Assignment - 1(ERD Design and Implementation)

Q1: A teacher can teach many courses and a course can be taught by many teachers. A course has course_id, title and credit_hour and a teacher has T_id, name, Date of Birth (DOB), street, city, designation, Total salary. You have to record the semester and year of teaching of these courses, remuneration of the course, section, number of students, course fee per student.

Draw the ERD and transform the ERD into relational schema. Write SQL to create the tables according to the relation schema

Q2: A mother can have many children and a child must have only one mother. A mother has birth registration (M_BRN) number and a child have also birth registration number (C_BRN). A mother is described by name, number of sons, number of daughters, total child, date of birth, profession and income. A child is described by name, date of birth, birth-time height and birth-time weight, gender.

Draw the ERD and transform the ERD into relational schema. Write SQL to create the tables according to the relation schema

Q3: An apartment must be owned by exactly one person and a person can own maximum one apartment. There are many persons having no apartment. A person has NID, name, gender, profession, birth registration number, date of birth, street, city and income. An apartment has app_id, size, building_name, total number of floors, location and price.

Draw the ERD and transform the ERD into relational schema. Write SQL to create the tables according to the relation schema

Submit the design and the relation schema in one PDF file. All SQL in one file.