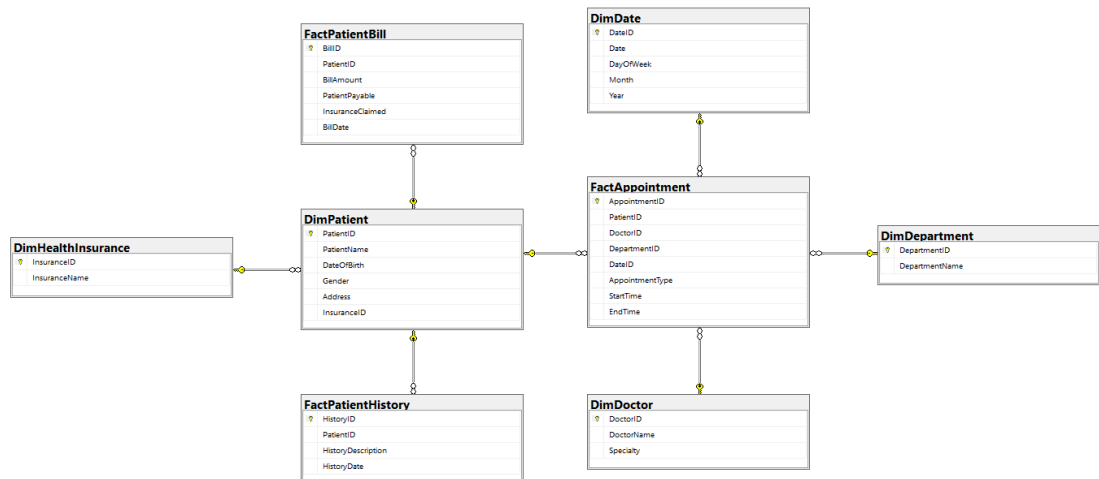


Hospital Management System

Database Diagram:



SQL code:

```
-- Dimension Tables
CREATE TABLE DimHealthInsurance (
    InsuranceID INT PRIMARY KEY,
    InsuranceName VARCHAR(100)
    -- Other health insurance attributes
);

CREATE TABLE DimPatient (
    PatientID INT PRIMARY KEY,
    PatientName VARCHAR(100),
    DateOfBirth DATE,
    Gender VARCHAR(10),
    Address VARCHAR(200),
    InsuranceID INT,
    -- Other patient attributes
    FOREIGN KEY (InsuranceID) REFERENCES DimHealthInsurance(InsuranceID)
);

CREATE TABLE DimDoctor (
    DoctorID INT PRIMARY KEY,
    DoctorName VARCHAR(100),
    Specialty VARCHAR(100)
    -- Other doctor attributes
```

```

);

CREATE TABLE DimDepartment (
    DepartmentID INT PRIMARY KEY,
    DepartmentName VARCHAR(100)
    -- Other department attributes
);

CREATE TABLE DimDate (
    DateID INT PRIMARY KEY,
    Date DATE,
    DayOfWeek VARCHAR(20),
    Month VARCHAR(20),
    Year INT
    -- Other date attributes
);

-- Fact Tables
CREATE TABLE FactAppointment (
    AppointmentID INT PRIMARY KEY,
    PatientID INT,
    DoctorID INT,
    DepartmentID INT,
    DateID INT,
    AppointmentType VARCHAR(50),
    StartTime DATETIME,
    EndTime DATETIME,
    -- Other appointment attributes
    FOREIGN KEY (PatientID) REFERENCES DimPatient(PatientID),
    FOREIGN KEY (DoctorID) REFERENCES DimDoctor(DoctorID),
    FOREIGN KEY (DepartmentID) REFERENCES DimDepartment(DepartmentID),
    FOREIGN KEY (DateID) REFERENCES DimDate(DateID)
);

CREATE TABLE FactPatientHistory (
    HistoryID INT PRIMARY KEY,
    PatientID INT,
    HistoryDescription VARCHAR(500),
    HistoryDate DATE,
    -- Other patient history attributes
    FOREIGN KEY (PatientID) REFERENCES DimPatient(PatientID)
);

CREATE TABLE FactPatientBill (
    BillID INT PRIMARY KEY,
    PatientID INT,
    BillAmount DECIMAL(10, 2),
    PatientPayable DECIMAL(10, 2),
    InsuranceClaimed DECIMAL(10, 2),
    BillDate DATE,
    -- Other patient bill attributes
    FOREIGN KEY (PatientID) REFERENCES DimPatient(PatientID)
);

```