Software Requirements Specification

for

<Project Name>

at The Department of Electrical and Computer Engineering,

The University of the West Indies

St Augustine Campus

Trinidad

Version x.x.x (Draft/Approved)

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# Document Control

Title:

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Author(s):

## Document Signoff

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| Nature of Signoff | Person | Signature with Date | Role |
| Author  Reviewees | Severus, Albus, Mad Eye  Lord Eddard Stark |  | Project Manager, Requirements Analyst and Consultant  QA Officer |

## Document Change Record

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| --- | --- | --- | --- |
| Date | Version | Author | Change Details |
| 13 Sept 2021 | 0.0.0 | All the managers dem | Initial template commit |

# 1. Introduction

## 1.1 Purpose

As of 2020, the world was forced into a pandemic situation due to the rise of COVID-19. As quarantine protocols such as travel and business restrictions are lifted, many persons need to submit a PCR test to engage in these restricted activities. Within Trinidad and Tobago, public health centers operate on a “walk in” basis. This type of operation can cause breaches in COVID-19 health regulations due to the influx of persons entering the health facility.

An appointment web application can be used to manage the number of persons entering the facility for a PCR test. The application limits the number of persons entering the facility for a PCR test which helps the facility adhere to National health regulations.

<Identify the product whose software requirements are specified in this document, including the revision or release number. Describe the scope of the product that is covered by this SRS, particularly if this SRS describes only part of the system or a single subsystem.>

## 1.2 Product Scope

The software system is a web application for online registration and scheduling of a COVID-19 PCR test at a public health center. This software application changes the operation of the health facility to better adhere to health regulations such as social distancing and person limits. It also reduces the number of visits a person makes to the facility as well as optimize its operation. This system is beneficial to a governing body of a country since the PCR test process is digitally optimized. The system also aids the governing body enforce its health protocols and regulations. Additionally, corporations would also benefit from the system since they can make appointments for their employees since some companies require staff to have proof of negative COVID-19 reading.

<Provide a short description of the software being specified and its purpose, including relevant benefits, objectives, and goals. Relate the software to corporate goals or business strategies. If a separate vision and scope document is available, refer to it rather than duplicating its contents here.>

<A product scope/context diagram should be presented here. See: <https://www.youtube.com/watch?v=iY7xZ8Nut5A>>

## 1.3 References

<List any other documents or Web addresses to which this SRS refers. These may include user interface style guides, contracts, standards, system requirements specifications, use case documents, or a vision and scope document. Provide enough information so that the reader could access a copy of each reference, including title, author, version number, date, and source or location.You should do this section last - before publishing the specification>

# 2. Overall Description

## 2.1 Product Perspective

<Describe the context and origin of the product being specified in this SRS. For example, state whether this product is a follow-on member of a product family, a replacement for certain existing systems, or a new, self-contained product. If the SRS defines a component of a larger system, relate the requirements of the larger system to the functionality of this software and identify interfaces between the two.

A simple diagram that shows the major components of the overall system, subsystem interconnections, and external interfaces should be included here.>

## 2.2 Product Functions

<List the major functions the product must perform or must let the user perform. Details will be provided in Section 4, so only a high level summary (such as a bullet list) is needed here.

Include a top level data flow diagram.>

# 3. External Interface Requirements

<Describe each interface identified in product scope/context diagram (from Section 1.2) and major components diagram (from Section 2.1). Note: interface can be a user interface (eg. GUI screen), a hardware interface (eg. to sensor, RFID reader, scanner, printer etc), a software interface (eg. API to separate inventory program which your software should pull information from), or a communications interface (eg. HTTP, I2C, FTP, Texas 1-wire, etc...>

# 4. Specific Requirements

<Specific Requirements should be listed in this section. Requirements may be grouped by: system feature, use case, mode of operation, user class, object class, functional hierarchy, or combinations of these, whatever makes the most logical sense for your product.>

Example follows (this particular example organizes by system feature):

Priority Flags (in this example): Necessary - High Priority, Highly Desirable, Desirable, Optional - Low Priority

4.1 Task Management  
4.1.1 Feature Description  
This feature allows the TR to view tasks assigned by the CSC and check off completion of task. CSC can view logged information on checked off tasks.

4.1.2 Stimulus/Response Sequences  
CSC creates a task, assigns it to a TR with date of expected completion  
TR receives task notification  
System checks off task completion when TR sends a report  
  
4.1.3 Functional Requirements

|  |  |  |
| --- | --- | --- |
| Label | Requirement | Priority |
| REQ1-1 |  | Necessary |
| REQ1-1.1 |  | Necessary |
| REQ1-1.2 |  | Highly Desirable |
| REQ1-2 |  | Highly Desirable |
| REQ1-2.1 |  | Desirable |
| REQ1-3 |  | Highly Desirable |
| REQ1-4 |  | Highly Desirable |
| REQ1-4.1 |  | Desirable |
| REQ1-5 |  | Necessary |
| REQ1-5.1 |  | Necessary |
| REQ1-6 |  | Necessary |
| REQ1-7 |  | Highly Desirable |
| REQ1-8 |  | Highly Desirable |

4.2 Report Management  
4.2.1 Feature Description  
  
<Here’s a description>  
  
4.2.2 Stimulus/Response Sequences  
  
TR fills out report, sends to CSC  
CSC receives push notification when a report is sent  
  
4.2.3 Functional Requirements

|  |  |  |
| --- | --- | --- |
| Label | Requirement | Priority |
| REQ2-1 | The system will store the report information in a shared data repository. | Necessary |
| REQ2-2 | The system will store associated information with the report - the user that made the report and the date that the report was created - in the shared data repository. | Necessary |
| REQ2-3 | The system will send a push notification to the CSC when a report is saved consisting of a label “New Report from”, plus the name of the TR making the report. | Desirable |
| REQ2-4 | The system will store the report information locally on the mobile device of the TR if there is no online connectivity. | Highly Desirable |
| REQ2-5 | The system will allow a CSC to view a list of all reports ordered by most recent report first. | Necessary |

4.3 Contact Management

4.3.1 Feature Description  
  
System will be able to manage a shared list of contacts.   
  
4.3.2 Stimulus/Response Sequences  
  
User creates/edits a contact, contact added to/modified in master list of contacts  
User views master list of contacts, clicks on a single contact, brings up detailed information  
  
4.3.3 Functional Requirements

|  |  |  |
| --- | --- | --- |
| Label | Requirement | Priority |
| REQ 1 | The system will allow customers to book appointments for a PCR test. | Necessary |
| REQ 1-1 | Users will have access to a log that contains all appointments, upcoming and previous. | High Priority |
| REQ 1-2 | The system will send reminders to users for upcoming appointments via email. | Low Priority |
| REQ 2 | Users will be able to complete and submit PCR test forms prior to booking. | Necessary |
| REQ 3 | The system will have three user classes: ‘admin’, ‘staff’ and ‘end user’. | Necessary |
| REQ 4-1 | All submitted files will be added to a database. | Necessary |
| REQ 4-2 | System will add newly submitted forms to the end of a queue for admin and staff viewing. | High Priority |
| REQ 5-1 | System will notify users when results are available via email | Low Priority |
|  |  |  |
|  |  |  |

4.4 Other non-functional requirements (not captured with specific features)

|  |  |  |
| --- | --- | --- |
| Label | Requirement | Priority |
| REQ 6 | User information will be secure and only accessible and modifiable by system admins. | Necessary |
| REQ 7 | System admins will be able to use all system functions after four hours of training. | Low Priority |
| REQ 4-3 | The ‘staff’ user class will only be able to view the appointments but cannot alter the data in it. | High Priority |
| REQ 8 | The web application will be applicable for booking at all relevant centers. | Low Priority |
| REQx | The web application will be functional on all mobile devices | Low Priority |