# 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 the project is to set up a system that the client, DriverPass, can access and modify their data for appointments, and the specifics anytime they want even on mobile devices.

### 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?*

* DiverPass wants the system to be accessible on multiple devices, with the ability to edit the data they have access too. Currently they can only access things on their work devices. The first component they will need is a server that can be accessed by multiple devices, as long as they are online, they will also need the ability to edit data and have that change reflected server wide, finally they’ll need to restrict access of certain files from specific employees, and to even remove them entirely if necessary.

### 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?*

* A company wide server, with different levels of access, that can be accessed and edited by any device with access. This can be broken down into several parts, a server that can be accessed by multiple devices; restrict the server to only people who has been given access and further restricted points in the server. The ability to edit the parts you have access to, and those changes reflected to everyone with access

## 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 run and be accessed anywhere, at least that is the goal. So it should be able to run on pretty much every major platform; which would include Android, IOS, and Windows.
* It needs to be fast enough where if information is updated on one end, it will visibly update wherever it is being viewed as well.
* The system will need to be updated regularly if there is a new security update, a version of it is crashing regularly, if the layout is updated, or if there any other general updates or regulations.

#### 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 main platform constraint that needs to be taken into account involves the web browser such as https/ Java accessibility, as well as IOS and android updates
* The back end can be set up where all the information is on a web browser, so that the mobile versions of the system port into the app itself

#### 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?*

* Every user will need a username and password to login and see any information
* The inputs should be case-sensitive as that is a more secure way of doing things
* If there are more than two failed attempts to sign in a security measure should be in place to warn the admins and request a password reset

#### 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?*

* The ability to make changes would involve messing with the code, adding, removing, or modifying the existing code.
* Updates should be handled based off OS updates. It is likely new versions will be needed whenever IOS and android updates, this can be handled by taking down the web browser version during low traffic times as the mobile versions are ported to that version.
* There is also an IT admin, and they will access and ability to modify the source code, as well as all rules and regulations for the DMV.

#### 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 logins are secure because they require a username and password and they alert the admin when there are too many failed attempts to log in.
* The limit on how many times one can attempt to login will stop brute force hacking, and with the admin notified can log off and lock that users profile from the back end which should prevent any long term damage
* If the user forgets their password there could be security question with preset answers, an option to have an email sent to reset their passwords, or contact support that has direct access to all accounts via a phone number

### 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 update any documents and information between platforms
* The system shall allow the reset of any password
* The system shall information to be modified by any platform
* The system shall tell the progress of the class and hours logged
* The system shall be updated with new rules or regulations
* The system shall show progress
* The system shall display user information

### 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 user interface will naturally depend on the what platform is being used to access it. On a web browser the interface will be a mouse and keyboard.
* Android and IOS it will the phones touchscreen
* No matter the platform or layout it should display; progress, driver notes, student info, drivers photo, and student photo

### 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?*

* Some of the things not addressed in the user interface section as nearly all of the target audience would know how to use their smartphone and PC.

### 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?*

* Some limitations would include screen size. When moving from a web browser to an app on a phone the display space is drastically smaller.
* As well that phones can’t draw as much power as a PC, which means we’ll need to optimize the stress from what the systems demands from the device.
* The limitation about the time don’t count for the inevitability of issues with coding. Programming is fickle and there is no way getting around encountering at least a couple bugs.
* The budget is good, assuming no huge security flaw happens, then it will cut into profit.
* The technology limits are null, web browsers on computers will naturally have more processing power when compared to smart phones. But this just means we’ll have to ensure the app versions are well optimized for that.

### 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.*

