

PART - 1

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CREATE TABLE EMPLOYEE( Fname          VARCHAR(20)          NOT NULL,
                        Minit          CHAR,
                        Lname          VARCHAR(20)          NOT NULL,
                        Ssn            CHAR(9)              NOT NULL,
                        Bdate          DATE,
                        Address         VARCHAR(100),
                        Sex             CHAR,
                        Salary          DECIMAL(20,5),
                        Super_ssn       CHAR(9),
                        Dno              INT                NOT NULL,
                        CONSTRAINT EMPLOYEEPK
                        PRIMARY KEY(Ssn));

CREATE TABLE DEPARTMENT(Dname          VARCHAR(30)          NOT NULL,
                        Dnumber         INT                NOT NULL,
                        Mgr_ssn         CHAR(9)            NOT NULL,
                        Mgr_start_date  DATE,
                        CONSTRAINT DEPARTMENTPK
                        PRIMARY KEY(Dnumber),
                        CONSTRAINT DEPARTMENTSU
                        UNIQUE(Dname),
                        CONSTRAINT DEPARTMENTFK
                        FOREIGN KEY(Mgr_ssn) REFERENCES EMPLOYEE(Ssn) ON DELETE
                        CASCADE);

CREATE TABLE DEPT_LOCATIONS(Dnumber     INT                NOT NULL,
                        Dlocation        VARCHAR(15)         NOT NULL,
                        CONSTRAINT DEPT_LOCATIONSPK
                        PRIMARY KEY(Dnumber, Dlocation),
                        CONSTRAINT DEPT_LOCATIONSFK
                        FOREIGN KEY(Dnumber) REFERENCES DEPARTMENT(Dnumber) ON
                        DELETE CASCADE);

CREATE TABLE PROJECT(Pname          VARCHAR(20)          NOT NULL,
                        Pnumber         INT                NOT NULL,
                        Plocation        VARCHAR(50),
                        Dnum             INT                NOT NULL,
                        CONSTRAINT PROJECTPK
                        PRIMARY KEY(Pnumber),
                        CONSTRAINT PROJECTSU
                        UNIQUE(Pname),
                        CONSTRAINT PROJECTFK
                        FOREIGN KEY(Dnum) REFERENCES DEPARTMENT(Dnumber) ON DELETE
                        CASCADE);
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CREATE TABLE WORKS_ON(Essn          CHAR(9)          NOT NULL,
                       Pno            INT              NOT NULL,
                       Hours          DECIMAL(3,1)      NOT NULL,
                       CONSTRAINT WORKS_ONPK
                       PRIMARY KEY(Essn, Pno),
                       CONSTRAINT WORKS_ONFK
                       FOREIGN KEY(Essn) REFERENCES EMPLOYEE(Ssn) ON DELETE CASCADE,
                       CONSTRAINT WORKS_ONFK1
                       FOREIGN KEY(Pno) REFERENCES PROJECT(Pnumber) ON DELETE CASCADE);

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CREATE TABLE DEPENDENT( Essn          CHAR(9)          NOT NULL,
                          Dependent_name VARCHAr(30)     NOT NULL,
                          Sex            CHAR,
                          Bdate          DATE,
                          Relationship    VARCHAR(10),
                          CONSTRAINT DEPENDENTPK
                          PRIMARY KEY(Essn, Dependent_name),
                          CONSTRAINT DEPENDENTFK
                          FOREIGN KEY (Essn) REFERENCES EMPLOYEE(Ssn) ON DELETE CASCADE);

```