# 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?*

* Our client, DriverPass is a company that wants to provide training for those taking their driver’s test. They want a system to be created that allows them to provide online tests to customers, as well as organize customer information, such as reservation and payment information.

### 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 problem that DriverPass wants to solve is the lack of driver training provided to drivers. DriverPass intends to solve this through providing online classes and practice tests, in addition to in-person instruction and lessons. Doing so should reduce the likelihood of a potential driver failing their official driving test at the DMV.

### 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?*

* System data must be stored online through the cloud and be available for download for offline use.
* When changes are made to customer information and data, a history should be provided to show which user made the change.
* Reservation system must be created and customer should be able to make it themselves, or a user can input a reservation for them.
* Have a feature that notifies users of an update in DMV policy directly from the DMV website.
* New customer input form created that allows potential customers to be contacted by users.
* Main interface should include: Online test progress, customer information, driver notes.

## 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?*

* Web-based
* Smartphone and tablet friendly
* System’s information would be updated as the DMV updates rules and tests

#### 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?*

* System will be web-based
* Run from the cloud, cloud should provide security and backup functionality

#### 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 system can differentiate between the different users through their username that would be case-sensitive, and not allow for more a specific username to be used more than once.
* The system should inform the admin of a problem if connection to the DMV website it lost, so it can be reconnected and allow data to updated if needed.

#### 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?*

* To create add or remove modules there would need to be developer support
* The IT Admin would be able block access to a module however, and they would be able to make changes to the user by calling functions written beforehand that allow for those actions.

#### 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?*

* Client wants the customer to be able to automatically reset their password if forgotten
* A two step verification can be created, have customer submit a phone number during account creation, and when resetting a password have the customer verify the phone number and the unique code sent to their phone.
* After 5 failed attempts, logging in to the account should be blocked and they should be prompted the reset password screen

### 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 user credentials when logging in
* The system shall allow users to reset password, and will force it if they fail 5 times
* The system shall display user dashboard, and will include the following information: Online Test progress, User information, Driver notes, driver photo, student photo.
* The system shall allow users to take online practice exams
* The system shall allow users to book their own appointments for in-person driving lessons
* The system shall display information on how the user can get in contact with DriverPass staff
* The system shall display a form for new users that will allow staff to contact potential customer

### 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.)?*

* Different users include: Customers and Staff (IT, Secretary, CEO, Drivers)
* The customers would most likely interact with the system’s interface through a smartphone or a computer. From this interface they should be able to take their practice exams, as well as make, cancel or modify their appointments.
* The staff would user the computer interface for the system. They would need to be able to print staff activity reports, access customer data, maintain the system, and also make appointments for users that call.

### 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?*

* Assume that they have an internet connection
* Assume that they are an English speaker
* Assume there is a cloud service willing to host DriverPass

### 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?*

* Limitation on time, since there are features that would be helpful to system design but will be possibly added later so that focus can be on essentials of system.

### 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.*

Chart, timeline

Description automatically generated