DAX
MODULE 5

DAX:

Dax stands for **Data Analysis Expression** and is the formula language used in POWER BI. The structure is somewhat different from EXCEL as you will study in this lecture. DAX is a **collection of functions, operators and constants that can be used in a formula, or expression to calculate and return one or more values.**

It allows you to perform **dynamic analysis**, in which the results of a formula can change to reflect the current row or cell selection and any related data.

Files to use: **Sample superstore** and **Retail Sales Analysis.pbix** Desktop files in this module.

1. Creating Calculated Tables
2. Creating Calculated Columns - DATEDIFF
3. Creating Calculated Columns - RANKX Highest
4. Creating Calculated Columns - RANKX Lowest
5. Creating Calculated Columns - RANKX Dense
6. Creating Quick Measures
7. Creating Measures
8. Creating Date Tables
9. Time Intelligence Functions
10. Key Performance Indicators
11. Additional Key Performance Indicators
12. DAX Recap

MEASURES

They are virtual functions.

They do not become a part of your dataset, instead they are only calculated when you add them to your report visualizations.

So, if file size is an issue, you might want to use measures instead of calculated tables or columns.

There are 2 variations of measures.

One is QUICK MEASURES, which is a template of sorts.
The other ones are measures that you build from scratch,

TASKS

Using the same approach that we have done right now, your task is to create 2 more calculated columns in the ORDERS table.

1. A "**END OF MONTH**" column that calculates the end of the month for the "**Order Dates**" column.
   Use **ENDOFMONTH** function
2. A "**END OF QUARTER**" column that calculates the end of the quarter for the "**Order Dates**" column.
   Use **ENDOFQUARTER** function

Once you have created both of these columns, you need to FORMAT them to match the Order and Ship Date columns.

I have already taught you how to format a date column, Do It Yourself now!

Hint: Column Tools
SELECT THE FORMAT THAT MATCHES WITH THE SHIP DATE (MMMM, DD, YYYY)

SAVE YOUR FILE NOW