

# **MENTAL INSTITUTION Project Proposal**

**GROUP: JCS1103I**

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# Final Report

## 1. Introduction

The Career & Counseling Center began its service in 1969. The main purpose of this center was to provide counseling services and student career development programs in line with UiTM's desire to produce graduates who are skilled, competitive and meet the needs of the industry. The organization provides services to enhance the conducive campus environment professionally by improving and controlling the emotions of patient with mental illness or by solving problems that patients face. In short, they are in charge of supervising the patients of the grounds and members.

One of their responsibilities is to treat patients that struggling the challenge in life. If one patient seeks for help, a counselor will treat them by hear their story or give them medicine for certain type of mental illness. The illness that the counselor always treat is depressed, anxiety and stress by far. Each illness is recorded with the details in a file for every patient. Hence, the data will be stored in a cabinet or a place that can fit all the files.

### 1.1 Purpose

The main purpose of us developing this database is to make it easier for the higher-ups to handle the abundant data related patients' information according to their level of mental illness. The technique of using file system is very difficult since the data keeps on growing from time to time. Every day patients are sent by their guardian to the mental institution due to a certain mental illness like depression, anxiety disorder, schizophrenia and so on.

These many data can't be efficiently managed if the higher-up still using the file system as it can make the process of getting the data will be so slow and it will require more space and time. Furthermore, by using the paper, data can be easily lost because there is no backup made. So, to solve this problem, we can create the database system and avoid the data from being lost

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## 1.2 Scope

The scope of this proposal is focused on the roles of every team member. This project has five team members which each one of us will have their own responsibilities. The project manager will manage and supervising every project in making within all groups by directly link the database analyst, designer and programmer. Next, there is two designers. The designer will design the solution for the data and design the ERD model. Lastly, the programmer. The programmer is the people who will receive the Entity Relationship Model as well as key in the data about Mental Institution.

This database is to ease the higher-up to key in the data without interrupt the database itself. With this program, all mental institution can use this database throughout the country. This database will be centralized at the biggest mental institution.

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## **2. Project Overview**

### **2.1 Problem Statement**

The existing system of keeping data of Mental Institution is very difficult and not easy to be managed. It is also slow when patients use a lot of time when it comes to processing data to get a useful information.

The next issue is that the nurse will have a hard time to find the patients information because there is a lot of paper that they need to checked one by one and it will take a lot of time if the nurse cannot remember where they put the specific patient's information. In other words, the collection of data using paper is not efficient because if they lost the data, the data will be lost forever.

Lastly, one of the reasons in making a system is to improve the data integrity. We will make sure that the data of patients will be stored safely and always be update. We can use IBM DB2 which is a database system to organize the information of patients.

### **2.2 Project Scope**

We are mainly looking forward to overcome the problems stated above. For our project mental institution system, it will cover the data including the patient's data. The old-school method made the system process slower and may cause redundancy of information. To get rid with this kind of problems, we designed a system that will improve the patient's data integrity. By making this way, the system process getting easier. No more papers or too many documents need to record and collect.

Our project will design a system which can be used to define each of the entities, attribute and relationship to create a database. If each of the data is not manage wisely, it may cause inconsistency. The data of the patients will be unstructured accordingly.

Finally, the database format can be used to make a good decision in upgrading our organization system and we need a feedback from the user so that they will rate our system

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whether it is convenient or not by the user. It may lead to be a better future for the generation.

## 2.3 Project Objectives

This purpose of this project is to handle the data information in a more safe and secure way. The objectives for this project of database system is to get the data and information in a faster way to prevent data loss, waste of space and money, secure the data and sharing the data.

Firstly, the objective is to prevent data loss. Before the database system was made, surely there will have a lot of data lose whether the nurse can't remember where they put the files of the patient's information and many more. So, in this case, the database system will make sure that the data that is being key in will be safely stored.

Secondly, another objective is to prevent any waste of space and money. As we all know, in file system it use a lot of paper and it will take a lot of money to buy the paper. By using this database system, the nurses didn't have to use paper, files and shelves anymore because all of the patient's information are already in the program.

Thirdly, data security is vital concept in a database. Only higher-up users will be allowed to access the database and their identity should be authenticated using a unique username and password. Unauthorized users cannot be allowed to access the database under any circumstances as it violates the integrity constraints.

Last but not least, the objective is data sharing. Data Sharing is the primary benefit of database systems. Database system allows users and applications to share data with multiple applications and users. Data are stored in one or more servers in the network and that there is some software locking mechanism that prevents the same set of data from being changed by two people at the same time. While the file system doesn't have this capability. So, this program will make it much more easier than the file system.

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### **3. Project Organization**

#### **3.1 Organizational Structure**

1. Nurain Nabilah Binti Salehuddin (Project Manager, Programmer 1, Analyst 1)
2. Siti Hajar Binti Kamaruzaman (Programmer 2, Analyst 2)
3. Shafiqah Binti Salehuddin (Designer 1)
4. Muhammad Syahmi Bin Abd Ghafar (Designer 2)
5. Nur Yasmin Imanina Binti Mazlan (Designer 3)

#### **3.2 Roles and Responsibilities**

6. Shafiqah Binti Kaharuddin and Muhammad Syahmi Bin Abd Ghafar designs the database model, function as Co-Analysts and Co-Database Designers.
7. Nurain Nabilah Binti Salehuddin and Siti Hajar Binti Kamaruzaman are responsible for the coding phase after getting the model from the designers of the project, creating tables, inserting data.
8. Nur Yasmin Imanina Binti Mazlan will be in charge of the final report and give it to Muhammad Syahmi Bin Abd Ghafar that is responsible for the slides.

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#### 4. Management Process

##### 4.1 Project Plan

###### *Phase Plan and Schedule*

WEEK TASK	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Brainstorming														
Analyze Idea														
Design External Model														
Design Conceptual Model														
Improve Conceptual Model														
Designing data dictionary														
Programming phase														
Program testing														



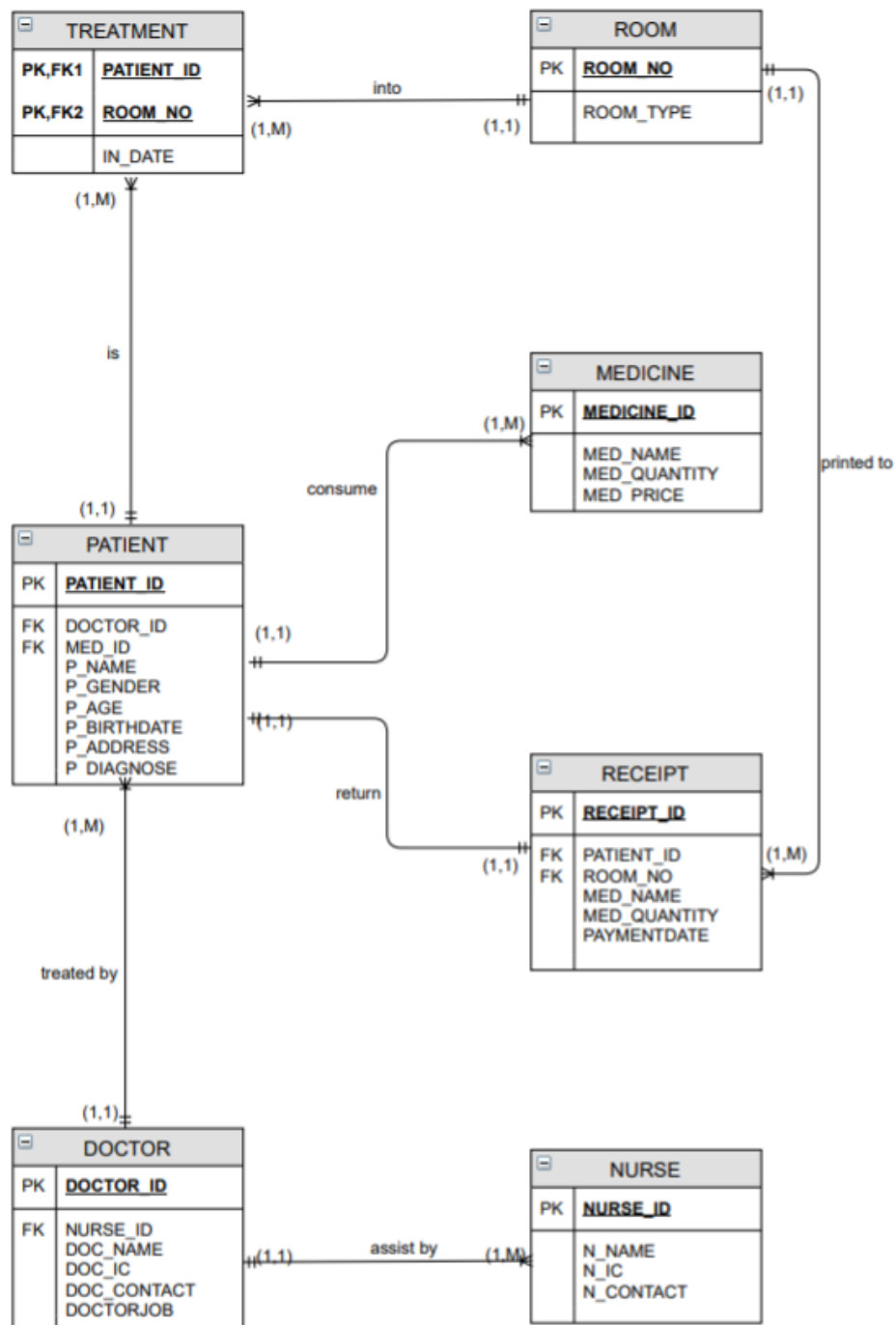
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## 5. Business Rules

### List of Business Rules

- 1) A patient can be treated by one doctor.  
But a doctor can treat many patients.
- 2) A doctor can be assist by many nurse.  
But a nurse can only assist one doctor.
- 3) Many patients can be enroll into a room.  
A room can consist many patients.
- 4) A patient can consume many medicine.  
But a medicine is consume by a patient.
- 5) A room can be print in a receipt.  
A receipt can contain many rooms.
- 6) Many medicine can be print into a receipt.  
A receipt can contain one type of medicine.

## 6. Entity Relationship Diagram



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## Relational Schema

DOCTOR(DOCTOR\_ID, NURSE\_ID, DOC\_NAME, DOC\_JOB, DOC\_IC, DOC\_CONTACT)

MEDICINE(MEDICINE\_ID, MED\_NAME, MED\_PRICE, MED\_QUANTITY)

NURSE(NURSE\_ID, N\_NAME, N\_IC, N\_CONTACT)

PATIENT(PATIENT\_ID, DOCTOR\_ID, P\_NAME, P\_GENDER, P\_AGE, P\_BIRTHDATE,  
P\_ADDRESS, P\_DIAGNOSE, MEDICINE\_ID)

ROOM(ROOM\_NO, ROOM\_TYPE)

TREATMENT(PATIENT\_ID, ROOM\_NO, IN\_DATE)

RECEIPT(RECEIPT\_ID, MEDICINE\_ID, DOCTOR\_ID, PATIENT\_ID,  
ROOM\_NO, PAYMENT\_DATE)

## Data Dictionary

Table Name	Attributes	Contents	Type	Nullable	PK / FK	Reference Table
DOCTOR	DOCTOR_ID	Doctor ID	VARCHAR(10)	NO	PK	
	NURSE_ID	Nurse ID	VARCHAR(10)	YES	FK	NURSE
	DOC_NAME	Doctor's name	VARCHAR(50)	YES		
	DOC_JOB	Doctor's job	VARCHAR(50)	YES		
	DOC_IC	Doctor's IC	VARCHAR(20)	YES		
	DOC_CONTACT	Doctor's phone number	VARCHAR(20)	YES		
MEDICINE	MEDICINE_ID	Medicine ID	VARCHAR(10)	NO	PK	
	MED_NAME	Medicine's name	VARCHAR(20)	YES		
	MED_PRICE	Medicine's price	DECIMAL(5,2)	YES		
	MED_QUANTITY	Medicine's quantity	INTEGER	NO		
NURSE	NURSE_ID	Nurse ID	VARCHAR(10)	NO	PK	
	N_NAME	Nurse's name	VARCHAR(50)	YES		
	N_IC	Nurse's IC	VARCHAR(20)	YES		
	N_CONTACT	Nurse's phone number	VARCHAR(20)	YES		

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PATIENT	PATIENT_ID	Patient ID	VARCHAR(10)	NO	PK	
	DOCTOR_ID	Doctor ID	VARCHAR(10)	YES	FK	DOCTOR
	P_NAME	Patient's name	VARCHAR(50)	YES		
	P_GENDER	Patient's Gender	VARCHAR(2)	YES		
	P_AGE	Patient's age	INTEGER	NO		
	P_BIRTHDATE	Patient 's birthdate	DATE	YES		
	P_ADDRESS	Patient's address	VARCHAR(100)	YES		
	P_DIAGNOSE	Patient's illness	VARCHAR(50)	YES		
	MEDICINE_ID	Medicine ID	VARCHAR(10)	YES	FK	MEDICINE
ROOM	ROOM_NO	Room's number	VARCHAR(10)	NO	PK	
	ROOM_TYPE	Room's type	VARCHAR(50)	YES		
TREATMENT	PATIENT_ID	Patient ID	VARCHAR(10)	NO	PK1, FK1	PATIENT
	ROOM_NO	Room's number	VARCHAR(10)	NO	PK2, FK2	ROOM
	IN_DATE	Date of admission	DATE	YES		
RECEIPT	RECEIPT_ID	Receipt ID	VARCHAR(10)	NO	PK	
	MEDICINE_ID	Medicine ID	VARCHAR(10)	YES	FK	MEDICINE
	DOCTOR_ID	Doctor ID	VARCHAR(10)	YES	FK	DOCTOR
	PATIENT_ID	Patient ID	VARCHAR(10)	YES	FK	PATIENT
	ROOM_NO	Room's number	VARCHAR(10)	YES	FK	ROOM
	PAYMENT_DATE	Date payment	DATE	YES		

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## 7. List of SQL Statement

### (1) CREATE TABLE MEDICINE

Query:





Target: MENT\_INS

```

CREATE TABLE MEDICINE (
MEDICINE_ID VARCHAR(10) NOT NULL,
MED_NAME VARCHAR(20),
MED_PRICE DECIMAL(5,2),
MED_QUANTITY INT NOT NULL,
PRIMARY KEY(MEDICINE_ID)
);





```

Results (after insert data as well):

MEDICINE_ID	MED_NAME	MED_PRICE	MED_QUANTITY
M001	CELEXA	78.00	2
M003	ALPHAZOLAM	100.00	1
M004	SEROTONIN	89.00	3
M002	PROZAC	51.00	3
M006	VRAYLAR	110.00	4
M007	NAMENDA	90.00	2
M005	ZYPREXA	125.00	4
M008	ANAFRANIL	60.00	2

### (2) CREATE TABLE ROOM

Query:





Target: MENT\_INS

```

CREATE TABLE ROOM (
ROOM_NO VARCHAR(10) NOT NULL,
ROOM_TYPE VARCHAR(50),
PRIMARY KEY (ROOM_NO)
);

```





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Results (after insert data as well):

ROOM_NO	ROOM_TYPE
R002	PADDED ROOM
R004	PADDED ROOM
R005	PADDED ROOM
R001	PADDED ROOM
R003	PADDED ROOM
R102	STANDARD SINGLE R...
R103	STANDARD SINGLE R...
R101	STANDARD SINGLE R...
R105	STANDARD SINGLE R...
R104	STANDARD SINGLE R...
R107	STANDARD SINGLE R...
R106	STANDARD SINGLE R...
R109	STANDARD SINGLE R...
R110	STANDARD SINGLE R...
R108	STANDARD SINGLE R...
R205	STANDARD SHARE R...
R203	STANDARD SHARE R...
R201	STANDARD SHARE R...
R204	STANDARD SHARE R...
R202	STANDARD SHARE R...
R208	STANDARD SHARE R...
R210	STANDARD SHARE R...
R207	STANDARD SHARE R...
R206	STANDARD SHARE R...
R209	STANDARD SHARE R...

### (3) CREATE TABLE NURSE

Query:

   	Target	MENT_INS
<pre>CREATE TABLE NURSE( NURSE_ID VARCHAR(10) NOT NULL, N_NAME VARCHAR(50), N_IC VARCHAR(20), N_CONTACT VARCHAR(20), PRIMARY KEY(NURSE_ID) );</pre>		

Results (after insert data as well) :

NURSE_ID	N_NAME	N_IC	N_CONTACT
N114	MARIAM LIYANA	951111-01-0396	017-8931647
N113	DIYANAH ARIANA	940202-01-3322	017-8931647
N111	DANIEL AMRAN	950109-01-6574	017-1122398
N112	NABILA SYAHIDAH	880414-01-4576	012-7856412
N118	AHMAD HAZIQ	870717-01-7711	012-8844552
N115	KAREEN SYAKIRA	930928-01-9815	018-2264798
N117	CHUA MEI LING	851129-01-8844	012-4558432
N116	LIM EUNICE	880326-01-4466	012-8849502

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#### (4) CREATE TABLE DOCTOR

Query:

Target: MENT\_INS

```

CREATE TABLE DOCTOR(
DOCTOR_ID VARCHAR(10) NOT NULL,
NURSE_ID VARCHAR(10),
DOC_NAME VARCHAR(50),
DOC_JOB VARCHAR(50),
DOC_IC VARCHAR(20),
DOC_CONTACT VARCHAR(20),
PRIMARY KEY(DOCTOR_ID),
FOREIGN KEY(NURSE_ID) REFERENCES NURSE
);

```

Results (after insert data as well):

DOCTOR_ID	NURSE_ID	DOC_NAME	DOC_JOB	DOC_IC	DOC_CONTACT
D007	N116	DR.AMIRAH ALYA	DEPRESSION SPECIA...	921015-01-6314	017-6843951
D006	N114	DR.SHASHA QISTINA	ANXIETY SPECIALIST	831212-01-9654	012-3495216
D004	N111	DR.TAN WEI NEE	PTSD SPECIALIST	800102-01-5566	018-9985314
D003	N112	DR.SIVA SEGARAN	ANOREXIA SPECIALIST	790511-01-4831	017-9385167
D005	N115	DR.FAIZ ABDULLAH	DEMINTIA SPECIALIST	920417-01-8364	012-5689741
D002	N113	DR.AIMAN HAIKAL	SCHIZOPHERNIA SPE...	900831-01-9645	012-9835746
D001	N118	DR.BELLA NADIA	BIPOLAR DISORDER ...	910906-01-6578	018-2864917
D008	N117	DR.LEE JONG SUK	OCD SPECIALIST	700518-01-8532	017-3684125

#### (5) CREATE TABLE PATIENT

Query:

Target: MENT\_INS

```

CREATE TABLE PATIENT(
PATIENT_ID VARCHAR(10) NOT NULL,
DOCTOR_ID VARCHAR(10),
P_NAME VARCHAR(50),
P_GENDER VARCHAR(2),
P_AGE INT NOT NULL,
P_BIRTHDATE DATE,
P_ADDRESS VARCHAR(100),
P_DIAGNOSE VARCHAR(50),
MEDICINE_ID VARCHAR(10),
PRIMARY KEY(PATIENT_ID),
FOREIGN KEY(MEDICINE_ID) REFERENCES MEDICINE
FOREIGN KEY(DOCTOR_D) REFERENCES DOCTOR
);

```

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Results (after insert data as well):

PATIENT_ID	DOCTOR_ID	P_NAME	P_GENDER	P_AGE	P_BIRTHDATE	P_ADDRESS	P_DIAGNOSE	MEDICINE_ID
P001	D007	ANISAH MAWADDAH ...	F	27	Mar 18, 1993	NO 30, JALAN PURNA...	DEPRESSION	M001
P002	D004	FARAH NATASHA BIN...	F	35	Dec 10, 1989	NO 75, JALAN BULAN...	POST-TRAUMATIC ST...	M003
P003	D006	MUHAMMAD AMIRUL ...	M	21	Jan 14, 1998	LOT 32, JALAN SG PI...	ANXIETY	M002
P004	D005	JASMIN IRDINA BINT...	F	45	Aug 23, 1974	D208, JALAN PENDA...	DEMINTIA	M007
P005	D007	MUHAMMAD AMMAR ...	M	18	Sep 30, 2001	LOT 45, KAMPUNG S...	DEPRESSION	M001
P006	D003	MUHAMMAD ANIQ D...	M	25	Feb 28, 1994	L098, PANGSAPURI D...	ANOREXIA NERVOSA	M004
P007	D005	NUR ATHIRA ASHIKI...	F	31	Jul 7, 1988	LOT 56, KAMPUNG PE...	DEMINTIA	M007
P008	D003	MUHAMMAD AQIB AI...	M	37	Apr 13, 1982	NO 35, JALAN BANDA...	ANOREXIA NERVOSA	M004
P009	D008	NUR AZEEMA BINTI B...	F	32	Jun 23, 1987	NO 24, JALAN SULTA...	OBSESSIVE-COMPUL...	M008
P010	D004	NUR ERINA MUSFIRA...	F	29	Nov 19, 1990	LOT 78, JALAN SG BU...	POST-TRAUMATIC ST...	M003
P011	D002	NUR FATEEHAH BINT...	F	39	May 27, 1980	LOT 45, JALAN SG BU...	SCHIZOPHERNIA	M006
P012	D001	NUR HANIS BINTI MO...	F	30	May 9, 1989	NO 23, JALAN ZAMRUD	BIPOLAR DISORDER	M005
P013	D001	MUHAMMAD AQMAR ...	M	27		F209, JALAN SUNGAI...	BIPOLAR DISORDER	M005
P014	D006	MUHAMMAD ASYRAA...	M	24	Oct 11, 1995	LOT 09, JALAN BAND...	ANXIETY	M002
P015	D005	NUR HANIS BINTI SA...	F	50	Jan 1, 1969	D205, BANDAR SUNG...	DEMINTIA	M007
P016	D002	NUR FATIHAH MAISA...	F	25		1198, JALAN MAKLU...	SCHIZOPHERNIA	M006
P017	D007	MUHAMMAD ARIEF B...	M	21	Jun 12, 1998	NO 886, JALAN BAND...	DEPRESSION	M001
P018	D004	MUHAMMAD AZIM BI...	M	33	Sep 16, 1986	LOT 7278 JALAN PER...	POST-TRAUMATIC ST...	M003
P019	D003	MUHAMMAD DHAIKA...	M	36	Feb 18, 1983	BLOCK 1783, GEYLAN...	ANOREXIA NERVOSA	M004
P020	D008	SITI SOFEA BINTI AB...	F	32		NO 34, JALAN SULTA...	OBSESSIVE-COMPUL...	M008
P021	D008	ZAFIRA SOFEAH BIN...	F	29	Dec 15, 1990	NO 45 JALAN SULTA...	OBSESSIVE-COMPUL...	M008
P022	D006	MUHAMMAD EMIR HA...	M	31	Feb 24, 1988	LOT 3215 TAMAN BA...	ANXIETY	M002
P023	D004	MUHAMMAD FAEZ BI...	M	28	Jul 14, 1991	LOT 4356 BANDAR B...	POST-TRAUMATIC ST...	M003
P024	D001	NOR AZERA NABILAH...	F	30	May 17, 1989	W345 JALAN SUNGAI...	BIPOLAR DISORDER	M005
P025	D007	NUR AINAA NAJIHAH...	F	19	Jun 6, 2000	LOT 3214 JALAN SEL...	DEPRESSION	M001

(6) CREATE TABLE TREATMENT(BRIDGE)

Query:

Target MENT\_INS Add...

```

CREATE TABLE TREATMENT (
PATIENT_ID VARCHAR(10) NOT NULL,
ROOM_NO VARCHAR(10) NOT NULL,
IN_DATE DATE,
PRIMARY KEY (PATIENT_ID, ROOM_NO),
FOREIGN KEY (PATIENT_ID) REFERENCES PATIENT,
FOREIGN KEY (ROOM_NO) REFERENCES ROOM
);

```

Results (after insert data as well):








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PATIENT_ID	ROOM_NO	IN_DATE
P001	R205	Sep 25, 2018
P002	R002	Oct 13, 2018
P003	R102	Sep 10, 2019
P004	R203	Feb 16, 2019
P005	R103	Feb 2, 2017
P006	R201	Mar 15, 2019
P007	R203	Dec 26, 2016
P008	R201	Aug 26, 2018
P009	R004	Nov 11, 2017
P010	R001	Sep 25, 2019
P011	R202	Sep 24, 2017
P012	R106	Apr 22, 2018
P013	R209	Feb 20, 2016
P014	R110	Jun 27, 2018
P015	R202	Dec 20, 2019
P016	R109	Sep 29, 2017
P017	R208	Jul 17, 2017
P018	R208	Jul 27, 2018
P019	R104	Dec 25, 2017
P020	R003	Nov 23, 2018
P021	R210	Sep 13, 2018
P022	R205	Dec 11, 2017
P023	R005	Dec 30, 2017
P024	R206	Jul 12, 2018
P025	R206	Oct 11, 2018

## (7) CREATE TABLE RECEIPT

Query:





Target: MENT\_INS  Add...

```

CREATE TABLE RECEIPT (
RECEIPT_ID VARCHAR(10) NOT NULL,
MEDICINE_ID VARCHAR(10),
DOCTOR_ID VARCHAR(10),
PATIENT_ID VARCHAR(10),
ROOM_NO VARCHAR(10),
PAYMENT_DATE DATE,
PRIMARY KEY (RECEIPT_ID),
FOREIGN KEY (MEDICINE_ID) REFERENCES MEDICINE,
FOREIGN KEY (DOCTOR_ID) REFERENCES DOCTOR,
FOREIGN KEY (PATIENT_ID) REFERENCES PATIENT,
FOREIGN KEY (ROOM_NO) REFERENCES ROOM
);

```

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Results (after insert data as well):

RECEIPT_ID ⇅	MEDICINE_ID ⇅	DOCTOR_ID ⇅	PATIENT_ID ⇅	ROOM_NO ⇅	PAYMENT_DATE ⇅
RP001	M008	D008	P021	R210	Aug 2, 2019
RP002	M002	D006	P003	R102	Aug 6, 2019
RP003	M003	D004	P010	R001	Aug 18, 2019
RP004	M007	D005	P015	R202	Aug 12, 2019
RP005	M008	D008	P020	R003	Aug 10, 2019
RP006	M006	D002	P011	R202	Aug 27, 2019
RP007	M003	D004	P002	R002	Aug 28, 2019
RP008	M008	D008	P009	R004	Aug 2, 2019
RP009	M001	D007	P025	R206	Aug 19, 2019
RP010	M007	D005	P007	R203	Aug 22, 2019
RP011	M004	D003	P006	R201	Aug 30, 2019
RP012	M002	D006	P014	R110	Aug 30, 2019
RP013	M004	D003	P019	R104	Aug 25, 2019
RP014	M001	D007	P001	R205	Aug 7, 2019
RP015	M007	D005	P004	R203	Aug 3, 2019
RP016	M001	D007	P017	R208	Aug 21, 2019
RP017	M005	D001	P012	R106	Aug 21, 2019
RP018	M004	D003	P008	R201	Aug 11, 2019
RP019	M001	D007	P005	R103	Aug 1, 2019
RP020	M005	D001	P024	R206	Aug 23, 2019
RP021	M006	D002	P016	R109	Aug 20, 2019
RP022	M003	D004	P018	R208	Aug 15, 2019
RP023	M003	D004	P023	R005	Aug 11, 2019
RP024	M005	D001	P013	R209	Aug 4, 2019
RP025	M002	D006	P022	R205	Aug 12, 2019

RECEIPT_ID ⇅	MEDICINE_ID ⇅	DOCTOR_ID ⇅	PATIENT_ID ⇅	ROOM_NO ⇅	PAYMENT_DATE ⇅
RP026	M001	D007	P001	R205	Sep 28, 2019
RP027	M005	D001	P024	R206	Sep 29, 2019
RP028	M004	D003	P006	R201	Sep 22, 2019
RP029	M007	D005	P004	R203	Sep 16, 2019
RP030	M005	D001	P012	R106	Sep 13, 2019
RP031	M003	D004	P018	R208	Sep 16, 2019
RP032	M008	D008	P020	R003	Sep 1, 2019
RP033	M001	D007	P005	R103	Sep 3, 2019
RP034	M006	D002	P011	R202	Sep 2, 2019
RP035	M008	D008	P009	R004	Sep 15, 2019
RP036	M007	D005	P015	R202	Sep 29, 2019
RP037	M005	D001	P013	R209	Sep 3, 2019
RP038	M002	D006	P022	R205	Sep 8, 2019
RP039	M003	D004	P023	R005	Sep 1, 2019
RP040	M003	D004	P010	R001	Sep 14, 2019
RP041	M007	D005	P007	R203	Sep 23, 2019
RP042	M003	D004	P002	R002	Sep 20, 2019
RP043	M008	D008	P021	R210	Sep 26, 2019
RP044	M004	D003	P008	R201	Sep 30, 2019
RP045	M004	D003	P019	R104	Sep 19, 2019
RP046	M006	D002	P016	R109	Sep 15, 2019
RP047	M002	D006	P003	R102	Sep 17, 2019
RP048	M002	D006	P014	R110	Sep 7, 2019
RP049	M001	D007	P025	R206	Sep 4, 2019
RP050	M001	D007	P017	R208	Sep 30, 2019

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RECEIPT_ID	MEDICINE_ID	DOCTOR_ID	PATIENT_ID	ROOM_NO	PAYMENT_DATE
RP050	M001	D007	P017	R208	Sep 30, 2019
RP051	M001	D007	P001	R205	Oct 2, 2019
RP052	M001	D007	P025	R206	Oct 16, 2019
RP053	M003	D004	P002	R002	Oct 17, 2019
RP054	M005	D001	P024	R206	Oct 22, 2019
RP055	M002	D006	P003	R102	Oct 2, 2019
RP056	M006	D002	P011	R202	Oct 17, 2019
RP057	M008	D008	P021	R210	Oct 14, 2019
RP058	M004	D003	P006	R201	Oct 1, 2019
RP059	M007	D005	P015	R202	Oct 31, 2019
RP060	M003	D004	P018	R208	Oct 29, 2019
RP061	M007	D005	P004	R203	Oct 25, 2019
RP062	M004	D003	P008	R201	Oct 21, 2019
RP063	M004	D003	P019	R104	Oct 30, 2019
RP064	M008	D008	P020	R003	Oct 11, 2019
RP065	M005	D001	P012	R106	Oct 19, 2019
RP066	M007	D005	P007	R203	Oct 10, 2019
RP067	M003	D004	P010	R001	Oct 8, 2019
RP068	M001	D007	P017	R208	Oct 6, 2019
RP069	M005	D001	P013	R209	Oct 24, 2019
RP070	M008	D008	P009	R004	Oct 27, 2019
RP071	M002	D006	P022	R205	Oct 16, 2019
RP072	M001	D007	P005	R103	Oct 14, 2019
RP073	M002	D006	P014	R110	Oct 19, 2019
RP074	M003	D004	P023	R005	Oct 5, 2019
RP075	M006	D002	P016	R109	Oct 22, 2019

RECEIPT_ID	MEDICINE_ID	DOCTOR_ID	PATIENT_ID	ROOM_NO	PAYMENT_DATE
RP073	M002	D006	P014	R110	Oct 19, 2019
RP074	M003	D004	P023	R005	Oct 5, 2019
RP075	M006	D002	P016	R109	Oct 22, 2019
RP076	M002	D006	P022	R205	Nov 8, 2019
RP077	M003	D004	P010	R001	Nov 21, 2019
RP078	M003	D004	P002	R002	Nov 30, 2019
RP079	M008	D008	P009	R004	Nov 4, 2019
RP080	M004	D003	P008	R201	Nov 1, 2019
RP081	M006	D002	P016	R109	Nov 5, 2019
RP082	M001	D007	P017	R208	Nov 19, 2019
RP083	M003	D004	P023	R005	Nov 13, 2019
RP084	M001	D007	P005	R103	Nov 27, 2019
RP085	M007	D005	P007	R203	Nov 11, 2019
RP086	M005	D001	P012	R106	Nov 10, 2019
RP087	M007	D005	P015	R202	Nov 4, 2019
RP088	M006	D002	P011	R202	Nov 2, 2019
RP089	M001	D007	P025	R206	Nov 22, 2019
RP090	M008	D008	P020	R003	Nov 17, 2019
RP091	M003	D004	P018	R208	Nov 11, 2019
RP092	M002	D006	P003	R102	Nov 23, 2019
RP093	M005	D001	P013	R209	Nov 28, 2019
RP094	M004	D003	P019	R104	Nov 24, 2019
RP095	M008	D008	P021	R210	Nov 12, 2019
RP096	M002	D006	P014	R110	Nov 5, 2019
RP097	M007	D005	P004	R203	Nov 9, 2019
RP098	M004	D003	P006	R201	Nov 15, 2019
RP099	M005	D001	P024	R206	Nov 18, 2019
RP100	M001	D007	P001	R205	Nov 25, 2019

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#### 8) UPDATE STATEMENT (CHANGE MED\_ID : 'M007' >> 'M001')

Query:

Target: MENT\_INS

```

UPDATE PATIENT
SET MEDICINE_ID = 'M001'
WHERE PATIENT_ID = 'P005';

```

Results (after updated):

P005	D007	MUHAMMAD AMMAR SYAHMI BIN NOORHANAFI	M	18	Sep 30, 2001	LOT 45, KAMPUNG S...	DEPRESSION	M001
------	------	--------------------------------------	---	----	--------------	----------------------	------------	------

#### (9) UPDATE STATEMENT (CHANGE P\_DIAGNOSE)

Query:

Target: MENT\_INS
Add...

```

UPDATE PATIENT
SET P_DIAGNOSE = 'POST-TRAUMATIC STRESS DISORDER (PTSD)'
WHERE PATIENT_ID = 'P002';

```

Results (after updated):

P002	D004	FARAH NATASHA BIN...	F	35	Dec 10, 1989	NO 75, JALAN BULAN...	POST-TRAUMATIC STRESS DISORDER(PTSD)	
------	------	----------------------	---	----	--------------	-----------------------	--------------------------------------	--

#### (10) UPDATE STATEMENT (CHANGE P\_DIAGNOSE)

Query:

Target: MENT\_INS
Add...

```

UPDATE PATIENT
SET P_DIAGNOSE = 'OBSESSIVE-COMPULSIVE DISORDER(OCD)'
WHERE PATIENT ID = 'P020';

```

Results (after updated):

P020	D008	SITI SOFEA BINTI AB...	F	32		NO 34, JALAN SULTA...	OBSESSIVE-COMPULSIVE DISORDER(OCD)	
------	------	------------------------	---	----	--	-----------------------	------------------------------------	--

#### (11) ARRANGE DOCTOR LIST BASED ON ID ASC

Query:

Target: MENT\_INS
Add...

```

SELECT *
FROM DOCTOR
ORDER BY DOCTOR_ID ASC;

```


Results:

DOCTOR_ID	NURSE_ID	DOC_NAME	DOC_JOB	DOC_IC	DOC_CONTACT
D001	N118	DR.BELLA NADIA	BIPOLAR DISORDER ...	910906-01-6578	018-2864917
D002	N113	DR.AIMAN HAIKAL	SCHIZOPHERNIA SPE...	900831-01-9645	012-9835746
D003	N112	DR.SIVA SEGARAN	ANOREXIA SPECIALIST	790511-01-4831	017-9385167
D004	N111	DR.TAN WEI NEE	PTSD SPECIALIST	800102-01-5566	018-9985314
D005	N115	DR.FAIZ ABDULLAH	DEMINTIA SPECIALIST	920417-01-8364	012-5689741
D006	N114	DR.SHASHA QISTINA	ANXIETY SPECIALIST	831212-01-9654	012-3495216
D007	N116	DR.AMIRAH ALYA	DEPRESSION SPECIA...	921015-01-6314	017-6843951
D008	N117	DR.LEE JONG SUK	OCD SPECIALIST	700518-01-8532	017-3684125

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#### (12) ARRANGE NURSE LIST BASED ON ID ASC

Query:


 Target MENT\_INS Add...


```
SELECT *
FROM NURSE
ORDER BY NURSE_ID ASC;
```

Results:

NURSE_ID	N_NAME	N_IC	N_CONTACT
N111	DANIEL AMRAN	950109-01-6574	017-1122398
N112	NABILA SYAHIDAH	880414-01-4576	012-7856412
N113	DIYANAH ARIANA	940202-01-3322	017-8931647
N114	MARIAM LIYANA	951111-01-0396	017-8931647
N115	KAREEN SYAKIRA	930928-01-9815	018-2264798
N116	LIM EUNICE	880326-01-4466	012-8849502
N117	CHUA MEI LING	851129-01-8844	012-4558432
N118	AHMAD HAZIQ	870717-01-7711	012-8844552

#### (13) ARRANGE MED LIST BASED ON ID ASC

Query:


 Target MENT\_INS Add...


```
SELECT *
FROM MEDICINE
ORDER BY MEDICINE_ID ASC;
```

Results:

MEDICINE_ID	MED_NAME	MED_PRICE	MED_QUANTITY
M001	CELEXA	78.00	2
M002	PROZAC	51.00	3
M003	ALPHAZOLAM	100.00	1
M004	SEROTONIN	89.00	3
M005	ZYPREXA	125.00	4
M006	VRAYLAR	110.00	4
M007	NAMENDA	90.00	2
M008	ANAFRANIL	60.00	2

#### (14) LIST PATIENT'S ID, NAME, DIAGNOSE WITH AGE BETWEEN AGE OF 20 – 40, ORDER BY ID ASC

Query:


 Target MENT\_INS Add...

```
SELECT PATIENT_ID, P_NAME, P_DIAGNOSE, P_AGE
FROM PATIENT
WHERE P_AGE BETWEEN 20 AND 40
ORDER BY PATIENT_ID ASC;
```

Results:

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PATIENT_ID	P_NAME	P_DIAGNOSE	P_AGE
P001	ANISAH MAWADDAH ...	DEPRESSION	27
P002	FARAH NATASHA BIN...	POST-TRAUMATIC ST...	35
P003	MUHAMMAD AMIRUL ...	ANXIETY	21
P006	MUHAMMAD ANIQ D...	ANOREXIA NERVOSA	25
P007	NUR ATHIRA ASHIKI...	DEMINTIA	31
P008	MUHAMMAD AQIB AI...	ANOREXIA NERVOSA	37
P009	NUR AZEEMA BINTI B...	OBSESSIVE-COMPUL...	32
P010	NUR ERINA MUSFIRA...	POST-TRAUMATIC ST...	29
P011	NUR FATEEHAH BINT...	SCHIZOPHERNIA	39
P012	NUR HANIS BINTI MO...	BIPOLAR DISORDER	30
P013	MUHAMMAD AQMAR ...	BIPOLAR DISORDER	27
P014	MUHAMMAD ASYRAA...	ANXIETY	24
P016	NUR FATIHAH MAISA...	SCHIZOPHERNIA	25
P017	MUHAMMAD ARIEF B...	DEPRESSION	21
P018	MUHAMMAD AZIM BI...	POST-TRAUMATIC ST...	33
P019	MUHAMMAD DHAIKA...	ANOREXIA NERVOSA	36
P020	SITI SOFEA BINTI AB...	OBSESSIVE-COMPUL...	32
P021	ZAFIRA SOFEAH BIN...	OBSESSIVE-COMPUL...	29
P022	MUHAMMAD EMIR HA...	ANXIETY	31
P023	MUHAMMAD FAEZ BI...	POST-TRAUMATIC ST...	28
P024	NOR AZERA NABILAH...	BIPOLAR DISORDER	30

(15) LIST OF PATIENT'S ID, NAME, AGE, ADDRESS WITH NAME STARTS WITH APLHABET "M" , ORDER BY DESC

Query:

Target: <span>MENT_INS</span> <span>Add...</span>
<pre>SELECT PATIENT_ID, P_NAME, P_AGE, P_ADDRESS FROM PATIENT WHERE P_NAME LIKE 'M%' ORDER BY P_AGE DESC;</pre>

Results:

PATIENT_ID	P_NAME	P_AGE	P_ADDRESS
P008	MUHAMMAD AQIB AI...	37	NO 35,JALAN BANDA...
P019	MUHAMMAD DHAIKA...	36	BLOCK 1783, GEYLAN...
P018	MUHAMMAD AZIM BI...	33	LOT 7278 JALAN PER...
P022	MUHAMMAD EMIR HA...	31	LOT 3215 TAMAN BA...
P023	MUHAMMAD FAEZ BI...	28	LOT 4356 BANDAR B...
P013	MUHAMMAD AQMAR ...	27	F209, JALAN SUNGAI...
P006	MUHAMMAD ANIQ D...	25	L098,PANGSAPURI D...
P014	MUHAMMAD ASYRAA...	24	LOT 09, JALAN BAND...
P003	MUHAMMAD AMIRUL ...	21	LOT 32, JALAN SG PI...
P017	MUHAMMAD ARIEF B...	21	NO 886, JALAN BAND...
P005	MUHAMMAD AMMAR ...	18	LOT 45, KAMPUNG S...

(16) LIST PATIENT's ID, NAME, ADDRESS THAT STARTS WITH ALPHABET "L"

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Query:

Target: MENT\_INS Add...

```

SELECT PATIENT_ID,P_NAME,P_ADDRESS
FROM PATIENT
WHERE P_ADDRESS LIKE 'L%'
ORDER BY PATIENT_ID DESC
FETCH FIRST 5 ROWS ONLY;

```

Results:

PATIENT_ID	P_NAME	P_ADDRESS
P025	NUR AINAA NAJIHAH...	LOT 3214 JALAN SEL...
P023	MUHAMMAD FAEZ BI...	LOT 4356 BANDAR B...
P022	MUHAMMAD EMIR HA...	LOT 3215 TAMAN BA...
P018	MUHAMMAD AZIM BI...	LOT 7278 JALAN PER...
P014	MUHAMMAD ASYRAA...	LOT 09, JALAN BAND...

(17) LIST DISTINCT MEDICINE'S ID, NAME WITH IT'S SUITABLE DIAGNOSE

Query:

Target: MENT\_INS Add...

```

SELECT DISTINCT M.MEDICINE_ID, M.MED_NAME,P.P_DIAGNOSE
FROM MEDICINE M JOIN PATIENT P
ON M.MEDICINE_ID = P.MEDICINE_ID
ORDER BY M.MEDICINE_ID ASC;

```

Results:

MEDICINE_ID	MED_NAME	P_DIAGNOSE
M001	CELEXA	DEPRESSION
M002	PROZAC	ANXIETY
M003	ALPHAZOLAM	POST-TRAUMATIC STRESS DISORDER(PTSD)
M004	SEROTONIN	ANOREXIA NERVOSA
M005	ZYPREXA	BIPOLAR DISORDER
M006	VRAYLAR	SCHIZOPHERNIA
M007	NAMENDA	DEMINTIA
M008	ANAFRANIL	OBSESSIVE-COMPULSIVE DISORDER(OCD)

(18) LIST DOCTOR'S ID, NAME, PATIENT'S ID,NAME TO SHOW WHICH DOCTOR ASSIGNED WITH WHICH PATIENTS

Query:

Target: MENT\_INS Add...

```

SELECT D.DOCTOR_ID,D.DOC_NAME,P.PATIENT_ID,P.P_NAME
FROM DOCTOR D,PATIENT P
WHERE D.DOCTOR_ID = P.DOCTOR_ID
ORDER BY D.DOCTOR_ID ASC;

```

Results:



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DOCTOR_ID	DOC_NAME	PATIENT_ID	P_NAME
D001	DR.BELLA NADIA	P012	NUR HANIS BINTI MOHD IDRIS
D001	DR.BELLA NADIA	P013	MUHAMMAD AQMAR BIN AZMI NOR
D001	DR.BELLA NADIA	P024	NOR AZERA NABILAH ABDUL AZIZ
D002	DR.AIMAN HAIKAL	P011	NUR FATEEHAH BINTI MOHD ZAKI
D002	DR.AIMAN HAIKAL	P016	NUR FATIHAH MAISARAH BINTI ...
D003	DR.SIVA SEGARAN	P006	MUHAMMAD ANIQ DANIEL BIN S...
D003	DR.SIVA SEGARAN	P008	MUHAMMAD AQIB AIDIL BIN MO...
D003	DR.SIVA SEGARAN	P019	MUHAMMAD DHAIKAL BIN MUHA...
D004	DR.TAN WEI NEE	P002	FARAH NATASHA BINTI MOHD F...
D004	DR.TAN WEI NEE	P010	NUR ERINA MUSFIRA BINTI NOR...
D004	DR.TAN WEI NEE	P018	MUHAMMAD AZIM BIN MOHD AMI...
D004	DR.TAN WEI NEE	P023	MUHAMMAD FAEZ BIN MOHAMM...
D005	DR.FAIZ ABDULLAH	P004	JASMIN IRDINA BINTI JEFRI
D005	DR.FAIZ ABDULLAH	P007	NUR ATHIRA ASHIKIN BINTI AZIZ...
D005	DR.FAIZ ABDULLAH	P015	NUR HANIS BINTI SARIMAN
D006	DR.SHASHA QISTINA	P003	MUHAMMAD AMIRUL HAIKAL BIN ...
D006	DR.SHASHA QISTINA	P014	MUHAMMAD ASYRAAF BIN AMRAN
D006	DR.SHASHA QISTINA	P022	MUHAMMAD EMIR HAKIMI BIN SA...
D007	DR.AMIRAH ALYA	P001	ANISAH MAWADDAH BINTI SUHAILI
D007	DR.AMIRAH ALYA	P005	MUHAMMAD AMMAR SYAHMI BIN...
D007	DR.AMIRAH ALYA	P017	MUHAMMAD ARIEF BIN NAZARU...
D007	DR.AMIRAH ALYA	P025	NUR AINAA NAJIHAH BINTI NOR ...
D008	DR.LEE JONG SUK	P009	NUR AZEEMA BINTI BAHARUDDIN
D008	DR.LEE JONG SUK	P020	SITI SOFEA BINTI ABU BAKAR
D008	DR.LEE JONG SUK	P021	ZAFIRA SOFEAH BINTI ZAFRULLAH

(19) LIST OF DOCTOR'S NAME,NURSE'S NAME ,PATIENT'S ID, NAME WHICH HAVE DEPRESSION  
Query:

	Target <span>MENT_INS</span> <span>Add...</span>
<pre> SELECT P.PATIENT_ID,P.P_NAME,P.P_DIAGNOSE,D.DOC_NAME,N_NAME FROM DOCTOR D,NURSE N, PATIENT P WHERE D.DOCTOR_ID = P.DOCTOR_ID AND D.NURSE_ID = N.NURSE_ID AND P.P_DIAGNOSE = 'DEPRESSION' ORDER BY PATIENT_ID ASC; </pre>	

Results:

PATIENT_ID	P_NAME	P_DIAGNOSE	DOC_NAME	N_NAME
P001	ANISAH MAWADDAH ...	DEPRESSION	DR.AMIRAH ALYA	LIM EUNICE
P005	MUHAMMAD AMMAR ...	DEPRESSION	DR.AMIRAH ALYA	LIM EUNICE
P017	MUHAMMAD ARIEF B...	DEPRESSION	DR.AMIRAH ALYA	LIM EUNICE
P025	NUR AINAA NAJIHAH...	DEPRESSION	DR.AMIRAH ALYA	LIM EUNICE



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(20) LIST PATIENT'S ID,NAME,ROOM\_NO,ROOM\_TYPE TO KNOW WHICH PATIENT THAT IS ASSIGNED TO THE "PADDED ROOM" (\*TOP 5)

```
SELECT P.PATIENT_ID, P.P_NAME,R.ROOM_NO,R.ROOM_TYPE
FROM PATIENT P, ROOM R,TREATMENT T
WHERE P.PATIENT_ID = T.PATIENT_ID
AND T.ROOM_NO = R.ROOM_NO
AND R.ROOM_NO LIKE 'R0%'
ORDER BY P.PATIENT_ID ASC;
```

(21)LIST ALL RECEIPT + TOTAL PAYMENT (\*TOP 5)

```
SELECT DISTINCT RP.RECEIPT_ID,
M.MEDICINE_ID,M.MED_NAME,D.DOCTOR_ID,D.DOC_NAME,P.PATIENT_ID,P.P_NAME,T.
ROOM_NO,R.ROOM_TYPE,RP.PAYMENT_DATE,DECIMAL(((M.MED_PRICE*M.MED_QUA
NTITY)*4),8,2) AS "TOTAL_PAYMENT"
FROM RECEIPT RP,MEDICINE M, DOCTOR D, PATIENT P, TREATMENT T,ROOM R
WHERE RP.MEDICINE_ID = M.MEDICINE_ID
AND RP.DOCTOR_ID = D.DOCTOR_ID
AND RP.PATIENT_ID = P.PATIENT_ID
AND RP.ROOM_NO = T.ROOM_NO
AND RP.ROOM_NO = R.ROOM_NO
ORDER BY RP.RECEIPT_ID ASC;
```

(22) LIST ALL PATIENT + 4MONTHS PAYMENT (\*TOP 5)

```
SELECT DISTINCT
P.PATIENT_ID,P.P_NAME,M.MED_NAME,DECIMAL((((M.MED_PRICE*M.MED_QUANTITY)*
4)*4),8,2) AS "4MONTHS-PAYMENT"
FROM PATIENT P, MEDICINE M
WHERE P.MEDICINE_ID = M.MEDICINE_ID
ORDER BY P.PATIENT_ID;
```

(23) LIST ALL PATIENT WITH TOTAL PAYMENT <= 1000.00 (\*TOP 5)

```
SELECT DISTINCT
P.PATIENT_ID,P.P_NAME,DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4),8,2) AS
"TOTAL_PAYMENT"
FROM PATIENT P, MEDICINE M
WHERE P.MEDICINE_ID = M.MEDICINE_ID
AND DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4),8,2) < 1000
ORDER BY P.PATIENT_ID;
```

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(24) CHANGE NULL TO '1000-10-10'

```
SELECT PATIENT_ID,P_NAME,COALESCE(P_BIRTHDATE,'UNKNOWN') AS
"P_BIRTHDATE"
FROM PATIENT
WHERE P_BIRTHDATE IS NULL
ORDER BY PATIENT_ID ASC;
```

(25) COLUMN FUNCTION (CALCULATE PRICE MED FOR EACH DIAGNOSE( ONE CODE OF MED = 1 WEEK SUPPLY = 1 PATIENT) ( TOTAL PRICE \* 5(FOR MAX 5 PATIENT)\* 16 WEEKS(FOR 4 MONTHS)) **(\*TOP5)**

```
SELECT SUM(((MED_PRICE*MED_QUANTITY)*5)*16) AS "SUM",
AVG (((MED_PRICE*MED_QUANTITY)*5)*16) AS "AVERAGE",
MIN (((MED_PRICE*MED_QUANTITY)*5)*16) AS "MINIMUM",
MAX (((MED_PRICE*MED_QUANTITY)*5)*16) AS "MAXIMUM",
COUNT (((MED_PRICE*MED_QUANTITY)*5)*16) AS "COUNT"
FROM MEDICINE;
```

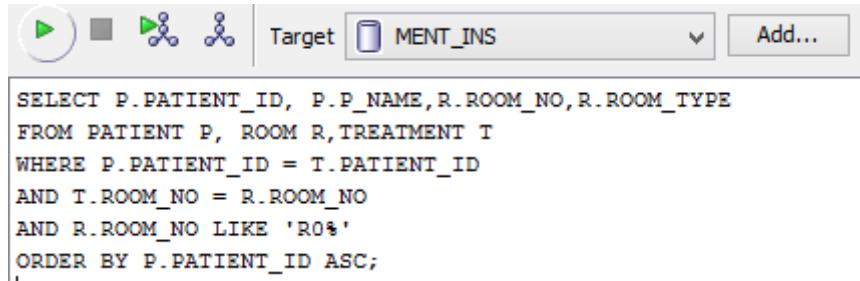
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## 8. Sample DB2 Queries and Output

### TOP 5 SELECTED SQL:

#### SQL #1

##### COMMAND:



```

SELECT P.PATIENT_ID, P.P_NAME,R.ROOM_NO,R.ROOM_TYPE
FROM PATIENT P, ROOM R,TREATMENT T
WHERE P.PATIENT_ID = T.PATIENT_ID
AND T.ROOM_NO = R.ROOM_NO
AND R.ROOM_NO LIKE 'R0%'
ORDER BY P.PATIENT_ID ASC;

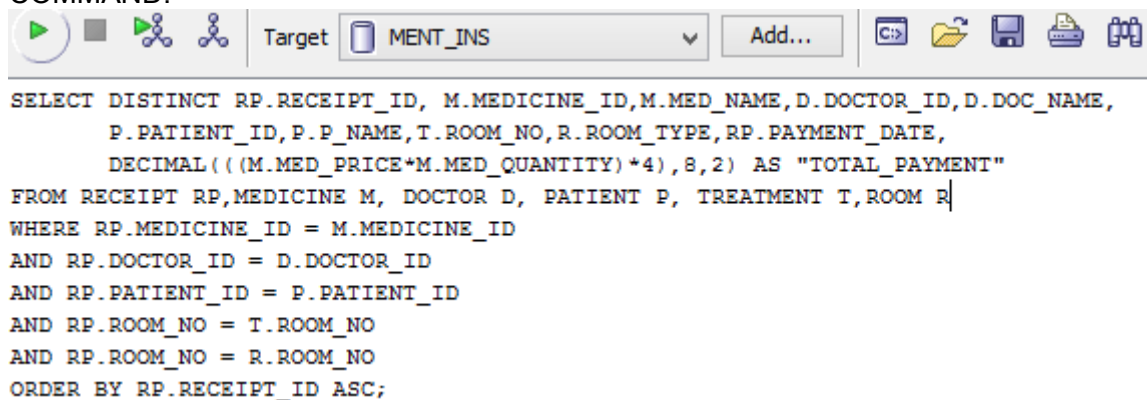
```

##### RESULT:

PATIENT_ID	P_NAME	ROOM_NO	ROOM_TYPE
P002	FARAH NATASHA BINTI MOHD FUAD	R002	PADDED ROOM
P009	NUR AZEEMA BINTI BAHARUDDIN	R004	PADDED ROOM
P010	NUR ERINA MUSFIRA BINTI NORAZMI	R001	PADDED ROOM
P020	SITI SOFEA BINTI ABU BAKAR	R003	PADDED ROOM
P023	MUHAMMAD FAEZ BIN MOHAMMAD NAZRI	R005	PADDED ROOM

#### SQL #2

##### COMMAND:



```

SELECT DISTINCT RP.RECEIPT_ID, M.MEDICINE_ID,M.MED_NAME,D.DOCTOR_ID,D.DOC_NAME,
P.PATIENT_ID,P.P_NAME,T.ROOM_NO,R.ROOM_TYPE,RP.PAYMENT_DATE,
DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4),8,2) AS "TOTAL_PAYMENT"
FROM RECEIPT RP,MEDICINE M, DOCTOR D, PATIENT P, TREATMENT T,ROOM R
WHERE RP.MEDICINE_ID = M.MEDICINE_ID
AND RP.DOCTOR_ID = D.DOCTOR_ID
AND RP.PATIENT_ID = P.PATIENT_ID
AND RP.ROOM_NO = T.ROOM_NO
AND RP.ROOM_NO = R.ROOM_NO
ORDER BY RP.RECEIPT_ID ASC;

```

##### RESULTS:

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RECEIPT_ID	MEDICINE_ID	MED_NAME	DOCTOR_ID	DOC_NAME	PATIENT_ID	P_NAME	ROOM_NO	ROOM_TYPE	PAYMENT_DATE	TOTAL_PAYMENT
RP001	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P021	ZAFIRA SOFEAH BINTI...	R210	STANDARD SHARE ...	Aug 2, 2019	480.00
RP002	M002	PROZAC	D006	DR.SHASHA QISTINA	P003	MUHAMMAD AMIRUL H...	R102	STANDARD SINGLE...	Aug 6, 2019	612.00
RP003	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P010	NUR ERINA MUSFIRA ...	R001	PADDED ROOM	Aug 18, 2019	400.00
RP004	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P015	NUR HANIS BINTI SAR...	R202	STANDARD SHARE ...	Aug 12, 2019	720.00
RP005	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P020	SITI SOFEA BINTI ABU...	R003	PADDED ROOM	Aug 10, 2019	480.00
RP006	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P011	NUR FATEEHAH BINTI ...	R202	STANDARD SHARE ...	Aug 27, 2019	1,760.00
RP007	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P002	FARAH NATASHA BINT...	R002	PADDED ROOM	Aug 28, 2019	400.00
RP008	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P009	NUR AZEEMA BINTI BA...	R004	PADDED ROOM	Aug 2, 2019	480.00
RP009	M001	CELEXA	D007	DR.AMIRAH ALYA	P025	NUR AINAA NAJIHAH ...	R206	STANDARD SHARE ...	Aug 19, 2019	624.00
RP010	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P007	NUR ATHIRA ASHIKIN ...	R203	STANDARD SHARE ...	Aug 22, 2019	720.00
RP011	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P006	MUHAMMAD ANIQ DA...	R201	STANDARD SHARE ...	Aug 30, 2019	1,068.00
RP012	M002	PROZAC	D006	DR.SHASHA QISTINA	P014	MUHAMMAD ASYRAAF...	R110	STANDARD SINGLE...	Aug 30, 2019	612.00
RP013	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P019	MUHAMMAD DHAIKAL ...	R104	STANDARD SINGLE...	Aug 25, 2019	1,068.00
RP014	M001	CELEXA	D007	DR.AMIRAH ALYA	P001	ANISAH MAWADDAH B...	R205	STANDARD SHARE ...	Aug 7, 2019	624.00
RP015	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P004	JASMIN IRDINA BINTI ...	R203	STANDARD SHARE ...	Aug 3, 2019	720.00
RP016	M001	CELEXA	D007	DR.AMIRAH ALYA	P017	MUHAMMAD ARIEF BI...	R208	STANDARD SHARE ...	Aug 21, 2019	624.00
RP017	M005	ZYPREXA	D001	DR.BELLA NADIA	P012	NUR HANIS BINTI MO...	R106	STANDARD SINGLE...	Aug 21, 2019	2,000.00
RP018	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P008	MUHAMMAD AQIB AID...	R201	STANDARD SHARE ...	Aug 11, 2019	1,068.00
RP019	M001	CELEXA	D007	DR.AMIRAH ALYA	P005	MUHAMMAD AMMAR S...	R103	STANDARD SINGLE...	Aug 1, 2019	624.00
RP020	M005	ZYPREXA	D001	DR.BELLA NADIA	P024	NOR AZERA NABILAH ...	R206	STANDARD SHARE ...	Aug 23, 2019	2,000.00
RP021	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P016	NUR FATIHAH MAISAR...	R109	STANDARD SINGLE...	Aug 20, 2019	1,760.00
RP022	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P018	MUHAMMAD AZIM BIN ...	R208	STANDARD SHARE ...	Aug 15, 2019	400.00
RP023	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P023	MUHAMMAD FAEZ BIN ...	R005	PADDED ROOM	Aug 11, 2019	400.00
RP024	M005	ZYPREXA	D001	DR.BELLA NADIA	P013	MUHAMMAD AQMAR B...	R209	STANDARD SHARE ...	Aug 4, 2019	2,000.00
RP025	M002	PROZAC	D006	DR.SHASHA QISTINA	P022	MUHAMMAD EMIR HAK...	R205	STANDARD SHARE ...	Aug 12, 2019	612.00





RECEIPT_ID	MEDICINE_ID	MED_NAME	DOCTOR_ID	DOC_NAME	PATIENT_ID	P_NAME	ROOM_NO	ROOM_TYPE	PAYMENT_DATE	TOTAL_PAYMENT
RP026	M001	CELEXA	D007	DR.AMIRAH ALYA	P001	ANISAH MAWADDAH B...	R205	STANDARD SHARE ...	Sep 28, 2019	624.00
RP027	M005	ZYPREXA	D001	DR.BELLA NADIA	P024	NOR AZERA NABILAH ...	R206	STANDARD SHARE ...	Sep 29, 2019	2,000.00
RP028	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P006	MUHAMMAD ANIQ DA...	R201	STANDARD SHARE ...	Sep 22, 2019	1,068.00
RP029	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P004	JASMIN IRDINA BINTI ...	R203	STANDARD SHARE ...	Sep 16, 2019	720.00
RP030	M005	ZYPREXA	D001	DR.BELLA NADIA	P012	NUR HANIS BINTI MO...	R106	STANDARD SINGLE...	Sep 13, 2019	2,000.00
RP031	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P018	MUHAMMAD AZIM BIN ...	R208	STANDARD SHARE ...	Sep 16, 2019	400.00
RP032	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P020	SITI SOFEA BINTI ABU...	R003	PADDED ROOM	Sep 1, 2019	480.00
RP033	M001	CELEXA	D007	DR.AMIRAH ALYA	P005	MUHAMMAD AMMAR S...	R103	STANDARD SINGLE...	Sep 3, 2019	624.00
RP034	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P011	NUR FATEEHAH BINTI ...	R202	STANDARD SHARE ...	Sep 2, 2019	1,760.00
RP035	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P009	NUR AZEEMA BINTI BA...	R004	PADDED ROOM	Sep 15, 2019	480.00
RP036	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P015	NUR HANIS BINTI SAR...	R202	STANDARD SHARE ...	Sep 29, 2019	720.00
RP037	M005	ZYPREXA	D001	DR.BELLA NADIA	P013	MUHAMMAD AQMAR B...	R209	STANDARD SHARE ...	Sep 3, 2019	2,000.00
RP038	M002	PROZAC	D006	DR.SHASHA QISTINA	P022	MUHAMMAD EMIR HAK...	R205	STANDARD SHARE ...	Sep 8, 2019	612.00
RP039	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P023	MUHAMMAD FAEZ BIN ...	R005	PADDED ROOM	Sep 1, 2019	400.00
RP040	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P010	NUR ERINA MUSFIRA ...	R001	PADDED ROOM	Sep 14, 2019	400.00
RP041	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P007	NUR ATHIRA ASHIKIN ...	R203	STANDARD SHARE ...	Sep 23, 2019	720.00
RP042	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P002	FARAH NATASHA BINT...	R002	PADDED ROOM	Sep 20, 2019	400.00
RP043	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P021	ZAFIRA SOFEAH BINTI...	R210	STANDARD SHARE ...	Sep 26, 2019	480.00
RP044	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P008	MUHAMMAD AQIB AID...	R201	STANDARD SHARE ...	Sep 30, 2019	1,068.00
RP045	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P019	MUHAMMAD DHAIKAL ...	R104	STANDARD SINGLE...	Sep 19, 2019	1,068.00
RP046	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P016	NUR FATIHAH MAISAR...	R109	STANDARD SINGLE...	Sep 15, 2019	1,760.00
RP047	M002	PROZAC	D006	DR.SHASHA QISTINA	P003	MUHAMMAD AMIRUL H...	R102	STANDARD SINGLE...	Sep 17, 2019	612.00
RP048	M002	PROZAC	D006	DR.SHASHA QISTINA	P014	MUHAMMAD ASYRAAF...	R110	STANDARD SINGLE...	Sep 7, 2019	612.00
RP049	M001	CELEXA	D007	DR.AMIRAH ALYA	P025	NUR AINAA NAJIHAH ...	R206	STANDARD SHARE ...	Sep 4, 2019	624.00
RP050	M001	CELEXA	D007	DR.AMIRAH ALYA	P017	MUHAMMAD ARIEF BI...	R208	STANDARD SHARE ...	Sep 30, 2019	624.00

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RP051	M001	CELEXA	D007	DR.AMIRAH ALYA	P001	ANISAH MAWADDAH B...	R205	STANDARD SHARE ...	Oct 2, 2019	624.00
RP052	M001	CELEXA	D007	DR.AMIRAH ALYA	P025	NUR AINAA NAJIHAH ...	R206	STANDARD SHARE ...	Oct 16, 2019	624.00
RP053	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P002	FARAH NATASHA BINT...	R002	PADDED ROOM	Oct 17, 2019	400.00
RP054	M005	ZYPREXA	D001	DR.BELLA NADIA	P024	NOR AZERA NABILAH ...	R206	STANDARD SHARE ...	Oct 22, 2019	2,000.00
RP055	M002	PROZAC	D006	DR.SHASHA QISTINA	P003	MUHAMMAD AMIRUL H...	R102	STANDARD SINGLE...	Oct 2, 2019	612.00
RP056	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P011	NUR FATEEHAH BINTI ...	R202	STANDARD SHARE ...	Oct 17, 2019	1,760.00
RP057	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P021	ZAFIRA SOFEAH BINTI...	R210	STANDARD SHARE ...	Oct 14, 2019	480.00
RP058	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P006	MUHAMMAD ANIQ DA...	R201	STANDARD SHARE ...	Oct 1, 2019	1,068.00
RP059	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P015	NUR HANIS BINTI SAR...	R202	STANDARD SHARE ...	Oct 31, 2019	720.00
RP060	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P018	MUHAMMAD AZIM BIN ...	R208	STANDARD SHARE ...	Oct 29, 2019	400.00
RP061	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P004	JASMIN IRDINA BINTI ...	R203	STANDARD SHARE ...	Oct 25, 2019	720.00
RP062	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P008	MUHAMMAD AQIB AID...	R201	STANDARD SHARE ...	Oct 21, 2019	1,068.00
RP063	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P019	MUHAMMAD DHAIKAL ...	R104	STANDARD SINGLE...	Oct 30, 2019	1,068.00
RP064	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P020	SITI SOFEA BINTI ABU...	R003	PADDED ROOM	Oct 11, 2019	480.00
RP065	M005	ZYPREXA	D001	DR.BELLA NADIA	P012	NUR HANIS BINTI MO...	R106	STANDARD SINGLE...	Oct 19, 2019	2,000.00
RP066	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P007	NUR ATHIRA ASHIKIN ...	R203	STANDARD SHARE ...	Oct 10, 2019	720.00
RP067	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P010	NUR ERINA MUSFIRA ...	R001	PADDED ROOM	Oct 8, 2019	400.00
RP068	M001	CELEXA	D007	DR.AMIRAH ALYA	P017	MUHAMMAD ARIEF BI...	R208	STANDARD SHARE ...	Oct 6, 2019	624.00
RP069	M005	ZYPREXA	D001	DR.BELLA NADIA	P013	MUHAMMAD AQMAR B...	R209	STANDARD SHARE ...	Oct 24, 2019	2,000.00
RP070	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P009	NUR AZEEMA BINTI BA...	R004	PADDED ROOM	Oct 27, 2019	480.00
RP071	M002	PROZAC	D006	DR.SHASHA QISTINA	P022	MUHAMMAD EMIR HAK...	R205	STANDARD SHARE ...	Oct 16, 2019	612.00
RP072	M001	CELEXA	D007	DR.AMIRAH ALYA	P005	MUHAMMAD AMMAR S...	R103	STANDARD SINGLE...	Oct 14, 2019	624.00
RP073	M002	PROZAC	D006	DR.SHASHA QISTINA	P014	MUHAMMAD ASYRAAF...	R110	STANDARD SINGLE...	Oct 19, 2019	612.00
RP074	M003	ALPHAZOLAM	D004	DR. TAN WEI NEE	P023	MUHAMMAD FAEZ BIN ...	R005	PADDED ROOM	Oct 5, 2019	400.00
RP075	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P016	NUR FATIHAH MAISAR...	R109	STANDARD SINGLE...	Oct 22, 2019	1,760.00

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RP074	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P023	MUHAMMAD FAEZ BIN ...	R005	PADDED ROOM	Oct 5, 2019	400.00
RP075	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P016	NUR FATIAH MAISAR...	R109	STANDARD SINGLE...	Oct 22, 2019	1,760.00
RP076	M002	PROZAC	D006	DR.SHASHA QISTINA	P022	MUHAMMAD EMIR HAK...	R205	STANDARD SHARE ...	Nov 8, 2019	612.00
RP077	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P010	NUR ERINA MUSFIRA ...	R001	PADDED ROOM	Nov 21, 2019	400.00
RP078	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P002	FARAH NATASHA BINT...	R002	PADDED ROOM	Nov 30, 2019	400.00
RP079	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P009	NUR AZEEMA BINTI BA...	R004	PADDED ROOM	Nov 4, 2019	480.00
RP080	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P008	MUHAMMAD AQIB AID...	R201	STANDARD SHARE ...	Nov 1, 2019	1,068.00
RP081	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P016	NUR FATIAH MAISAR...	R109	STANDARD SINGLE...	Nov 5, 2019	1,760.00
RP082	M001	CELEXA	D007	DR.AMIRAH ALYA	P017	MUHAMMAD ARJEF BI...	R208	STANDARD SHARE ...	Nov 19, 2019	624.00
RP083	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P023	MUHAMMAD FAEZ BIN ...	R005	PADDED ROOM	Nov 13, 2019	400.00
RP084	M001	CELEXA	D007	DR.AMIRAH ALYA	P005	MUHAMMAD AMMAR S...	R103	STANDARD SINGLE...	Nov 27, 2019	624.00
RP085	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P007	NUR ATHIRA ASHIKIN ...	R203	STANDARD SHARE ...	Nov 11, 2019	720.00
RP086	M005	ZYPREXA	D001	DR.BELLA NADIA	P012	NUR HANIS BINTI MO...	R106	STANDARD SINGLE...	Nov 10, 2019	2,000.00
RP087	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P015	NUR HANIS BINTI SAR...	R202	STANDARD SHARE ...	Nov 4, 2019	720.00
RP088	M006	VRAYLAR	D002	DR.AIMAN HAIKAL	P011	NUR FATEHAH BINTI ...	R202	STANDARD SHARE ...	Nov 2, 2019	1,760.00
RP089	M001	CELEXA	D007	DR.AMIRAH ALYA	P025	NUR AINAA NAJIHAH ...	R206	STANDARD SHARE ...	Nov 22, 2019	624.00
RP090	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P020	SITI SOFEA BINTI ABU...	R003	PADDED ROOM	Nov 17, 2019	480.00
RP091	M003	ALPHAZOLAM	D004	DR.TAN WEI NEE	P018	MUHAMMAD AZIMI BIN ...	R208	STANDARD SHARE ...	Nov 11, 2019	400.00
RP092	M002	PROZAC	D006	DR.SHASHA QISTINA	P003	MUHAMMAD AMIRUL H...	R102	STANDARD SINGLE...	Nov 23, 2019	612.00
RP093	M005	ZYPREXA	D001	DR.BELLA NADIA	P013	MUHAMMAD AQMAR B...	R209	STANDARD SHARE ...	Nov 28, 2019	2,000.00
RP094	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P019	MUHAMMAD DHAIKAL ...	R104	STANDARD SINGLE...	Nov 24, 2019	1,068.00
RP095	M008	ANAFRANIL	D008	DR.LEE JONG SUK	P021	ZAFIRA SOFEAH BINTI...	R210	STANDARD SHARE ...	Nov 12, 2019	480.00
RP096	M002	PROZAC	D006	DR.SHASHA QISTINA	P014	MUHAMMAD ASYRAAF...	R110	STANDARD SINGLE...	Nov 5, 2019	612.00
RP097	M007	NAMENDA	D005	DR.FAIZ ABDULLAH	P004	JASMIN IRDINA BINTI ...	R203	STANDARD SHARE ...	Nov 9, 2019	720.00
RP098	M004	SEROTONIN	D003	DR.SIVA SEGARAN	P006	MUHAMMAD ANIQ DA...	R201	STANDARD SHARE ...	Nov 15, 2019	1,068.00
RP099	M005	ZYPREXA	D001	DR.BELLA NADIA	P024	NOR AZERA NABILAH ...	R206	STANDARD SHARE ...	Nov 18, 2019	2,000.00
RP100	M001	CELEXA	D007	DR.AMIRAH ALYA	P001	ANISAH MAWADDAH B...	R205	STANDARD SHARE ...	Nov 25, 2019	624.00

SQL #3  
COMMAND:

Target MENT\_INS

Add...

```

SELECT DISTINCT P.PATIENT_ID,P.P_NAME,M.MED_NAME,
      DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4)*4),8,2) AS "4MONTHS-PAYMENT"
FROM PATIENT P, MEDICINE M
WHERE P.MEDICINE_ID = M.MEDICINE_ID
ORDER BY P.PATIENT_ID;

```










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## RESULTS:

PATIENT_ID	P_NAME	MED_NAME	4MONTHS-PAYMENT
P001	ANISAH MAWADDAH BINTI SUHAILI	CELEXA	2,496.00
P002	FARAH NATASHA BINTI MOHD FUAD	ALPHAZOLAM	1,600.00
P003	MUHAMMAD AMIRUL HAIKAL BIN MUHAMMAD RAZANI	PROZAC	2,448.00
P004	JASMIN IRDINA BINTI JEFRI	NAMENDA	2,880.00
P005	MUHAMMAD AMMAR SYAHMI BIN NOORHANAFI	CELEXA	2,496.00
P006	MUHAMMAD ANIQ DANIEL BIN SUHAIMI	SEROTONIN	4,272.00
P007	NUR ATHIRA ASHIKIN BINTI AZIZAN	NAMENDA	2,880.00
P008	MUHAMMAD AQIB AIDIL BIN MOHD NAZARUDIN	SEROTONIN	4,272.00
P009	NUR AZEEMA BINTI BAHARUDDIN	ANAFRANIL	1,920.00
P010	NUR ERINA MUSFIRA BINTI NORAZMI	ALPHAZOLAM	1,600.00
P011	NUR FATEEHAH BINTI MOHD ZAKI	VRAYLAR	7,040.00
P012	NUR HANIS BINTI MOHD IDRIS	ZYPREXA	8,000.00
P013	MUHAMMAD AQMAR BIN AZMI NOR	ZYPREXA	8,000.00
P014	MUHAMMAD ASYRAAF BIN AMRAN	PROZAC	2,448.00
P015	NUR HANIS BINTI SARIMAN	NAMENDA	2,880.00
P016	NUR FATIHAH MAISARAH BINTI MOHD FAUZAN	VRAYLAR	7,040.00
P017	MUHAMMAD ARIEF BIN NAZARUDDIN	CELEXA	2,496.00
P018	MUHAMMAD AZIM BIN MOHD AMIRUDIN	ALPHAZOLAM	1,600.00
P019	MUHAMMAD DHAIKAL BIN MUHAMMAD DZULFAKAR	SEROTONIN	4,272.00
P020	SITI SOFEA BINTI ABU BAKAR	ANAFRANIL	1,920.00
P021	ZAFIRA SOFEAH BINTI ZAFRULLAH	ANAFRANIL	1,920.00
P022	MUHAMMAD EMIR HAKIMI BIN SAHROM @ NORIZAMIM	PROZAC	2,448.00
P023	MUHAMMAD FAEZ BIN MOHAMMAD NAZRI	ALPHAZOLAM	1,600.00
P024	NOR AZERA NABILAH ABDUL AZIZ	ZYPREXA	8,000.00
P025	NUR AINAA NAJIHAH BINTI NOR AZHA	CELEXA	2,496.00

## SQL #4

### COMMAND:

    Target: <span>MENT_INS</span> Add...     
<pre> SELECT DISTINCT P.PATIENT_ID,P.P_NAME,         DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4),8,2) AS "TOTAL_PAYMENT" FROM PATIENT P, MEDICINE M WHERE P.MEDICINE_ID = M.MEDICINE_ID AND DECIMAL(((M.MED_PRICE*M.MED_QUANTITY)*4),8,2) &lt; 1000 ORDER BY P.PATIENT_ID; </pre>







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## RESULTS:

PATIENT_ID	P_NAME	TOTAL_PAYMENT
P001	ANISAH MAWADDAH BINTI SUHAILI	624.00
P002	FARAH NATASHA BINTI MOHD FUAD	400.00
P003	MUHAMMAD AMIRUL HAIKAL BIN MUHAMMAD RAZANI	612.00
P004	JASMIN IRDINA BINTI JEFRI	720.00
P005	MUHAMMAD AMMAR SYAHMI BIN NOORHANAFI	624.00
P007	NUR ATHIRA ASHIKIN BINTI AZIZAN	720.00
P009	NUR AZEEMA BINTI BAHARUDDIN	480.00
P010	NUR ERINA MUSFIRA BINTI NORAZMI	400.00
P014	MUHAMMAD ASYRAAF BIN AMRAN	612.00
P015	NUR HANIS BINTI SARIMAN	720.00
P017	MUHAMMAD ARIEF BIN NAZARUDDIN	624.00
P018	MUHAMMAD AZIM BIN MOHD AMIRUDIN	400.00
P020	SITI SOFEA BINTI ABU BAKAR	480.00
P021	ZAFIRA SOFEAH BINTI ZAFRULLAH	480.00
P022	MUHAMMAD EMIR HAKIMI BIN SAHROM @ NORIZAMIM	612.00
P023	MUHAMMAD FAEZ BIN MOHAMMAD NAZRI	400.00
P025	NUR AINAA NAJIHAH BINTI NOR AZHA	624.00

## SQL #5

## COMMAND:





Target: MENT\_INS Add...

```

SELECT SUM(((MED_PRICE*MED_QUANTITY)*5)*16) AS "SUM",
AVG (((MED_PRICE*MED_QUANTITY)*5)*16) AS "AVERAGE",
MIN (((MED_PRICE*MED_QUANTITY)*5)*16) AS "MINIMUM",
MAX (((MED_PRICE*MED_QUANTITY)*5)*16) AS "MAXIMUM",
COUNT (((MED_PRICE*MED_QUANTITY)*5)*16) AS "COUNT"
FROM MEDICINE;

```

## RESULTS:

SUM	AVERAGE	MINIMUM	MAXIMUM	COUNT
153,280.00	19,160.00	8,000.00	40,000.00	8

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## 9. Conclusion

We learnt a lot of experiences and lessons in creating an efficient database. The problems we faced were surprisingly a lot but we as a team, managed to overcome the problem. Creating a dummy data such as names and diagnose were challenging as PATIENT table should consists of more than 20 data of patients, the struggle to define just their names was a huge obstacle and that doesn't include the SQL queries to insert the data into the specific tables.

We interviewed professionals in order to create a realistic database. Almost all of the data in the database are actual real-life data from the Career & Counseling Center. The specialists, the specific wards for specific treatments and the medication descriptions are all real-life data from the Career & Counseling Center mentioned in the title.

This course taught us the foundation of organizing all data which can be applied in many different fields. By organizing data, we can see that the data is easy to access, and most importantly no data redundancy. The data is well kept and can also be added, removed or updated based on the required tasks.

## 10. References

- 1) Sir Mohd Hafizan Bin Musa, Senior Lecturer, Introduction to Database System, UiTM Johor Segamat Campus.
- 2) Carlos Coronel/ Steven Morris, Database Systems: Design. Implementation and Management, 2018, Cengage Learning, 13th Edition, ISBN: 978-981-4834-24-7.