# Study Case:

Adventure Works, a multinational bicycle manufacturer, has multiple sales operations across the globe. The company's executive board and sales management team require quarterly sales information to assess their performance for the previous quarter. This analysis should provide them with the insights they need to make strategic decisions for their upcoming quarter.

The specific tasks we will perform in this exercise are:

- Create a data story through a dashboard, providing an overview of quarterly sales performance for the executive board of Adventure Works.

- Create a granular report with interactivity about the same sales period for the sales management team.

- Highlight any trends identified, such as higher/lower sales by region, category, and salespersons.

- Provide a conclusion summarizing the key takeaways for both the board of directors and sales management team.

Solution:

Our data model comprises a Sales fact table along with three-dimension tables: **Region**, **Products**, and **Salesperson**. Additionally, there is a **Key Measures** table that is independent of the model and contains specific key measures.
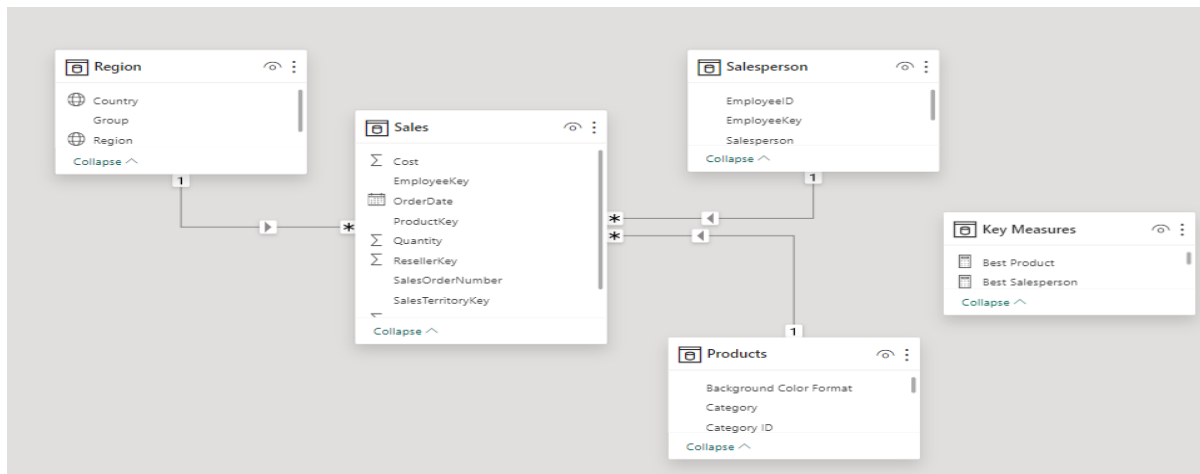
1. We can visualize the sales by **category**, **country**, and **salesperson** and introduce **year** and **quarter** slicer for interactive visualization of quarterly or yearly sales values. On the other hand, we need to consider adding snapshots of valuable information in the form of card visuals for the executive board.

2. Create visualizations according to the relevant data fields:
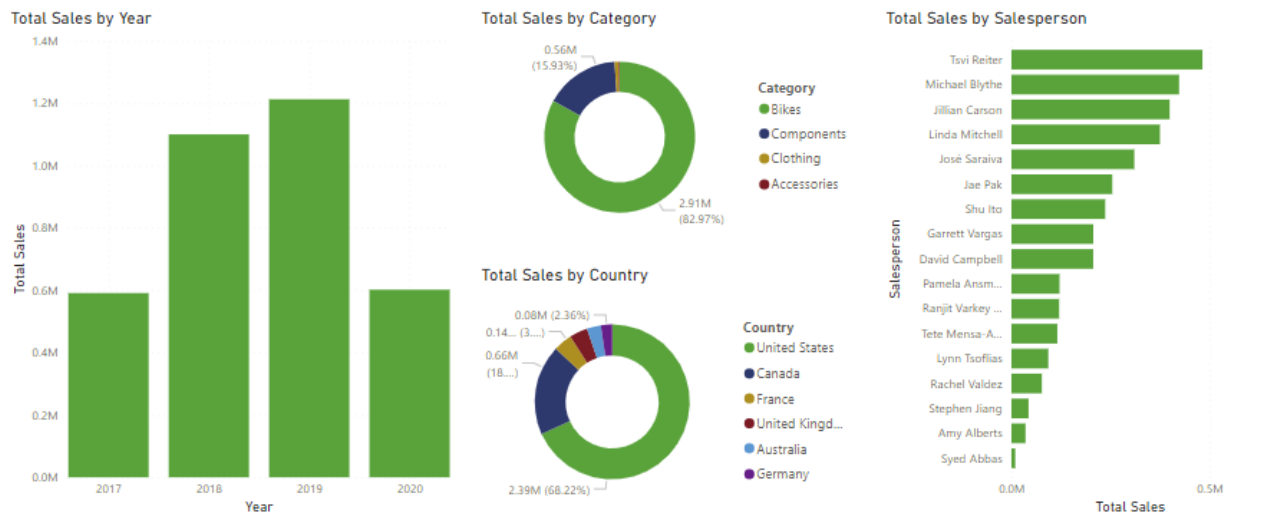
3. Our data story objective is to show quarterly sales performance, we have to add slicers for the years and yearly quarters so we can interactively explore the data. As well we need to create card visuals to highlight key metrics such as profit, revenue, profit margin.
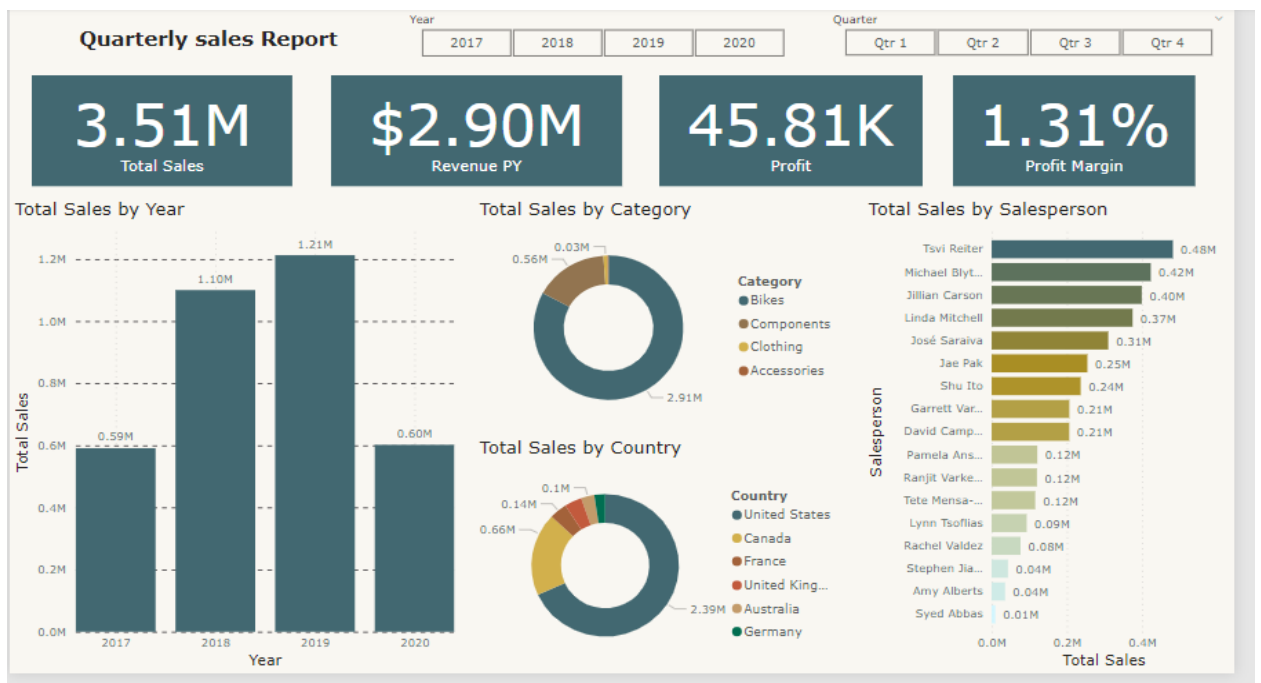
4. We need to apply filters to the report for the first two quarters of 2020, by selecting 2020 from the year slicer will display the data only relevant to the first two quarters of the year. And then select the 1st quarter.

Quarterly sales Report

412.37K	$265.12K	261.72	0.06%
Total Sales	**Revenue PY**	**Profit**	**Profit Margin**

Total Sales by Quarter

0.41M

- 0.4M
- 0.3M
- 0.2M
- 0.1M
- 0.0M

Total Sales

Qtr 1
Quarter

Total Sales by Category

33.04K

373.37K

Category
- Bikes
- Components
- Clothing
- Accessories

Total Sales by Country

23.74K
27.64K
30...
69.22K
239.46K

Country
- United States
- Canada
- Australia
- France
- United King...
- Germany

Total Sales by Salesperson

Salesperson	Total Sales
Linda Mitchell	43K
Jae Pak	43K
Tsvi Reiter	41K
Michael Blyt...	38K
Jillian Carson	36K
Tete Mensa-...	33K
Ranjit Varke...	28K

0K   20K   40K
Total Sales

- The sales for the 1st quarter of 2020 is higher than same period last year.
- the profit margin is negligible even if we have high sales.
- Bikes accounted for 90.54% of Total Sales for 1st quarter 2020.
- Linda Mitchell accounted for 10.39% of Total Sales for 1st quarter of 2020.
- Stephan, Syed, Pamela, Amy have the lowest total sales in the 1st quarter of 2020.
- United States accounted for 58.07% of Total Sales in the 1st quarter of 2020.

Sales