TechKart is an online store tracking customer purchases across multiple cities.
Sometimes customers reorder within 1–2 days, creating similar order amounts.
A few orders get cancelled or paid late, making payment tracking difficult.
Finance wants to analyze gaps between consecutive orders for each customer.
Some customers make payments before the actual order date due to system errors.
Multiple customers have placed orders with the same amount on the same date.
Refunded orders are still showing payments, which must be detected through queries.
The analytics team needs to find each customer's rank within their city based on spending.
They also want to detect any sudden jump or drop between consecutive order amounts.
The goal is to prepare clean, ranked, and time-aware insights directly using SQL logic.

CUSTOMERS

customer_id	customer_name	city
1	Aarav Mehta	Delhi
2	Riya Sharma	Mumbai
3	Kabir Jain	Delhi
4	Neha Verma	Pune

ORDERS

order_id	customer_id	order_date	total_amount	status
1001	1	2023-06-01	4500	Delivered
1002	1	2023-06-03	5200	Delivered
1003	2	2023-06-02	3000	Delivered
1004	2	2023-06-10	3000	Cancelled
1005	3	2023-06-05	5200	Delivered
1006	3	2023-06-06	7000	Delivered
1007	4	2023-06-09	4000	Delivered

PAYMENTS

payment_id	order_id	payment_date	payment_amount
P01	1001	2023-06-02	4500
P02	1002	2023-06-01	5200
P03	1003	2023-06-05	3000
P04	1006	2023-06-08	7000
P05	1007	2023-06-10	4000

1. Find orders where payment was done before the order date.
2. Show orders that have the same total_amount but belong to different customers.
3. Show customer name, order date, total amount, and payment amount (include NULL if no payment).
4. Show customers who made payment but order was cancelled.

5.Find customers who spent more than the average of all customers.

6.Find customers whose total spending is greater than Riya Sharma's spending.

7.Show difference between each order and previous order of same customer.

8.Show next order date for each customer.

9. Rank customers within city by total amount.

10.Find biggest drop in amount between 2 consecutive orders (per customer).