

# Relational Database Project Brief

## Introduction:

- The Company is a Local Hospital called Ocean Medical Clinic. It is located in Cork City and was founded in 1996 and has 14 employees.
- The Aims of the Database are to store and retrieve Hospital information in an efficient and safe way. We hope to store patient and staff information, diagnosis, inpatient, outpatient, billing information and ward information. We hope to reduce human error and keep the data safer.
- Some of the User needs are for the admin to register a patient and their information to the hospital. Doctors need to be able to quickly look up information about a Patient and for the managing staff to easily look up information on the staff and wards and to edit and delete it.
- Tables: Patient, doctor, ward, treatments, bill.
- Attributes: (Doctor id, doctor name, email address, staff phone num, staff role, staff salary, patient id, patient name, patient date of admission, patient gender, patient date of birth, patient diagnosis, patient address, patient phone num, patient height, patient weight, patient room number, ward occupancy, ward id, ward name, treatment id, treatment name, treatment cost, bill )
- 1NF  
**Staff** (DoctorID, Salary, PhoneNum, Speciality, WardID)  
**Patients** (PatientID, PatientName, DateOfAdmission, Gender, DateOfBirth, MobileNum, Weight, Height, Diagnosis, RoomNo, WardID, TreatmentID, Bill)  
**Wards** (WardID, DoctorID, WardName, Occupancy)  
**Treatments** (TreatmentID, TreatmentName, TreatmentCost)
- 2NF  
**StaffDetails** (DoctorID, Salary, PhoneNum)  
**StaffRole** (DoctorID, Speciality, WardID)  
**PatientPersonalDetails** (PatientID, PatientName, Gender, DateOfBirth, MobileNum, Weight, Height)  
**PatientHospitalDetails** (PatientID, DateOfAdmission, Diagnosis, RoomNo, WardID, TreatmentID, Bill)

**Wards** (WardID, DoctorID, WardName, Occupancy)

**Treatments** (TreatmentID, TreatmentName, TreatmentCost)

- 3NF
- **StaffSalary**(DoctorID, Salary)
- **StaffContactDetails** (DoctorID, PhoneNum)
- **StaffRole** (DoctorID, Speciality)
- **StaffWorkLocation** (DoctorID, WardID)
- **PatientPersonalDetails** (PatientID, PatientName, DateOfBirth, Weight, Height, Gender)
- **PatientHospitalDetails** (PatientID, DateOfAdmission, Diagnosis)
- **PatientContactDetails** (PatientID, MobileNum)
- **PatientLocation** (PatientID, RoomNo, WardID)
- **PatientPayment** (PatientID, TreatmentID, Bill)
- **Wards** (WardID, WardName, Occupancy)
- **WardStaff** (WardID, DoctorID)
- **Treatments** (TreatmentID, TreatmentName)
- **TreatmentsPrice** (TreatmentID, TreatmentCost)



## Documentation

Locigal Design: 0 NF

Doctor Table

<u>DoctorID</u>	DoctorName	Salary	DoctorPhoneNum	Speciality	WardID
1556	John Abram	€90,000	0896342143	Cardiologist	4
2453	Josh Suarez	€73,000	0874532142	Orthopaedic	2
3453	Kate Hopkins	€90,000	0891238432	Cardiologist	1

Patient Table

<u>PatientID</u>	PatientName	DateOfAdmission	Gender	DateOfBirth	EmergencyContact	Weight	Height	Diagnosis	RoomNo	WardID	TreatmentID
432	Pansy Elliot	08/10/2020	M	05/10/1986	0894635273	76	190	Diabetes	456	1	564
234	Terence Ogley	09/11/2020	M	11/05/1990	0876452435	67	190	Back Pain	345	2	343
654	PansyElliot	12/12/2020	M	13/1/2000	0874635241	87	178	Heart Pain	232	4	865

Wards Table

<u>WardID</u>	WardName	WardOccupancy	DoctorID
1	Charlie Ward	23	3456
2	ICU	12	2453
3	Franks Ward	11	1575

Treatment Table

<u>TreatmentID</u>	TreatmentName	TreatmentCost	WardID
1	Xray	350	6
2	Cardiac Surgery	7800	2
3	Radiotherapy	4500	3