Lucerne University of
Applied Sciences and Arts

# HOCHSCHULE
# LUZERN

**Technik & Architektur**

FH Zentralschweiz

**Bachelor's thesis in Business Engineering | Innovation**
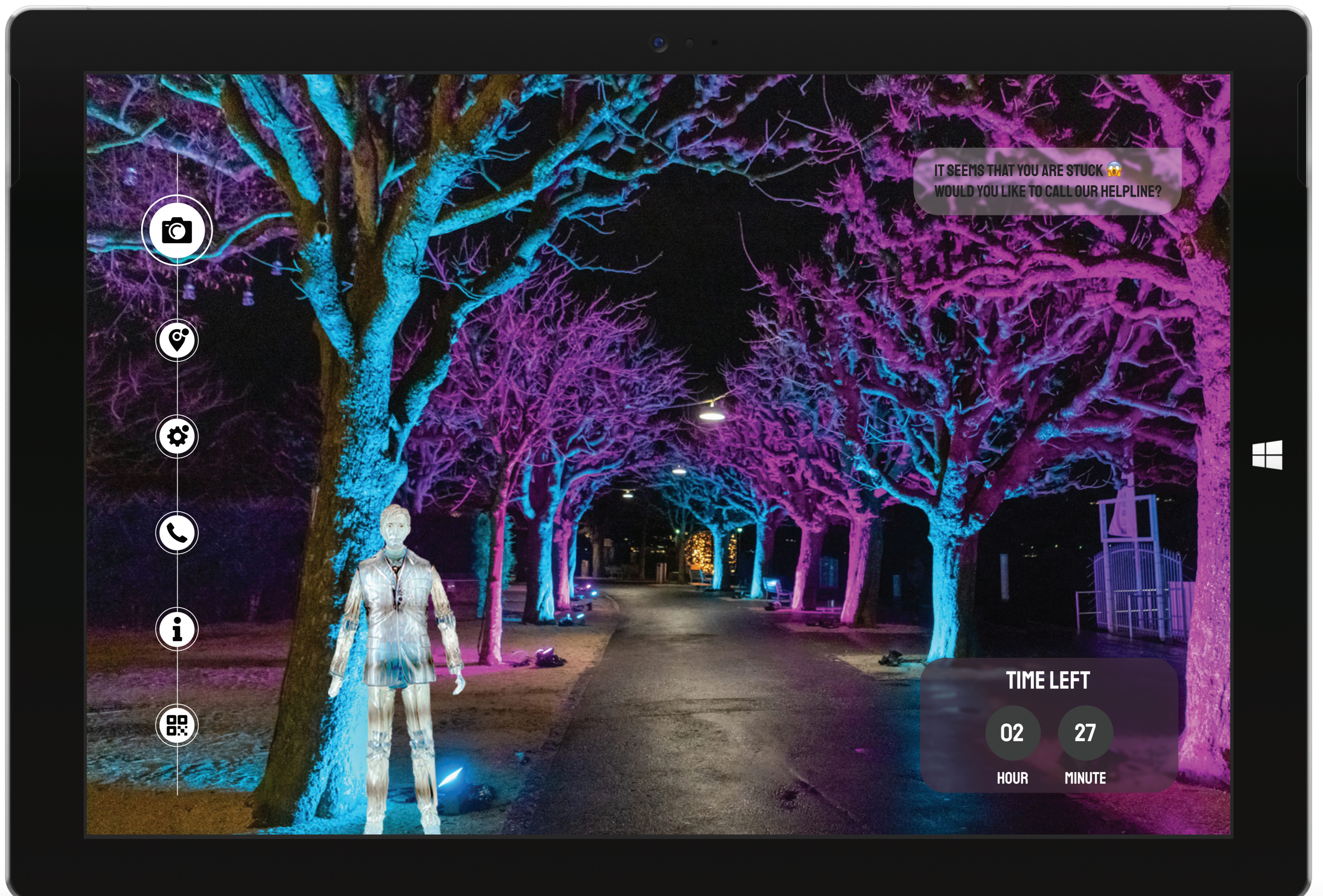
# Develop an application based, open-air quest activity



## Abstract

Escape Quest AG is a Swiss-based escape room and real-live entertainment services provider, which seeks to expand its product range to attract more customers and increase its turnover during Summer. Escape Quest believes that an expansion into the market of outdoor riddle activities could rectify the imbalance between the revenue flows during the warm and the cold seasons. The company possesses significant know-how in developing storylines and adventures but has no experience with application design and development.

The aim of this project is to develop a concept for a new open-air application-based, quest activity. This product has to be accessible, reusable, have high replayability potential, and require minimal personnel resources for it to operate daily.

The applied methodology is iteratively structured. The author has decided to use the design thinking approach, which is conducted in free order cycles of the six phases: Understand, Observe, Define point of view, Ideate, Prototype, Test. The author has decided to additionally divide the development process into three stages: Understanding the problem, Creating a vision, and Developing the solution. At the end of each phase, the author has conducted a reflection process, to re-evaluate the problem and gain valuable insights of qualitative nature, due to the interview-based information-gathering approach.

The result of this work is the concept of a versatile riddle platform that was designed according to user feedback on multiple prototypes. This platform addresses multiple pains of the customers, simultaneously creating significant gains. The design of the concept allows for a faster product implementation due to the flexible foundation, resulting in high replayability and reusability. The simplistic and accessible design has allowed minimizing the involvement of the company's personnel for the introduction and in-game assistance, as well as gave the possibility of including various riddle concepts within the same storyline. Such a platform will provide an immersive and entertaining experience for the end-users.

Further research is necessary to gain information about the precise cost structure of the product as well as to discover possible key partners for this product.

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