



# Pizza sales project on SQL



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# Hello.

## Welcome to my SQL project.

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I am Sium Ahameed, currently pursuing my education in Statistics with a focused ambition to become a data scientist. My journey in data science is guided by a structured roadmap that I meticulously follow to ensure I acquire the essential skills and knowledge needed to excel in this dynamic field. I am practicing SQL through some projects. This projects is one of them.

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**Have a lovely time !**



# QUERIES



- 1) Retrieve the total number of orders placed.
- 2) Calculate the total revenue generated from pizza sales.
- 3) Identify the highest-priced of pizza.
- 4) Identify the most common pizza size ordered.
- 5) List the top 5 most ordered pizza types along with their quantity.
- 6) Join the necessary tables to find the total quantity of each pizza category ordered.
- 7) Determine the distribution orders by hour of the day
- 8) Join relevant tables to find the category-wise distribution of pizzas.
- 9) Group the orders by date and calculate the average number of pizzas ordered per day.
- 10) Determine the top 3 most ordered pizza types based on revenue.
- 11) Calculate the percentage contribution of each pizza type to total revenue.
- 12) Analyze the cumulative revenue generated over time.
- 13) Determine the top 3 most ordered pizza types based on revenue for each pizza category.



01

**Retrieve the total number of orders placed.**

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



	total_orders
▶	21350

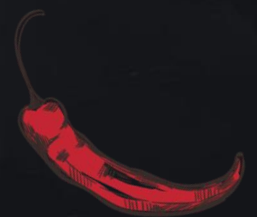







02

**Calculate the total revenue generated from pizza sales.**

```
SELECT  
    ROUND(SUM(order_details.quantity * pizzas.price),2) AS total_sales  
FROM  
    order_details  
    JOIN  
    pizzas ON pizzas.pizza_id = order_details.pizza_id;
```



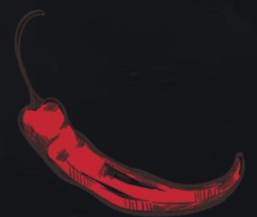


	total_sales
▶	817860.05



03

## Identify the highest-priced pizza.

```
SELECT
  pizza_types.name, pizzas.price
FROM
  pizza_types
  JOIN
    pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id
ORDER BY pizzas.price DESC
LIMIT 5;
```



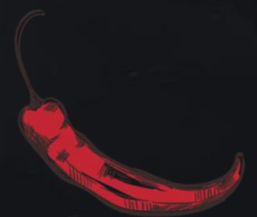


	name	price
▶	The Greek Pizza	35.95
	The Greek Pizza	25.5
	The Brie Carre Pizza	23.65
	The Italian Vegetables Pizza	21
	The Barbecue Chicken Pizza	20.75



04

## Identify the most common pizza size ordered

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



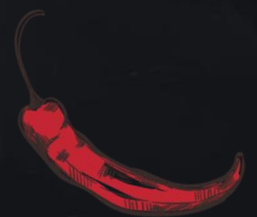


	size	order_count
▶	L	18526
	M	15385
	S	14137
	XL	544
	XXL	28



05

List the top 5 most ordered pizza types along with their quantities.

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

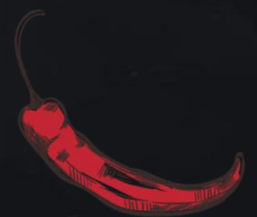




	name	quantity
▶	The Classic Deluxe Pizza	2453
	The Barbecue Chicken Pizza	2432
	The Hawaiian Pizza	2422
	The Pepperoni Pizza	2418
	The Thai Chicken Pizza	2371



## 06 Join the necessary tables to find the total quantity of each pizza category ordered.

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



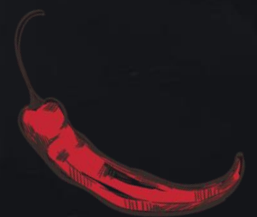

	category	quantity
▶	Classic	14888
	Supreme	11987
	Veggie	11649
	Chicken	11050



07

## Determine the distribution of orders by hour of the day.

```
SELECT
    HOUR(time) AS Hour, COUNT(order_id) AS order_count
FROM
    orders
GROUP BY HOUR(time);
```





	Hour	order_count
▶	11	1231
	12	2520
	13	2455
	14	1472
	15	1468
	16	1920
	17	2336
	18	2399



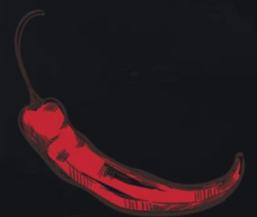
08

**Join relevant tables to find the category-wise distribution of pizzas.**

```
SELECT
    category, COUNT(name) AS Quantity
FROM
    pizza_types
GROUP BY category;
```



	category	Quantity
▶	Chicken	6
	Classic	8
	Supreme	9
	Veggie	9





09

**Group the orders by date and calculate the average number of pizzas ordered per day.**

```
SELECT
  ROUND(AVG(quantity), 0) AS Avg_pizzas_ordered_per_day
FROM
  (SELECT
    orders.date, SUM(order_details.quantity) AS quantity
  FROM
    orders
  JOIN order_details ON orders.order_id = order_details.order_id
  GROUP BY orders.date) AS order_quantity;
```

Avg\_pizzas\_ordered\_per\_day

▶ 138





# 10

## Determine the top 3 most ordered pizza types based on revenue.

```
SELECT
```

```
    pizza_types.name AS Name,  
    SUM(order_details.quantity * pizzas.price) AS Revenue
```

```
FROM
```

```
    pizza_types
```

```
    JOIN
```

```
    pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id
```




```
    JOIN
```

```
    order_details ON order_details.pizza_id = pizzas.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(order_details.quantity * pizzas.price) / (SELECT
    ROUND(SUM(order_details.quantity * pizzas.price),
      2) AS total_sales
    FROM
      order_details
      JOIN
        pizzas ON pizzas.pizza_id = order_details.pizza_id) * 100,
    2) AS revenue
FROM
  pizza_types
  JOIN
    pizzas ON pizza_types.pizza_type_id = pizzas.pizza_type_id
  JOIN
    order_details ON order_details.pizza_id = pizzas.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 date,  
       Sum(revenue)  
       OVER (  
         ORDER BY date) AS cumm_revenue  
FROM (SELECT orders.date,  
            Sum(order_details.quantity * pizzas.price) AS revenue  
FROM   order_details  
JOIN   pizzas  
      ON order_details.pizza_id = pizzas.pizza_id  
JOIN   orders  
      ON orders.order_id = order_details.order_id  
GROUP BY date) AS sales;
```



	date	cumm_revenue
▶	2015-01-01	2713.8500000000004
	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 category,
       NAME,
       revenue
FROM   (SELECT category,
              NAME,
              revenue,
              Rank()
              OVER(
                partition BY category
                ORDER BY revenue DESC) AS rn
FROM   (SELECT pizza_types.category,
              pizza_types.NAME,
              Sum(( order_details.quantity ) * pizzas.price) AS revenue
FROM   pizza_types

JOIN pizzas
      ON pizza_types.pizza_type_id = pizzas.pizza_type_id
JOIN order_details
      ON order_details.pizza_id = pizzas.pizza_id
GROUP BY pizza_types.category,
         pizza_types.NAME) AS a) AS b
WHERE  rn <= 3;
```



	category	NAME	revenue
►	Chicken	The Thai Chicken Pizza	43434.25
	Chicken	The Barbecue Chicken Pizza	42768
	Chicken	The California Chicken Pizza	41409.5
	Classic	The Classic Deluxe Pizza	38180.5
	Classic	The Hawaiian Pizza	32273.25
	Classic	The Pepperoni Pizza	30161.75
	Supreme	The Spicy Italian Pizza	34831.25
	Supreme	The Italian Supreme Pizza	33476.75
	Supreme	The Sicilian Pizza	30940.5
	Veggie	The Four Cheese Pizza	32265.70000000065





# THANKS!

Working on this project was really cool! We dug into pizza hut's sales using SQL, cleaned it up and found some neat insights.

We learned a lot and can't wait to use our newfound skills in future projects. Thanks to everyone involved for a great experience! If you have any questions or would like to discuss this project further, feel free to reach out to me.

## Connect with me



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