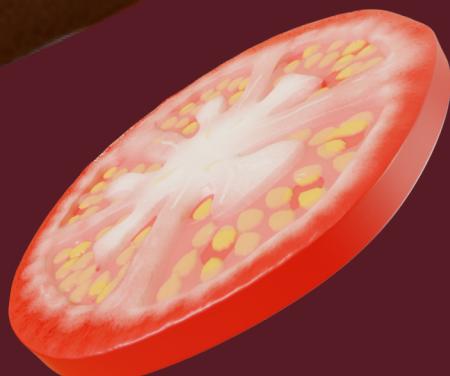


PIZZA SALES

MySQL

ANALYSIS



Unveiling Trends and Tastes in Pizza Consumption



INTRODUCTION

- In this presentation, we will delve into the captivating world of pizza orders using SQL analysis. Our goal is to uncover valuable insights about our business by querying data from pizza sales Database

Agenda

- **Order Details Analysis:** We'll examine order details to understand sales performance and identify any trends.
- **Customer Preference:** By analysing pizza types, we'll gain insights into customer preferences.
- **Order Pattern:** We'll explore order data to identify recurring patterns and optimize our processes.



KEY QUESTIONS

Sales Volume and Revenue

- Retrieve the total number of orders placed.
- Calculate the total revenue generated by pizza sales.

Product Analysis

- Identify the highest priced pizza.
- Identify the total orders based on pizza size.
- List the 5 most ordered pizza types along with their quantities.



Category and Time Analysis

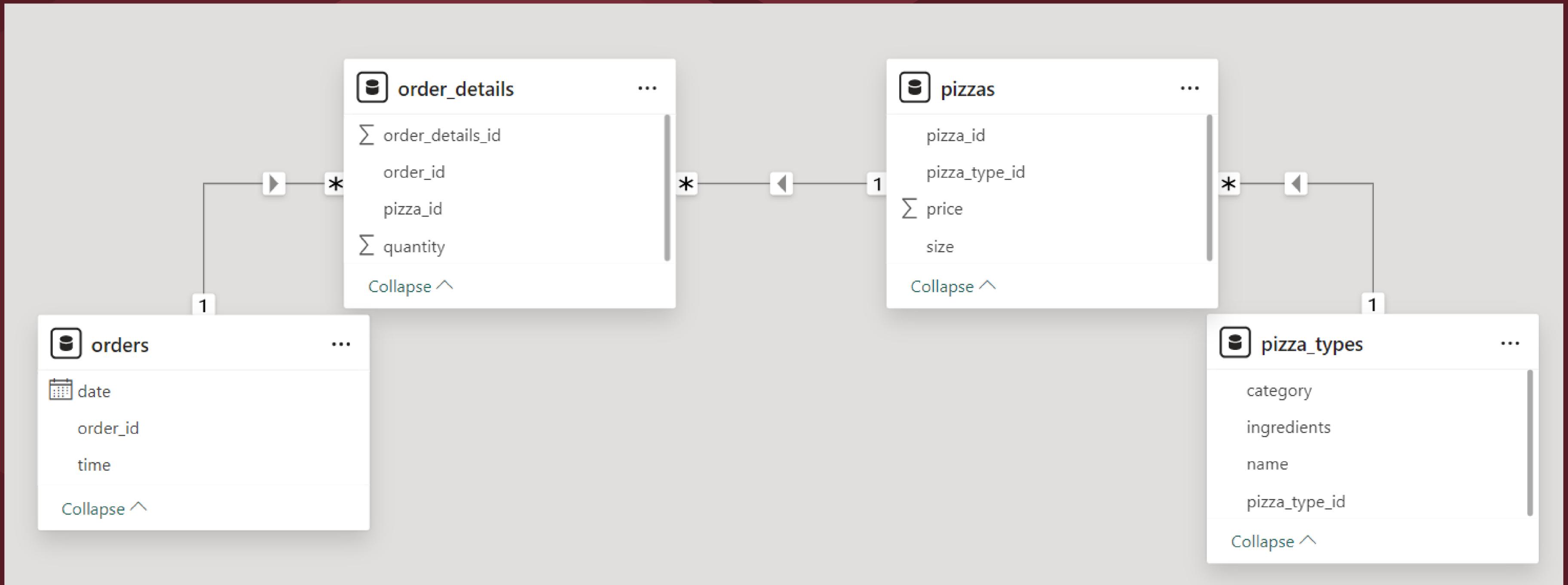
- Find the total category of each pizza category ordered.
- Determine the distribution of orders by hour of the day.
- Join the relevant tables and find the category wise distribution of pizzas.

Trend and Performance Analysis

- Calculate the average number of pizzas ordered per day.
- Determine the top 3 pizzas ordered based upon revenue.
- Calculate the percentage distribution of each pizza type of total revenue.
- Analyze the cumulative revenue generated over time.
- Determine the top 3 most ordered pizza types based on revenue for each pizza category.



SCHEMA





1) RETRIEVE THE TOTAL NUMBER OF ORDERS PLACED.

```
SELECT  
    COUNT(order_id) AS total_orders  
FROM  
    orders;
```

	total_orders
▶	21350



2) CALCULATE THE TOTAL REVENUE GENERATED FROM PIZZA SALES.

SELECT

```
    ROUND(SUM(orders_details.quantity * pizzas.price),  
          2) AS total_revenue
```

FROM

orders_details

JOIN

pizzas ON orders_details.pizza_id = pizzas.pizza_id

total_revenue

817860.05

3) IDENTIFY THE HIGHEST-PRICED PIZZA.

```
SELECT  
    MAX(price)  
FROM  
    pizzas
```

	MAX(price)
▶	35.95



4) IDENTIFY THE MOST COMMON PIZZA SIZE ORDERED.

```
SELECT  
    pizzas.size,  
    COUNT(orders_details.order_details_id) AS order_count  
FROM  
    pizzas  
        JOIN  
    orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizzas.size  
ORDER BY order_count DESC;
```

size	order_count
L	18526
M	15385
S	14137
XL	544
XXL	28



5) LIST THE TOP 5 MOST ORDERED PIZZA TYPES ALONG WITH THEIR QUANTITIES.

```
SELECT  
    pizza_types.name,  
    SUM(orders_details.quantity) AS total_quantity  
FROM  
    pizza_types  
        JOIN  
    pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id  
        JOIN  
    orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizza_types.name  
ORDER BY total_quantity DESC  
LIMIT 5;
```

name	total_quantity
The Classic Deluxe Pizza	2453
The Barbecue Chicken Pizza	2432
The Hawaiian Pizza	2422
The Pepperoni Pizza	2418
The Thai Chicken Pizza	2371



6) JOIN THE NECESSARY TABLES TO FIND THE TOTAL QUANTITY OF EACH PIZZA CATEGORY ORDERED.

SELECT

```
 pizza_types.category,  
 SUM(orders_details.quantity) AS total_quantity  
FROM  
 pizza_types  
     JOIN  
 pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id  
     JOIN  
 orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizza_types.category  
ORDER BY total_quantity DESC;
```

	category	total_quantity
▶	Classic	14888
	Supreme	11987
	Veggie	11649
	Chicken	11050



7) DETERMINE THE DISTRIBUTION OF ORDERS BY HOUR OF THE DAY.

SELECT

HOUR(order_time) AS hour, COUNT(order_id) AS orders_count

FROM

orders

GROUP BY HOUR(order_time)

ORDER BY HOUR(order_time);

hour	orders_count
9	1
10	8
11	1231
12	2520
13	2455
14	1472
15	1468
16	1920
17	2336
18	2399



8) JOIN RELEVANT TABLES TO FIND THE CATEGORY-WISE DISTRIBUTION OF PIZZAS.

SELECT

category, COUNT(name) as Distribution

FROM

pizza_types

GROUP BY category;

category	Distribution
Chicken	6
Classic	8
Supreme	9
Veggie	9



9) GROUP THE ORDERS BY DATE AND CALCULATE THE AVERAGE NUMBER OF PIZZAS ORDERED PER DAY..

```
SELECT  
    ROUND(AVG(quantity), 0) as avg_pizza_ordered_per_day  
FROM  
(SELECT  
    orders.order_date, SUM(orders_details.quantity) AS quantity  
FROM  
    orders  
JOIN orders_details ON orders.order_id = orders_details.order_id  
GROUP BY orders.order_date) AS order_quantity;
```

avg_pizza_ordered_per_day
138



10) DETERMINE THE TOP 3 MOST ORDERED PIZZA TYPES BASED ON REVENUE.

```
SELECT pizza_types.name, SUM(orders_details.quantity * pizzas.price) as revenue  
FROM pizza_types  
JOIN pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id  
JOIN orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizza_types.name  
ORDER BY revenue desc  
LIMIT 3;
```

name	revenue
The Thai Chicken Pizza	43434.25
The Barbecue Chicken Pizza	42768
The California Chicken Pizza	41409.5



11) CALCULATE THE PERCENTAGE CONTRIBUTION OF EACH PIZZA TYPE TO TOTAL REVENUE.

```
SELECT pizza_types.category, ROUND(SUM(orders_details.quantity * pizzas.price) / (SELECT  
    ROUND(SUM(orders_details.quantity * pizzas.price),  
        2) AS total_revenue  
FROM  
    orders_details  
    JOIN  
    pizzas ON orders_details.pizza_id = pizzas.pizza_id) * 100,2) as revenue  
FROM pizza_types  
JOIN pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id  
JOIN orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizza_types.category  
ORDER BY revenue desc;
```

category	revenue
Classic	26.91
Supreme	25.46
Chicken	23.96
Veggie	23.68



12) ANALYZE THE CUMULATIVE REVENUE GENERATED OVER TIME.

```
SELECT order_date, SUM(revenue) OVER (ORDER BY order_date) as cum_revenue
FROM
(SELECT orders.order_date , SUM(orders_details.quantity * pizzas.price) as revenue
FROM orders_details
JOIN pizzas ON orders_details.pizza_id = pizzas.pizza_id
JOIN orders ON orders.order_id = orders_details.order_id
GROUP BY orders.order_date) as sales;
```

order_date	cum_revenue
2015-01-01	2713.850000000004
2015-01-02	5445.75
2015-01-03	8108.15
2015-01-04	9863.6
2015-01-05	11929.55
2015-01-06	14358.5
2015-01-07	16560.7
2015-01-08	19399.05
2015-01-09	21526.4
2015-01-10	23990.350000000002



13) DETERMINE THE TOP 3 MOST ORDERED PIZZA TYPES BASED ON REVENUE FOR EACH PIZZA CATEGORY.

```
SELECT name , revenue FROM  
(SELECT category, name, revenue, RANK() OVER(PARTITION BY category ORDER BY revenue DESC) as rn FROM  
(SELECT pizza_types.name,pizza_types.category, SUM(orders_details.quantity * pizzas.price) as revenue  
FROM pizza_types  
JOIN pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id  
JOIN orders_details ON pizzas.pizza_id = orders_details.pizza_id  
GROUP BY pizza_types.name,pizza_types.category) as a) as b  
WHERE rn <=3;
```

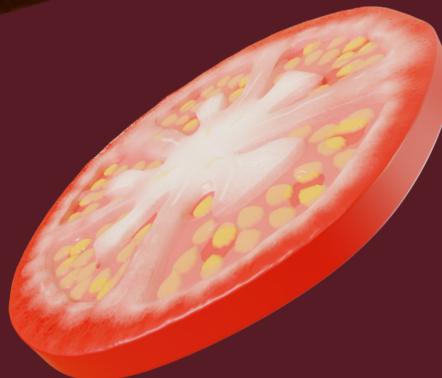
name	revenue
The Thai Chicken Pizza	43434.25
The Barbecue Chicken Pizza	42768
The California Chicken Pizza	41409.5
The Classic Deluxe Pizza	38180.5
The Hawaiian Pizza	32273.25
The Pepperoni Pizza	30161.75
The Spicy Italian Pizza	34831.25
The Italian Supreme Pizza	33476.75
The Sicilian Pizza	30940.5
The Four Cheese Pizza	32265.70000000065
The Mexicana Pizza	26780.75
The Five Cheese Pizza	26066.5

ORDER NOW

Life is short, eat the pizza!

21,350

Orders fueled our Business,
optimising satffing and inventory





INSIGHTS

- The analysis revealed that large size pizzas (L) are most commonly ordered
- The Thai Chiken Pizza (43434.25), The Barbecue Chicken Pizza (42,768) and The California Chicken pizza (41409.5) generates the highest revenue.
- The highest prices pizza is The Greek Pizza (35.39) is contributing significantly to the revenue.
- The average no. of pizzas ordered per day is 138.
- The most ordered pizza types based on quantities are The Classic Deluxe Pizza (2416). The Barbecue Chicken Pizza (2372) and The Hawaiian Pizza (2370).
- Cumulative revenue trends provide a long term view of performance.



THANK YOU