DATABASE DESCRIPTION

The Database for Sigma will have 7 tables.

The 7 tables are: -

1) Customer Table
2) Membership Table
3) Address Table
4) Bill Table
5) Inventory Table
6) Membership_details Table
7) Discount Table

The purpose of each table is described below.

1) **Customer Table:**
   This table is used to store information regarding the customers, such as customer id, customer's mobile number and email, customer's name and customer's date of birth.
   - customer_id is the primary key of Customer table; it is of SERIAL datatype and each value will be UNIQUE.
   - mobile and email values of each customers will be UNIQUE and NOT NULL and it will be of VARCHAR datatype
   - date_of_birth will be of DATE datatype and NOT NULL.
   - first_name and last_name will be of VARCHAR datatype and will be NOT NULL
   - address_id is of INTEGER datatype and it is a foreign key and of NOT NULL value.

2) **Membership Table:**
   This table will store the membership details of the customers. Not all customers have a membership, but all members are customers.
   - membership_id is the primary key of Membership Table; it is of SERIAL datatype and each value will be UNIQUE.
   - customer_id, membership_tag are of INTEGER datatype and they are foreign keys. They are of NOT NULL values.
   - membership_start_date and membership_end_date are of DATE datatype and they are of NOT NULL values.

3) **Address Table:**
   This table will store the address information about the customers.
   - address_id is the primary key of Address Table; it is of SERIAL datatype and each value will be UNIQUE.
   - cutomer_id is of INTEGER datatype and it is a foreign key and of NOT NULL value.
   - city, district, country will be of VARCHAR datatype and NOT NULL values.
   - zip_code will be a INTEGER datatype and a NOT NULL value.

4) **Bill Table:**

This table stores the bill information of the purchases made by the customer.

- bill_no. is the primary key of Bill Table. It is of SERIAL datatype and UNIQUE.
- bill_amount is of INTEGER datatype and of NOT NULL value.
- bill_date is of DATE datatype and of NOT NULL value.
- customer_id, product_id are of INTEGER datatype and they are foreign keys. They are of NOT NULL values.
- product_name is of VARCHAR datatype and of NOT NULL values.

5) **Inventory Table:**

This table stores the information about the products.

- product_id is the primary key of Inventory table. It is of INTEGER datatype and of UNIQUE values.
- product_name, type and brand are of VARCHAR datatype and of NOT NULL values.
- price is of INTEGER datatype and of NOT NULL value.

6) **Membership_details Table**

- membership_tag is the primary key of Membership_details Table, it is of INTEGER datatype and of UNIQUE values.
- membership_type is of VARCHAR datatype and of UNIQUE and NOT NULL values.

7) **Discount Table**

- discount_id is the primary key of the Discount Table, it of INTEGER datatype and of UNIQUE values.
- discount_start_date and discount_end_date are of DATE datatype and they are of NOT NULL values.
- membership_tag is of INTEGER datatype and it is a foreign key and of NOT NULL value.
- discount_info, status are of VARCHAR datatype and of NOT NULL Values.