applications

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Process vs. results	The purpose of gaming is usually in the process of playing, not in the final result.
Defining goals vs. importing goals	Games (or gamers) usually define their own goals, or how to reach a game's goal. However, in productivity applications, the goals are usually defined by external factors.
Few alternatives vs. many alternatives	Games are encouraged to support alternative choices to reach the overall goal, whereas choices are usually limited in productivity applications.
Being consistent vs. generating variety	Games are designed to provide a variety of experiences. However productivity applications are meant to be consistent in the user experience.
Imposing constraints vs. removing or structuring constraints	Game designers intentionally embed constraints into the game loop, but productivity applications aim to minimize constraints.

From: https://www.researchgate.net/publication/234820600\_User-Centered\_Design\_in\_Games

### Games vs. productivity applications

Function vs. mood	Productivity applications are built around functionality, but games set out to create mood (for example, using sound or music to set a tone).
View of outcome vs. view of world	Gamers usually play a role in a game world such as race car driver, soldier, warrior, etc. Productivity applications rarely have a point of view.
Organization as buyer vs. individual as buyer	Individuals usually buy games, but productivity applications are often bought by organizations.
Form follows function vs. function follows form	Gamers tend to welcome innovation while users of productivity applications tend to be cautious about adopting innovation.
Standard input devices vs. novel input devices	Games usually explore possibilities to use novel input methods, such as motion capture or biofeedback, in addition to standard input devices. Productivity applications mostly rely on a mouse and keyboard.

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# Criteria for applied usability & UX evaluation on games

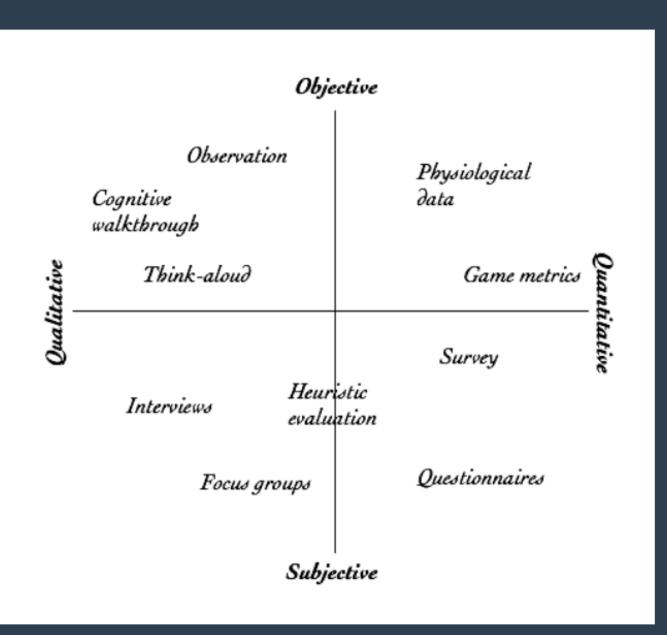
# Criteria for applied usability & UX evaluation on games

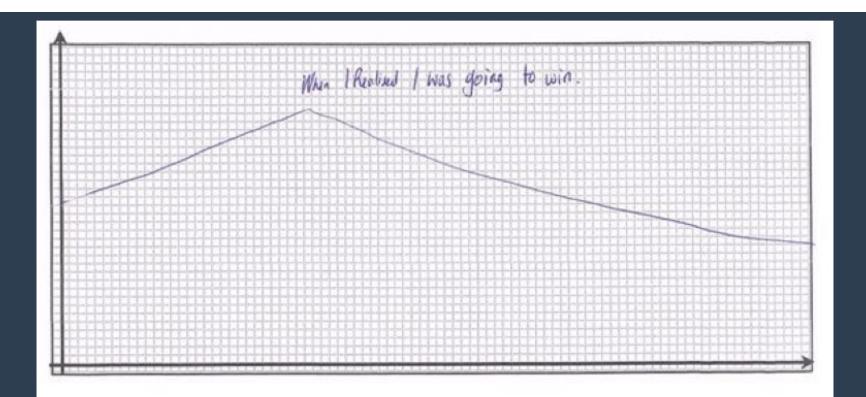
Representative	Selected methods and recruited participants must correctly reflect user testing needs and outcomes.
Accurate	Results should reflect user testing assumptions and include multiple sources of supporting data.
Specific	Methods selected for conducting the test need to deliver precise and specific results. For example, they cannot state that a game is not good without indicating why or identifying the problems.
Timely	User test findings should be delivered in a timeframe that matches the game development cycle.

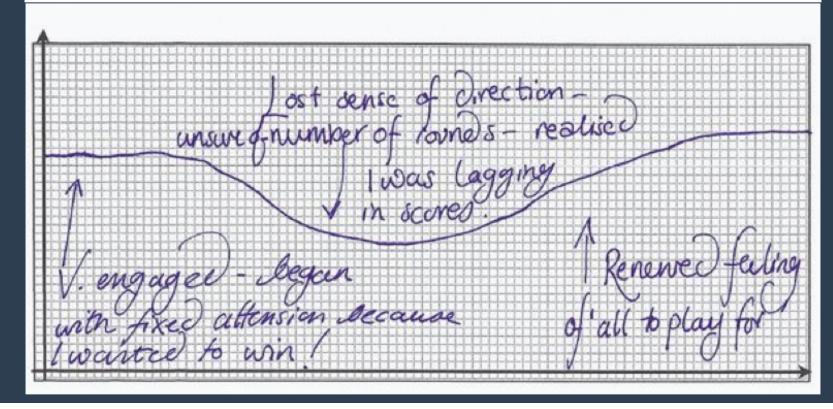
# Criteria for applied usability & UX evaluation on games

Cost-effective	There must be a return on investment or value added to a game that justifies the cost of conducting user tests.
Actionable	Results need to be delivered in an actionable and applicable format. The quality of results is directly affected by the chosen methods and analysis approaches.
Motivational	Presented results should motivate game developers to take action on them. Game developers should believe in and fully understand the results.

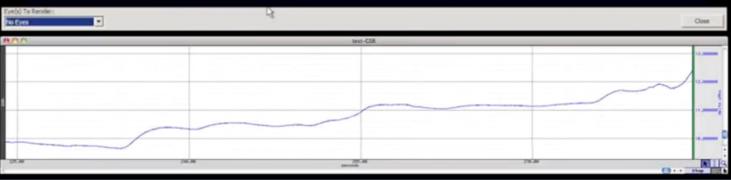
# Challenges in GUR







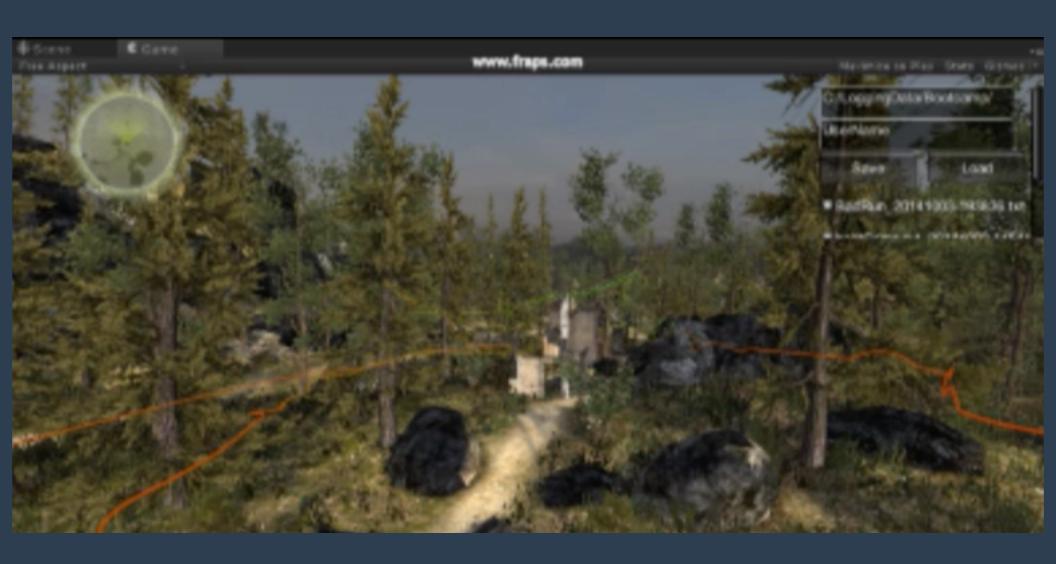




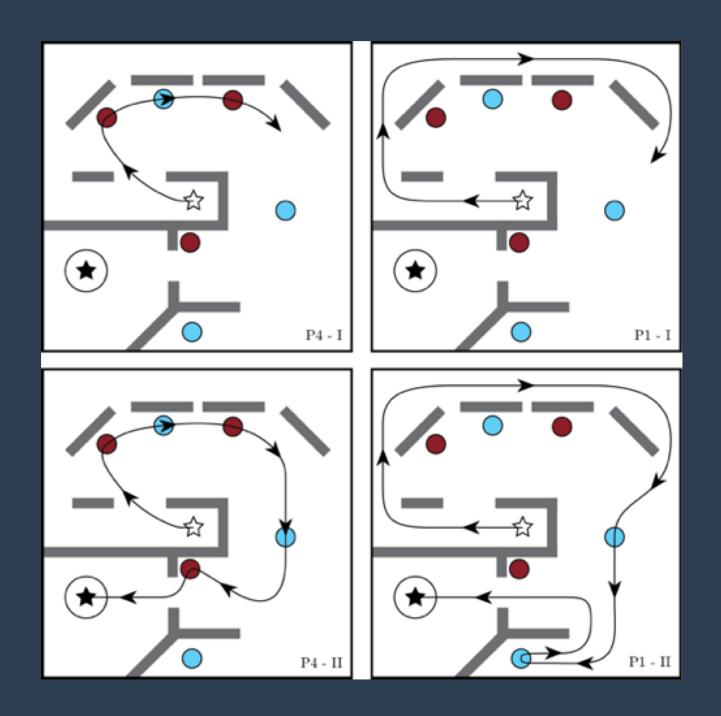




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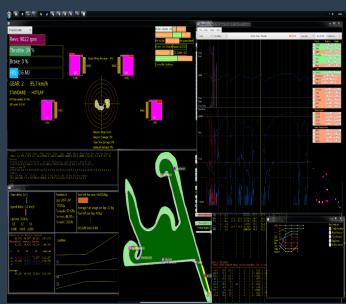
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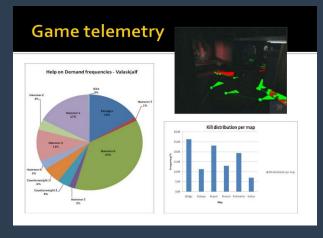


From: https://blog.oup.com/2018/02/playerless-playtesting-user-experience-evaluation/

### Data Oceans

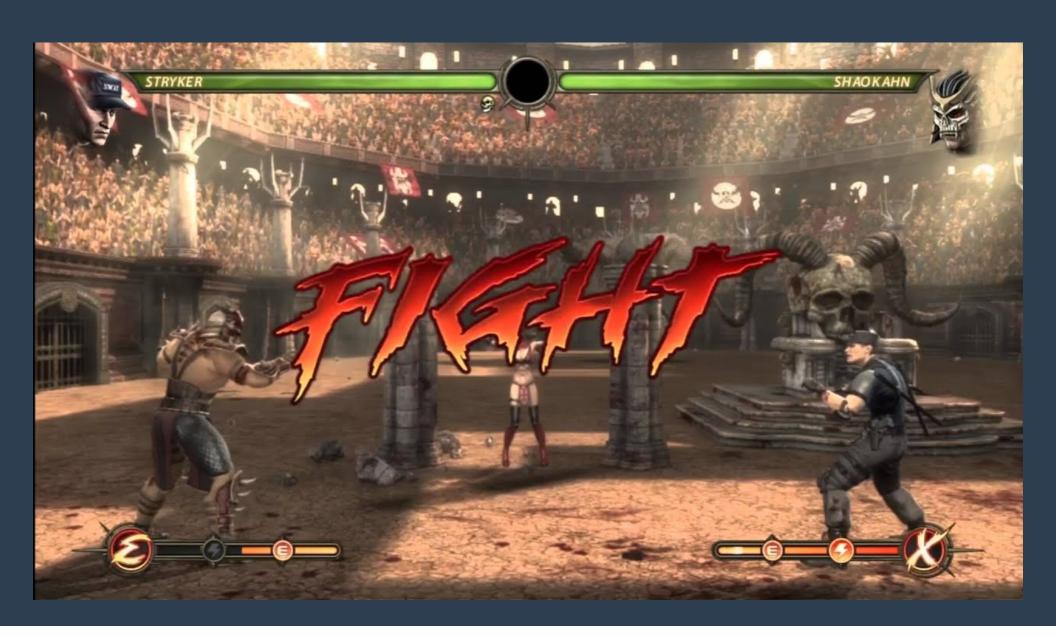








### GUR vs GA



# Ethics





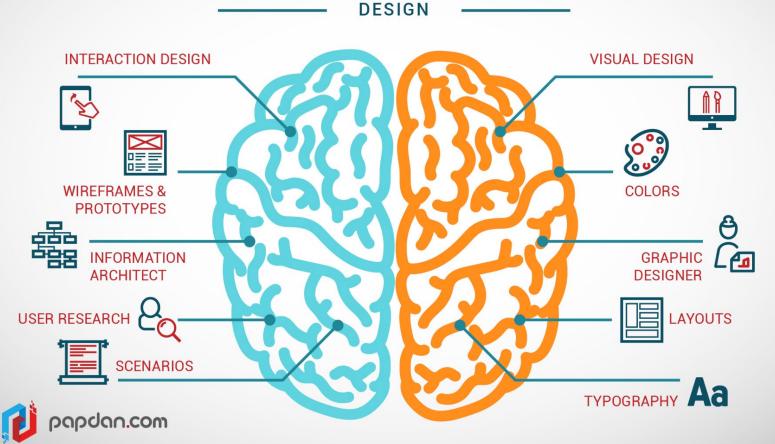
## UX Design in Games











# Activity 1

# Back to You: What are your challenges?