***PRINCIPLE OF DATABASE MANAGEMENT***

***Project Proposal***

***Topic******:*** P – Online Retail Application

***Group members :*** ***IDs:***

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**Summary of the project :** Our project – project P is about creating and managing a database for an online retailer .The project main goal is to allow the owners to manage the store, customers information and also allow customers to register an account for purchasing items and pay the bills with their bank account by using the application. How the application works is that it will store a database of information on the customers ( their bank account, registration account, passwords,..etc ) and the items in the store (the stock, price, discount,..etc) and will have functions, features that will allow for registration to purchasing items via the customers bank accounts, managing the list of customers and items , as well as printing the bills when items are purchased and store the data on the transaction (date, amount of money,…etc). The idea for now is to create a table that stores the customers bank account , bank name , id and password as well as a function to add another customer to the list whenever they register with a bank account (or multiple bank accounts) ,after that there will be another table to store the item’s information, a function that allow the customer to purchase items and print the bill as well as automatically update the table when a transaction occurs and also a table that stores the information on the transaction just in case of any demands.

**Reasons :** The reason why we choose this topic because online retailing is very popular right now and becoming more and more preferable than the tradition shopping method, so it is very relatable and practical in our lives. We want to use our skill that we learned in this course to help us deal with everyday problems such as things like this and understand more about the how a database operates in the real world as well as our courses.

**Work division and progress :**

*Step 1:* (from now to 20/3/2019) Chose the topic , introduction , cover page and title page . As we already chosen our topic, in this time we will write our introduction as well as designing the cover page and title page for our report until we learned ERD for the next step. The workflow will be divided evenly between members for designing , creating introduction and comprising.

*Step 2:* (form 20/3/2019 to 26/3/2019) ERD. As this point according to the schedule we have learned about the ERD so we will try to create our own suitable for our project. Each member will come up with ideas on different ways to create and then we will combine our ERDs into the final product. The workflow is that everyone has to do it.

*Step 3:* (from 26/3/2019 to 1/4/2019) Relation database schema. We have learned so much more about ERD so on this point forward we can create the relation database schema. This step will contain many schemas and relations so we will divide them evenly and each person will work on their specific task. After our work is done we will combine them and fix any issues. 1/4 is the date of midterm report so we will try our best and submit it.

*Step 4:* (from 17/4 to 27/4/2019) Database. If we don’t have enough time to finish step 3 before midterm we will have to finish it around this time as well as step 4. Similar to step 3 , step 4 will contain many workflow related closely to the relation database schema on step 3 so whoever work on what part in step 3 will be responsible for creating the table for that part.

*Step 5:* (from 27/4/2019 to 7/5/2019) Program (querying). We will divide our parts base on how many functions in the program and work accordingly to the specific needs of the program. Everyone will have to participate in creating the final product program that provides the capability to run queries on the database management system.

*Conclusion and Report* (from 7/5/2019 to 10/5/2019) Because the due date of the report is 10/5 so we will have a few days to compose our work and write our conclusion on what we learned in the process, as well as make the report for submission before the deadline. Files organization and submission will be handled by 1 person in the group but will be permitted by all the members.

*Presentation* (from 10/5/2019 to 22/5/2019) After submitting, we will have some times to work on the presentation. Workflow for this is very basic: powerpoint and present. Everything will be divided among members.