## SQL Assignment - Stock Market Analysis

## **Results Obtained & Inferences:**

- 1. There were numerous instances on each stock where short term moving average (20 Day) was crossing over long term moving average (50 Day) which indicated the good time for buying a stock. Bajaj Auto and TCS generate the maximum such instances.
- 2. Below is a tabulated summary of count of number of instances when there was a signal for Buying or Selling a stock based on approximately last three years of data;

Sr. No.	Stock	Signals	Count Instances
1	Bajaj Auto	Buy	12
		Sell	11
		Hold	866
2	Eicher Motors	Buy	6
		Sell	7
		Hold	876
3	Hero Motocorp	Buy	9
		Sell	9
		Hold	871
4	Infosys	Buy	9
		Sell	9
		Hold	871
5	TCS	Buy	12
		Sell	13
		Hold	864
6	TVS Motors	Buy	8
		Sell	8
		Hold	873

- 3. User Defined Function is created in a way to generate the actual signal if exist for a day in Bajaj2 table or else it gives the result as 'Hold'.
- 4. Below is list of assumptions made in completing this assignment;
  - a. Signals are calculated from the first instance when the short-term moving average crosses the long-term moving average and hence for every stock, 50<sup>th</sup> row shows the signal as 'Hold'.
  - b. UDF will result in 'Hold' signal if the date is not found in Bajaj2 table; signifying that there is no data for calculation on that day or it might be a holiday in stock exchange.