Scope of Project

We use this application to implement an online pharmacy store like Pharmeasy/ netmeds. In the application, suppliers could add the drugs they want to sell via the application, while the users would be able to buy the pills they are interested in. The primary purpose of this application would be to maintain a database where both the suppliers and customers can work together to have a beneficial relationship. Moreover, we would also be managing a database of the transporters and delivering the orders based on the transporters' availability and the user's address.

Stakeholders

The stakeholders Involved are:

- Consumers (Patient)
- Doctors
- Sellers (Chemist)
- Transporters

Entities

The company is organized mainly into four sections, one for every stakeholder and another for employees related to different departments. Each department has a unique name and ID, and each employee will only be working for a single department. Employee's name, social security number (SSN), department, address, salary, sex, and age are maintained by the company. Although guaranteed to work under only one department, employees can work on several projects (under the same department). Each employee has one direct supervisor to whom he is accountable. The supervisor is solely responsible for reporting their performance for bonuses and promotions.

Employee (Employee_ID, Departement, Supervisor, PAN_Number, Aadhaar_Number, First_Name, Last_Name, Apartment, Street, City_Village_Town, District, State, Pincode, DOB, Age(Derived Attribute), Employee_Phone_Number, Photo)

Consumer (CIN, PAN_Number, First_Name, Last_Name, Sex, Age, Email_ID, {Phone_Number})

Drug (Name, Salts (Composition), Expiry_Date, Manufacturing_Date, Producer, Price, Quantity, Category, Handling_Details)

Doctors (Consultations) (fname, lname, age, sex, {Phone_Number}, specialization, Work_Experience, Qualifications, Current_place_of_Work, Departement)

Niche_Requirement (Type, Defcon, Location)

Supply_Chain_Control (Demand, Supply, Government_Guidliance, legality_check)

Transporter (TID, Transporter_Name, Category, Open_hours, Handling_provisions)

Sellers (SID, Stock, Category, Location, Open_hours, Discount)

Department (Department_ID, Department_name)

Prescription (PID, Organisation_details, Doctor_details, medicinal_details, Patient_details, Date)

Branch (Branch_Name, Street, City_Village_Town, District, State, Pincode, Opening_Date)

Card (Card_Number, Linked_Mobile_Number, Card_Pin, Issued_Date, Expiry_Date, CVV, Daily_Limit, Monthly_Limit)

Insurance ((Policy_ID, Policy_Start_Date, Policy_Duration_Years, Policy_Expiry_Date(Derived Attribute), Premium_Amount, Sum_Insured, Unclaimed_Amount)

UPI (UPI_ID, Active_Status, Last_Used,Transaction_Limit_Remaining)

UPI_Transactions (UPI_Transaction_ID, From_UPI_ID(FK references UPI(UPI_ID)), To_UPI_ID(FK references UPI(UPI_ID)), Transaction_Date_Time, Transaction_Status, Transaction_Amount)

Bill_Payment (Bill_ID)

Auto_Payment (Auto_Payment_ID, Payment_Date, Payment_Frequency)

Transaction_Log (Log_ID, Log_Date_Time, Log_File)

User_Credentials (User_Login_ID, User_Login_Password)

Employee_Credentials (Employee_Login_ID, Employee_Login_Password)

OTPs (Account_Number(FK references Bank_Account(Account_Number)), CIN(FK references Customer(CIN)), Valid_From, Valid_Till, OTP)

ER Model

https://drive.google.com/file/d/1N2NhGZo6Ks8a8UDQROjU13JfAB-wPB4O/view?usp=share_link

Relationship Model

Each Employee is related to one department and one branch, which can assign him different projects. On the other hand, multiple employees are in one unit and similarly in one department.

Employee and Consumer credentials are verified using UserLoginID and User Login Password.

Consumers can have a card or can link UPI ID for payment. An automatic payment method is also available, deducting money at the end of each month.

Every Consumer can have multiple prescriptions based on medicines that can be purchased (1 to N relationship).

Employees can supervise Supply Chain based on demand and supply in the market.

One consumer has many transaction logs.

Each payment is authenticated by a One-time password, which is sent to the consumer on checkout.

Niche Requirements of individuals can be fulfilled through online consultations with doctors (N to M relationship holds where N Doctors can assign M medications).