

# CPSC 304 Project Cover Page

Milestone #: 1

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Group Number: 59

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By typing our names and student numbers in the above table, we certify that the work in the attached assignment was performed solely by those whose names and student IDs are included above. (In the case of Project Milestone 0, the main purpose of this page is for you to let us know your e-mail address, and then let us assign you to a TA for your project supervisor.)

In addition, we indicate that we are fully aware of the rules and consequences of plagiarism, as set forth by the Department of Computer Science and the University of British Columbia

## **Project Description**

### **What is the domain of the application?**

The domain of this application is the tourism and entertainment sectors. This application provides escape room fans means to engage with their favorite teams and events by providing functionality related to team and player information, escape room puzzles and related statistics. The application also provides escape room operators means to develop their establishments by providing functionality related to analyzing statistics, managing puzzle props and monitoring room ratings. The application aims to enhance the user experience of the passionate escape room fans and provides an efficient means for escape room operators to build a more compelling attraction.

### **What aspects of the application are modeled based on the application?**

The key aspects of the domain modeled by the database are:

1. **Escape Room:** This represents escape rooms which have an Room #, name, genre (eg. Horror, Fantasy, Mystery etc.) and time limit.
2. **Puzzle:** Each escape room has several puzzles with an Puzzle #, name and difficulty level (such as beginner, intermediate or expert).
3. **Prop:** Each puzzle has props that are used to make and solve the puzzles for that room. These can be damaged over a course of time which is indicated by the "Status" attribute. For example cupboards, locks, keys, clocks etc.
4. **Team:** Each escape room game is completed by a team which is made of several escape room players and has capacity for the number of players it can accommodate.
5. **Score:** Each team is assigned a score for completing a given escape room puzzle based on their performance.
6. **Booking:** Stores the information of the date and time of team reservations of escape rooms.
7. **Rating:** Stores the ratings for escape rooms given on different criteria like fun, difficulty, room theme etc.
8. **Player:** Stores information of escape room players, their skill level (such as novice, experienced, expert), playing style (such as systematic, creative, adaptive etc. ) along with the year since when they are a part of their current team.
9. **Employee:** Stores information of escape room players along with their phone number and position (such as technician, designer, coordinator etc.).

## Database specification

### **What functionality will the database provide?**

The database project creates a platform for escape room lovers to get the information of ratings of different escape rooms, performance of their favorite teams and for the escape room managers to gather the feedback from the user. The site will provide ratings for the escape rooms on different criteria (such as fun, difficulty, room theme etc.), and also the names of the top teams to solve different puzzles of the escape rooms. This would assist employees in making decisions about adjusting the difficulty of the puzzles, checking condition of the props and assess the average age of their viewers to tailor their games towards them.

## Description of the application platform

### **What database will your project use (department provided Oracle, MySQL, etc.) ?**

Our project will use the department-provided Oracle as our database.

### **What is your expected application technology stack (i.e., what programming languages and libraries do you want to use)?**

We plan to use Javascript with node.js for both our frontend, backend, and the interaction with the database. HTML and CSS will also be used to create the webpage of our app.

## ER Diagram

