

Question:

Day 10 of SQL Advent Calendar

Today's Question:

You are tracking your friends' New Year's resolution progress. Write a query to calculate the following for each friend: number of resolutions they made, number of resolutions they completed, and success percentage (% of resolutions completed) and a success category based on the success percentage:

- **Green:** If success percentage is greater than 75%.
- **Yellow:** If success percentage is between 50% and 75% (inclusive).
- **Red:** If success percentage is less than 50%.

Table name: resolutions

resolution_id	friend_name	resolution	is_completed
1	Alice	Exercise daily	1
2	Alice	Read 20 books	0
3	Bob	Save money	0
4	Bob	Eat healthier	1
5	Charlie	Travel more	1
6	Charlie	Learn a new skill	1
7	Diana	Volunteer monthly	1
8	Diana	Drink more water	0
9	Diana	Sleep 8 hours	1

Question level of difficulty: Medium



SQL Query:

```
1  SELECT
2      friend_name,
3      COUNT(resolution) AS num_of_resolutions_made,
4      SUM(is_completed) AS num_of_resolutions_completed,
5      SUM(is_completed)*100/COUNT(resolution) AS success_percentage,
6      CASE
7          WHEN (SUM(is_completed)*100/COUNT(resolution)) > 75 THEN 'Green'
8          WHEN (SUM(is_completed)*100/COUNT(resolution)) >= 50 THEN 'Yellow'
9          ELSE 'Red'
10     END AS pct_resolutions_completed
11  FROM
12      resolutions
13  GROUP BY friend name;
```

Output:

FRIEND_NAME	NUM_OF_RESOLUTIONS_MADE	NUM_OF_RESOLUTIONS_COMPLETED	SUCCESS_PERCENTAGE	PCT_RESOLUTIONS_COMPLETED
Alice	2	1	50	Yellow
Bob	2	1	50	Yellow
Charlie	2	2	100	Green
Diana	3	2	66	Yellow

Correct!! 🏆 Great work!