SQL PROJECT

Inventory Management System

NAME:- Komal Kachare

COURSE:- MASTER IN DATA SCIENCE AND ANALYTICS WITH AI

ABOUT DATASET:

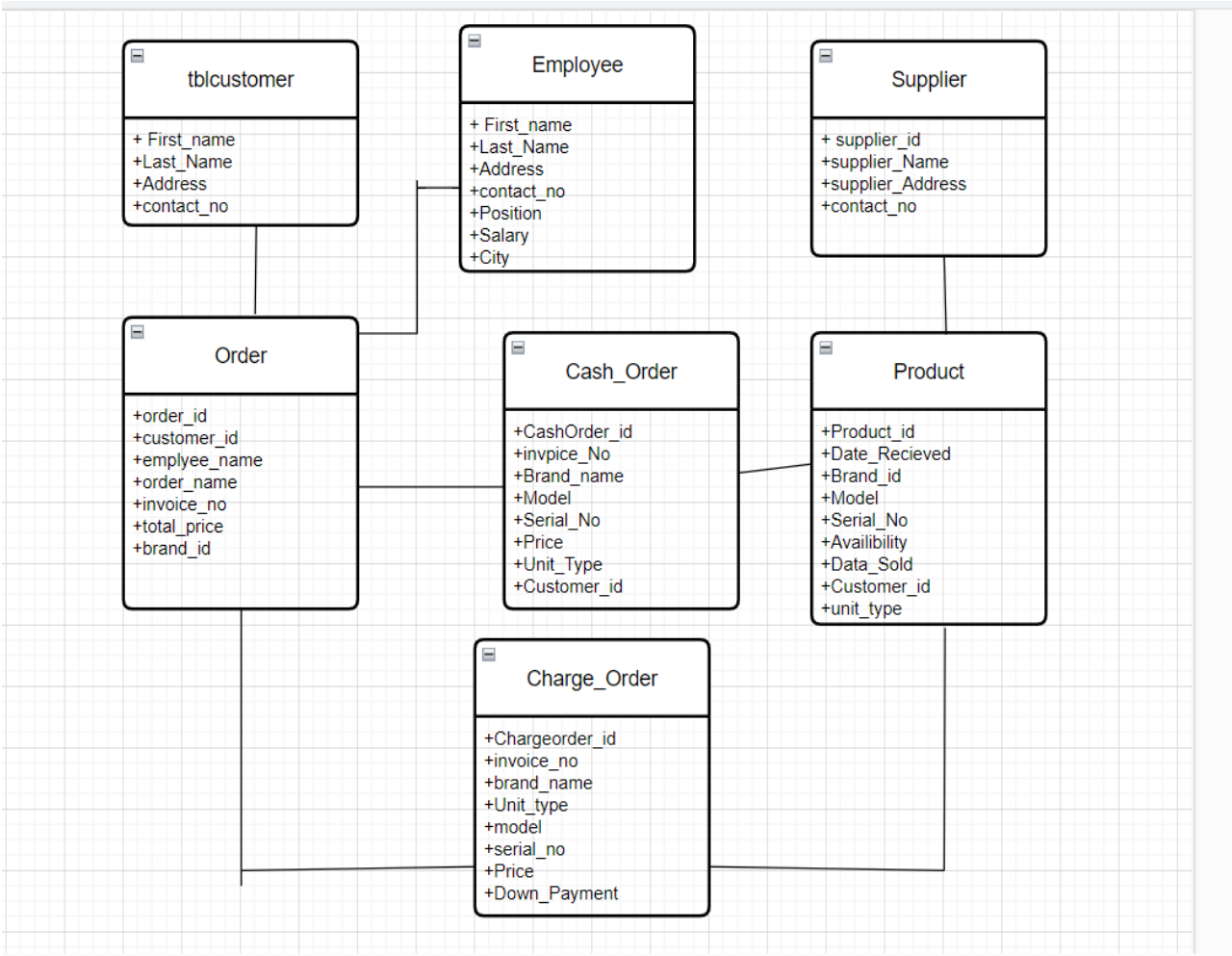
An inventory management system is the combination of technology (hardware and software) and processes and procedures that oversee the monitoring and maintenance of stocked products, whether those products are company assets, raw materials and supplies, or finished products ready to be sent to vendors or end consumers. Inventory Management System plays an important role because it reduces the stress , monitoring of products, making balance sheets and many more which was done manually.

AVAILABLE TABLES:

- Tblcustomer
- Employee
- Order
- Cash_order
- Charge_order
- Supplier
- Product

DATASET FROM: GitHub

E-R DIAGRAM:-


tblcustomer
+ First_name
+Last_Name
+Address
+contact_no
Employee
+ First_name
+Last_Name
+Address
+contact_no
+Position
+Salary
+City
Supplier
+ supplier_id
+supplier_Name
+supplier_Address
+contact_no
Order
+order_id
+customer_id
+emplyee_name
+order_name
+invoice_no
+total_price
+brand_id
Cash_Order
+CashOrder_id
+invpice_No
+Brand_name
+Model
+Serial_No
+Price
+Unit_Type
+Customer_id
Product
+Product_id
+Date_Recieved
+Brand_id
+Model
+Serial_No
+Availibility
+Data_Sold
+Customer_id
+unit_type
Charge_Order
+Chargeorder_id
+invoice_no
+brand_name
+Unit_type
+model
+serial_no
+Price
+Down_Payment

1) Describe the structure of customer table

```
1 •  use inventory;
2    -- 1 describe the structure of table
3 •  desc tblcustomer;
4
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Field	Type	Null	Key	Default	Extra
customer_id	int	NO	PRI	NULL	
First_name	varchar(45)	NO		NULL	
Last_name	varchar(45)	NO		NULL	
Address	varchar(65)	NO		NULL	
Contact_No	int	NO		NULL	

2) Show the records of the customer table

```
5    -- 2 show the records of the customer table
6 •  select * from tblcustomer;
7
```

Result Grid | Filter Rows: | Edit:

customer_id	First_name	Last_name	Address	Contact_No
1	Komal	Kachare	102 uran	123455
2	Sejal	Daingade	032 kamothe	983455
3	John	Smith	100 banglore	763455
4	vishwt	rongre	945 panvel	7423455
5	vishkha	Patil	04 pen	223455
6	Nikita	varat	002 veshi	923455
7	alia	shrma	456 vashi	623455
8	kiara	roha	132 uran	323455
9	Rushi	Kachare	002 panvel	873455
10	kajal	deshmukha	202 sanpada	393455
NULL	NULL	NULL	NULL	NULL

3) Add one salary column to the employee table

```
7     -- 3 add one salary column to the employee table
8 •   alter table employee add column salary decimal(10,3);
9 •   desc employee;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Field	Type	Null	Key	Default	Extra
Employee_id	int	NO	PRI	NULL	
First_Name	varchar(45)	NO		NULL	
Last_name	varchar(45)	NO		NULL	
Addresss	varchar(45)	NO		NULL	
Contact_No	int	NO		NULL	
position	varchar(200)	YES		NULL	
salary	decimal(10,3)	YES		NULL	

4) Change the datatype of salary column

```
11 •   alter table employee modify column salary int;
12 •   desc employee;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

Field	Type	Null	Key	Default	Extra
Employee_id	int	NO	PRI	NULL	
First_Name	varchar(45)	NO		NULL	
Last_name	varchar(45)	NO		NULL	
Addresss	varchar(45)	NO		NULL	
Contact_No	int	NO		NULL	
position	varchar(200)	YES		NULL	
salary	int	YES		NULL	

5) To fetch unique model with the customer_id from product table

```
15 •  select distinct model,customer_id from product;
```

Result Grid | Filter Rows: | Export: | Wrap

model	customer_id
Atari	1
Baby Ruth	2
Barcardi	3
Bad Boy	4
Barbie	5
Coach	6
Fila	7

6) Write a query to fetch brand_name and model whose price greater than 200

```
17 •  select brand_name,model,price from cash_order where price>200;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

brand_name	model	price
Bacardi	Alcohol	500
Bad Boy	Media Entertaiment	600
Barbie	Toy/Game,	900
Coach	Fashion/Clothing	800
Cartier	Food/Beverges	1000
Fila	Sports related goods	300
Four season	Hotel services	2000

7) To fetch all records whose brand_name baby ruth and model food beverages

```
19 •  select * from cash_order where
20    brand_name="Baby Ruth" and model="Food Beverages";
```

Result Grid | Filter Rows: | Edit: | Export/Import:

CashOrder_id	invoice_no	brand_name	Model	serial_no	Price	unit_type
2	87321567	Baby Ruth	Food Beverages	102	200	Ewallet
NULL	NULL	NULL	NULL	NULL	NULL	NULL

8) Write a query to fetch brand name and model whose range in between 300 to 600

```
22 •   select brand_name,model from cash_order where
23      price between 300 and 600;
```

Result Grid | Filter Rows: | Export: | Wrap

brand_name	model
Bacardi	Alcohol
Bad Boy	Media Entertaiment
Fila	Sports related goods

9) To fetch employee records whose name start with k

```
25 •   select * from employee where first_name like 'k%';
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wra

Employee_id	First_Name	Last_name	Addresss	Contact_No	position
6	kojii	raha	04 yedw	913495	verifying quantities
7	kojii	raha	06 new mumbai	987695	Update inventory databases
8	kuji	jain	09 og	9023495	Generate inventory reports
NULL	NULL	NULL	NULL	NULL	NULL

10) To fetch the customer_id whose not using cash method

```
27 •   select customer_id from product where not unit_type ='cash';
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

customer_id
2
4
6

Result Grid

11) To fetch all employee details whose city new mumbai or salary greter than 55000

```
29 •  select * from employee where city="new mumbai" or salary>55000;
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

Employee_id	First_Name	Last_name	Addresss	Contact_No	position	salary	city
6	kojii	raha	04 yedw	913495	verifying quantities	75000	yedw
7	kojii	raha	06 new mumbai	987695	Update inventory databases	95000	new mumbai
8	kuji	jain	09 og	9023495	Generate inventory reports	15000	new mumbai
4	riti	shrma	94 ulwe	23495	conducting regular stock counts to ensure accur...	95000	ulwe
3	shala	kachare	34 cst	319495	tracking stock movements	65000	cst
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

12) Display brand_name and model whose price between 500 and 900

```
34 •  select brand_name,model,price from cash_order where price not between 500  and 900;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

brand_name	model	price
Atari	Toy/Game,	100
Baby Ruth	Food Beverages	200
Cartier	Food/Beverges	1000
Fila	Sports related goods	300
Four season	Hotel services	2000
Dom Perignon	Alcohol	200

13) Retrieve model name whose price 900,1000,2000

```
37 •  select model,price from cash_order where price in(900,1000,2000);
38
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

model	price
Toy/Game,	900
Food/Beverges	1000
Hotel services	2000

14) To fetch top most product sold

```
42 •    select * from product limit 5;
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

Product_id	Date_Recieved	Brand_id	Model	serial_no	Availiblity	data_sold	customer_id	unit_type
1	2023-08-20	101	Atari	101	100	2023-08-01	1	Cash
2	2022-01-20	101	Baby Ruth	102	101	2023-08-01	2	online pay
3	2023-01-23	102	Barcardi	103	102	2023-01-01	3	Cash
4	2022-10-20	103	Bad Boy	104	103	2023-09-08	4	ewallet
5	2024-01-17	104	Barbie	105	104	2024-08-01	5	Cash
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

15) To fetch all product details in descending order

```
42      select * from product order by model desc limit 5;
43
```

Result Grid | Filter Rows: | Edit: | Export/Import: | Wrap Cell Content:

Product_id	Date_Recieved	Brand_id	Model	serial_no	Availiblity	data_sold	customer_id	unit_type
7	2022-08-20	106	Fila	107	106	2023-08-01	7	Cash
6	2023-08-20	105	Coach	106	105	2023-08-01	6	online pay
3	2023-01-23	102	Barcardi	103	102	2023-01-01	3	Cash
5	2024-01-17	104	Barbie	105	104	2024-08-01	5	Cash
4	2022-10-20	103	Bad Boy	104	103	2023-09-08	4	ewallet
NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL	NULL

16) Write a query to join fristname and lastname of the customer

```
44    select concat(first_name," ",last_name)from tblcustomer;
45
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

concat(first_name," ",last_name)
Komal Kachare
Sejal Daingade
John Smith
vishwt rongre
vishkha Patil
Nikita varat
alia shrma
kiara roha
Rushi Kachare
kajal deshmukha

17) To fetch all the brand name in upper case

```
37 •    select upper(brand_name) from cash_order;
```

Result Grid | Filter Rows: | Export: | W

upper(brand_name)
ATARI
BABY RUTH
BACARDI
BAD BOY
BARBIE
COACH
CARTIER
FILA
FOUR SEASON
DOM PERIGNON

18) To fetch all model name in lower case

```
39 •    select lower(model) from cash_order;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

lower(model)
toy/game,
food beverages
alcohol
media entertaiment
toy/game,
fashion/clothing
food/beverges
sports related goods
hotel services
alcohol

19) Write a query to replace food beverges model to food items

```
41 •  select replace("food beverges","beverges","item") from cash_order;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

replace("food beverges","beverges","item")
food item
food item
food item
food item
food item
food item
food item
food item
food item
food item

20) Display price after rounding off to zero decimal places.

```
42 •  select price,ceil(price) from charge_order;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

price	ceil(price)
300.200000	301
200.000000	200
1000.200000	1001
350.200000	351
100.000000	100
600.200000	601
700.200000	701
900.200000	901
700.200000	701

21 Display monthname , dayname, productid when product_recieved

```
45 •  select product_id,date_recieved,monthname(date_recieved),dayname(date_recieved) from product;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

product_id	date_recieved	monthname(date_recieved)	dayname(date_recieved)
1	2023-08-20	August	Sunday
2	2022-01-20	January	Thursday
3	2023-01-23	January	Monday
4	2022-10-20	October	Thursday
5	2024-01-17	January	Wednesday
6	2023-08-20	August	Sunday
7	2022-08-20	August	Saturday

22) write a query to fetch available product is Whose availability greater than 105

```
47 •  select model,max(availiblity) from product
48     group by model
49     having max(availiblity)>105;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

model	max(availiblity)
Fila	106

23) write a query to fetch maximum available Product

```
47 •  select max(availiblity) from product;
48
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

max(availiblity)
106

24) Write a query to fetch minimum available Product

```
49 •  select min(availiblity) from product;
50
```

Result Grid | Filter Rows: | Export: | Wrap Cell

min(availiblity)
100

25) To fetch how many brands Available in stores

```
50 •  select count(brand_name) as brand_name from cash_order;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

brand_name
10

26) To fetch average price of brand

```
51 •  select brand_name,avg(price) from cash_order group by brand_name;
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

brand_name	avg(price)
Atari	100.0000
Baby Ruth	200.0000
Bacardi	500.0000
Bad Boy	600.0000
Barbie	900.0000
Coach	800.0000
Cartier	1000.0000
Fila	300.0000
Four season	2000.0000
Dom Perignon	200.0000

27) To fetch the second highest salary of the employee

```
47 •  select max(salary) from employee where salary<(select max(salary)from employee);
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

max(salary)
75000

28) Display customerid with their name whose pursches branded product

```
53 •  select tblcustomer.customer_id,product.model,tblcustomer.first_name from tblcustomer
54    join product
55    on tblcustomer.customer_id=product.customer_id;
56
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

customer_id	model	first_name
1	Atari	Komal
2	Baby Ruth	Sejal
3	Barcardi	John
4	Bad Boy	vishwt
5	Barbie	vishkha
6	Coach	Nikita
7	Fila	alia

29) display customerid with their name whose pursches branded product and whose are nothing to pursches any product

```
53 •  select tblcustomer.customer_id,product.model,tblcustomer.first_name from tblcustomer
54    left join product
55    on tblcustomer.customer_id=product.customer_id;
56
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

customer_id	model	first_name
1	Atari	Komal
2	Baby Ruth	Sejal
3	Barcardi	John
4	Bad Boy	vishwt
5	Barbie	vishkha
6	Coach	Nikita
7	Fila	alia
8	NULL	kiara
9	NULL	Rushi
10	NULL	kajal

30) Create View

```
61 •  create view viewdetailed as select * from cash_order
62    where price>500;
63 •  select * from viewdetailed;
64
```

Result Grid | Filter Rows: | Export: | Wrap Cell Content:

CashOrder_id	invoice_no	brand_name	Model	serial_no	Price	unit_type	customer_id
4	90321567	Bad Boy	Media Entertaiment	104	600	Cash	0
5	60321567	Barbie	Toy/Game,	105	900	online pay	0
6	80321567	Coach	Fashion/Clothing	106	800	Ewallet	0
7	24321567	Cartier	Food/Beverges	107	1000	Cash	0
9	21321567	Four season	Hotel services	109	2000	Cash	0