The purpose of this document is to convey information about the application's requirements, both functional and nonfunctional of the Outpatient Management System for Hospital.
It describes the functions, goals and task the system can perform.Software Development Team (SDT) would use this document to describe the scope of the project and to plan for the system's design and eventual implementation. SDT should consult this document and its revisions as the only source of requirements for the project. They should not consider any requirement statements, written or verbal until they appear in this documenter its revision. It would also serve as a legal document to protect the interests of the solution providers once the requirements have been established.
This document is not only for the SDT's but intended to several groups as follows:
•The hospital management and its team members should use this document and its revisions as primary means to communicate confirmed requirements to the SDT. The SRS will serve to establish a basis for agreement between the client and development team about the functionality to be provided by the application.
•The project manager will use this document during project planning and monitoring.
•Application managers will review the document to clarity their understanding of what the application does.
•Test planners will use the document to clarity their understanding of what the application does.

3Scope of the work
The proposed software product is the OPD token management system. The system will be used in the Outpatient Department (OPD) of the hospital. The system will be used to register a new patient for the OPD consultation and provide appointment to the new patients for the doctor's consultation. The OPD token management system consists of following assets.

•Patient Name
•Patient Age
•Gender
•Department Name
•Mobile No
•Time/Date
•Entitle ID No
•Army ID No
•Token NO
•Token Fee
•Specialist Fee
•Referral Department
•Referral No
•Appointment List (Departmental/ Combined)/ (Daily/Monthly/Yearly)
•Diagnosis (Manually Entered)

•Patient history in excel sheet
•Ward Admission
•Ward Admission no
•Ward Admission Fee
•Summary

The administrator will use this system for generating reports and analysis so that it can be further use for the better functioning of the hospital. The system will also help the hospital with one of the major problems they are facing and i.e. managing the long queues of waiting patients.
The project client has determined that the application will provide the following benefits:
1) Provide patient satisfaction by reducing the waiting time and also providing the appointment to the patient online.
2) Help the hospital staff to manage the queue of the patient in the OPD.
3) Reducing the paperwork.
4) Reducing the Staff.
5) Provide with the facility to easily search and take reports about the day to day operations and leading to more efficient and effective providing of services to the patient coming to the OPD for the consultation

3.1Product perspective

The OPD Management system is a self contained system that manages activities of the Outpatient Department of the hospital which includes the patient registration, providing appointment to specialist Doctor, billing for the patient and also managing queue of the patients during the OPD hours. The system also provides the reports and analysis for the administrator which helps them in decision making. The System would have the following stakeholders using the system directly and indirectly.

4Stakeholders

The stakeholders and their characteristics are as follows:
1) Patient: He/ She is a person coming to the hospital for any consultation from the doctor present during the OPD hours. The patient will not be a direct user of the system but the system is majorly been used for individual patient records in the database. The system will get the input from the patient and some of the outputs is provided to the patient.
2) Front Desk Personnel:They all have general reception duties. Every staff has basic computer training. They are responsible for taking the patient information from the patient and entering the information in the system.
3) Billing Personnel: They all have the duties of general cashier to collect money from the patient for the various services in the OPD which includes payment of pre consultation billing and billing for the other services like Radiology, Lab Investigation and other medication charges. They are also using the system directly for billing purposes.

5Product functions

The system functions can be described as follows:
1) Registration of the Patients: Whenever a new patient is coming for the OPD Consultation, the front desk personnel register the patient to the system. The system

generates a UID for the patient which is now been used by the other users who are the part of this system. If the patient is old then the front desk personnel search for the patient in the system by using its UID or any other data element such as Name, mobile number etc.

2) Appointment: The patient can get the appointment through this system. The registered patient is been provided with the appointment with the consultant. The front desk personnel gives appointment while checking the scheduler of the consultant which is been provided by the doctors in the system. The system generates a token number after the appointment has been saved. SMS facility is also been provided in near future.

3) Billing: In this, the billing personnel logs into the system and provide with the bill for the patient. The bill includes the pre consultation billing and billing for the services which is ordered after the doctor consultation.

4) Report Generation: The system generates the reports as per of the Administrator option selection. Like they can see the daily/ weekly/ monthly/yearly census, department wise census etc.

General constraints

1)The System is having MYSQL database

2)The language used is HTML

3) The hospital management wants the system should be integrated to the other departments.

4)The system should have a Graphical user interface so that the user feels it easy to use.

5)The system should be having very less down time not more than 1 minute.

Assumptions and Dependencies

•It is assumed that the hospital will have at least 1 computers with the Windows 7 or above as the Operating System for OPD Token Management system.

•The hospital should have Display Systems installed at the entrance the Hospital.

•It is assumed that the Hospital will have enough trained staff to take care of the system.

6Functional Requirements

Note: * represents Low Priority; ** Medium Priority; *** High Priority

6.1Registrations

Patient Details ***

The system shall have the following mandatory information for patient: First Name, Last Name, Phone Number, Address (Present & Permanent) Postal Code, City, Country etc.

Registered New Patient***

The system should be able to register new patients coming for the OPD.

Generate UID ***

The system should generate a patient ID after the registration has been done. It should also be providing a registration print out.

Patient Search***

The older patients should be able to search in the system easily using the UID, patient name, mobile number, etc

Revisit the old patient**
The system should not provide another UID for the older patients who are coming for the revisit in the OPD.
6.2Consultant Scheduler
Upload Schedule
The system should allow administrator to upload a scheduler in a specific format monthly.
Change Update Schedule
The system should allow administrator to do any changes/ updating the scheduler is necessary.
Reminder
The system shall allow the administrator to send reminders to the consultants about the scheduler updating by the doctor monthly/weekly as needed.
6.3Appointment
Appointment to the patient
The system should provide appointment to both old and new patients after the complete registration.
Appointment Detail
Appointment shall contain the following: Date and Time of the appointment, Consultant Name (if provided by the patient), Reason for appointment (Optional).
Generate Token No
The system should generate a number not same as UID which may term as Token no for the appointment of the patient.

Appointment Update
The system shall allow the users to update/ change the appointment details and the updated details.
Token Assign
The system shall allow the administrator to update/edit the token number if the patient has not arrived for that day. (The token number can be assigned to any other patient).

6.4Billing
Patient Bill
The system shall provide with the billing for OPD services in the Hospital.
Bill Print
The system shall print out the bill to the patient before going for consultation Other services billing is to be provided as per order
Database.
Each Staff who are directly or indirectly involved in the system shall have mandatory information: Employee ID, First Name, Last Name, Phone Number, Address, Postal Code, City, Country, Employee Type.
Reset Information
Before saving in the database, there should be reset option if entered incorrectly.

Employee Search
The system shall allow the administrator to search (using last name, first name or Employee ID).
Update Employee information
The administrator shall be able to update any information in the database.

6.5Report
Periodic Report
The system should generate reports for the number of registration periodically (daily/weekly/ monthly/ yearly).
Analysis
The system should help the administration to analyze the data with any option present in the database.

7Non-Functional Requirements
Login ID
All the users using the system should have login ID and password respectively.
Modification
Any modification in the database (insert, change or update) shall be synchronized and done by the administrator.
Signature
The bill/ registration slip generated should have a provision of electronic signature.
Users
Users shall be able to view all the information in the system regarding their specific module but shall not be able to modify any information in it.
Authentication
Administrator should be provided with an additional password for authentication (including username and password).
Capacity
The system must support at least 50 people at any given specific time (offline)
User Interface
User interface should open within 5 seconds.
Response Time
The system shall give response within 2 seconds after submitting the details.
Backup
System shall provide the capability to back up all data.
Downtime
The system should not have a down time more than 10 minutes.
Error
The system shall keep a log of all the error which might have been done by the users during the usage.
Demo
The system shall provide a demo of the different options and how does the system work.

Reliability

The system shall be available working 24 hrs and especially from 8 am to 2 pm (OPD timings).

Graphical user Interface

The system should have a Graphic User Interface so that it becomes very easy for any user to learn it and also decreases the time to finish any operation.

Interoperatibility

The system should have the capability to be integrated with the system for future.