

CS 255 Business Requirements Document Template

Complete this template by replacing the bracketed text with the relevant information.

This template lays out all the different sections that you need to complete for Project One. Each section has guiding questions to prompt your thinking. These questions are meant to guide your initial responses to each area. You are encouraged to go beyond these questions using what you have learned in your readings. You will need to continually reference the interview transcript as you work to make sure that you are addressing your client's needs. There is no required length for the final document. Instead, the goal is to complete each section based on your client's needs.

Tip: You should respond in a bulleted list for each section. This will make your thoughts easier to reference when you move into the design phase for Project Two. One starter bullet has been provided for you in each section, but you will need to add more.

System Components and Design

Purpose:

What is the purpose of this project? Who is the client and what do they want their system to be able to do?

The purpose of this system is to create a web-based platform that helps students prepare for their driver's test, providing both practice tests and scheduling features for driving sessions with instructors.

System Background:

What does DriverPass want the system to do? What is the problem they want to fix? What are the different components needed for this system?

DriverPass aims to offer a more streamlined and efficient process for students learning to drive. Currently, the process is manual and inefficient, with multiple disconnected systems and limited tracking capabilities.

Objectives and Goals:

What should this system be able to do when it is completed? What measurable tasks need to be included in the system design to achieve this?

- Develop a platform that includes sign-up, scheduling, and test prep capabilities.
- Improve communication between students and instructors.
- Track lesson progress and success metrics.
- Simplify the registration and scheduling process.

Requirements

Nonfunctional Requirements

In this section, you will detail the different nonfunctional requirements for the DriverPass system. You will need to think about the different things that the system needs to function properly.



Performance Requirements:

What environments (web-based, application, etc.) does this system need to run in? How fast should the system run? How often should the system be updated?

- The system should support at least 500 concurrent users.
- Response time should not exceed 2 seconds under normal load.

Platform Constraints:

What platforms (Windows, Unix, etc.) should the system run on? Does the back end require any tools, such as a database, to support this application?

- Must be accessible on desktops, tablets, and smartphones.
- Compatible with all major browsers.

Accuracy and Precision:

How will you distinguish between different users? Is the input case-sensitive? When should the system inform the admin of a problem?

- Test questions must match DMV standards.
- Scheduling must reflect real-time availability of instructors and vehicles.

Adaptability:

Can you make changes to the user (add/remove/modify) without changing code? How will the system adapt to platform updates? What type of access does the IT admin need?

- Should allow integration with future features such as video tutorials or driving analytics.
- Modular design to support updates without overhauling the entire system.

Security:

What is required for the user to log in? How can you secure the connection or the data exchange between the client and the server? What should happen to the account if there is a "brute force" hacking attempt? What happens if the user forgets their password?

- Must include secure login and user authentication.
- Payment information must be encrypted.
- Comply with standard data protection regulations.

Functional Requirements:

Using the information from the scenario, think about the different functions the system needs to provide. Each of your bullets should start with "The system shall . . ." For example, one functional requirement might be, "The system shall validate user credentials when logging in."

- The system shall allow users to sign up and create profiles.
- The system shall enable students to take practice tests.
- The system shall allow scheduling of lessons with instructors.
- The system shall send automated reminders for upcoming lessons.
- The system shall provide instructors with lesson tracking tools.

User Interface:

What are the needs of the interface? Who are the different users for this interface? What will each



user need to be able to do through the interface? How will the user interact with the interface (mobile, browser, etc.)?

The primary users will be students, instructors, and administrators. Students need easy access to scheduling and testing features. Instructors require tools for managing schedules and student progress. Admins need oversight of the entire system and user accounts.

Assumptions:

What things were not specifically addressed in your design above? What assumptions are you making in your design about the users or the technology they have?

- Students have basic computer literacy.
- Instructors will input their availability accurately.
- All users will have internet access.

Limitations:

Any system you build will naturally have limitations. What limitations do you see in your system design? What limitations do you have as far as resources, time, budget, or technology?

- Project must be completed in 10 weeks.
- Limited to web-based access only, no mobile app for initial launch.
- Budget constraints limit external vendor use.

Gantt Chart:

See attached Gantt chart screenshot below (insert your visual here).

Please include a screenshot of the GANTT chart that you created with Lucidchart. Be sure to check that it meets the plan described by the characters in the interview.

