###### Cairo University

Faculty of Computers and Information

IS221 - Database Systems

SQL Practical Exam -2015

**Question 1: 2.5 Grades**

Given the following table Department (DeptCode, Name) and Student (SSN, Name, Major,GPA) having the following data:

|  |  |
| --- | --- |
| DeptCode | Name |
| IS | Information Systems |
| CS | Computer Science |
| IT | Information Technology |
| DS | Decision Support |

\*DeptCode data type is nchar(2)

|  |  |  |  |
| --- | --- | --- | --- |
| SSN | Name | Major | GPA |
| 101 | Ahmed | IS | 2 |
| 102 | Ali | IT | 3.4 |
| 103 | Ahmed | IS | 1.7 |
| 104 | Ismail | DS | 3.2 |

Assuming that any new student should have a major as one of the values in the DeptCode column in the department table and GAP between ZERO and FOUR, **write a DDL statement that creates the table “Student” with all required constraints.**

CREATETABLE Student

(

 (0.5) on create statement

 SSN nchar(14),

 Name nchar(100),

 Major nchar(2),

 GPA float,

 (0.5) for attributes creation

 primarykey(SSN),

 foreignkey (Major)reference Department(DeptCode),

 check (GPA between 0 and 4)

 (1.5) 0.5 for each constraint

)

**Question 2: 2.5 Grades**

Write an SQL query over Northwind Database to findorders id’s and the associated customers’company names who received the orders but shipped after the required date.

Select CompanyName,OrderID

(0.5) for the select with the right attributes

From Orders innerjoin Customers

on Customers.CustomerID=Orders.CustomerID

(1.5) for the inner join with the right condition

where Orders.ShippedDate > Orders.RequiredDate

(0.5) for the filtering condition