

Leon Seferi

Homework 3 Task 1

(For full screen viewing, please see “Source1.pdf” in the ‘HW 3’ folder in Databases on GitHub).

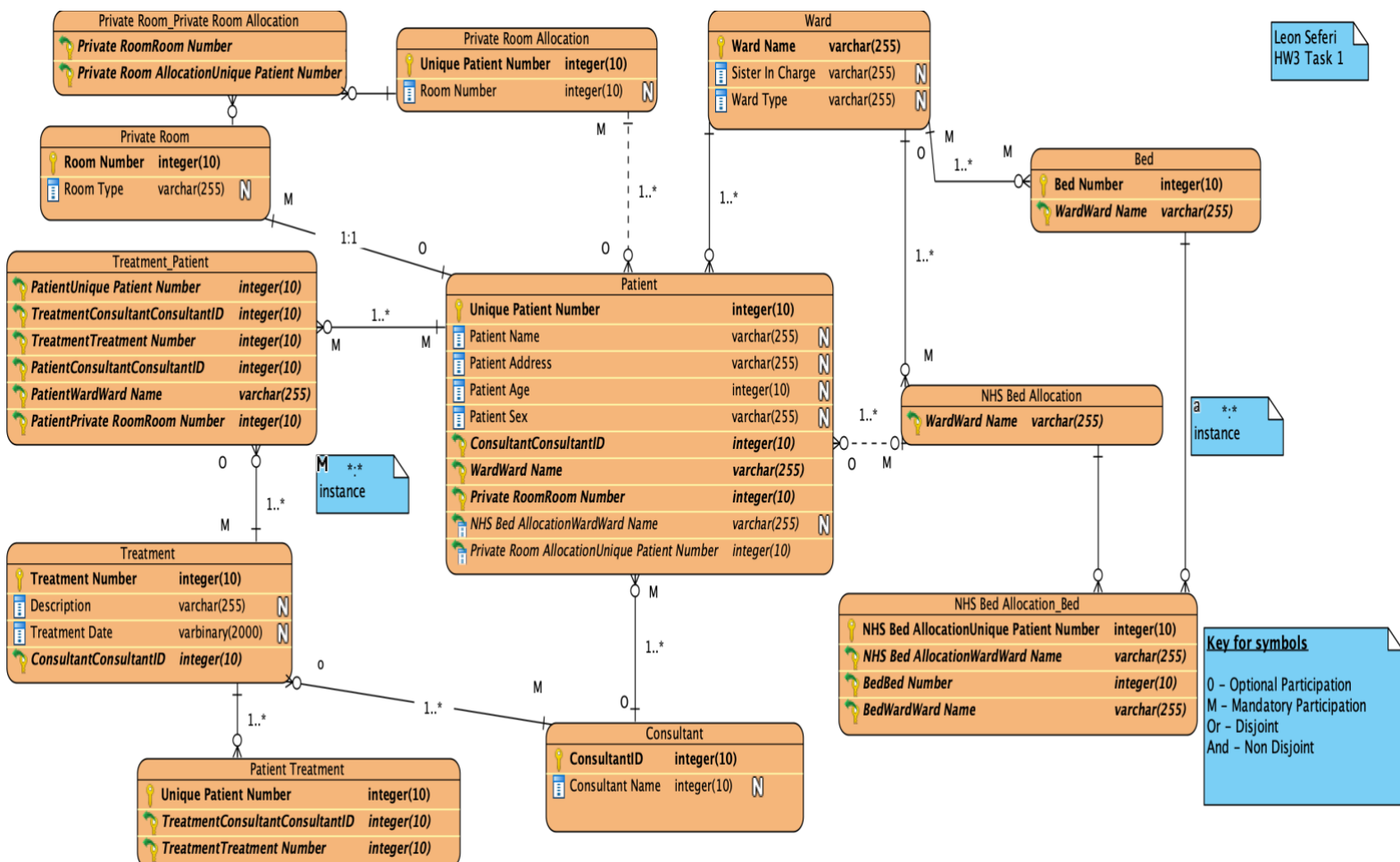
*** Please refer to the blue notes for the keys that I have used to demonstrate constraints.**

1::* - One to many

1:1 – One to one

***:* - Many to many**

E-R Diagram:



Relational schema in 3NF:

Patient [patient_id (PK), patient_name, address, age, sex, consultant_id (FK)]

Ward [ward_name (PK), sister_in_charge, ward_type]

Bed [Bed_Number (PK), ward_name (FK)]

Private Room [private_room_number (PK), private_room_type]

Private Room Allocation [patient_id (FK), private_room_number (FK)]

NHS Bed Allocation [patient_id (FK), ward_name (FK), Bed_Number(FK)]

Treatment [Treatment_Number (PK), Desc, Treatment_Date, consultant_id (FK)]

Consultant [consultant_id (PK), consultant_name]

Patient Treatment [patient_id (FK), consultant_id (FK), Treatment_Number (FK)]