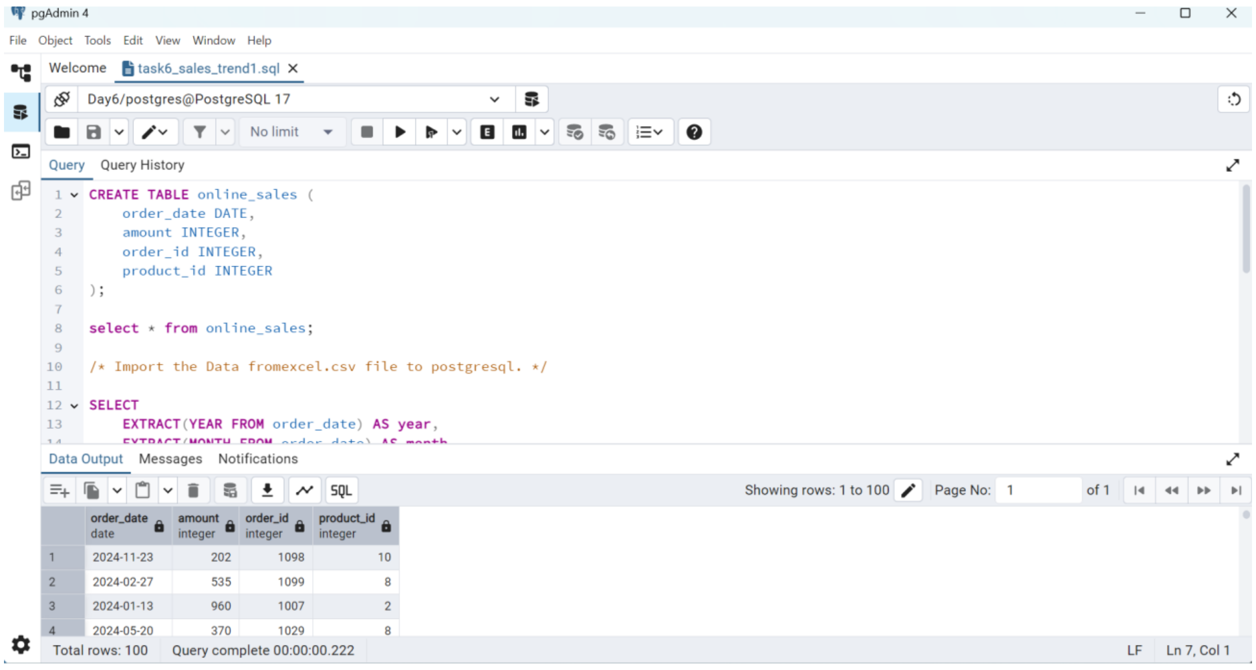
Sales Trend Analysis Using Aggregations

Step 1: -

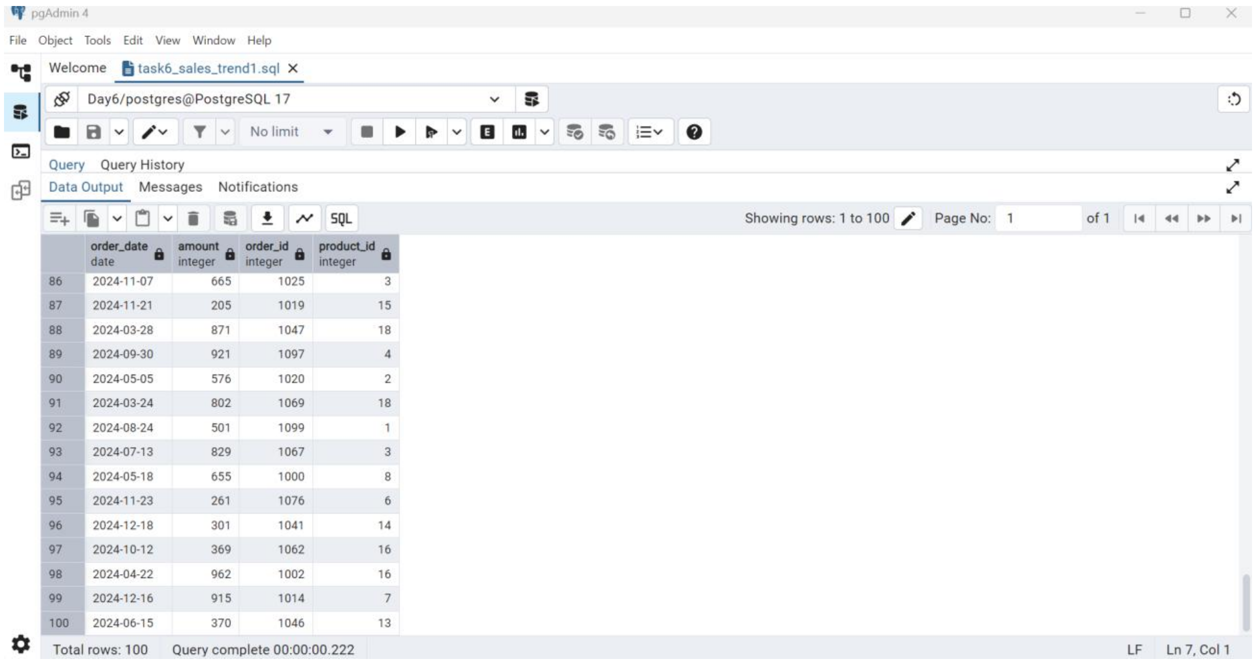

pgAdmin 4
File Object Tools Edit View Window Help
Welcome task6_sales_trend1.sql
Day6/postgres@PostgreSQL 17
No limit
Query Query History
Data Output Messages Notifications
Showing rows: 1 to 100 Page No: 1 of 1
LF Ln 7, Col 1

```sql
CREATE TABLE online_sales (
    order_date DATE,
    amount INTEGER,
    order_id INTEGER,
    product_id INTEGER
);

select * from online_sales;

/* Import the Data fromexcel.csv file to postgresql. */

SELECT
    EXTRACT(YEAR FROM order_date) AS year,
    EXTRACT(MONTH FROM order_date) AS month
```

	order_date date	amount integer	order_id integer	product_id integer
1	2024-11-23	202	1098	10
2	2024-02-27	535	1099	8
3	2024-01-13	960	1007	2
4	2024-05-20	370	1029	8

Total rows: 100 Query complete 00:00:00.222

Step 2: -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Welcome task6_sales_trend1.sql
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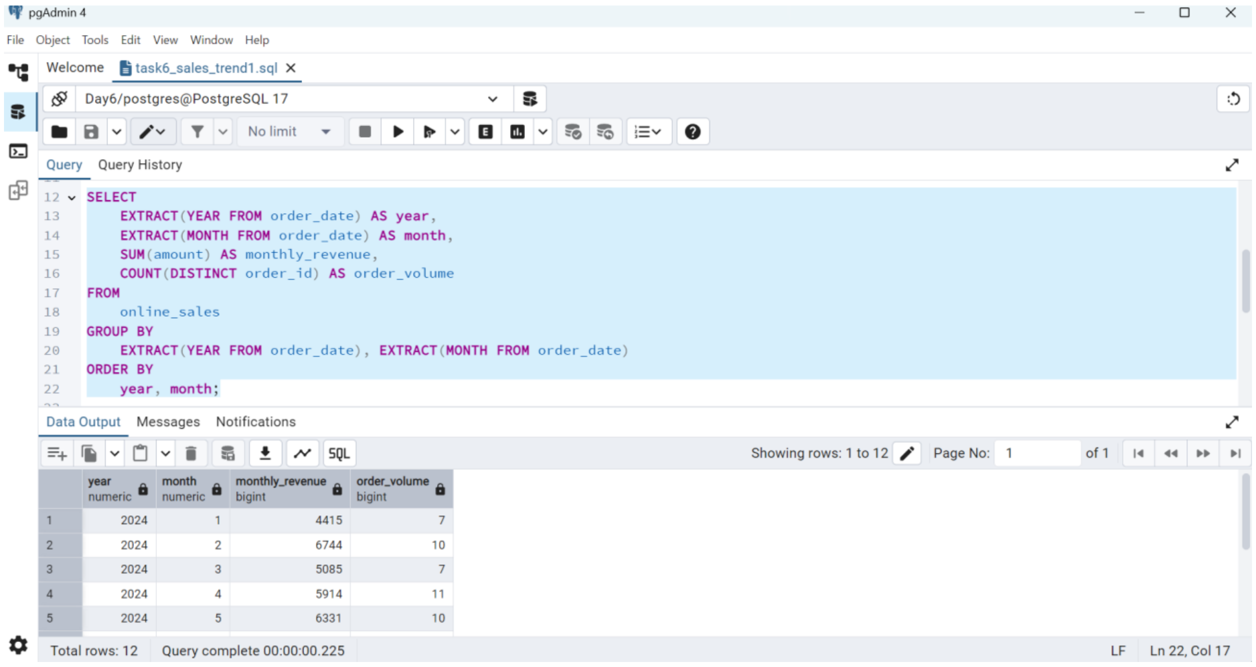
LF Ln 7, Col 1

	order_date date	amount integer	order_id integer	product_id integer
86	2024-11-07	665	1025	3
87	2024-11-21	205	1019	15
88	2024-03-28	871	1047	18
89	2024-09-30	921	1097	4
90	2024-05-05	576	1020	2
91	2024-03-24	802	1069	18
92	2024-08-24	501	1099	1
93	2024-07-13	829	1067	3
94	2024-05-18	655	1000	8
95	2024-11-23	261	1076	6
96	2024-12-18	301	1041	14
97	2024-10-12	369	1062	16
98	2024-04-22	962	1002	16
99	2024-12-16	915	1014	7
100	2024-06-15	370	1046	13

Total rows: 100 Query complete 00:00:00.222

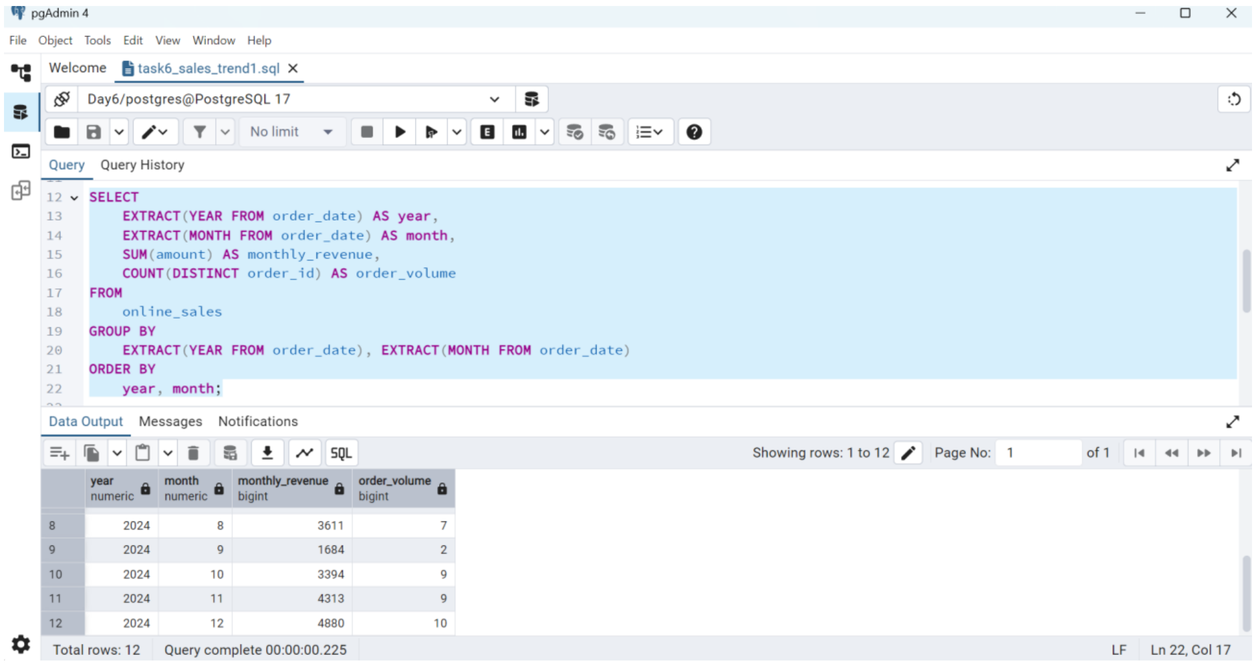
Step 3:


```
SELECT
    EXTRACT(YEAR FROM order_date) AS year,
    EXTRACT(MONTH FROM order_date) AS month,
    SUM(amount) AS monthly_revenue,
    COUNT(DISTINCT order_id) AS order_volume
FROM
    online_sales
GROUP BY
    EXTRACT(YEAR FROM order_date), EXTRACT(MONTH FROM order_date)
ORDER BY
    year, month;
```

	year numeric	month numeric	monthly_revenue bigint	order_volume bigint
1	2024	1	4415	7
2	2024	2	6744	10
3	2024	3	5085	7
4	2024	4	5914	11
5	2024	5	6331	10

Total rows: 12 Query complete 00:00:00.225

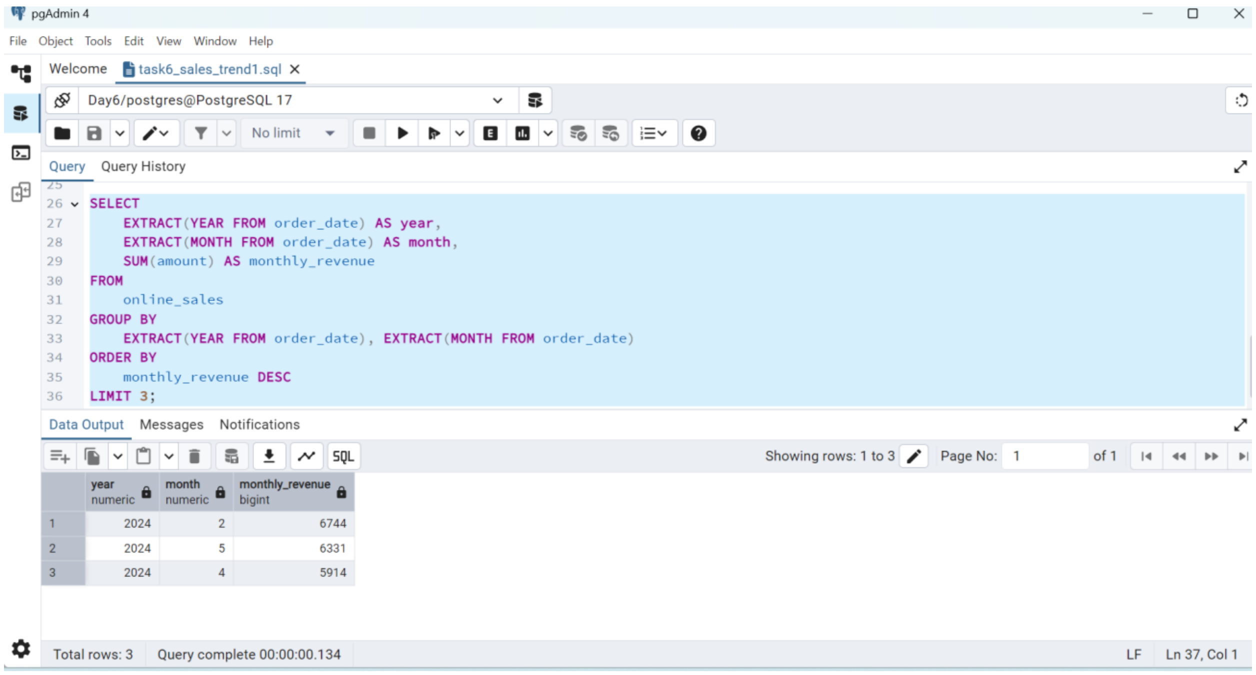
Step 4:


```
SELECT
    EXTRACT(YEAR FROM order_date) AS year,
    EXTRACT(MONTH FROM order_date) AS month,
    SUM(amount) AS monthly_revenue,
    COUNT(DISTINCT order_id) AS order_volume
FROM
    online_sales
GROUP BY
    EXTRACT(YEAR FROM order_date), EXTRACT(MONTH FROM order_date)
ORDER BY
    year, month;
```

	year numeric	month numeric	monthly_revenue bigint	order_volume bigint
8	2024	8	3611	7
9	2024	9	1684	2
10	2024	10	3394	9
11	2024	11	4313	9
12	2024	12	4880	10

Total rows: 12 Query complete 00:00:00.225

Step 5:



```sql
SELECT
    EXTRACT(YEAR FROM order_date) AS year,
    EXTRACT(MONTH FROM order_date) AS month,
    SUM(amount) AS monthly_revenue
FROM
    online_sales
GROUP BY
    EXTRACT(YEAR FROM order_date), EXTRACT(MONTH FROM order_date)
ORDER BY
    monthly_revenue DESC
LIMIT 3;
```

Showing rows: 1 to 3 Page No: 1 of 1

	year numeric	month numeric	monthly_revenue bigint
1	2024	2	6744
2	2024	5	6331
3	2024	4	5914

Total rows: 3 Query complete 00:00:00.134 LF Ln 37, Col 1