

RESTAURANT

Data Analysis



Subtitle :

PERFORMANCE AND PROFITABILITY INSIGHTS

Tools used :

**EXCEL FOR CLEANING AND MYSQL
FOR DATABASE QUERYING AND
ANALYSIS.**

Objectives :

**ANALYZE MENU PERFORMANCE,
CATEGORY PROFITABILITY, MONTHLY
REVENUE TRENDS, AND IDENTIFY RUSH
HOURS.**

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Data Cleaning with Excel

INITIALLY, THERE WERE NULL VALUES IN THE ITEM_ID COLUMN BECAUSE THE DATA WAS STORED IN AN EXCEL FILE. BEFORE IMPORTING THE DATA INTO SQL AND CREATING THE DATABASE, I PROCESSED AND CLEANED IT IN EXCEL. THIS INVOLVED IDENTIFYING THE NULL VALUES AND ADDRESSING THEM APPROPRIATELY TO ENSURE THE DATASET'S ACCURACY AND CONSISTENCY. BY HANDLING THESE DATA ISSUES IN EXCEL BEFOREHAND, I ENSURED A SMOOTH TRANSITION TO THE SQL ENVIRONMENT AND PREVENTED POTENTIAL PROBLEMS DURING DATA ANALYSIS. THIS CAREFUL PREPARATION WAS CRUCIAL FOR MAINTAINING THE INTEGRITY OF THE DATA AND OBTAINING RELIABLE RESULTS FROM SUBSEQUENT ANALYSES.

A	B	C	D	E	F
order_details_id	order_id	order_date	order_time	item_id	
1	1	01-01-2023	11:38:36 AM	109	
2	2	01-01-2023	11:57:40 AM	108	
3	2	01-01-2023	11:57:40 AM	124	
4	2	01-01-2023	11:57:40 AM	117	
5	2	01-01-2023	11:57:40 AM	129	
6	2	01-01-2023	11:57:40 AM	106	
7	3	01-01-2023	12:12:28 PM	117	
8	3	01-01-2023	12:12:28 PM	119	
9	4	01-01-2023	12:16:31 PM	117	
10	5	01-01-2023	12:21:30 PM	117	
11	6	01-01-2023	12:29:36 PM	101	
12	6	01-01-2023	12:29:36 PM	114	

A	B	C	D	E	F
order_details_id	order_id	order_date	order_time	item_id	
1	1	01			
2	2	01			
3	2	01			
4	2	01			
5	2	01			
6	2	01			
7	3	01			
8	3	01			
9	4	01			
10	5	01			
11	6	01			
12	6	01			
13	7	01			
14	8	01			
15	9	01			
16	9	01			
17	9	01			
18	9	01			

Sort Smallest to Largest

Sort Largest to Smallest

Sort by Color

Sheet View

Clear Filter From "item_id"

Filter by Color

Number Filters

Search

126
127
128
129
130
131
132
NULL

Exploratory Data Analysis (EDA)

BASIC DATA EXPLOITATION WITH THE HELP OF AGGREGATED FUNCTIONS TO BETTER UNDERSTAND THE DATA FOR ANALYSIS.

Q:1 WHAT IS THE AVERAGE PRICE OF THE FOOD ITEMS AVAILABLE ON THE RESTAURANT'S MENU?

Query

```
Select avg(price) from managment_restaurnt.menu_items;
```

Answer Table

avg(price)
13.285937499999996

Q:2 HOW MANY TOTAL ORDERS HAVE BEEN PLACED AT THE RESTAURANT?

Query

```
Select count(order_id)  
from managment_restaurnt.order_details;
```

Answer Table

count(order_id)
12097