

**Lab-01 – Weekend Paper**  
**EEI4366 / EEX4366 – Data Modelling and Database Systems**  
**Bachelor of Software Engineering Honours / Bachelor of Technology**  
**Department of Electrical and Computer Engineering**  
**The Open University of Sri Lanka**  
**Academic Year – 2022/2023**

**Duration: 2 hours**

Use “MySQL Workbench” to perform the following operations.  
The database ‘**ApplePC\_Store**’ consists of the following tables with the given fields.

- **employee**(empNo, lname, fname, email)
- **product**(pCode, pName, pDescription, quantityInStock, buyingPrice)
- **customer**(cusNo, cName, contactNo, city, address, pCode)
- **orderProduct** (orderId, orderDate, orderStatus, cusNo, empNo)

**Abbreviations used in the tables**

- |                           |                                      |
|---------------------------|--------------------------------------|
| ○ empNo – Employee Number | ○ pName – Product name               |
| ○ lname – Last Name       | ○ pDescription – Product Description |
| ○ fname – First name      | ○ cusNo – Customer Number            |
| ○ pCode – Product Code    | ○ cName – Customer Name              |

**Instructions:**

1. The first record of data inserted to both customer and employee should be details pertaining to you. (eg. **employee: empNo - Snumber, email - ousl email and customer: cusNo – Registration No, cName - your name with initials**)
2. Add your snumber and registration number as comments at the beginning of creation of the tables, beginning of insert queries and at the beginning of select queries.  

```
# This comment continues to the end of line - single line comment
-- This comment continues to the end of line - single line comment
/*
this is a
multiple-line comment
*/
```
3. For all select queries the result set should also be taken and included as screenshots. You need to add screenshots of all the queries to a word file and upload it along with your sql script file.
4. You need to prepare the word file with screenshots and convert it to pdf to be uploaded to the dropbox. You need to prepare this file during the test as additional time for preparation will not be given. Extra 5 minutes will be provided after the lab test only to upload your answers.
5. **Any cases where plagiarism / copying is identified you will be getting Zero marks.** Therefore, DO NOT share your code with anyone. Both the copies of a copied assignment will be given zero marks.

### **Write SQL statements to do the following operations.**

1. Create the given tables with appropriate data types and constraints.
2. Insert some dummy data into the tables to run queries on the tables. (At least 3 records should be inserted for each table)
3. Write SQL statement to add the field “postalCode” to the table Customer.
4. Write SQL statement to remove field “city” from the table Customer.
5. Write SQL statement to truncate the table “orderProduct”.
6. Write SQL statement to modify the orderStatus of all orders on a given date to ‘Complete’ (give a date you inserted).
7. Write SQL statement to remove all products which have quantityInStock less than 2.
8. Write SQL statements to view the following.
  - i. All details of employees in the shop.
  - ii. All product names with their descriptions along with the names of customers who bought that product (if there are any).
  - iii. The last name and the email of all employee(s) who have sold at least 2 products.
  - iv. The name and the buying price of the product having the highest quantity in stock. (quantity heading of the result set should be displayed as “Available Quantity”)
  - v. Name and contact number of all customers who have order status as “Pending”.
  - vi. Details of last 3 orders according to the order date.
  - vii. Total buying price of all products bought by a certain customer (display with the customer name).

***\*For clarity of the code, inserting values relevant to the student and giving comments as instructed will be given 10 marks.***