create database HMS;

use HMS;

---

mysql> CREATE TABLE Department (

    -> dept_it INT PRIMARY KEY,

    -> dept_name VARCHAR(50),

    -> dept_head VARCHAR(50));

```
mysql> describe Department;
+-----------+-------------+------+-----+---------+-------+
| Field     | Type        | Null | Key | Default | Extra |
+-----------+-------------+------+-----+---------+-------+
| dept_it   | int         | NO   | PRI | NULL    |       |
| dept_name | varchar(50) | YES  |     | NULL    |       |
| dept_head | varchar(50) | YES  |     | NULL    |       |
+-----------+-------------+------+-----+---------+-------+
3 rows in set (0.00 sec)
```

```
mysql> insert into Department Values (01,'Cardiology', 'Mr Arihant');
Query OK, 1 row affected (0.03 sec)

mysql> select * from Department;
+---------+------------+------------+
| dept_it | dept_name  | dept_head  |
+---------+------------+------------+
|       1 | Cardiology | Mr Arihant |
+---------+------------+------------+
1 row in set (0.00 sec)
```

---

mysql> CREATE TABLE Doctor(

    -> doc_id INT PRIMARY KEY,

    -> doc_name VARCHAR(50),

    -> doc_phone VARCHAR(20),

    -> doc_email VARCHAR(50),

    -> specialization VARCHAR(50),

    -> doc_dept INT,

    -> FOREIGN KEY(doc_dept)

-> REFERENCES Department(dept_it));

```
mysql> describe Doctor;
+----------------+-------------+------+-----+---------+-------+
| Field          | Type        | Null | Key | Default | Extra |
+----------------+-------------+------+-----+---------+-------+
| doc_id         | int         | NO   | PRI | NULL    |       |
| doc_name       | varchar(50) | YES  |     | NULL    |       |
| doc_phone      | varchar(20) | YES  |     | NULL    |       |
| doc_email      | varchar(50) | YES  |     | NULL    |       |
| specialization | varchar(50) | YES  |     | NULL    |       |
| doc_dept       | int         | YES  | MUL | NULL    |       |
+----------------+-------------+------+-----+---------+-------+
6 rows in set (0.00 sec)
```

CREATE TABLE Patient(

pat_id INT PRIMARY KEY,

pat_name VARCHAR(50),

pat_age INT,

pat_gender CHAR(1),

pat_phone VARCHAR(20),

pat_email VARCHAR(50),

pat_address VARCHAR(100),

pat_diagnose VARCHAR(100));

```
mysql> describe Patient;
+--------------+--------------+------+-----+---------+-------+
| Field        | Type         | Null | Key | Default | Extra |
+--------------+--------------+------+-----+---------+-------+
| pat_id       | int          | NO   | PRI | NULL    |       |
| pat_name     | varchar(50)  | YES  |     | NULL    |       |
| pat_age      | int          | YES  |     | NULL    |       |
| pat_gender   | char(1)      | YES  |     | NULL    |       |
| pat_phone    | varchar(20)  | YES  |     | NULL    |       |
| pat_email    | varchar(50)  | YES  |     | NULL    |       |
| pat_address  | varchar(100) | YES  |     | NULL    |       |
| pat_diagnose | varchar(100) | YES  |     | NULL    |       |
+--------------+--------------+------+-----+---------+-------+
8 rows in set (0.00 sec)
```

CREATE TABLE Room(

room_id INT PRIMARY KEY,

room_type VARCHAR(50),

room_dept INT,

room_status VARCHAR(20),

room_capacity INT,

FOREIGN KEY(room_dept) REFERENCES Department(dept_it));

```
mysql> describe Room;
+---------------+-------------+------+-----+---------+-------+
| Field         | Type        | Null | Key | Default | Extra |
+---------------+-------------+------+-----+---------+-------+
| room_id       | int         | NO   | PRI | NULL    |       |
| room_type     | varchar(50) | YES  |     | NULL    |       |
| room_dept     | int         | YES  | MUL | NULL    |       |
| room_status   | varchar(20) | YES  |     | NULL    |       |
| room_capacity | int         | YES  |     | NULL    |       |
+---------------+-------------+------+-----+---------+-------+
5 rows in set (0.00 sec)
```

CREATE TABLE Medication(

   -> med_id INT PRIMARY KEY,

   -> med_name VARCHAR(50),

   -> med_dosage VARCHAR(20),

   -> med_frequency VARCHAR(20),

   -> pat_id INT,

   -> FOREIGN KEY(pat_id) REFERENCES Patient(pat_id) ON DELETE

CASCADE);

```
mysql> describe Medication;
+---------------+-------------+------+-----+---------+-------+
| Field         | Type        | Null | Key | Default | Extra |
+---------------+-------------+------+-----+---------+-------+
| med_id        | int         | NO   | PRI | NULL    |       |
| med_name      | varchar(50) | YES  |     | NULL    |       |
| med_dosage    | varchar(20) | YES  |     | NULL    |       |
| med_frequency | varchar(20) | YES  |     | NULL    |       |
| pat_id        | int         | YES  | MUL | NULL    |       |
+---------------+-------------+------+-----+---------+-------+
5 rows in set (0.00 sec)
```

CREATE TABLE Appointment(

   -> app_id INT PRIMARY KEY,

   -> app_date DATE,

   -> app_dept INT,

   -> app_doctor INT,

   -> app_patient INT,

   -> FOREIGN KEY(app_dept) REFERENCES Department(dept_it) ON DELETE CASCADE,

   -> FOREIGN KEY(app_doctor) REFERENCES Doctor(doc_id) ON DELETE CASCADE,

   -> FOREIGN KEY(app_patient) REFERENCES Patient(pat_id) ON DELETE CASCADE);

```
mysql> describe Appointment;
+-------------+------+------+-----+---------+-------+
| Field       | Type | Null | Key | Default | Extra |
+-------------+------+------+-----+---------+-------+
| app_id      | int  | NO   | PRI | NULL    |       |
| app_date    | date | YES  |     | NULL    |       |
| app_dept    | int  | YES  | MUL | NULL    |       |
| app_doctor  | int  | YES  | MUL | NULL    |       |
| app_patient | int  | YES  | MUL | NULL    |       |
+-------------+------+------+-----+---------+-------+
5 rows in set (0.00 sec)
```