# 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?*

* Create a system for driving training
* Would be used by people wanting to do better on driving tests
* System should allow users to schedule driving practices and access online materials

### 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 seeks to help improve the success rates of DMV driving tests
* DriverPass should allow users to schedule driving practices with provided vehicles and drivers on given dates and times
* The system should also allow access to online materials

### 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?*

* The system should have a running schedule of drivers and time slots they are available
* Hierarchical roles should be established for maintenance
* Changes to users' schedules should be logged for future reference
* The system should be cloud-based
* DriverPass should have three options for packages users can buy
* Users should be able to access online content should they have purchased the access rights to do so
* The system should also display information such as but not limited to online test progression, user information, driver notes, special needs, driver photo, student photo, etc.

## 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 will be web-based
* System should update as changes are published to the server
* With a web-based server utilizing the cloud, the server should be highly responsive with minuscule load time

#### 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?*

* The system is web-based, so most computer operating systems should be able to run without hindrance
* The application should be able to display on mobile screens as well as desktop screens
* The system would require databases to hold user account information and course material.

#### 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?*

* When an account is made it will require a unique username that can be used to identify the user.
* Requiring the username to be case-sensitive would be best to ensure proper verification.
* The system should inform the admin as a problem occurs as the system would be updating constantly.

#### 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?*

* Code modifications should not be required to change user accounts. Accounts should be able to be added, removed, or modified to a system update.
* Updates to the platform should be handled modularly such that they can be integrated with system updates.
* The IT Administrator should have access to any database associated with the server, including user and employee accounts and course information. They would also need access to the web application to make necessary edits when application modifications are needed.

#### 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?*

* The user would need to input the username and password to log in to their account.
* Cookies and 2-Step Authentication such as a Captcha can be used to ensure a secure connection.
* The number of attempts allowed to log in can be restricted to help prevent “brute force” hack attempts.
* The user could be required to answer a security question to reset their password or receive an email with a security code.

### 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 validate a user’s credentials when logging in.
* The system shall allow for a user to reset their password.
* The system shall allow the user to choose from three different bundles that vary in price.
* The system shall allow the user to access online course material at their convenience.
* The system shall allow the user to schedule driving practices based on an updated schedule.
* The system shall display information specific to the user.
* The system shall update at the time of interaction to reflect changes made by the user.

### 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 interface would need information from databases to access the proper information per user account.
* The interface must display information specific to the user and allow interaction to access course progression, driving test schedules, personal information, and packages.
* Employees should be able to access and modify user accounts, change information on the site, and alter privileges as necessary and allowed by their own privileges.
* The user should be able to access the interface from almost any device that is has access to the internet.

### 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?*

* Databases are accessible and able to be maintained, as well as having access to cloud services.
* The user should have access to a device that can access the internet to access the service.

### 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?*

* The time of this project can be considered a limitation as we are not given the number of personnel who will be able to work on the project.
* As stated in the assumptions, we are assuming that access to cloud services and databases are provided or covered, but this needs to be ensured.
* Any requirements requested during development are also going to strain the team to be able to deliver a finished product by the set deadline.

### Gantt Chart

*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.*

*A screenshot of a gantt chart

Description automatically generated*