

2051. The Category of Each Member in the Store

Description

Table: Members

Column Name	Type	
member_id	int	
name	varchar	

member_id is the column with unique values for this table.
Each row of this table indicates the name and the ID of a member.

Table: Visits

Column Name	Type	
visit_id	int	
member_id	int	
visit_date	date	

visit_id is the column with unique values for this table.
member_id is a foreign key (reference column) to member_id from the Members table.
Each row of this table contains information about the date of a visit to the store and the member who visited it.

Table: Purchases

Column Name	Type	
visit_id	int	
charged_amount	int	

visit_id is the column with unique values for this table.
visit_id is a foreign key (reference column) to visit_id from the Visits table.
Each row of this table contains information about the amount charged in a visit to the store.

A store wants to categorize its members. There are three tiers:

- "Diamond": if the conversion rate is **greater than or equal to** 80 .
- "Gold": if the conversion rate is **greater than or equal to** 50 and less than 80 .
- "Silver": if the conversion rate is **less than** 50 .
- "Bronze": if the member never visited the store.

The **conversion rate** of a member is $(100 * \text{total number of purchases for the member}) / \text{total number of visits for the member}$.

Write a solution to report the id, the name, and the category of each member.

Return the result table in **any order** .

The result format is in the following example.

Example 1:

Input:

Members table:

member_id	name
9	Alice
11	Bob
3	Winston
8	Hercy
1	Narihan

Visits table:

visit_id	member_id	visit_date
22	11	2021-10-28
16	11	2021-01-12
18	9	2021-12-10
19	3	2021-10-19
12	11	2021-03-01
17	8	2021-05-07
21	9	2021-05-12

Purchases table:

visit_id	charged_amount
12	2000
18	9000
17	7000

Output:

member_id	name	category
1	Narihan	Bronze
3	Winston	Silver
8	Hercy	Diamond
9	Alice	Gold
11	Bob	Silver

Explanation:

- User Narihan with id = 1 did not make any visits to the store. She gets a Bronze category.
- User Winston with id = 3 visited the store one time and did not purchase anything. The conversion rate = $(100 * 0) / 1 = 0$. He gets a Silver category.
- User Hercy with id = 8 visited the store one time and purchased one time. The conversion rate = $(100 * 1) / 1 = 1$. He gets a Diamond category.
- User Alice with id = 9 visited the store two times and purchased one time. The conversion rate = $(100 * 1) / 2 = 50$. She gets a Gold category.
- User Bob with id = 11 visited the store three times and purchased one time. The conversion rate = $(100 * 1) / 3 = 33.33$. He gets a Silver category.

