

Sub Query Exercises

```
CREATE TABLE StudentInfo (  
    SID INTEGER(7) PRIMARY KEY,  
    S_Name VARCHAR(30),  
    GPA FLOAT(3,2),  
    Major VARCHAR(30)  
);
```

```
CREATE TABLE Faculty (  
    FID INTEGER(7) PRIMARY KEY,  
    F_Name VARCHAR(30) NOT NULL,  
    F_Phone VARCHAR(15),  
    Salary FLOAT(7,2),  
    JoinDate DATETIME,  
    Dept VARCHAR(10)  
);
```

```
CREATE TABLE CourseInfo (  
    CID INTEGER(7) PRIMARY KEY,  
    C_Name VARCHAR(30) NOT NULL,  
    FID INTEGER(7),  
    CONSTRAINT CI_FID_FK  
        FOREIGN KEY (FID)  
        REFERENCES Faculty (FID)  
        ON DELETE CASCADE  
);
```

```
CREATE TABLE CourseGrade (  
    SID INTEGER(7) NOT NULL,  
    CID INTEGER(7) NOT NULL,  
    Grade VARCHAR(1) NOT NULL,  
    PRIMARY KEY (SID, CID),  
    CONSTRAINT CG_SID_FK  
        FOREIGN KEY (SID)  
        REFERENCES StudentInfo (SID)  
        ON DELETE CASCADE,  
    CONSTRAINT CG_CID_FK  
        FOREIGN KEY (CID)  
        REFERENCES CourseInfo (CID)  
        ON DELETE CASCADE  
);
```

1. Show the Course ID and grade of the courses that Jones has taken. **(1 result)**
2. For each of the students with an IS major, show the Course ID and the grades of all the courses they have taken. **(8 results)**
3. Show the phone number and name of the faculty who is teaching ISM 301. **(1 result)**
4. For each of the students whose name starts with an 'A', show the course name of all the courses that he/she has taken. **(2 results)**
5. Show the name of the faculty who earns the highest salary. **(1 result)**
6. Show the name(s) of the faculty who earns more than the average salary. **(2 results)**
7. Show the name(s) of the students who have gotten an A in ISM 218. **(3 results)**
8. Show the grade in the ISM 218 course for student ID 2. **(1 result)**
9. Show the name of the course where student ID 1 received an A. **(1 result)**