SQL FOR DATA ANALYSIS

PORTFOLIO PROJECT

PIZZA STORE

HELLO!!

My name is Sathwik Shetty, in this project I have used SQL Queries to solve few problem statements given by the pizza store

BASIC QUERIES

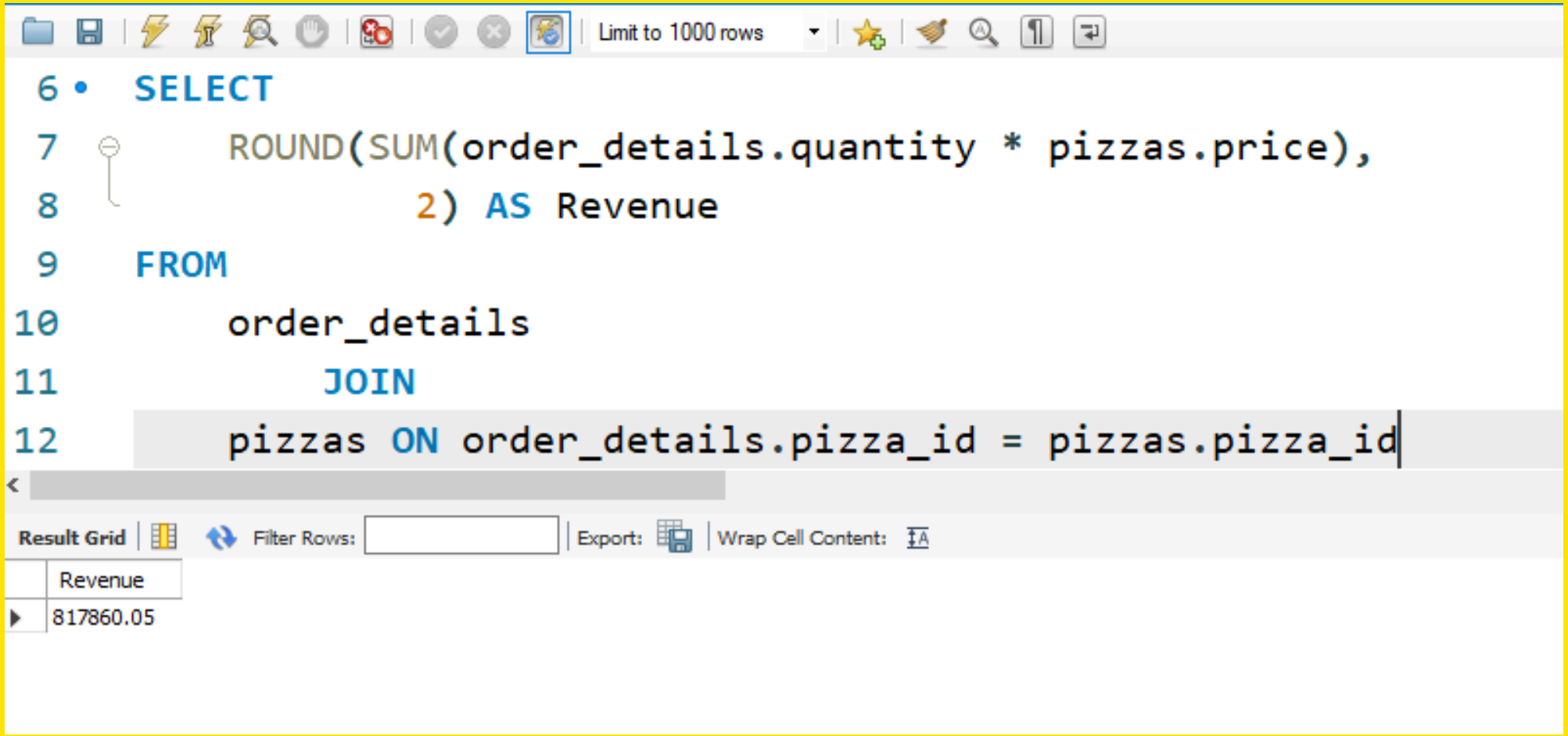
1.Retrieve the total number of orders placed.

```
6
7  select  count(order_id) from orders
8
9
10
11
```

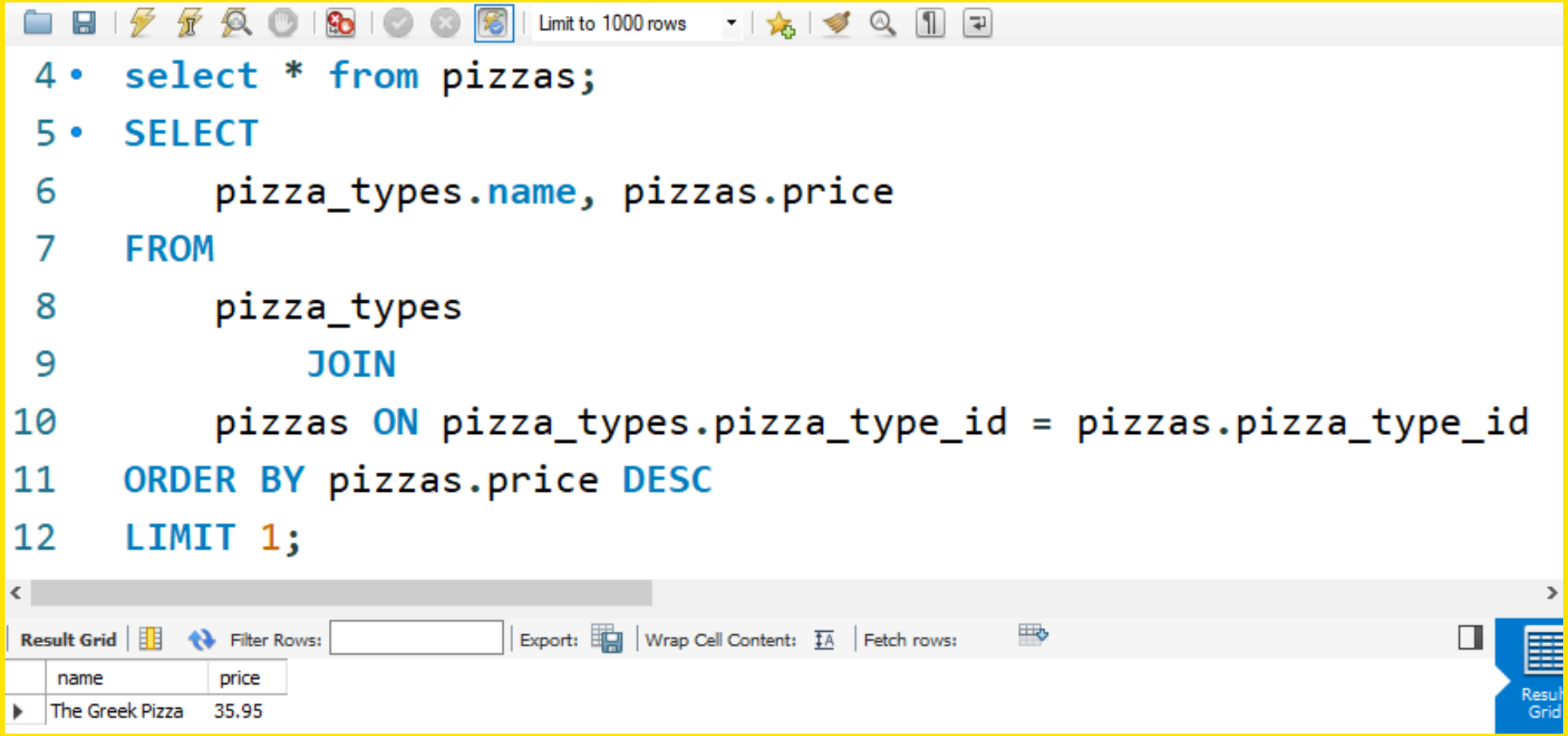
Result Grid | Filter Rows: | Export: | Wrap Cell Content:

count(order_id)
21350

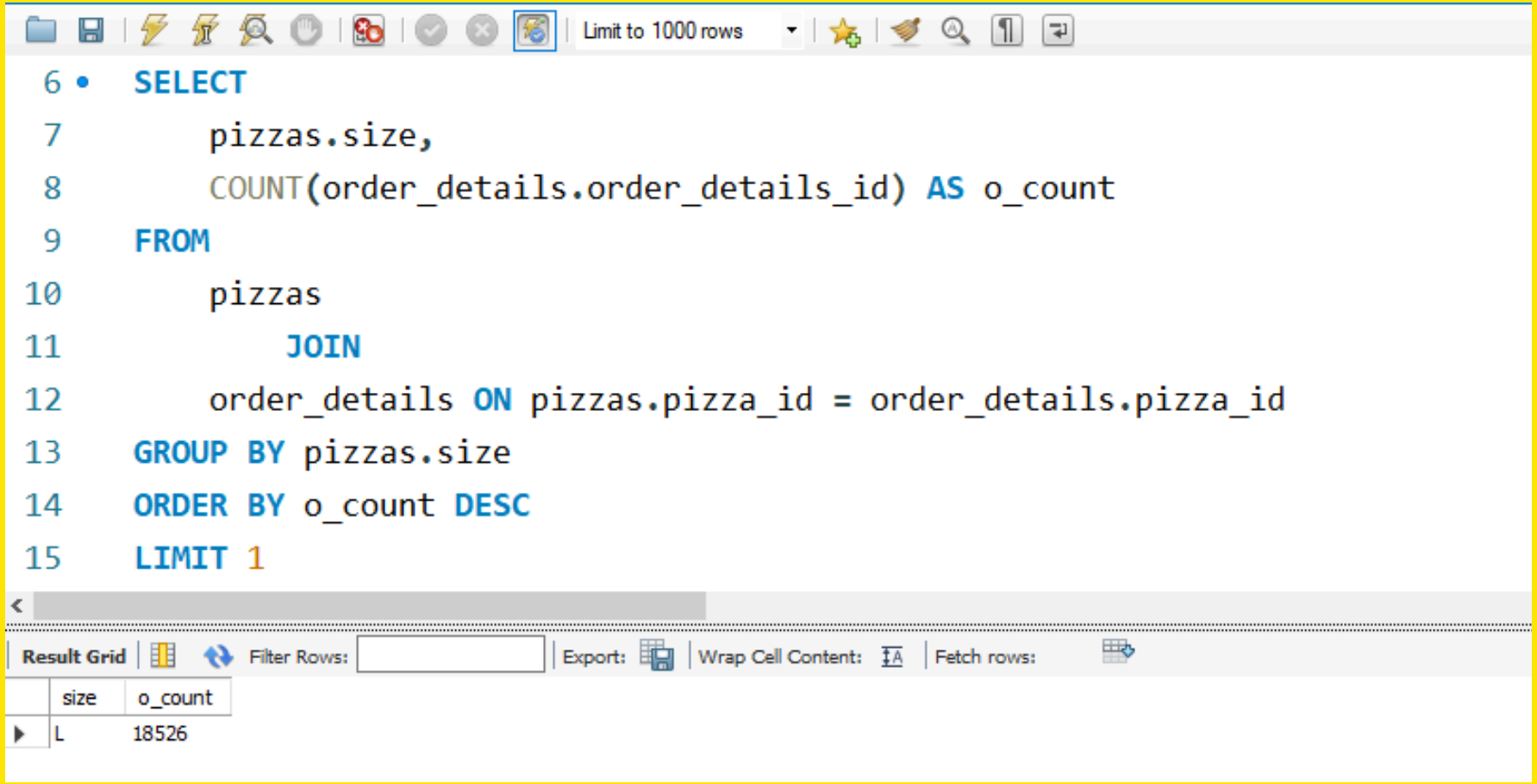
2.Calculate the total revenue generated from pizza sales.



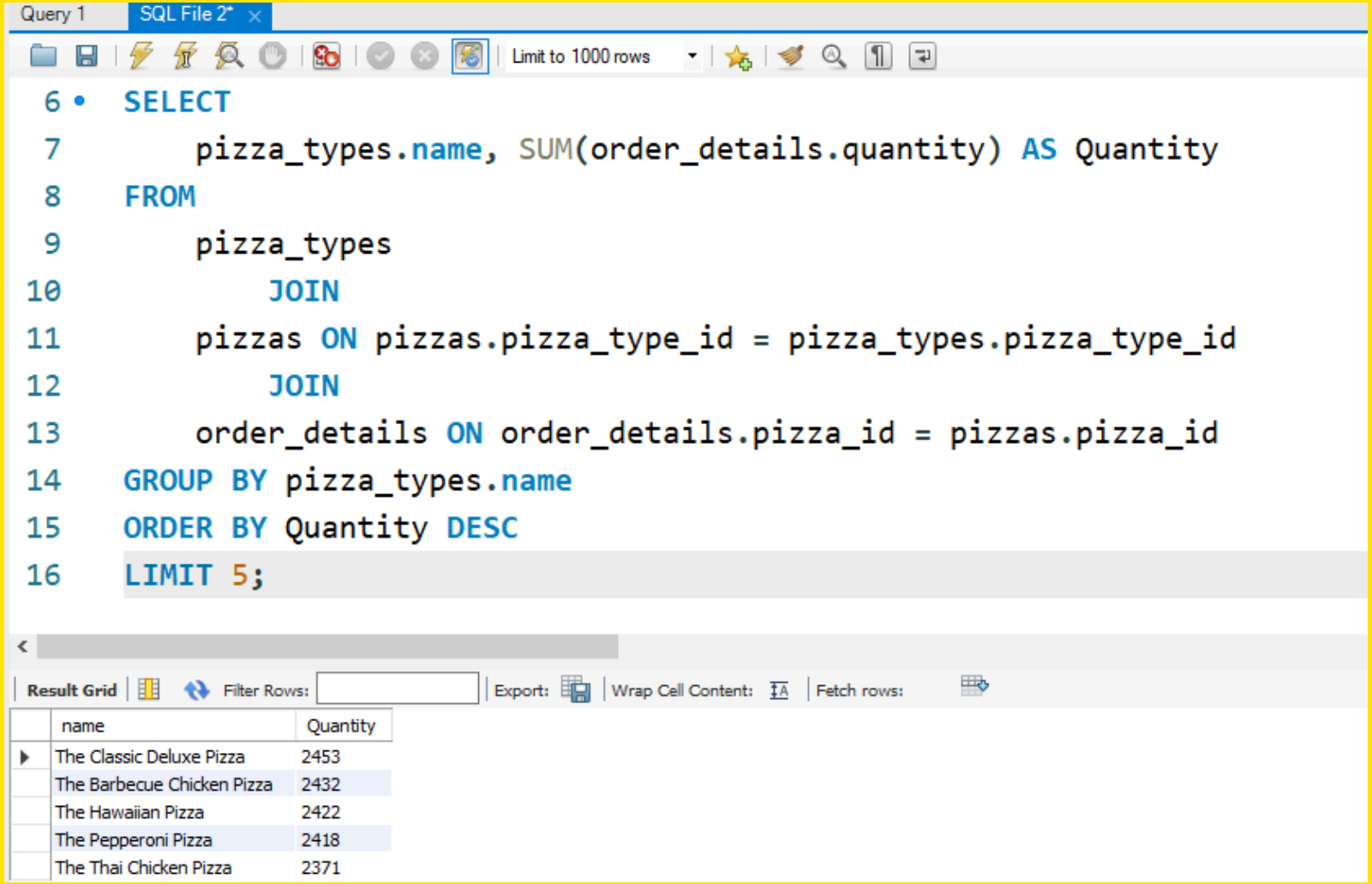
3.Identify the highest-priced pizza.



Identify the most common pizza size ordered.



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



Intermediate:

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

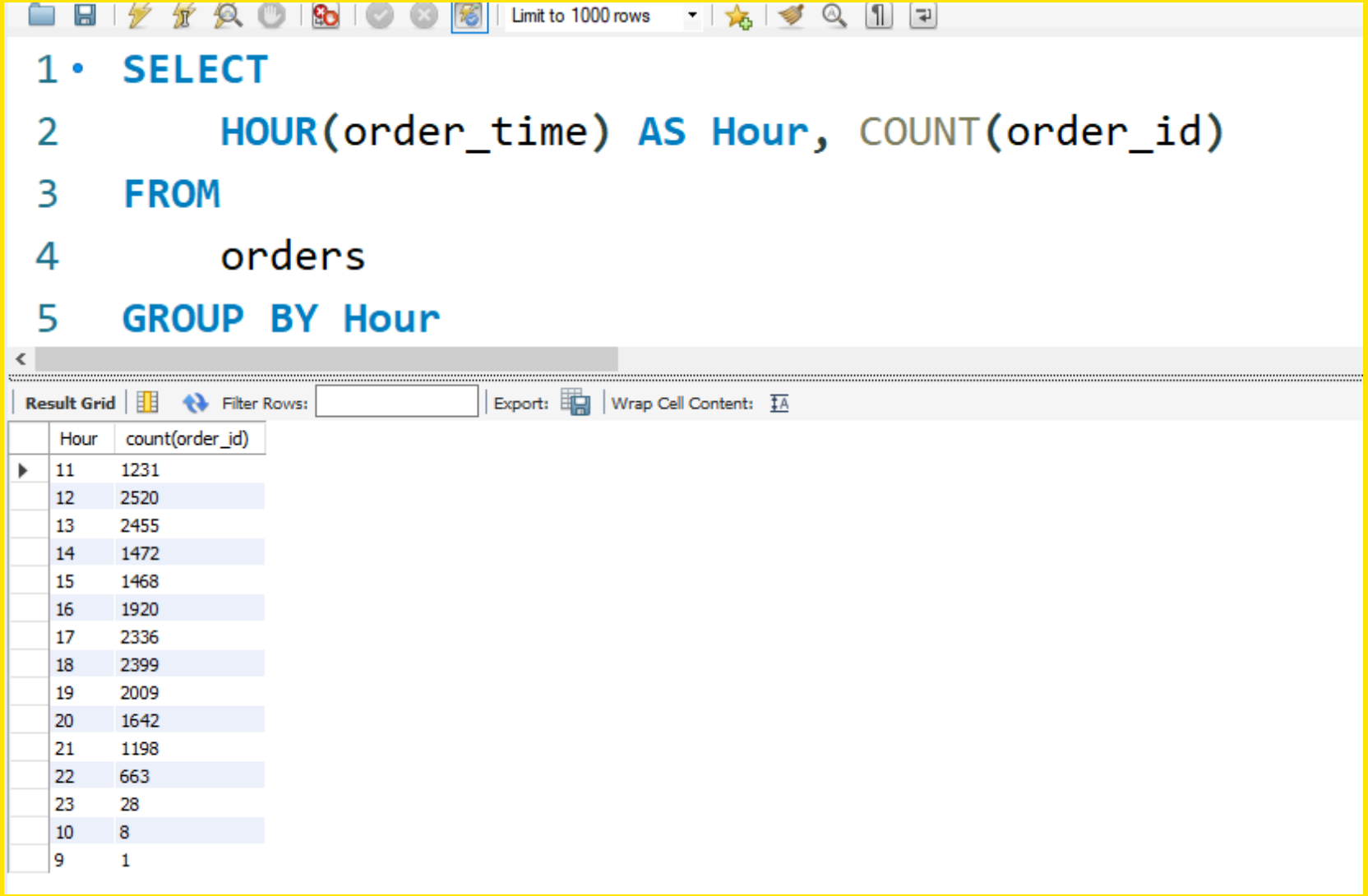
```
Limit to 1000 rows

 6 • SELECT
 7       pizza_types.category,
 8       SUM(order_details.quantity) AS quantity
 9   FROM
10       pizza_types
11           JOIN
12       pizzas ON pizzas.pizza_type_id = pizza_types.pizza_type_id
13           JOIN
14       order_details ON pizzas.pizza_id = order_details.pizza_id
15   GROUP BY pizza_types.category
16   ORDER BY quantity DESC
```

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

category	quantity
Classic	14888
Supreme	11987
Veggie	11649
Chicken	11050

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



Hour	count(order_id)
11	1231
12	2520
13	2455
14	1472
15	1468
16	1920
17	2336
18	2399
19	2009
20	1642
21	1198
22	663
23	28
10	8
9	1

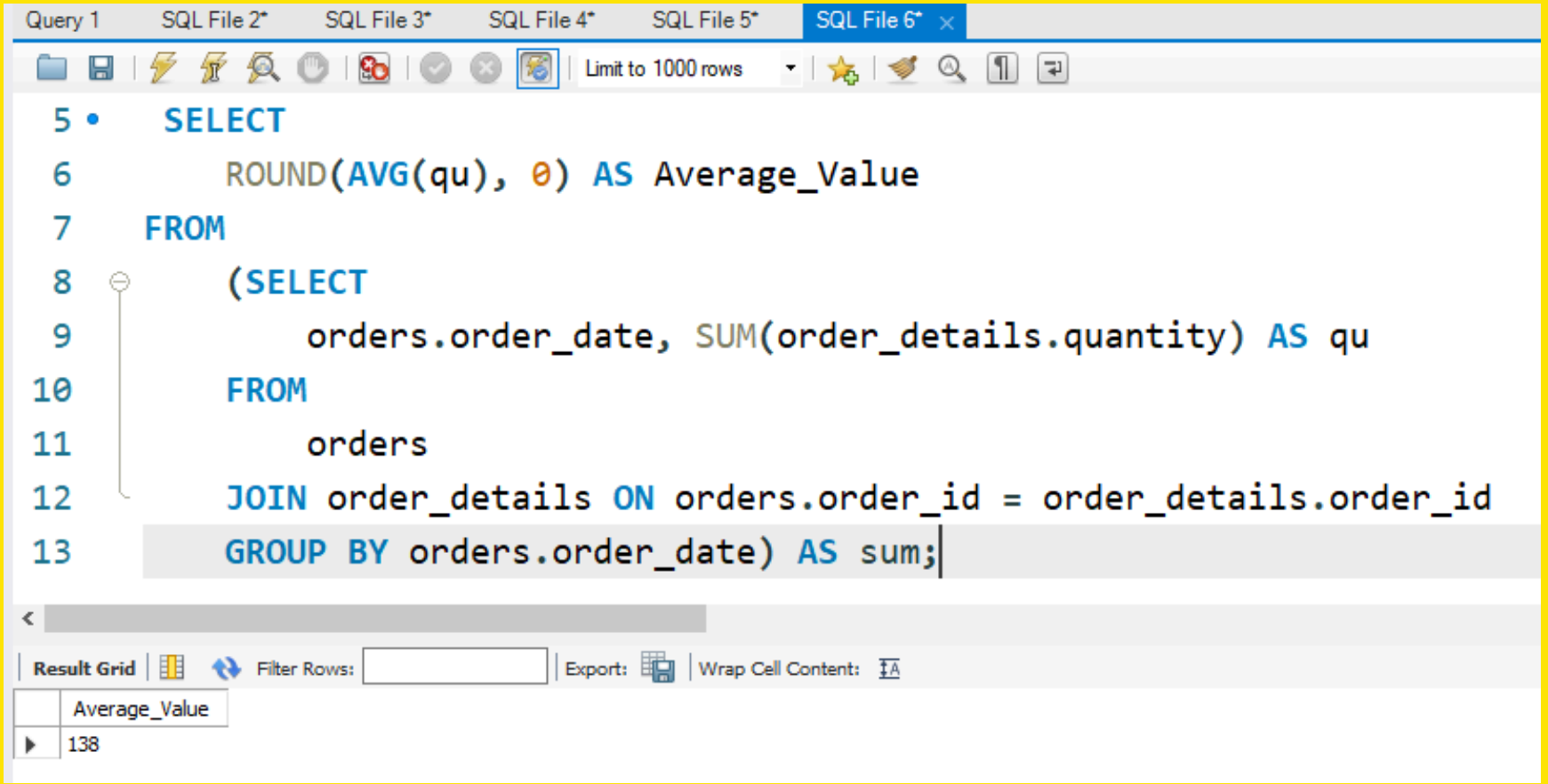
3.Join relevant tables to find the category-wise distribution of pizzas.

```sql
SELECT
    pizza_types.category,
    COUNT(order_details.order_id) AS Contribution
FROM
    pizza_types
        JOIN
    pizzas ON pizzas.pizza_type_id = pizza_types.pizza_type_id
        JOIN
    order_details ON pizzas.pizza_id = order_details.pizza_id
GROUP BY pizza_types.category
```

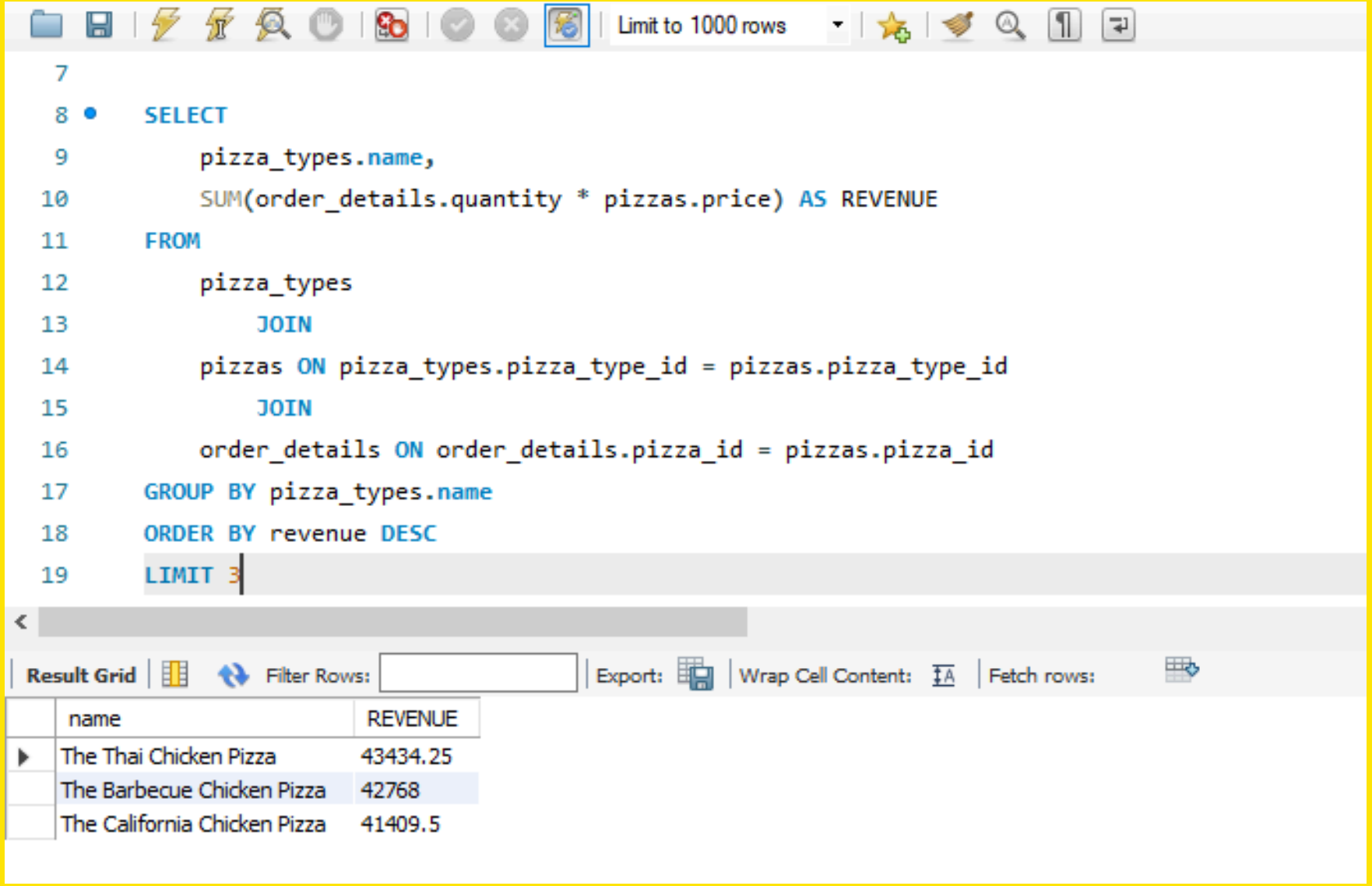
Result Grid | Filter Rows: | Export: | Wrap Cell Content:

category	Contribution
Classic	14579
Veggie	11449
Supreme	11777
Chicken	10815

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



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



Advanced:

Calculate the percentage contribution of each pizza type to total revenue.

```sql
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 PERCENTAGE_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 PERCENTAGE_REVENUE DESC
```

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

category	PERCENTAGE_REVENUE
Classic	26.91
Supreme	25.46
Chicken	23.96
Veggie	23.68

Analyze the cumulative revenue generated over time.

```sql
select order_date,sum(revenue) over(order by order_date) As Cumulative_Revenue
from
(select orders.order_date,round(sum(order_details.quantity*pizzas.price),2)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 orders.order_date)as sales
```

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

order_date	Cumulative_Revenue
2015-01-01	2713.85
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	21526.399999999998
2015-01-10	23990.35
2015-01-11	25862.649999999998

Result 3

Determine the top 3 most ordered pizza types based on revenue for each pizza category.

```sql
select 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;
```

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

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

Thank you!