

# Problem 1398: Customers Who Bought Products A and B but Not C

## Problem Information

**Difficulty:** Medium

**Acceptance Rate:** 71.65%

**Paid Only:** Yes

**Tags:** Database

## Problem Description

Table: `Customers`

```
+-----+-----+ | Column Name | Type | +-----+-----+ | customer_id |
int | | customer_name | varchar | +-----+-----+ customer_id is the column with
unique values for this table. customer_name is the name of the customer.
```

Table: `Orders`

```
+-----+-----+ | Column Name | Type | +-----+-----+ | order_id | int | |
customer_id | int | | product_name | varchar | +-----+-----+ order_id is the column
with unique values for this table. customer_id is the id of the customer who bought the product
"product_name".
```

Write a solution to report the customer\_id and customer\_name of customers who bought products **A**, **B** but did not buy the product **C** since we want to recommend them to purchase this product.

Return the result table **ordered** by `customer\_id`.

The result format is in the following example.

**Example 1:**

```
Input: Customers table: +-----+-----+ | customer_id | customer_name |
+-----+-----+ | 1 | Daniel | | 2 | Diana | | 3 | Elizabeth | | 4 | Jhon |
```

```

+-----+-----+ Orders table: +-----+-----+-----+ | order_id |
customer_id | product_name | +-----+-----+-----+ | 10 | 1 | A | | 20 | 1 | B | |
30 | 1 | D | | 40 | 1 | C | | 50 | 2 | A | | 60 | 3 | A | | 70 | 3 | B | | 80 | 3 | D | | 90 | 4 | C |
+-----+-----+-----+ **Output:** +-----+-----+ | customer_id |
customer_name | +-----+-----+ | 3 | Elizabeth | +-----+-----+
**Explanation:** Only the customer_id with id 3 bought the product A and B but not the
product C.

```

## Code Snippets

### MySQL:

```
# Write your MySQL query statement below
```

### MS SQL Server:

```
/* Write your T-SQL query statement below */
```

### PostgreSQL:

```
-- Write your PostgreSQL query statement below
```