MARKS

CO2: /50

CO3: /50

CO3: /25



UNIVERSITI MALAYSIA PAHANG AL-SULTAN ABDULLAH

BCI2023 DATABASE SYSTEMS

TITLE: SINGLE MOTHER SERVICE MANAGEMENT SYSTEM

LECTURER: TS. DR. LIEW SIAU CHUIN

MATRIC NO	SECTION	NAME
SD22004	01G	NUR AINUL NASUHA BINTI MOHD AZREEN
SD22012	02G	PUTRI BALQIS BATRISYIA BINTI MOHD RIZAL
SD22013	01G	AQILAH MAISARAH BINTI AZIZI
SD22031	02G	ANIS AQILAH BINTI MOHD ASRI
SD22055	01G	AMIRAH AISYAH BINTI ABDULLAH

TABLE OF CONTENTS:

Part 1: Proposal of database system

- 1.0 Content of report
- 2.0 Comparison between two databases
- 3.0 Business Rules of Proposed System
- 4.0 ERD & EERD of Proposed System

Part 2: SQL & Normalization

- 5.0 Data Definition Language (DDL)
- 6.0 Data Manipulation Language (DML)
- 7.0 Normalization
- 8.0 Data Dictionary
- 9.0 References
- 10.0 Appendix

1.0 PROJECT BACKGROUND

The "Single Mother Service Management System" is a database application system designed to address the challenges faced by single mothers in the post-COVID-19 pandemic era. The COVID-19 pandemic has had a profound impact on individuals and communities, and single mothers have been particularly affected. Many single mothers faced increased financial strain, lost their jobs or had their working hours reduced due to lockdowns and economic uncertainties, childcare difficulties and health-related support during the pandemic. Thus, it is crucial to develop a system that provides support and services tailored to the unique needs of single mothers in this new normal.

The "Single Mother Service Management System" is essential to assist single mothers in rebuilding their lives after the challenges posed by the COVID-19 pandemic. It recognizes the need for a centralized platform that streamlines access to vital services and support, enabling single mothers to regain their economic stability, provide for their children, and maintain their overall well-being.

This project is significant because it directly addresses the impact of the COVID-19 pandemic on single mothers. By offering tailored support services, it aims to empower single mothers to rebuild their lives and create a more stable future for themselves and their children. The "Single Mother Service Management System" embodies the spirit of resilience and community support in these challenging times.

In conclusion, the "Single Mother Service Management System" is a vital project designed to assist single mothers in navigating the post-COVID-19 landscape. By offering a comprehensive set of services, it aims to empower single mothers, improve their well-being, and contribute to their long-term success and happiness.

OBJECTIVES

The objectives of the proposed system are: -

- 1. To create a database application system that offers a range of services to support single mothers in their daily life.
- 2. To provide a platform for single mothers to access resources, job opportunities, and financial assistance programs.
- 3. Facilitate the coordination of childcare services and resources, helping single mothers find suitable and affordable options for their children.
- 4. Offer health and wellness resources to address the physical and mental well-being of single mothers.
- 5. Foster a sense of community and connection by enabling single mothers to interact and share their experiences with others in similar situations.

SCOPES

A mother is frequently required to enter her preferred subject area of interest in a form-based inquiry in an e-management single mother management system. Some of the functions that this system provides are child coordination, health and wellness integration, and resource access and administration. It will gather resources, including financial aid and employment opportunities, to facilitate simple searching and filtering. Additionally, the system will make it easier for users to organize childcare, giving them access to appropriate and affordable solutions. It would also take mental and physical health into care. The program will expand its services through collaborations with community organizations, with the goal of empowering single moms by improving their standard of living and encouraging self-sufficiency.

2.0 Case study

Particularly in the aftermath of the COVID-19 outbreak, every single mother is entitled to a better life. They experienced tremendous things, both physically and mentally. To support their family and their children, they put in a lot of labor. The management service system for single mothers requires time to heal from the damage caused by the COVID-19 outbreak too. This is a fantastic chance for mutual profit for both parties.

To improve the quality of life for herself and her children, the system helps single mothers get more money, work, insurance, and counselling. Additionally, the system is incredibly user-friendly and can do a variety of operations that record information without requiring users to go to several companies or places, saving time and effort.

To register in the system, an applicant must meet certain prerequisites. It's because the management system works in collaboration with other companies, and thus it's imperative to make sure the applicants meet the requirements.

2.0 COMPARISON BETWEEN 2 DATABASES

	Manual Process	Database System 1	Database System 2
Process/ entities	 Registration Referral from: (urban) village clinics, private midwife clinics, POSYANDU ANC services by a midwife Laboratory Case management Referral to a hospital Pharmacy Home Treatment 	 Patient Medicines Tests Treatments Reports Doctors Roles Permission Login User 	 Admin Students Choices Seat Allotment Courses Institutes
Attributes		-Patient patient_id patient_name patient_mobile patient_email patient_username patient_password patient_address -Medicines medicine_id medicine_company medicine_composition medicine_type medicine_dose medicine_description -Tests test_id test_patient_id test_name test_type test_cost test_report test_description -Treatments	• Admin -Admin_ID -Name -Contact No -Email Address -Gender • Students -Student_ID -Name -Contact No -Email Address -DOB -Entrance Rank -10/12th%age • Choices -Entrance Rank -1st Preference -2nd Preference -2nd Preference -Status • Seat Allotment -Student_ID -Entrance Rank -Institute_Code -Course_Code -Preference No • Courses

 -		
	Treatment_id treatment_name treatment_type treatment_description -Reports report_id report_title report_type report_description -Doctors doctors_id doctors_name doctors_specialist doctors_mobile doctors_email doctors_username doctors_password doctors_address -Login login_id login_username login_password -user user_id user_name user_mobile user_email user_address -Roles role_id role_name role_desc -permission per_id per_role_id per_module per_name	-Course_ID -Institute_ID -Of Seats -Total Seats • Institutes -Institute_ID -Name -Contact No -Email Address -Address -Of Courses -Seats

Primary keys Diagram	Flowchart	 Patient Pat_ID Medicines Mdcn_ID Tests Test_ID Reports Rep_ID Roles Role_ID Login Login_ID User User_ID Permission Per_ID ERD/EERD	 Admin Admin_ID Students Student_ID Choices Entrance Rank Seat Allotment Student_ID Courses Course_ID Institutes Institutes_ID
References	ResearchGate. (2024). Indonesian antenatal nutrition education: A qualitative study of healthcare professional views - Scientific Figure. Retrieved January 1, 2024, from https://www.researchga te.net/figure/Flow- chart-of-the-integrated- antenatal-care-process- in-primary-health- centres25- 27_fig2_356963384	Patient Care System ER Diagram FreeProjectz. (2017, July 17). https://www.freeprojectz.c om/entity- relationship/patient-care- system-er-diagram	S. (2021, September 18). ONLINE STUDENT COUNSELING SYSTEM. Instant Edu Help. Retrieved December 31, 2022, from https://instanteduhelp.co m/online-st udent- counseling-system

3.0 BUSSINESS RULES OF MANAGEMENT SYSTEM

ENTITY	RELATIONSHIP	ENTITY	BUSSINESS RULE
Mother PK: MotherIC FK1:ServiceID	1:N	Child PK: ChildIC FK: MotherIC	Each mother can have one or many children.
Child PK: ChildIC	1:1	Mother PK: MotherIC FK:ServiceID	Each child can only have one mother.
Child PK: ChildIC	0:N	Childcare Service PK: ChildcareID FK: ChildIC	Each child can receive zero or many childcare services.
Children_Service PK: ChildcareID	1:1	Child PK:ChildIC	Each childcare service must be received by one child.
Child PK: ChildIC	1:N	Child_patient PK1,FK1:ChildIC PK2,FK2:HospitaIID	Each child can has one or many healthcare service for child patient.
Child_patient PK1,FK1:ChildIC PK2,FK2:HospitalID	1:1	Child PK: ChildIC	Each healthcare service must have one child for a child patient.

Donor PK: DonorIC	1:N	Donation PK: DonationID FK: DonorIC	Each donor can give many donations.
Donation PK: DonationID	1:N	Donor PK: DonorIC	Each donation can be given by only one donor.
Mother PK: MotherIC FK1: ServiceID	0:N	Mother_Coverage PK,FK1: InsuranceID PK,FK2: MotherIC	Each mother can consult zero or many insurances for mother coverage.
Mother_Coverage PK,FK1:InsuranceID PK,FK2:MotherIC	1:1	Mother PK:MotherIC FK1: ServiceID	Each insurance must be consulted by one mother for mother coverage.
Insurance PK: InsuranceID	0:N	Mother_Coverage PK,FK1: InsuranceID PK,FK2: MotherIC	Each insurance can be consulted by zero or many mother for mother coverage.
Mother_Coverage PK,FK1: InsuranceID PK,FK2: MotherIC	1:1	Insurance PK: InsuranceID FK: MotherIC	Each mother must be consulted by at least one insurance for mother coverage.

Healthcare_Service PK: HospitalID	1:N	Mother_Patient PK,FK1: MotherIC PK,FK2: HospitalID	Each healthcare service must be provided with at least one mother as their patient.
Mother_Patient PK,FK1: MotherIC PK,FK2: HospitalID	1:1	Healthcare_Service PK: HospitalID	Each mother may or may not be a patient that provided with one or more healthcare services
Mother PK:MotherIC FK1: ServiceID	1:N	Mother_Patient PK,FK1: MotherIC PK,FK2: HospitalID	Each mother can has one or many healthcare service for mother patient.
Mother_Patient PK,FK1: MotherIC PK,FK2: HospitalID	1:1	Mother PK: MotherIC FK1: ServiceID	Each healthcare service must have one mother for a mother patient.
Healthcare _Service PK:HospitalID	1:N	Child_Patient PK,FK1: ChildIC PK.FK2: HospitalID	Each healthcare service must provide with at least one child as their patient.
Child_Patient PK,FK1: ChildIC PK,FK2: HospitalID	1:1	Healthcare_Service PK: HospitalID	Each child may or may not be a patient that provided with one or more healthcare services.

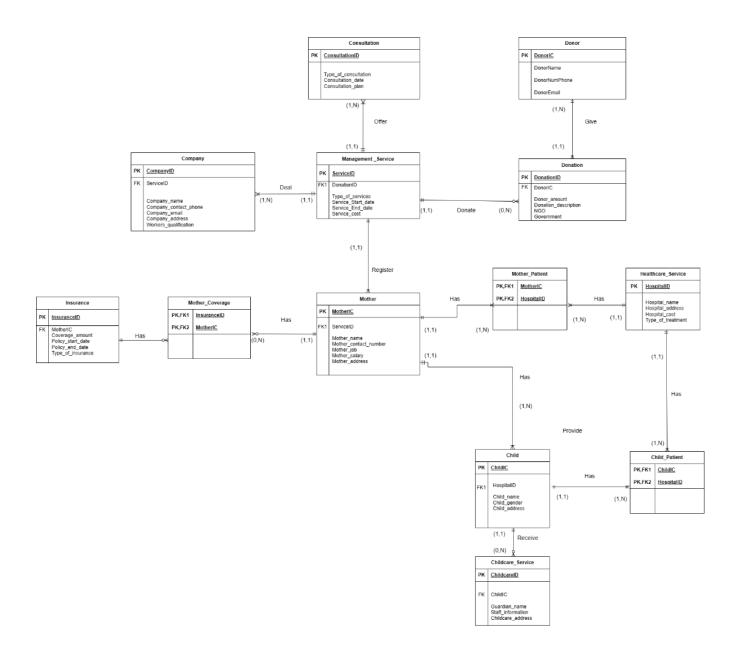
Management_Service PK: ServiceID	1:N	Mother PK: MotherIC FK: ServiceID	•	Management service can accept the registration of one or many mothers.
Mother PK: MotherIC FK: ServiceID	1:1	Management_Service PK: ServiceID FK1: DonationID	•	Each mother can register with only one management service.
Donation PK: DonationID FK: DonorIC	1:1	Management service PK: ServiceID FK: DonationID	•	Each donation can donate to only one management service.
Management_Service PK:ServiceID FK:DonationID	0:N	Donation PK:DonationID FK:DonorIC	•	Each management service can receive zero or many donation.

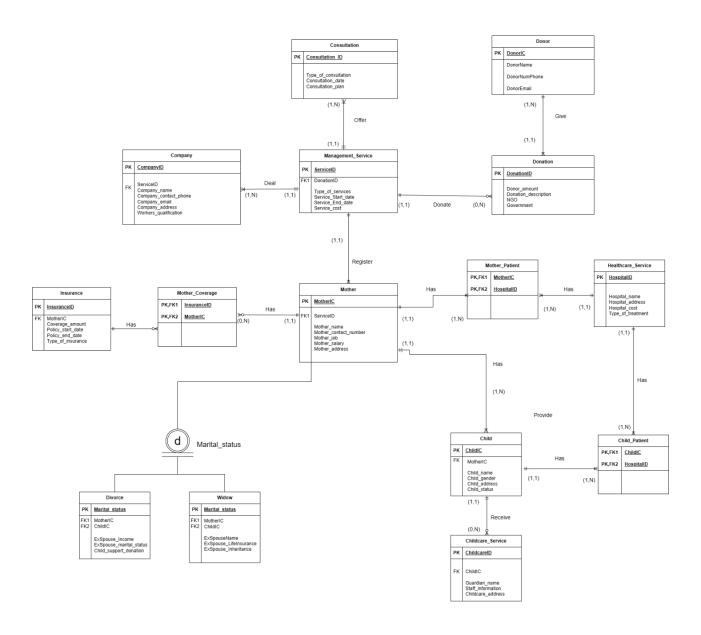
Management_Service PK: ServiceID	1:N	Company PK: CompanyID FK: ServiceID	Management services associated with one or many companies.
Company PK:CompanyID FK:ServiceID	1:1	Management_Service PK: ServiceID FK1:DonationID	Each company was associated with only one management service.
Management_Service PK: ServiceID FK1: DonationID	1:N	Consultation PK: Consultation_ID	Each management service offers one or many consultations.

Consultation PK:ConsultationID	1:1	Management_Service	•	Each consultation can
PK:ConsultationiD		PK:ServiceID		be offered by only
		FK1:DonationID		one management service.

4.0 ERD AND EERD

4.1 ERD





5.0 SQL

CREATE TABLES:

```
CREATE DATABASE:
create database MotherCare;
show databases;
use MotherCare;
SHOW TABLES;
create table CONSULTATION
Consultation_ID varchar (10) not null primary key,
Type_of_consultation varchar (50),
Consultation_date date,
Consultation_plan varchar (40)
);
create table DONOR
DonorIC varchar (25) not null primary key,
DonorName varchar (30),
DonorNumPhone varchar (15),
DonorEmail varchar (50)
);
create table DONATION
```

```
DonationID varchar (10) not null primary key,
Donor_amount varchar (10),
Donation_description varchar (50),
NGO varchar (30),
Goverment varchar (20),
DonorIC varchar (20),
Foreign Key (DonorIC) references DONOR (DonorIC)
);
create table MANAGEMENT_SERVICE
ServiceID varchar (10) not null primary key,
DonationID varchar (10),
Type_of_services varchar (30),
Service_Start_date date,
Service_End_date date,
Service_cost varchar (50),
foreign key (DonationID) references Donation (DonationID)
);
create table COMPANY
(
CompanyID varchar (10) not null primary key,
ServiceID varchar (20),
Company_name varchar (30),
Company_contact_phone varchar (15),
Company_email varchar (50),
Company_address varchar (100),
Workers_qualification varchar (50),
```

```
foreign key (ServiceID) references MANAGEMENT_SERVICE (ServiceID)
);
create table HEALTHCARE_SERVICE
(
HospitalID varchar (10) not null primary key,
Hospital_name varchar (30),
Hospital_address varchar (40),
Hospital_cost varchar (10),
Type_of_treatment varchar (30)
);
create table MOTHER
MotherIC varchar (20) not null primary key,
ServiceID varchar (20),
Mother_name varchar (50),
Mother_contact_number varchar (20),
Mother_job varchar (20),
Mother_salary varchar (10),
Mother_address varchar (40),
foreign key (ServiceID) references MANAGEMENT_SERVICE (ServiceID)
);
create table CHILD
ChildIC varchar (20) not null primary key,
MotherIC varchar (20),
```

```
Child_name varchar (30),
Child_gender varchar (10),
Child_address varchar (30),
Child_status varchar (10),
foreign key (MotherIC) references Mother (MotherIC)
);
create table CHILDCARE_SERVICE
ChildcareID varchar (10) not null primary key,
ChildIC varchar (20),
Staff_information varchar (50),
Guardian_name varchar (30),
Childcare_address varchar (50),
Foreign key (ChildIC) references Child (ChildIC)
);
create table INSURANCE
InsuranceID varchar (10) not null primary key,
MotherIC varchar (20),
Coverage_amount varchar (30),
Policy_start_date date,
Policy_end_date date,
Type_of_insurance varchar (40),
foreign key (MotherIC) references Mother (MotherIC)
);
CREATE TABLE MOTHER_COVERAGE (
```

```
MotherIC varchar (15),
InsuranceID varchar (10),
PRIMARY KEY (InsuranceID, MotherIC),
FOREIGN KEY (InsuranceID) REFERENCES INSURANCE (InsuranceID),
FOREIGN KEY (MotherIC) REFERENCES MOTHER (MotherIC)
);
CREATE TABLE MOTHER_PATIENT (
MotherIC varchar (15),
HospitalID varchar (10),
PRIMARY KEY (HospitalID, MotherIC),
FOREIGN KEY (HospitalID) REFERENCES HEALTHCARE_SERVICE (HospitalID),
FOREIGN KEY (MotherIC) REFERENCES MOTHER (MotherIC)
);
CREATE TABLE CHILD_PATIENT (
ChildIC varchar (20),
HospitalID varchar (10),
PRIMARY KEY (HospitalID, ChildIC),
FOREIGN KEY (HospitalID) REFERENCES HEALTHCARE_SERVICE (HospitalID),
FOREIGN KEY (ChildIC) REFERENCES CHILD (ChildIC)
);
6.0
INSERT VALUES:
CONSULTATION
insert into CONSULTATION values
('CS1', 'Antenatal Checkup', '2023-01-05', 'Monthly checkups'),
```

```
('CS2', 'Postnatal Checkup', '2023-02-10', 'Follow-up appointments'),
('CS3', 'Pediatric Consultation', '2023-03-15', 'Vaccination schedule'),
('CS4', 'Gynecological Consultation', '2023-04-20', 'Women health check'),
('CS5', 'General Health Checkup', '2023-05-25', 'Routine health assessment'),
('CS6', 'Maternal Nutrition Counseling', '2023-06-30', 'Diet and nutrition advice'),
('CS7', 'Mental Health Counseling', '2023-07-05', 'Emotional well-being support'),
('CS8', 'Family Planning Consultation', '2023-08-10', 'Reproductive health guidance'),
('CS9', 'Dental Checkup', '2023-09-15', 'Oral health examination'),
('CS10', 'Eye Examination', '2023-10-20', 'Vision testing'),
('CS11', 'Speech Therapy', '2023-11-25', 'Speech and language improvement'),
('CS12', 'Occupational Therapy', '2023-12-30', 'Skills development'),
('CS13', 'Physiotherapy', '2024-01-05', 'Physical rehabilitation'),
('CS14', 'Nutritional Consultation', '2024-02-10', 'Balanced diet planning'),
('CS15', 'Wellness Checkup', '2024-03-15', 'Comprehensive health assessment');
```

DONOR

```
insert into DONOR values
('960101-14-1234', 'Ahmad Bin Abu', '012-3456789', 'ahmad.abu@gmail.com'),
('960202-14-5678', 'Siti Binti Hamzah', '019-8765432', 'siti.hamzah@yahoo.com'),
('960303-14-9012', 'Razak Bin Khaulid', '017-9876543', 'razak.khaulid@gmail.com'),
('960404-14-3456', 'Norazizah Binti Afiq', '014-5678901', 'norazizah.afiq@yahoo.com'),
('960505-14-6789', 'Fatimah Binti Hasif', '016-7890123', 'fatimah.hasif@gmail.com'),
('960606-14-9012', 'Zainab Binti Rosyam', '013-1234567', 'zainab.rosyam@yahoo.com'),
('960707-14-2345', 'Hassan Bin Noor', '018-2345678', 'hassan.noor@gmail.com'),
('960808-14-5678', 'Noraini Binti Fezrul', '019-3456789', 'noraini.fezrul@yahoo.com'),
('960909-14-9012', 'Ali Bin Khan', '011-4567890', 'ali.khan@gmail.com'),
('961010-14-3456', 'Salmah Binti Donori', '016-5678901', 'salmah.donori@yahoo.com'),
('961111-14-6789', 'Hamid Bin Zainal', '014-6789012', 'hamid.zainal@gmail.com'),
('961212-14-9012', 'Zainal Bin Yassin', '017-7890123', 'zainal.yassin@yahoo.com'),
('961313-14-2345', 'Siti Aishah Binti Ali', '012-8901234', 'siti aishah.ali@gmail.com'),
('961414-14-5678', 'Abdul Rahman Bin Sofian', '019-9012345', 'abdul_rahman.sofian@yahoo.com'),
```

('961515-14-9012', 'Nurul Huda Binti Rizan', '016-0123456', 'nurul huda.rizan@gmail.com');

DONATION

insert into DONATION values

('D1', '1000', 'Maternity Care Fund', 'Save Mothers NGO', 'PeKa B40', '960101-14-1234'), ('D2', '500', 'Child Vaccination Program', 'Child Health Foundation', 'mySalam', '960202-14-5678'), ('D3', '1500', 'Medical Support for Mothers', 'Healthcare Heroes', 'STR', '960303-14-9012'), ('D4', '800', 'Gynecological Services', 'Women Health Organization', 'BKK', '960404-14-3456'), ('D5', '1200', 'Pediatric Care', 'Child Wellness Association', 'Mercy Malaysia', '960505-14-6789'), ('D6', '700', 'Family Planning Initiative', 'Repro Health Foundation', 'BTB', '960606-14-9012'), ('D7', '950', 'Rehabilitation Programs', 'Ability Foundation', 'BPT', '960707-14-2345'), ('D8', '600', 'Dental Health Campaign', 'Smile Foundation', 'BWE', '960808-14-5678'), ('D9', '300', 'Eye Care Program', 'Vision for All', 'BA', '960909-14-9012'), ('D10', '550', 'Nutrition Support', 'Healthy Living NGO', 'BAP', '961010-14-3456'), ('D11', '750', 'Mental Health Awareness', 'Mindful Society', 'BLP', '961111-14-6789'), ('D12', '1100', 'Child Education Fund', 'Education Empowerment', 'GP', '961212-14-9012'),

```
('D13', '800', 'Psychological Support', 'Mind Matters', 'BAT', '961313-14-2345'),
('D14', '700', 'Speech Therapy Initiative', 'Speak Up Foundation', 'TBS', '961414-14-5678'),
('D15', '900', 'Occupational Therapy Program', 'Ability Beyond Limits', 'NADMA', '961515-14-9012');
MANAGEMENT SERVICE
insert into MANAGEMENT_SERVICE values
('M1', 'D1', 'Medical Checkup', '2023-01-01', '2023-01-15', '500'),
('M2', 'D2', 'Maternity Care', '2023-02-01', '2023-02-15', '1200'),
('M3', 'D3', 'Child Vaccination', '2023-03-01', '2023-03-15', '800'),
('M4', 'D4', 'Antenatal Checkup', '2023-04-01', '2023-04-15', '600'),
('M5', 'D5', 'Postnatal Checkup', '2023-05-01', '2023-05-15', '700'),
('M6', 'D6', 'General Checkup', '2023-06-01', '2023-06-15', '900'),
('M7', 'D7', 'Gynecological Services', '2023-07-01', '2023-07-15', '750'),
('M8', 'D8', 'Pediatric Care', '2023-08-01', '2023-08-15', '1100'),
('M9', 'D9', 'Dental Checkup', '2023-09-01', '2023-09-15', '400'),
('M10', 'D10', 'Eye Examination', '2023-10-01', '2023-10-15', '300'),
('M11', 'D11', 'Maternal Nutrition Counseling', '2023-11-01', '2023-11-15', '550'),
```

```
('M12', 'D12', 'Physiotherapy', '2023-12-01', '2023-12-15', '950'),
```

('M13', 'D13', 'Psychological Counseling', '2024-01-01', '2024-01-15', '800'),

('M14', 'D14', 'Speech Therapy', '2024-02-01', '2024-02-15', '700'),

('M15', 'D15', 'Occupational Therapy', '2024-03-01', '2024-03-15', '900');

COMPANY

insert into COMPANY values

('C1', 'M1', 'HealthTech Solutions', '012-3456789', 'info@healthtech.com', 'Suite 101, Medical Plaza, Jalan Medik, Kuala Lumpur', 'Medical Degree'),

('C2', 'M2', 'ChildCare Innovations', '019-8765432', 'info@childcareinnovations.com', 'Block B, Kids Haven, Jalan Joyful, Penang', 'Early Childhood Education Certification'),

('C3', 'M3', 'DentalCare Experts', '017-9876543', 'info@dentalcareexperts.com', 'Dental Towers, Jalan Smile, Johor Bahru', 'Dental Degree'),

('C4', 'M4', 'VisionCare Professionals', '016-5432109', 'info@visioncarepro.com', 'Visionary Place, Jalan ClearSight, Kuala Lumpur', 'Optometry Degree'),

('C5', 'M5', 'TechSolutions Hub', '011-2345678', 'info@techsolutionshub.com', 'Innovation Center, Jalan TechPark, Penang', 'Information Technology Certification'),

('C6', 'M6', 'NutriWellness Group', '013-3456789', 'info@nutriwellness.com', 'Healthful House, Jalan NutriFit, Johor Bahru', 'Nutrition Certification'),

('C7', 'M7', 'SafetyGuard Systems', '018-4567890', 'info@safetyguard.com', 'Guardian Tower, Jalan SafeZone, Kuala Lumpur', 'Occupational Safety Certification'),

('C8', 'M8', 'EduTech Solutions', '014-5678901', 'info@edutechsolutions.com', 'Learning Center, Jalan EduHub, Penang', 'Education Degree'),

('C9', 'M9', 'LawFirm Associates', '015-6789012', 'info@lawfirm.com', 'Legal Plaza, Jalan LegalEase, Johor Bahru', 'Law Degree'),

('C10', 'M10', 'GreenScape Builders', '016-7890123', 'info@greenscapebuilders.com', 'Eco Towers, Jalan GreenPark, Kuala Lumpur', 'Civil Engineering Degree'),

('C11', 'M11', 'TechInnovate Labs', '017-8901234', 'info@techinnovate.com', 'Innovation Hub, Jalan TechX, Penang', 'Engineering Degree'),

('C12', 'M12', 'FineDine Catering', '018-9012345', 'info@finedinecatering.com', 'Gourmet Avenue, Jalan Tasty, Johor Bahru', 'Culinary Certification'),

('C13', 'M13', 'CreativeDesign Studio', '019-0123456', 'info@creativedesign.com', 'Artistic Block, Jalan Imagination, Kuala Lumpur', 'Design Certification'),

('C14', 'M14', 'FinancialAdvise Consultants', '012-3456789', 'info@financialadvise.com', 'Money Tower, Jalan Finance, Penang', 'Finance Degree'),

('C15', 'M15', 'EventMasters Planners', '011-2345678', 'info@eventmasters.com', 'Celebration Place, Jalan Eventful, Johor Bahru', 'Event Management Certification');

HEALTHCARE SERVICE

insert into HEALTHCARE_SERVICE values

('H1', 'City Medical Center', '456 Jalan XYZ, Kuala Lumpur', '2000', 'Maternity'),

('H2', 'Suburb Hospital', '789 Jalan LMN, Penang', 1500, 'Pediatric'),

('H3', 'Rural Clinic', '101 Jalan PQR, Johor Bahru', 800, 'General Checkup'),

```
('H4', 'Family Health Center', '234 Jalan DEF, Kuala Lumpur', 1200, 'Family Medicine'),
('H5', 'Child Wellness Clinic', '567 Jalan GHI, Penang', '900', 'Child Health'),
('H6', 'Women Health Clinic', '890 Jalan JKL, Johor Bahru', '1000', 'Gynecology'),
('H7', 'Mental Wellness Center', '345 Jalan MNO, Kuala Lumpur', '1800', 'Mental Health'),
('H8','Dental Care Hub', '678 Jalan PQR, Penang', '600', 'Dental Services'),
('H9', 'Eye Care Institute', '901 Jalan STU, Johor Bahru', '500', 'Ophthalmology'),
('H10', 'Rehabilitation Center', '123 Jalan VWX, Kuala Lumpur', '1500', 'Rehabilitation'),
('H11', 'Child Education Clinic', '234 Jalan YZA, Penang', '1300', 'Education Support'),
('H12', 'Psychological Services Center', '456 Jalan BCD, Johor Bahru', '1600', 'Psychology'),
('H13', 'Speech Therapy Institute', '567 Jalan EFG, Kuala Lumpur', '1100', 'Speech Therapy'),
('H14', 'Occupational Therapy Center', '789 Jalan HIJ, Penang', '1200', 'Occupational Therapy'),
('H15','Wellness Clinic', '890 Jalan KLM, Johor Bahru', '1400', 'Comprehensive Wellness');
MOTHER
insert into MOTHER values
('990101-08-1234', 'M1', 'Aminah Binti Ahmad', '012-3456789', 'Accountant', ' 4000', '123 Jalan ABC,
Kuala Lumpur'),
```

('980202-02-5678','M2', 'Siti Fatimah Binti Mohd', '019-8765432', 'Teacher', '3500', '456 Jalan XYZ, Penang'),

('970303-03-9012','M3', 'Maisarah Binti Azizi', '017-9876543', 'Engineer', '6000', '789 Jalan LMN, Johor Bahru'),

('900404-04-3456', 'M4', 'Norazizah Binti Ali', '014-5678901', 'Nurse', '4500', '234 Jalan DEF, Kuala Lumpur'),

('960505-06-6788', 'M5', 'Laila Binti Amir', '016-7890123', 'Technician', '5500', '567 Jalan GHI, Penang'),

('950606-05-0122','M6', 'Zainab Binti Yusof', '013-8901234', 'Homemaker', '3000', '890 Jalan JKL, Johor Bahru'),

('940707-07-4568', 'M7', 'Asiah Binti Abdul', '011-2345678', 'Lawyer', '7000', '345 Jalan MNO, Kuala Lumpur'),

('950808-09-8902', 'M8', 'Noraini Binti Ali', '018-3456789', 'Business Owner', '8000', '678 Jalan PQR, Penang'),

('940909-08-2346', 'M9', 'Alia Binti Andi', '015-6789012', 'Teacher', '3500', '901 Jalan STU, Johor Bahru'),

('921010-11-6786', 'M10', 'Zakaria Bin Rahman', '017-8901234', 'Engineer', '6000', '123 Jalan VWX, Kuala Lumpur'),

('931111-10-0124', 'M11', 'Norlia Binti Mohd', '013-2345678', 'Doctor', '9000', '234 Jalan YZA, Penang'),

('921212-12-4562', 'M12', 'Husna Binti Kamarul', '014-5678901', 'Business Analyst', '5500', '456 Jalan BCD, Johor Bahru'),

('971013-10-8908', 'M13', 'Yasmin Binti Mustafa', '016-6789012', 'Psychologist', '7500', '567 Jalan EFG, Kuala Lumpur'),

```
('960514-13-2348', 'M14', 'Najihah Binti Kamil', '018-8901234', 'Sales Manager', '6800', '789 Jalan HIJ, Penang'),
```

('911115-14-6786', 'M15', 'Zahirah Binti Yusof', '019-0123456', 'Researcher', '5000', '890 Jalan KLM, Johor Bahru');

CHILD

'Healthy'),

INSERT INTO CHILD VALUES

```
('080101-14-5673', '990101-08-1234', 'Ali Bin Amin', 'Male', '456 Jalan XYZ, Kuala Lumpur', 'Healthy'), ('090202-14-9012', '980202-02-5678', 'Fatimah Binti Dollah', 'Female', '789 Jalan LMN, Penang',
```

('100303-02-3455', '970303-03-9012', 'Ahmad Bin Razak', 'Male', '101 Jalan PQR, Johor Bahru', 'Healthy'),

('110404-03-5678', '900404-04-3456', 'Nurul Aisha Binti Ali', 'Female', '234 Jalan DEF, Kuala Lumpur', 'Healthy'),

('120505-04-9017', '960505-06-6788', 'Mohd Ali Bin Ahmad', 'Male', '567 Jalan GHI, Penang', 'Healthy'),

('110606-11-2346', '950606-05-0122', 'Norazizah Binti Hassan', 'Female', '890 Jalan JKL, Johor Bahru', 'Healthy'),

('120707-12-5673', '940707-07-4568', 'Hassan Bin Abdullah', 'Male', '345 Jalan MNO, Kuala Lumpur', 'Healthy'),

('150808-08-9012', '950808-09-8902', 'Noraini Binti Ali', 'Female', '678 Jalan PQR, Penang', 'Healthy'),

('160909-07-3453', '940909-08-2346', 'Ali Bin Hussein', 'Male', '901 Jalan STU, Johor Bahru', 'Healthy'),

('181010-06-5678', '921010-11-6786', 'Salmah Binti Hamid', 'Female', '112 Jalan VWX, Kuala Lumpur', 'Healthy'),

('201111-14-9013', '931111-10-0124', 'Hamid Bin Ismail', 'Male', '223 Jalan YZA, Penang', 'Healthy'),

('171212-06-2345', '921212-12-4562', 'Zainal Bin Ahmad', 'Male', '334 Jalan BCD, Johor Bahru', 'Healthy'),

('151213-09-5678', '971013-10-8908', 'Siti Aishah Binti Abdul', 'Female', '445 Jalan EFG, Kuala Lumpur', 'Healthy'),

('151014-13-9015', '960514-13-2348', 'Abdul Rahman Bin Ismail', 'Male', '556 Jalan HIJ, Penang', 'Healthy'),

('101115-14-2346', '911115-14-6786', 'Nurul Huda Binti Zainal', 'Female', '667 Jalan KLM, Johor Bahru', 'Healthy');

CHILDCARE SERVICE

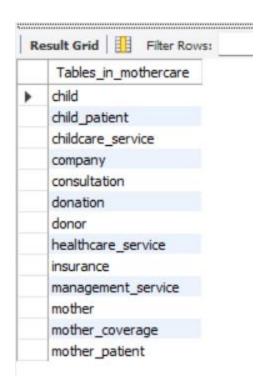
insert into CHILDCARE SERVICE values

('CR1', '080101-14-5673','920101-14-1234', 'Ali Bin Abu', '446 Jalan XYZ, Kuala Lumpur'), ('CR2', '090202-14-9012', '930202-13-5678', 'Fatimah Binti Wahid', '785 Jalan LMN, Penang'), ('CR3','100303-02-3455', '950303-12-9012', 'Ahmad Bin Razak', '109 Jalan PQR, Johor Bahru'), ('CR4', '110404-03-5678', '920404-10-3456', 'Nurul Aisha Binti Ali', '231 Jalan DEF, Kuala Lumpur'), ('CR5', '120505-04-9017', '910505-14-6789', 'Mohd Ali Bin Ahmad', '577 Jalan GHI, Penang'), ('CR6', '110606-11-2346', '900606-02-9012', 'Norazizah Binti Hassan', '880 Jalan JKL, Johor Bahru'), ('CR7', '120707-12-5673', '940707-02-2345', 'Hassan Bin Hasbulllah', '335 Jalan MNO, Kuala Lumpur'), ('CR8', '150808-08-9012', '950808-06-5678', 'Noraini Binti Ali', '688 Jalan PQR, Penang'), ('CR9', '160909-07-3453', '920909-14-9012', 'Ali Bin Hussein', '911 Jalan STU, Johor Bahru'), ('CR10','181010-06-5678', '931010-07-3456', 'Salmah Binti Hamid', '113 Jalan VWX, Kuala Lumpur'), ('CR11','201111-14-9013', '931111-14-6789', 'Hamid Bin Ismail', '229 Jalan YZA, Penang'), ('CR12', '171212-06-2345', '901212-14-9012', 'Zainal Bin Ahmad', '330 Jalan BCD, Johor Bahru'),

```
('CR13', '151213-09-5678', '910506-12-2345', 'Siti Aishah Binti Abdul Ali', '442 Jalan EFG, Kuala Lumpur'),
('CR14', '151014-13-9015', '950904-08-5678', 'Abdul Rahman Bin Ismail', '554 Jalan HIJ, Penang'),
('CR15', '101115-14-2346', '940802-06-9012', 'Nurul Huda Binti Zainal', '663 Jalan KLM, Johor Bahru');
INSURANCE
INSERT INTO INSURANCE VALUES
('I1', '990101-08-1234', '3000', '2023-01-01', '2024-01-01', 'Maternity Coverage'),
('I2', '980202-02-5678', '2000', '2023-02-01', '2024-02-01', 'Child Health Coverage'),
('I3', '970303-03-9012', '1000', '2023-03-01', '2024-03-01', 'General Health Insurance'),
('I4', '900404-04-3456', '2500', '2023-04-01', '2024-04-01', 'Dental Coverage'),
('I5', '960505-06-6788', '1800', '2023-05-01', '2024-05-01', 'Vision Care'),
('16', '950606-05-0122', '3500', '2023-06-01', '2024-06-01', 'Family Health Plan'),
('I7', '940707-07-4568', '1200', '2023-07-01', '2024-07-01', 'Critical Illness Insurance'),
('18', '950808-09-8902', '2800', '2023-08-01', '2024-08-01', 'Accidental Coverage'),
('19', '940909-08-2346', '2000', '2023-09-01', '2024-09-01', 'Travel Insurance'),
('I10', '921010-11-6786', '4000', '2023-10-01', '2024-10-01', 'Life Insurance'),
('I11', '931111-10-0124', '1500', '2023-11-01', '2024-11-01', 'Disability Insurance'),
('I12', '921212-12-4562', '2200', '2023-12-01', '2024-12-01', 'Income Protection'),
('I13', '971013-10-8908', '3000', '2024-01-01', '2025-01-01', 'Retirement Savings Plan'),
('I14', '960514-13-2348', '1800', '2024-02-01', '2025-02-01', 'Cancer Insurance'),
```

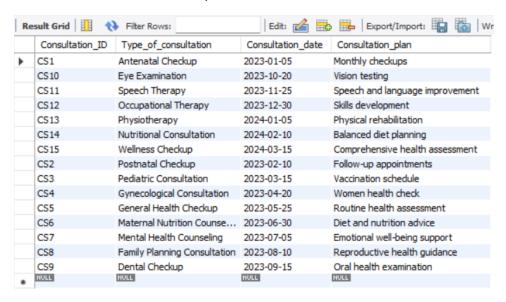
('I15', '911115-14-6786', '2500', '2024-03-01', '2025-03-01', 'Personal Accident Coverage');

Show tables;

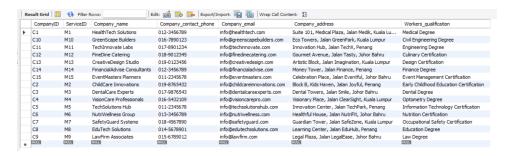


PRINT VALUES:

SELECT * FROM CONSULTATION;



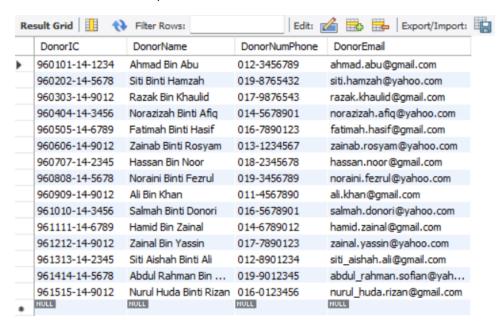
SELECT * FROM COMPANY;



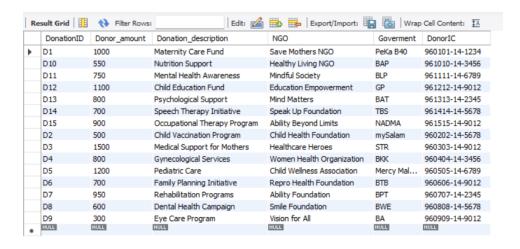
SELECT * FROM MANAGEMENT SERVICE;



SELECT * FROM DONOR;



SELECT * FROM DONATION;



SELECT * FROM HEALTHCARE_SERVICE;



SELECT * FROM CHILD;



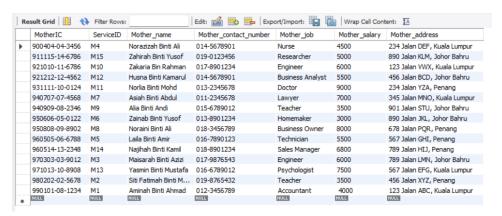
SELECT * FROM COMPANY;

	CompanyID	ServiceID	Company_name	Company_contact_phone	Company_email	Company_address	Workers_qualification
•	C1	M1	HealthTech Solutions	012-3456789	info@healthtech.com	Suite 101, Medical Plaza, Jalan Medik, Kuala Lu	Medical Degree
	C10	M10	GreenScape Builders	016-7890123	info@greenscapebuilders.com	Eco Towers, Jalan GreenPark, Kuala Lumpur	Civil Engineering Degree
	C11	M11	TechInnovate Labs	017-8901234	info@techinnovate.com	Innovation Hub, Jalan TechX, Penang	Engineering Degree
	C12	M12	FineDine Catering	018-9012345	info@finedinecatering.com	Gourmet Avenue, Jalan Tasty, Johor Bahru	Culinary Certification
	C13	M13	CreativeDesign Studio	019-0123456	info@creativedesign.com	Artistic Block, Jalan Imagination, Kuala Lumpur	Design Certification
	C14	M14	FinancialAdvise Consultants	012-3456789	info@financialadvise.com	Money Tower, Jalan Finance, Penang	Finance Degree
	C15	M15	EventMasters Planners	011-2345678	info@eventmasters.com	Celebration Place, Jalan Eventful, Johor Bahru	Event Management Certification
	C2	M2	ChildCare Innovations	019-8765432	info@childcareinnovations.com	Block B, Kids Haven, Jalan Joyful, Penang	Early Childhood Education Certification
	C3	M3	DentalCare Experts	017-9876543	info@dentalcareexperts.com	Dental Towers, Jalan Smile, Johor Bahru	Dental Degree
	C4	M4	VisionCare Professionals	016-5432109	info@visioncarepro.com	Visionary Place, Jalan ClearSight, Kuala Lumpur	Optometry Degree
	C5	M5	TechSolutions Hub	011-2345678	info@techsolutionshub.com	Innovation Center, Jalan TechPark, Penang	Information Technology Certification
	C6	M6	NutriWellness Group	013-3456789	info@nutriwellness.com	Healthful House, Jalan NutriFit, Johor Bahru	Nutrition Certification
	C7	M7	SafetyGuard Systems	018-4567890	info@safetyguard.com	Guardian Tower, Jalan SafeZone, Kuala Lumpur	Occupational Safety Certification
	C8	M8	EduTech Solutions	014-5678901	info@edutechsolutions.com	Learning Center, Jalan EduHub, Penang	Education Degree
	C9	M9 NULL	LawFirm Associates	015-6789012 NULL	info@lawfirm.com	Legal Plaza, Jalan LegalEase, Johor Bahru	Law Degree

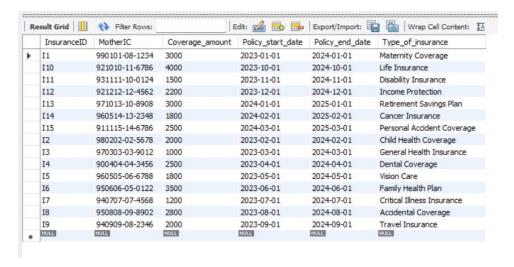
SELECT * FROM CHILDCARE_SERVICE;



SELECT * FROM MOTHER;



SELECT * FROM INSURANCE;



SELECT * FROM MOTHER_PATIENT;

SELECT * FROM CHILD_PATIENT;

SELECT * FROM MOTHER_COVERAGE;

ALTER:

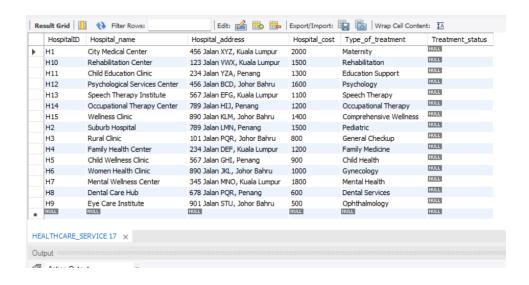
ALTER TABLE CHILD

Drop column Child gender;



ALTER TABLE HEALTHCARE_SERVICE

ADD COLUMN Treatment status VARCHAR(20);



DROP:

ALTER TABLE Donor

DROP COLUMN DonorEmail;



DELETE:

DELETE FROM HEALTHCARE_SERVICE WHERE HospitalID = 'H2';



UPDATE:

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H1';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Cancelled'

WHERE HospitalID = 'H2';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Scheduled'

WHERE HospitalID = 'H3';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H4';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H5';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Scheduled'

WHERE HospitalID = 'H6';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Cancelled'

WHERE HospitalID = 'H7';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H8';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H9';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Cancelled'

WHERE HospitalID = 'H10';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

WHERE HospitalID = 'H11';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Cancelled'

WHERE HospitalID = 'H12';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Completed'

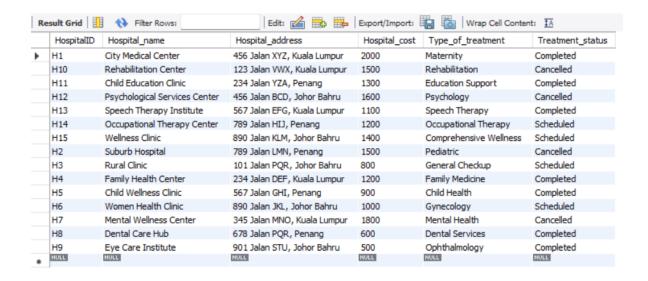
WHERE HospitalID = 'H13';

UPDATE HEALTHCARE_SERVICE

SET Treatment_status = 'Scheduled'

WHERE HospitalID = 'H14';

UPDATE HEALTHCARE_SERVICE
SET Treatment_status = 'Scheduled'
WHERE HospitalID = 'H15';

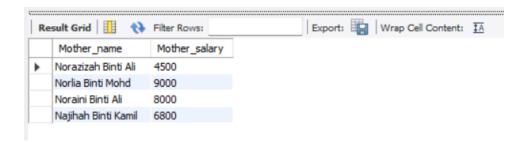


WHERE:

SELECT M.Mother name, M.Mother salary

FROM MOTHER M

WHERE Mother name like 'N%' and Mother salary between '3000' and '9500';



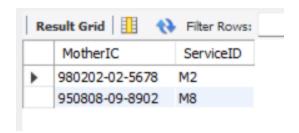
WHERE, AND:

SELECT distinct M.MotherIC, S.ServiceID

FROM MOTHER M, MANAGEMENT_SERVICE S

WHERE M.ServiceID = S.ServiceID

AND Service_cost between '500' and '1200';



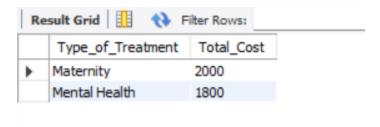
WHERE, GROUP BY, SUM:

SELECT Type_of_Treatment, SUM(Hospital_cost) AS Total_Cost

FROM HEALTHCARE_SERVICE

WHERE Type_of_Treatment LIKE 'M%'

GROUP BY Type_of_Treatment;



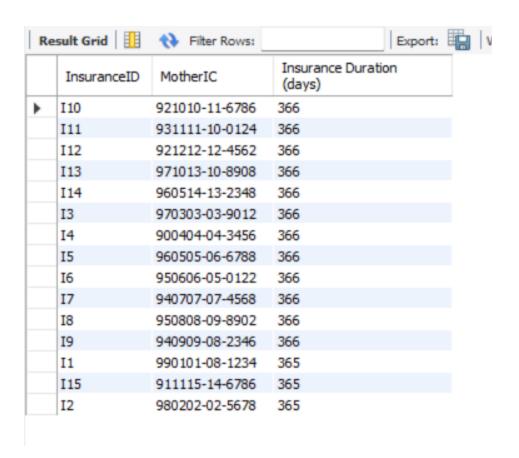
WHERE, ORDER BY:

SELECT I.InsuranceID, M.MotherIC, datediff(I.Policy_end_date, I.Policy_start_date) as 'Insurance Duration (days)'

FROM INSURANCE I, MOTHER M

WHERE M.MotherIC = I.MotherIC

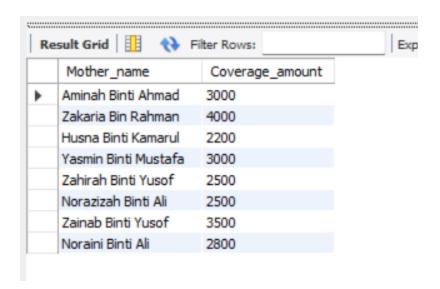
ORDER BY datediff(I.Policy_start_date, I.Policy_end_date) asc;



JOIN 2 TABLES, WHERE:

SELECT M.Mother_name, I.Coverage_amount
FROM MOTHER M

JOIN INSURANCE I ON M.MotherIC = I.MotherIC
WHERE I.Coverage_amount > 2000;



JOIN 4 TABLES, WHERE AND GROUP BY:

SELECT S.ServiceID, S.Type_of_services, M.Mother_name, C.Child_name
FROM MANAGEMENT_SERVICE S, MOTHER M, CHILD C, CHILDCARE_SERVICE CS
WHERE S.ServiceID=M.ServiceID

AND M.MotherIC=C.MotherIC

AND C.ChildIC=CS.ChildIC

Group by S.ServiceID, S.Type_of_services, M.Mother_name, C.Child_name;

	ServiceID	Type_of_services	Mother_name	Child_name
١	M1	Medical Checkup	Aminah Binti Ahmad	Ali Bin Amin
	M10	Eye Examination	Zakaria Bin Rahman	Salmah Binti Hamid
	M11	Maternal Nutrition Counseling	Norlia Binti Mohd	Hamid Bin Ismail
	M12	Physiotherapy	Husna Binti Kamarul	Zainal Bin Ahmad
	M13	Psychological Counseling	Yasmin Binti Mustafa	Siti Aishah Binti Abdul
	M14	Speech Therapy	Najihah Binti Kamil	Abdul Rahman Bin Ismail
	M15	Occupational Therapy	Zahirah Binti Yusof	Nurul Huda Binti Zainal
	M2	Maternity Care	Siti Fatimah Binti Mohd	Fatimah Binti Dollah
	M3	Child Vaccination	Maisarah Binti Azizi	Ahmad Bin Razak
	M4	Antenatal Checkup	Norazizah Binti Ali	Nurul Aisha Binti Ali
	M5	Postnatal Checkup	Laila Binti Amir	Mohd Ali Bin Ahmad
	M6	General Checkup	Zainab Binti Yusof	Norazizah Binti Hassan
	M7	Gynecological Services	Asiah Binti Abdul	Hassan Bin Abdullah
	M8	Pediatric Care	Noraini Binti Ali	Noraini Binti Ali
	M9	Dental Checkup	Alia Binti Andi	Ali Bin Hussein

7.0 NORMALIZATION

Primary Key:

MotherIC, InsuranceID, ChildIC, ChildcareID, HospitalID, CompanyID, ServiceID, DonationID, DonorIC, ConsultationID

Partial Dependency

<u>(MotherIC</u>, Mother_name, Mother_ contact_ number, Mother_job, Mother_salary, Mother address)

(<u>InsuranceID</u>, Coverage_amount, Policy_start_date, Policy_end_date, Type_of_insurance)

Mother_Coverage (InsuranceID, MotherIC)

(ChildIC, Child_name, Child_gender, Child_adsress, Child_status)

(HospitalID, Hospital name, Hospital address, Hospital cost, Type of treatment)

Mother patient (MotherIc, HospitalID)

(<u>ServiceID</u>, Type_of_services, Service_Start_date, Service_End_date, Service_cost)

(**DonationID**, Donor_amount, Donation_description, NGO, Government)

(<u>CompanyID</u>, Company_name, Company_contact_phone, Company_email, Company_address, Workers_qualification)

Transitive Dependency

Childcare_Service (**ChildcareID**, Guardian_name,Staff_information,Childcare_address)

Consultation (ConsultationID, Type of consultation, Consultation date, Consultation plan)

Donor (DonorlC, DonorName, DonorNumPhone, DonorEmail)

1NF

Mother (MotherIC, Mother_name, Mother_contact_number, Mother_job, Mother_salary, Mother_address, InsuranceID, Coverage_amount, Policy_start_date, Police_end_date, Type_of_insurance, ChildLot, Child_name, Child_gender, Child_address, Child_status, ChildcareID, Guardian_name, Staff_information, Childcare_address, Hospital_name, Hospital_address, Hospital_cost, Type_of_treatment, ServiceID, Type_of_service, Service_start_date, Service_end_date, Service_cost, CompanyID, Company_name, Company_contact_phone, Company_email, Company_address, workers_qualification, DonationID, Donor_amount, Donation_description, NGO, Government, DonorIC, DonorName, DonorNumPhone, DonorEmail, ConsultationID, Type_of_consultation, Consultation_date, Consultation_plan)

2NF

Mother (Mother_name, Mother_contact_number, Mother_job, Mother_salary, Mother_address)

Insurance(InsuranceID ,Coverage_amount, Policy_start_date, Policy_end_date,
Type of insurance)

Mother_Coverage (InsuranceID,MotherIC)

Child(ChildIC,Child_name, Child_gender, Child_adsress, Child_status, ChildcareID, Guardian name, Staff information,Childcare address,)

Helthcare_Service(<u>HospitalID</u>, Hospital_name, Hospital_address, Hospital_cost, Type of treatment)

Mother patient (MotherIC, HospitalID)

Management_Service (<u>ServiceID</u>, Type_of_services, Service_Start_date, Service_End_date, Service_cost,,ConsultationID, Type_of_consultation, Consultation_date,Consultation_plan)

 $\label{lem:company} \textbf{Company} \underline{\textbf{Company}} \underline{\textbf{Company}} \underline{\textbf{company}} \underline{\textbf{contact_phone}}, \underline{\textbf{Company}} \underline{\textbf{company}} \underline{\textbf{address}}, \underline{\textbf{Workers_qualification}}$

Donation (<u>DonationID</u>, Donor_amount, Donation_description, NGO, Government, DonorIC, DonorName, DonorNumPhone, DonorEmail)

3NF

Mother (MotherIC, Mother_name, Mother_contact_number, Mother_job, Mother_salary, Mother_address)

Mother_Coverage (InsuranceID,MotherIC)

Insurance(InsuranceID, MotherIC, Coverage_amount, Policy_start_date, Policy_end_date,
Type_of_insurance)

Mother_Patient (MotherIc, HospitalID)

Child (_ChildIC, Child_name,Child_gender,Child_address,Child_status)

Childcare_Service (ChildcareID, Guardian_name,Staff_information,Childcare_address)

Child_Patient_(ChildIC,HospitalID)

Healthcare_Service (<u>HospitalID</u>, Hospital_name, Hospital_address, Hospital cost, Type of treatment)

Management_Service (ServiceID, Type_of_services, Service_Start_date, Service_End_date, Service_cost)

Company(CompanyID, Company_name, Company_contact_phone, Company_email, Company_a ddress, Workers_qualification)

Donation (DonationID,Donor amount,Donation description,NGO,Government)

Donor (DonorlC, DonorName, DonorNumPhone, DonorEmail)

Consultation (ConsultationID, Type_of_consultation,Consultation_date,Consultation_plan)

8.0 DATA DICTIONARY (DD)

MOTHER ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	MotherIC	Mother IC	Varchar	20	PK, Not Null
2.	Mother_name	Mother Name	Varchar	50	
3.	Mother_contact_number	Mother Contact	Varchar	50	
		Number			
4.	Mother_job	Mother Job	Varchar	20	
5.	Mother_salary	Mother Salary	Varchar	10	
6.	Mother_address	Mother Address	Varchar	30	
7.	ServiceID	Service ID	Varchar	20	FK1

MANAGEMENT SERVICE ENTITIY

No	Data/Variable	Description	Type	Length	PK/FK
1.	ServiceID	Service ID	Varchar	20	PK, Not Null
2.	Type_of_service	Type Of Service	Varchar	30	
3.	Service_Start_date	Service Start Date	Date		
4.	Service_End_Date	Service End Date	Date		
5.	Service_cost	Sevice Cost	Varchar	50	
6.	DonationID	Donation ID	Varchar	10	FK1

CONSULTATION ENTITY

No	Data/Variable	Description	Type	Length	PK/FK
1.	Consultation_ID	Consultation ID	Varchar	10	PK, Not Null
2.	Type_of_consultation	Type Of	Varchar	30	
		Consultation			
3.	Consultation_date	Consultation Date	Date		
4.	Consultation_plan	Consultation Plan	Varchar	30	

No	Data/Variable	Description	Туре	Length	PK/FK
1.	DonationID	Donation ID	Varchar	10	PK, Not Null
2.	Donor_amount	Donor Amount	Varchar	10	
3.	Donation_description	Donation	Varchar	50	
		Description			
4.	NGO	NGO	Varchar	15	
5.	Goverment	Goverment	Varchar	10	
6.	DonorIC	Donor IC	Varchar	20	FK1

HEALTHCARE SERVICE ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	HospitalID	Hospital ID	Varchar	10	PK, Not Null
2.	Hospital_name	Hospital Name	Varchar	30	
3.	Hospital_address	Hospita Address	Varchar	40	
4.	Hospital_cost	Hospital Cost	Varchar	10	
5.	Type_of_treatment	Type Of	Varchar	20	
		Treatment			

INSURANCE ENTITY

No	Data/Variable	Description	Type	Length	PK/FK
1.	InsuranceID	Insurance ID	Varchar	10	PK, Not Null
2.	Coverage_amount	Coverage Amount	Varchar	30	
3.	Policy_start_date	Policy start date	Date		
4.	Policy_end_date	Policy end date	Date		
5.	Type_of_insurance	Type Of Insurance	Varchar	20	
6.	MotherIC	Mother IC	Varchar	20	FK1

CHILD ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	ChildIC	Child IC	Varchar	20	PK, Not Null
2.	Child_name	Child Name	Varchar	30	
3.	Child_gender	Child Gender	Varchar	10	
4.	Child_address	Child Address	Varchar	30	
5.	HospitalID	Hospital ID	Varchar	10	FK1

CHILDCARE SERVICE ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	ChildcareID	Childcare ID	Varchar	10	PK, Not Null
2.	Guardian_name	Guardian Name	Varchar	30	
3.	Staff_information	Staff Information	Varchar	50	
4.	Childcare_address	Childcare Address	Varchar	50	
5.	ChildIC	Child IC	Varchar	20	FK

DONOR ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	DonorIC	Donor IC	Varchar	20	PK, Not Null
2.	DonorName	Donor Name	Varchar	30	
3.	DonorNumPhone	Donor Number Phone	Varchar	15	
4.	DonorEmail	Donor Email	Varchar	50	

COMPANY ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	CompanyID	Company ID	Varchar	10	PK, Not Null
2.	Company_name	Company Name	Varchar	30	
3.	Company_contact_phone	Company Contact Phone	Varchar	15	
4.	Company_email	Company Email	Varchar	50	
5.	Company_address	Company Address	Varchar	50	
6.	Workers_qualification	Workers Qualification	Varchar	50	
7.	ServiceID	Service ID	Varchar	20	FK

MOTHER COVERAGE ENTITY

No	Data/Variable	Description	Type	Length	PK/FK
1.	InsuranceID	Insurance ID	Varchar	10	PK, FK1
2.	MotherIC	Mother IC	Varchar	15	PK, FK2

MOTHER PATIENT ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	MotherIC	Mother IC	Varchar	15	PK, FK1
2.	HospitalID	Hospital ID	Varchar	10	PK, FK2

CHILD PATIENT ENTITY

No	Data/Variable	Description	Туре	Length	PK/FK
1.	ChildIC	Child IC	Varchar	20	PK, FK1
2.	HospitalID	Hospital ID	Varchar	10	PK, FK2

9.0 REFERENCES

1. Reference: Single Mother Portal

Kamarudin, A. (2023, May 12). *Single Mother: Motivation - PORTAL MyHEALTH*. PORTAL MyHEALTH. http://www.myhealth.gov.my/en/single-mother-motivation1/

2. Reference: ERD and SQL

Raghu. (n.d.). *Database management system solution*. Princeton University. Retrieved December 28, 2023, from https://www.cs.princeton.edu/courses/archive/spr00/cs425/soln from text midterm.pdf

- 3. ResearchGate. (2021, December). Indonesian antenatal nutrition education: A qualitative study of healthcare professional views Scientific Figure. Retrieved January 1, 2024, from https://www.researchgate.net/publication/356963384 Indonesian antenatal nutrition education A qualitative study of healthcare professional views
- 4. Patient Care System ER Diagram | FreeProjectz. (2017, July 17). https://www.freeprojectz.com/entity-relationship/patient-care-system-er-diagram
- 5. S. (2021, September 18). ONLINE STUDENT COUNSELING SYSTEM. Instant Edu Help. Retrieved December 31, 2022, from

https://instanteduhelp.com/online-student-counseling-system/

6. Tool used: Diagrams.net

https://app.diagrams.net/

7. Tools used:

MYSQL 8.0 COMMAND LINE CLIENT

10.0 PLANNING

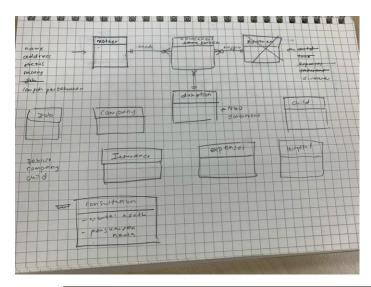
TASK:	MEMBERS:
Project Background:	Aqilah & Anis
Objectives:	Ainul
Scopes:	Balqis
Comparison between two databases:	Aqilah, Amirah & Ainul
Case Study:	Aqilah & Anis
Business Rule:	Anis, Amirah & Balqis
ERD:	Anis, Amirah & Balqis
EERD:	Anis, Amirah & Balqis
Data Definition Language (DDL):	Ainul & Aqilah
Data Manipulation Language (DML):	Ainul & Aqilah
Normalization	Anis & Ainul
Data dictionary:	Balqis
References:	Anis
Planning:	Amirah
Appendix:	Ainul & Aqilah

11.0 APPENDIX

Group	Group Meeting Report [1]					
Date: 13/10/2023 Time: 11 am -12		Venue: BLOK Z SCL Leader: Anis	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
No	Task I	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		
1	Choose title		Discuss which title we should choose.	Anis		
2	List attribute		Discuss what attributes should have to make a table.	Ainul		

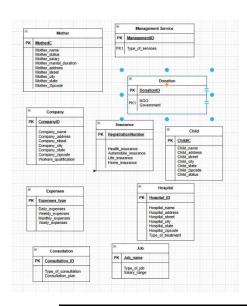
Group	Meetin	g Report [2]			
Date:		Venue:	Attendees:		
19/10/2023 Blok Z		Blok Z	1. AQILAH MAISARAH		
			2. ANIS AQILAH		
			3. PUTRI BALQIS BATRISYIA		
			4. AMIRAH AISYAH		
			5. NUR AINUL NASUHA		
Time:		SCL Leader:			
8 am –10 a	m	Amirah			
No	Task l	List	Progress Task/	Person in	
			Table Involves/ Remarks	Charge (PIC)	
1	Sketch ERD		Try sketching the ERD for our project	Amirah	

Proof:



Group	Group Meeting Report [3]					
Date: 25/10/2023 Venue: STUDENT LOUNGE KK3		STUDENT LOUNGE	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
9 pm -11 pm		SCL Leader: Ainul				
No	Task l	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		
1	Sketch ERD in draw.io		Try sketching the ERD for our project	Ainul		

Proof:



Group	Group Meeting Report [4]					
Date: 26/10/2023 Venue: BLOK M Time: SCL Leader:		BLOK M	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
8 am - 12 pm		Balqis				
No	Task 1	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		
1	Sketch ERD in draw.io		Continue sketching the ERD for our project	Balqis		

2	Overview (Business rule)	List all the business rule based on ERD	Balqis & Anis
3	Foreign Key	Identify foreign key	Amirah, Aqilah & Ainul
4	Review ERD	Ask dr. about the ERD	Amirah, Aqilah & Ainul

Group	Group Meeting Report [5]					
Date: 1/11/2023		Venue: STUDENT LOUNGE KK3	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
8 pm -12 am		SCL Leader: Aqilah				
No	Task]	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		
1	Projec	t background	Write the project background in the docs	Anis & Aqilah		

2	Objective	List all the objectives in the docs	Ainul
3	Scopes	Write the project's scope in the docs	Ainul
4	Case study	Write case study in the docs	Aqilah

Group	Group Meeting Report [6]					
Date: 3/11/2023		Venue: Blok M	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
Time: 8 am -12 p	m	SCL Leader: Aqilah				
No	Task 1	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		

1	Compare 2 databases	Compare 2 databases in a table	Ainul,
			Balqis,
			Aqilah,
			Amirah &
			Anis
2	Find solution for 2.0	Everyone in the group gives one	Ainul,
		example for manual process,	Balqis,
		database system 1 and 2. So that	Aqilah,
		we can compare and choose the	Amirah &
		best example to put in our project.	Anis

Group	Group Meeting Report [7]					
Date: 21/12/2023 Venue: GOOGLE MEET		GOOGLE	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA			
Time: 9 pm – 10.	30 pm	SCL Leader: Aqilah				
No	Task 1	List	Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)		

1	Find solution for 3.0 -	Distribute the works among our	Amirah
	- 6.0	group	

Group Meeting	Group Meeting Report [8]				
Date: 22/12/2023 - 24/12/2023	Venue:	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH			
Time:	SCL Leader: Anis	5. NUR AINUL NASUHA			

No	Task List	Progress Task/	Person in
		Table Involves/	Charge (PIC)
		Remarks	g- (/
1	No. 3.0 & 4.0	Finalized the answer for question 3 and 4	Amirah, Anis & Balqis

Group Meeting Report [9]				
Date:	Venue:	Attendees:		
24/12/2023 - 27/12/2023	-	1. AQILAH MAISARAH		
		2. ANIS AQILAH		
		3. PUTRI BALQIS BATRISYIA		
		4. AMIRAH AISYAH		
		5. NUR AINUL NASUHA		

Time:		SCL Leader:		
-		Aqilah		
No	Task l	List	Progress Task/	Person in
			Table Involves/ Remarks	Charge (PIC)
1	No. 5.0	0 and 6.0	Finalized the answer for question 5 and 6	Aqilah & Ainul
2	No. 8	.0	Finalized the answer for question 8	Balqis
3	No. 9.	.0	Finalized the answer for question 9	Anis
4	No. 1	0	Finalized the answer for question 10	Amirah
5	No. 1	1	Finalized the answer for question 11	Ainul & Aqilah

Group Meeting Report [10]					
Date: 27/12/2023	Venue: Facetime Call	Attendees: 1. AQILAH MAISARAH 2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH			
		7. AVIIKAII AISTAII			

			5. NUR AINUL NASUHA	
Time:	6 20	SCL Leader:		
5.45 pm – 0 pm	3.30	Aqilah		
No	Task l	List	Progress Task/	Person in
			Table Involves/	Charge (PIC)
			Remarks	0 \
1	ERD		Review back the ERD	Amirah, Anis
				& Balqis
2	Codin	ıg	Review back the coding	Aqilah & Ainul
				Alliui

Group Meeting Report [11]

Date: 5/1	1/2024	Venue:	Attendees: 1. AQILAH MAISARAH	
			2. ANIS AQILAH 3. PUTRI BALQIS BATRISYIA 4. AMIRAH AISYAH 5. NUR AINUL NASUHA	
Time: 9:30 am – 10:00 am		SCL Leader: Anis & Ainul	3. NUK AHVUL IVASUHA	
No	Task List		Progress Task/ Table Involves/ Remarks	Person in Charge (PIC)
1	Normalization		Review and finalize the normalization	Aqilah, Anis, Balqis, Ainul, Amirah

Proof:

