

PHASE 3 (DATA BASE)



UTM
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Faculty of
Computer Science
and Information
Systems

UNIVERSITI TEKNOLOGI MALAYSIA, JOHOR BAHRU

FACULTY OF COMPUTING

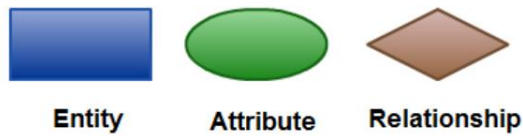
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NAME OF GROUP MEMBER :

1. Ahmad Zulfikar (A19EC3003)
2. Muhammad faris ibrahim (A19EC3012)
3. Savero fajri sutiono (A19EC3016)
4. Ahmad kemal aushaf (A19EC3002)
5. Alya nasuha (B19EC3001)



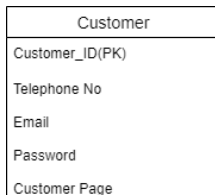
-Identifies all the basic concepts in ERD (entity, attribute, relationship)



Entity

An entity is an object or component of data. An entity is represented as rectangle in an ER diagram.

Example :

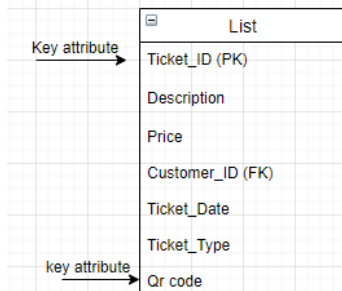


Attribute

An attribute describes the property of an entity. An attribute is represented as Oval in an ER diagram. There are four types of attributes such as :

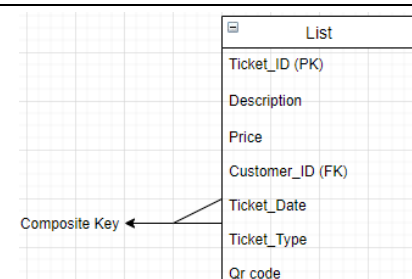
A key attribute can uniquely identify an entity from an entity set

Example :



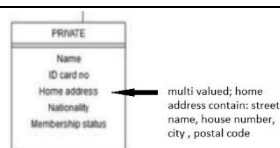
Composite attribute an attribute that is a combination of other attributes is known as composite attribute

Example :



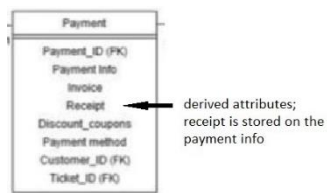
Multivalued attribute an attribute that can hold multiple values is known as multivalued attribute.

Example :



A derived attribute is one whose value is dynamic and derived from another attribute.

Example :

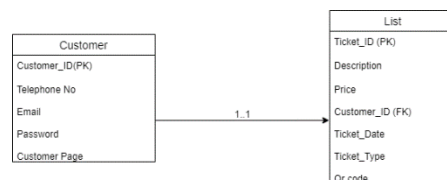


Relationship

A relationship is represented by diamond shape in ER diagram, it shows the relationship among entities. There are four types of relationships:

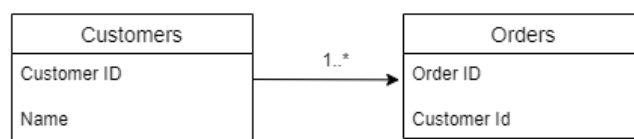
One to One Relationship, when a single instance of an entity is associated with a single instance of another entity then it is called one to one relationship

Example :



One to Many Relationship when a single instance of an entity is associated with more than one instances of another entity then it is called one to many relationship.

Example :



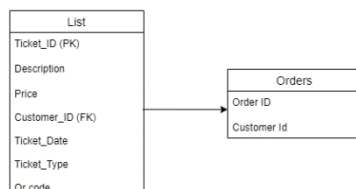
Many to One Relationship when more than one instances of an entity is associated with a single instance of another entity then it is called many to one relationship

Example :



Many to Many Relationship when more than one instances of an entity is associated with more than one instances of another entity then it is called many to many relationship

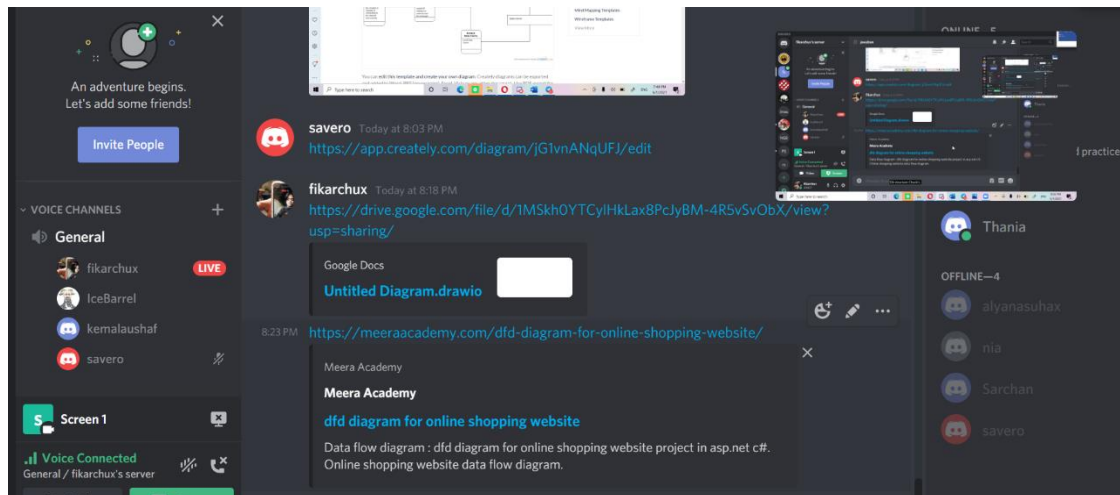
Example :



-Produces the necessary primary keys (PK) and/or foreign keys (FK)

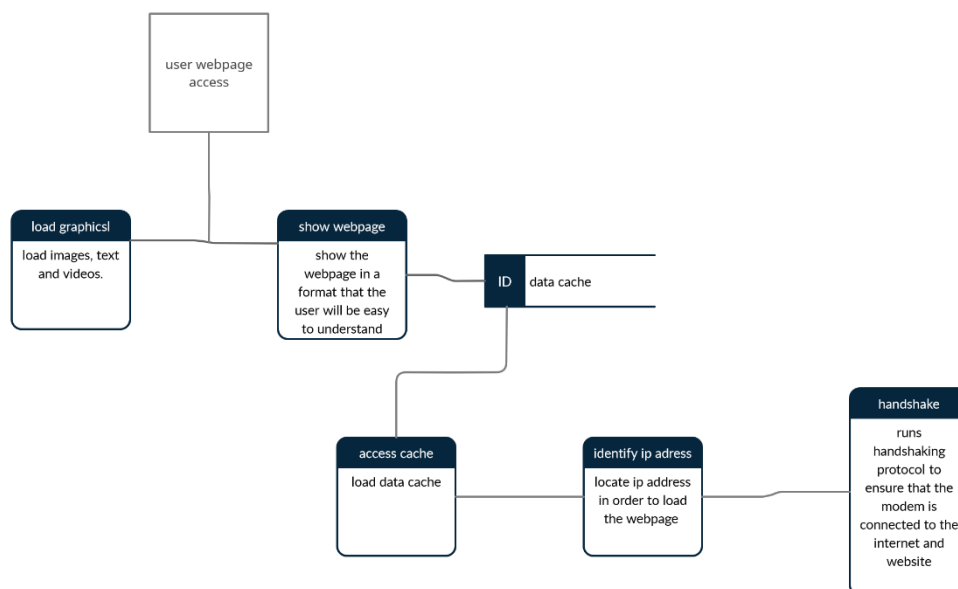
Primary key	Foreign key
Customer_ID	Customer_ID
Ticket_ID	Ticket_ID
Payment_ID	

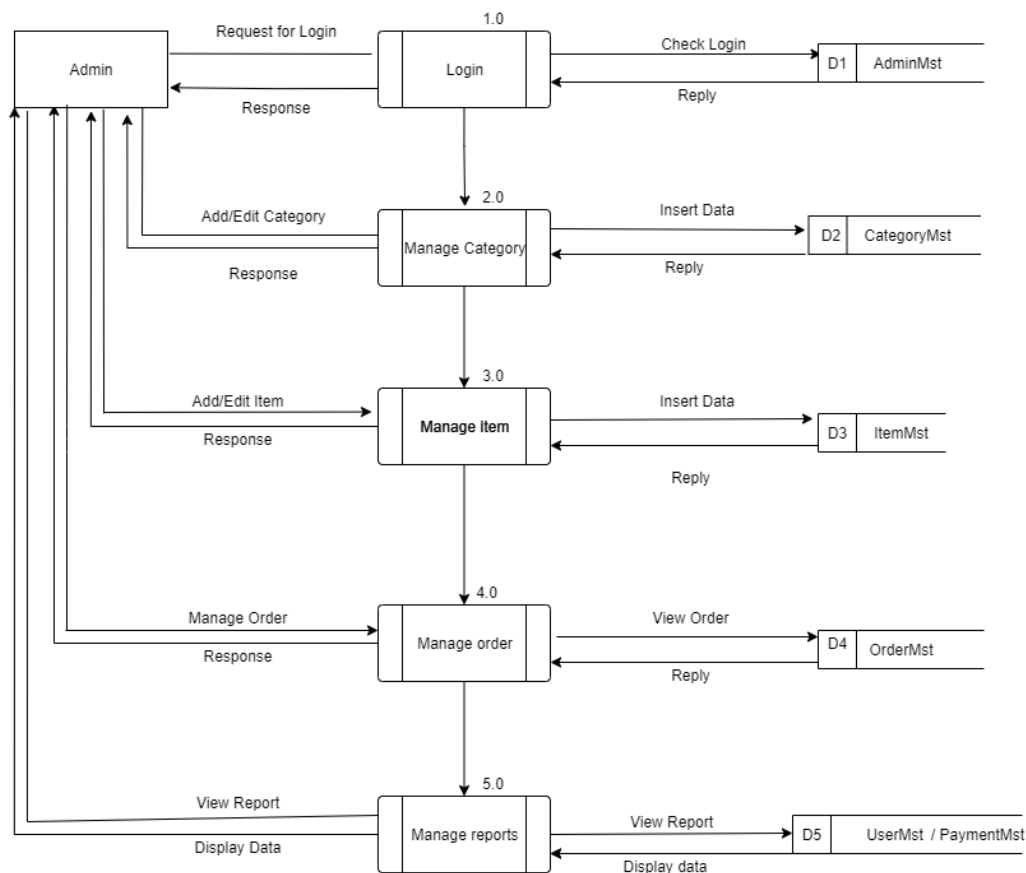
-Document the whole process of designing the ERD



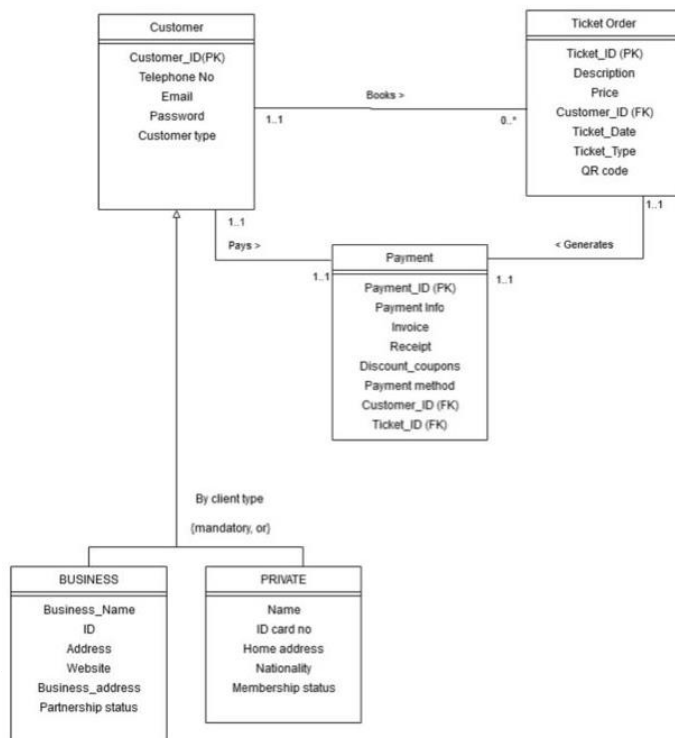
So we did the phase 3 via discord application

-Logical DFD





-Relates the entities and determines the multiplicity of each relationships using UML notation



- System's functional requirement (data and transaction requirements) as in P2

“Transaction requirements”

Data entry :

Enter the details of admin data

Enter the details of user data

Enter the details data of e-ticket

Enter the details of payment

Data update/

Update/delete the details of a user.

Update/delete the details of an admin.

Update/delete the details of E-ticket.

Update/delete the details of client.

Data queries :

Data of queries required by the website admin views

Data of queries required by the website user views

(a) List the details of clients in a given city.

(b) Identify the total number of clients in each city.

(c) List the name of users that created based on the creation time.

(d) Identify the total number of user and the sum of e-ticket order.

(e) Identify the total number of admin in each fixed position at wax museum.

(f) List the clients name, address, email, phone number.

(g) List the details of at least 1 e-tickets that bought by user.

(h) Identify the e-ticket type that already sold by admin.

(i) List the available e-ticket by the admin