# 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 project is the client DrivePass is seeking to create a service for students to learn how to drive and receive resources on how to pass both on the road and written tests. The service will provide access to online practice exams, and the ability to schedule and receive on the road practice with an instructor.

### 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?*

* The system will need a tool for quizzing, taking practice exams, and for online videos explaining topics. Additionally, there is a need for an appointment system. There will need to be an account management system for keeping track of user data to hold this information to each member.

### 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?*

* Functionality wise, the system will need to be able to have users create an account to track study progress in lessons, as well as helping them schedule on the road practice tests. In these practice tests, the instructors will be able to leave feedback for users for their appointments.

## 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 needs to be running in a web based environment so it can be accessible on the road and from home. Additionally, it needs to be updated ever so often when the rules and regulations change. The system will need to be optimal to serve an exponential number of users.

#### 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 should run on windows, mobile platforms such as apple iOS and google’s Android. It will require a User database to host user information and rights for those accounts such as standard user and admin account, the ability to send emails to those accounts and newsletters, additionally there is a requirement to store data for the appointments users do.

#### 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?*

* The users can have any username however there is a 4 digit number following every user, allowing 1,000 variations of each username. The user is not case sensitive. And there will be a helpdesk ticketing system for issues with accounts that cannot be resolved through the automatic forgot password tool.

#### 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?*

* Admins will have access to a web based application which will allow them for a limited period of time to reset a users credential. Upon finding a user and clicking on the “reset” password button, an email will be sent to the user with a button to reset their password on their own device. This will keep rights limited to what IT admins can do to user accounts.

#### 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 can sign in with other accounts that can share access of information, such as google, apple, or facebook sign in methods through the use of their APIs, but for the requirement the users will need to input first name, last name, email address, country, and a phone number for contact. If users are booking appointments, or acquiring memberships it will force the user to add a credit or debit to give them the ability to purchase and save the card for future use.

### 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 require a user account in order to have access to the main web page.
* The system shall validate users information and password for signing in.
* The system shall validate with an MFA method to sign in, if one is not setup it will require users to setup in order to sign in.
* The system shall validate appointment scheduling with an instructor. When an appointment is requested, a user will receive the ability to schedule a date and time with an instructor who is available at those times.

### 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 standard users will need to setup accounts, view and create appointments, watch instruction videos, and quizzes. All of these services will be accessible from a computer and mobile phones.
* Admin accounts will be able to access a help desk ticketing system, and a simplified user data base which only shows user names. However they will need to request access each time they need to reset a users password which will be approved by the appropriate high admin users.
* Instructors will need access to the appointment system, access to user contact information for the appointments they are scheduled for.
* The instructors will all need access to a documentation and note taking software within each appointment which can be sent to a user following the appointments.

### 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?*

* Assumed that users will be able to create an account with simple instructions.
* Assumed that instructors will not be able to be trained on the note taking software.
* Assumed there will be IT support will be readily available for in the very least limited time in order to respond to user inquiries which cannot be resolved with the automatic tools.
* We assume that the users will know how to use basic quiz taking technology such as duolingo or khan academy.

### 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?*

* Limitations in the software used by the admins and instructors, since these are not customer facing, in the wake of lack of funding the graphic UI and designs for these are not priorities.
* Limitation in time allocated, there needs to be a minimum viable product outlined to ensure we atleast make a functional product prior to release to the client requirements.
* The limitation on continued updating, ensure there are no bugs to avoid the futures updates.

### 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.*

[Insert chart]