Enhancing user immersion in e-sports events through interface design

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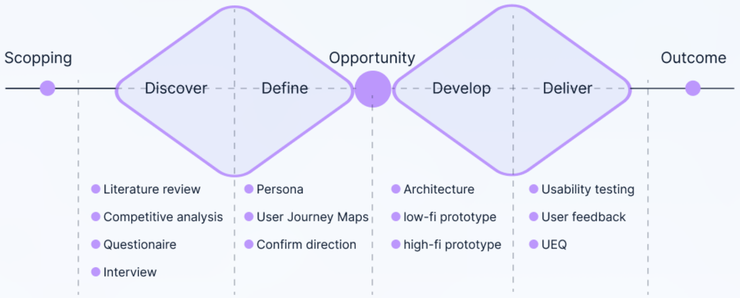
Abstract

This project is all about enhancing the user's sense of **participation and immersion** in the process of watching e-Sports matches through innovative design solutions. Through questionnaire surveys and user interviews, the impact of the viewing platform's interface on the user's viewing experience is studied in depth. This research will help to increase users' interest and enthusiasm in eSports.

Introduciton

According to Newzoo's eSports Market Report 2022, the global eSports audience is expected to grow to **532 million** in 2022, an 8.7% increase year-on-year. Core users who watch more than one eSports event per month will exceed **261 million**. However, the online viewing experience of eSports events is not perfect; the current online **social features** are tedious and uninteresting, while studies have pointed out that one of the most important motivations for eSports event viewers is to understand the game mechanics and gameplay, but there are often no **detailed data** displays and explanations to help viewers understand the matches during the viewing process. The goal of this project is to address user pain points through interface design and to incorporate and optimize current online viewing features.

Study Methodology



I conducted the study using a mixed methods approach, obtaining the results of the survey from both qualitative and quantitative methods.

Questionaire

The questionnaire was distributed via email and an online community and centered around questions about viewers' perceptions of current viewing platforms, their needs and thoughts on social features and event data.

Interview

Semi-structured interviews were used for the research to collect participants' experiences of e-sports viewing and the confusion they encountered in it from a user experience perspective.

Research Results

Survey

62%
Social features are important

81%
Need **match data** (Match analysis/record)

Interview

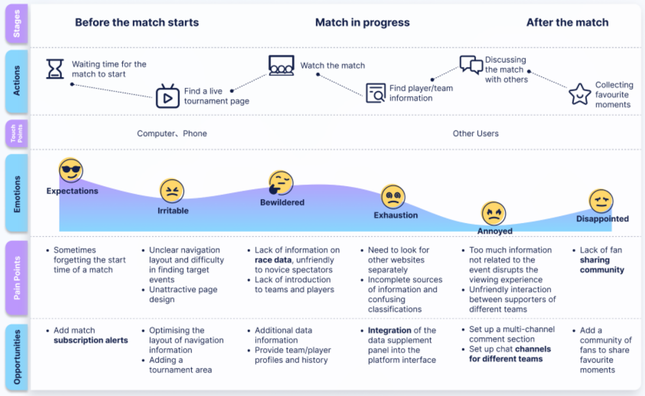
Monotonous **social interactions**, cluttered conversational environments

Insufficient match data and **high cost of understanding**

Match schedule presentation is not clear, would like to have **personalized subscription** settings

Design

Problem Define

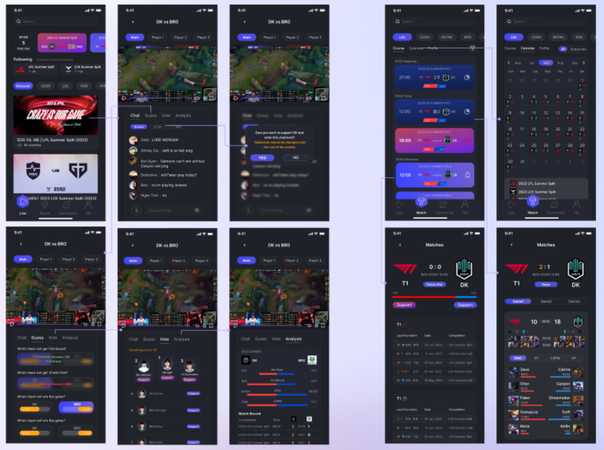


User journey maps illustrate the behavior and feelings of viewers at various stages of online viewing. By analyzing users' emotions at different stages, pain points and opportunity points are found.

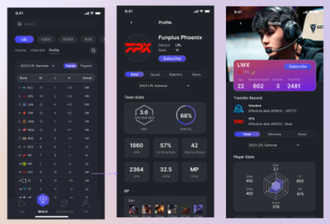
Prototype Design

1 Go to the live stream and participate in the interaction

2 Chronological fixture display, data information for different states

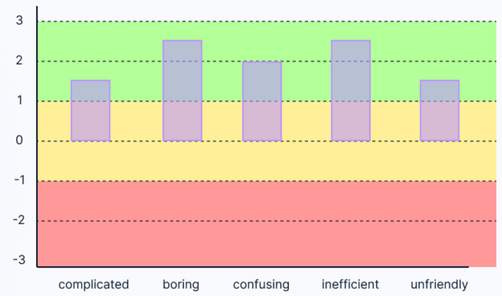


3 Team/player profiles, personalized subscription matches



Testing & Evaluation

7 Participant **8** Tasks **5** Questions **UEQ**



The design results of the prototype were verified through **usability testing**, which was divided into two rounds. Compared to the low-fidelity prototype, users in the second round of usability testing were **largely able to complete** operational tasks **smoothly and quickly**, and overall ratings of functionality improved.

Conclusions & Future Work

After a series of studies and tests, we found that **optimising social and data display features** is obvious for users to improve their viewing experience. However, users with **different levels of match familiarity** still have different needs for features and details. In subsequent improvements, we can try to adjust the ratio of different features in the app according to users' preferences, such as **personalised settings** navigation. There are still more possibilities and room for users' personalisation needs in the subsequent improvement of the viewing platform.