



SALES ANALYSIS PROJECT

Products

Carlota

Quad

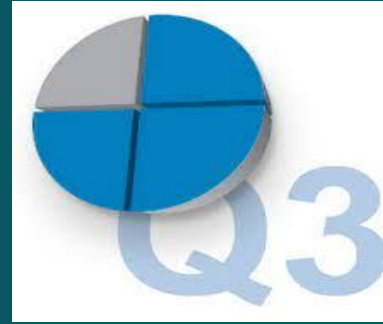
Magnum



**Target
Audience :
GERMANY**



**Time
Period :
Quarter 3**



**After
analyzing
the data, I
observed**







Hey Jack....Your
report and
presentation style
was

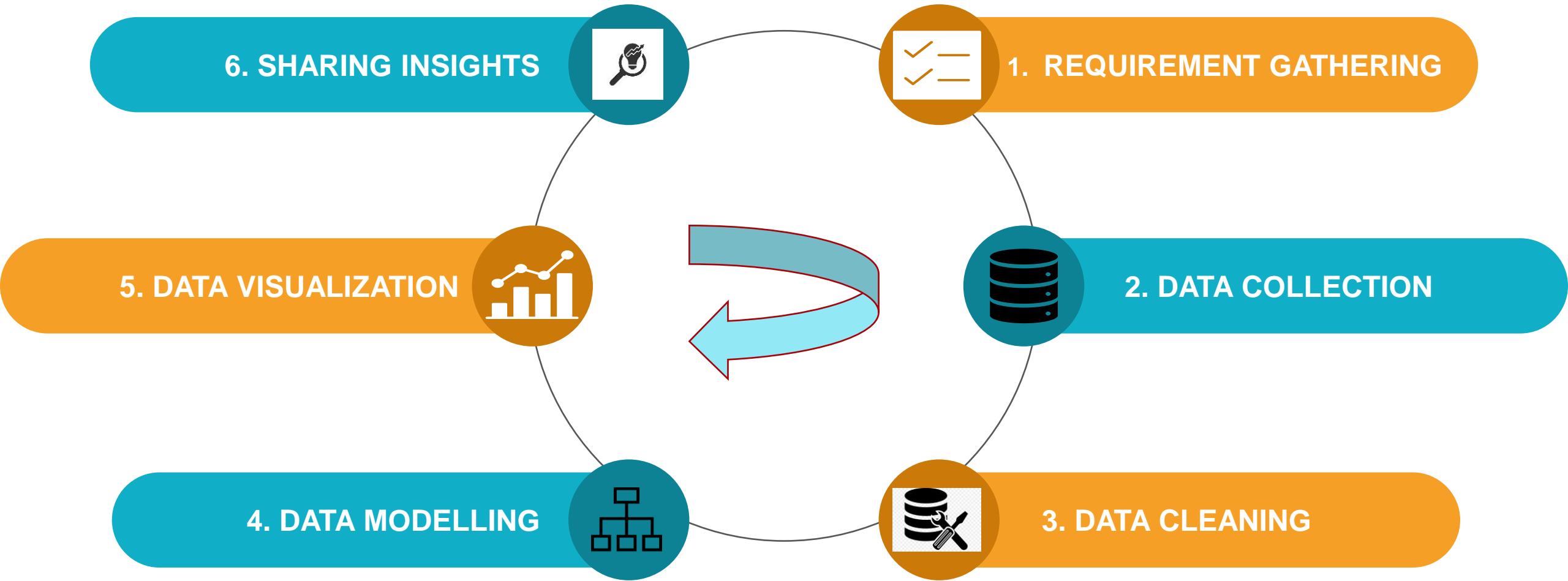
Could you please
share your efforts
with the rest of your
colleagues?

Thank you
Sir!

Sure! Sir



DEVELOPMENT STEPS





REQUIREMENT GATHERING

Assemble a sales report with different visuals to best show the sales insights in one-page dashboard.

Do the respective transformations to the Sales fact table in order to split the “location” column into “Country” and “City”.

Create a mechanism to load all the files from the sales folder in a single Sales fact table.

Create the Data Model connecting all tables and using the Calendar table .

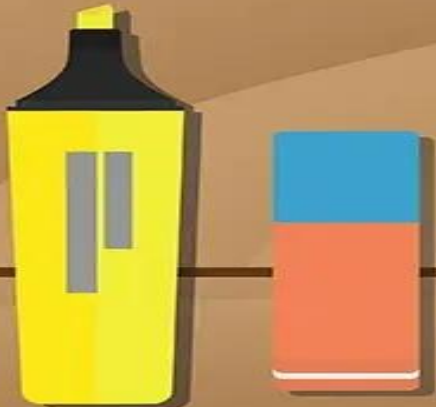
Create unique key (GeoKey) in Sales and Geography table.

Calculate **Total Revenue** in Sales table.

Calculate a measure for **AVG sales per day**.

Calculate **Total Cost, Gross Profit, Gross profit MoM growth Change%** in the Sales table.

Breakdown analysis by **Product (drop or increase)**





DATA COLLECTION

Imported data from Excel and CSV files provided by the client and loaded it into Microsoft Power BI.

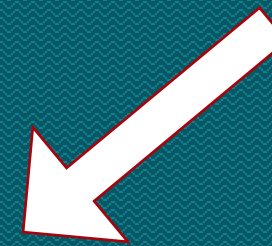
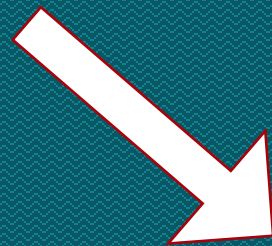


Files:

Categories.xlsx
Geography.xlsx
SalesRep.xlsx
SubCategories.xlsx

Files:

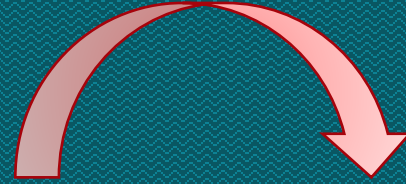
Sales2014.csv
Sales2015.csv
Sales2016.csv
Sales2017.csv
Product.csv





DATA CLEANING

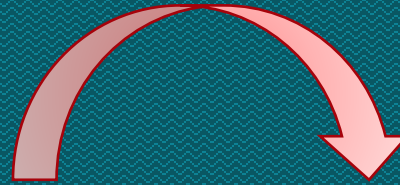
REMOVED DUPLICATES



| ProductID | Sub Category Key | Color | ProductName | RetailPrice | StandardCost |
|-----------|------------------|-----------------|-------------|-------------|--------------|
| 1 | 3 | Red | Alder | 23.95 | 7.55 |
| 2 | 2 | Blue | Linder | 23.95 | 7.55 |
| 3 | 2 | Green | Magnum | 23.95 | 7.55 |
| 4 | 1 | Red | Quad | 43.95 | 13.75 |
| 5 | 1 | Blue | Black Monk | 43.95 | 13.75 |
| 6 | 4 | Green | Quad | 43.95 | 13.75 |
| 7 | 1 | Red | Bing | 26.95 | 8.25 |
| 8 | 3 | Blue | VanHelen | 26.95 | 8.25 |
| 9 | 1 | Green | Magnum | 26.95 | 8.25 |
| 10 | 1 | Florescent Pink | Carlota | 29.95 | 9.15 |
| 11 | 4 | Florescent Blue | Carlota | 29.95 | 9.15 |
| 7 | 1 | Red | Bing | 26.95 | 8.25 |
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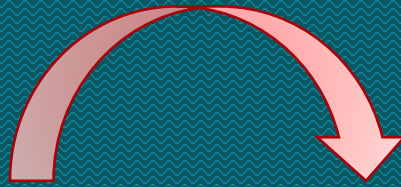
CONVERTED THE FIRST ROW INTO THE HEADER AND CORRECTED COLUMN VALUES.



| Column1 | Column2 |
|------------|----------------|
| SalesRepID | Sales Rep Name |
| ID - 6 | Jan Novotny |
| ID - 7 | John White |
| ID - 5 | Ellen Woody |
| ID - 3 | Mark Spancer |
| ID - 1 | Ellie Gill |
| ID - 2 | Bill Muray |
| ID - 4 | El Bob |

| SalesRepID | Sales Rep Name |
|------------|----------------|
| 6 | Jan Novotny |
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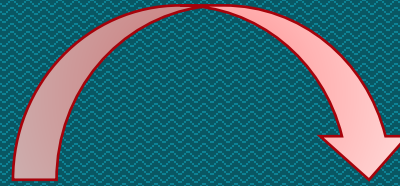
ADDED A NEW COLUMN “ GeoKey ”



















| Column1 | Column2 | Column3 |
|----------------|------------|---|
| Country | Town | Wikipedia |
| Czech republic | Prague | https://en.wikipedia.org/wiki/Prague |
| Denmark | Copenhagen | https://en.wikipedia.org/wiki/Copenhagen |
| Germany | Frankfurt | https://en.wikipedia.org/wiki/Frankfurt |
| Germany | Berlin | https://en.wikipedia.org/wiki/Berlin |
| Germany | Dresden | https://en.wikipedia.org/wiki/Dresden |
| Czech republic | Brno | https://en.wikipedia.org/wiki/Brno |
| Czech republic | Ostrava | https://en.wikipedia.org/wiki/Ostrava |

| GeoKey | Country | City | Wikipedia |
|--------|----------------|------------|---|
| 1 | Czech republic | Prague | https://en.wikipedia.org/wiki/Prague |
| 2 | Denmark | Copenhagen | https://en.wikipedia.org/wiki/Copenhagen |
| 3 | Germany | Frankfurt | https://en.wikipedia.org/wiki/Frankfurt |
| 4 | Germany | Berlin | https://en.wikipedia.org/wiki/Berlin |
| 5 | Germany | Dresden | https://en.wikipedia.org/wiki/Dresden |
| 6 | Czech republic | Brno | https://en.wikipedia.org/wiki/Brno |
| 7 | Czech republic | Ostrava | https://en.wikipedia.org/wiki/Ostrava |

MERGED ALL THE EXCEL FILES INTO A SINGLE TABLE.



- >  Categories
- >  Geography
- >  Product
- >  Sales 2014
- >  sales 2015
- >  sales 2016
- >  sales 2017
- >  Sales rep
- >  SubCategory

- >  Categories
- >  DateMaster
- >  Geography
- >  Product
- >  Sales
- >  SalesRep
- >  SubCategory



DATA MODELLING



FROM THIS..

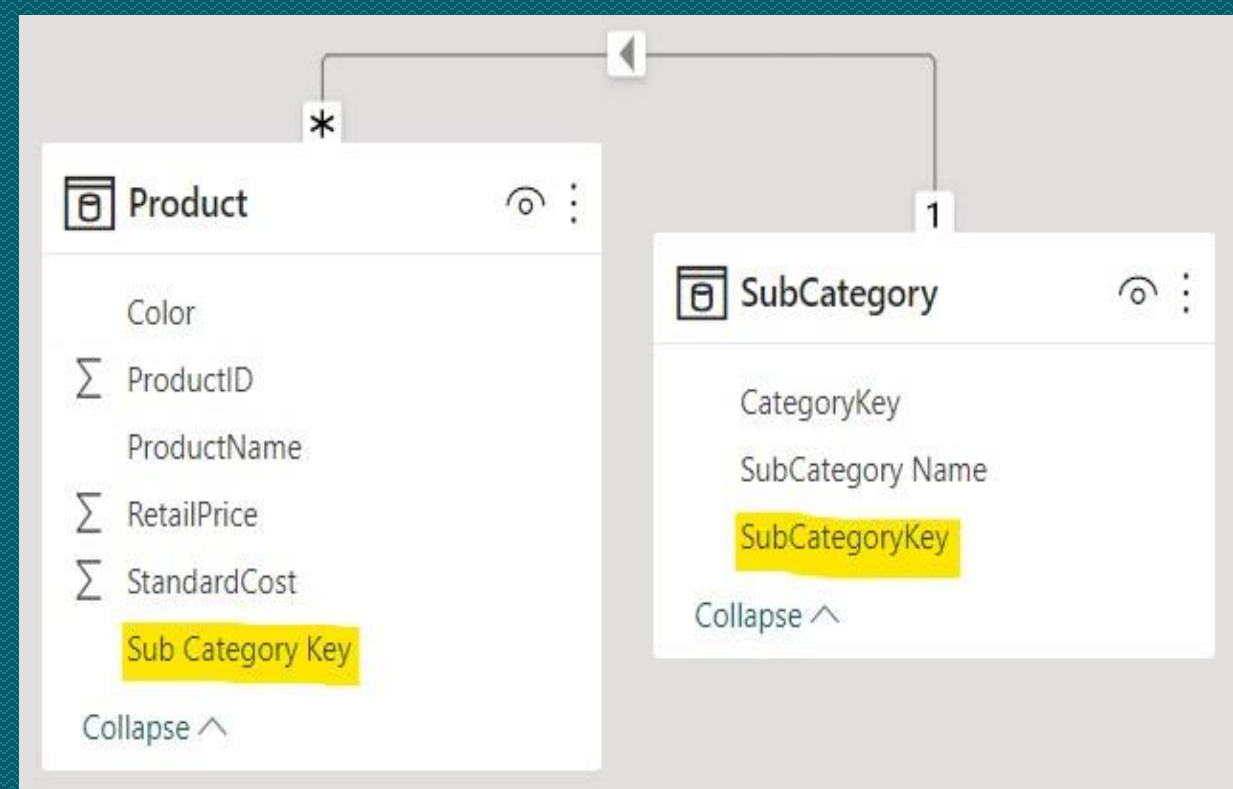
| Sales rep |
|------------|
| Column1 |
| Column2 |
| Collapse ^ |

| Geography |
|------------|
| Column1 |
| Column2 |
| Column3 |
| Collapse ^ |

| Sales 2014 |
|-----------------------|
| Date |
| fSalesPrimaryKey |
| Location |
| PercentOfStandardCost |
| ProductID |
| RevenueDiscount |
| SalesRepID |
| Units |
| Collapse ^ |

| sales 2015 |
|-----------------------|
| Date |
| fSalesPrimaryKey |
| Location |
| PercentOfStandardCost |
| ProductID |
| RevenueDiscount |
| SalesRepID |
| Units |
| Collapse ^ |

| sales 2017 |
|-----------------------|
| Date |
| fSalesPrimaryKey |
| Location |
| PercentOfStandardCost |
| ProductID |
| RevenueDiscount |
| SalesRepID |
| Units |
| Collapse ^ |

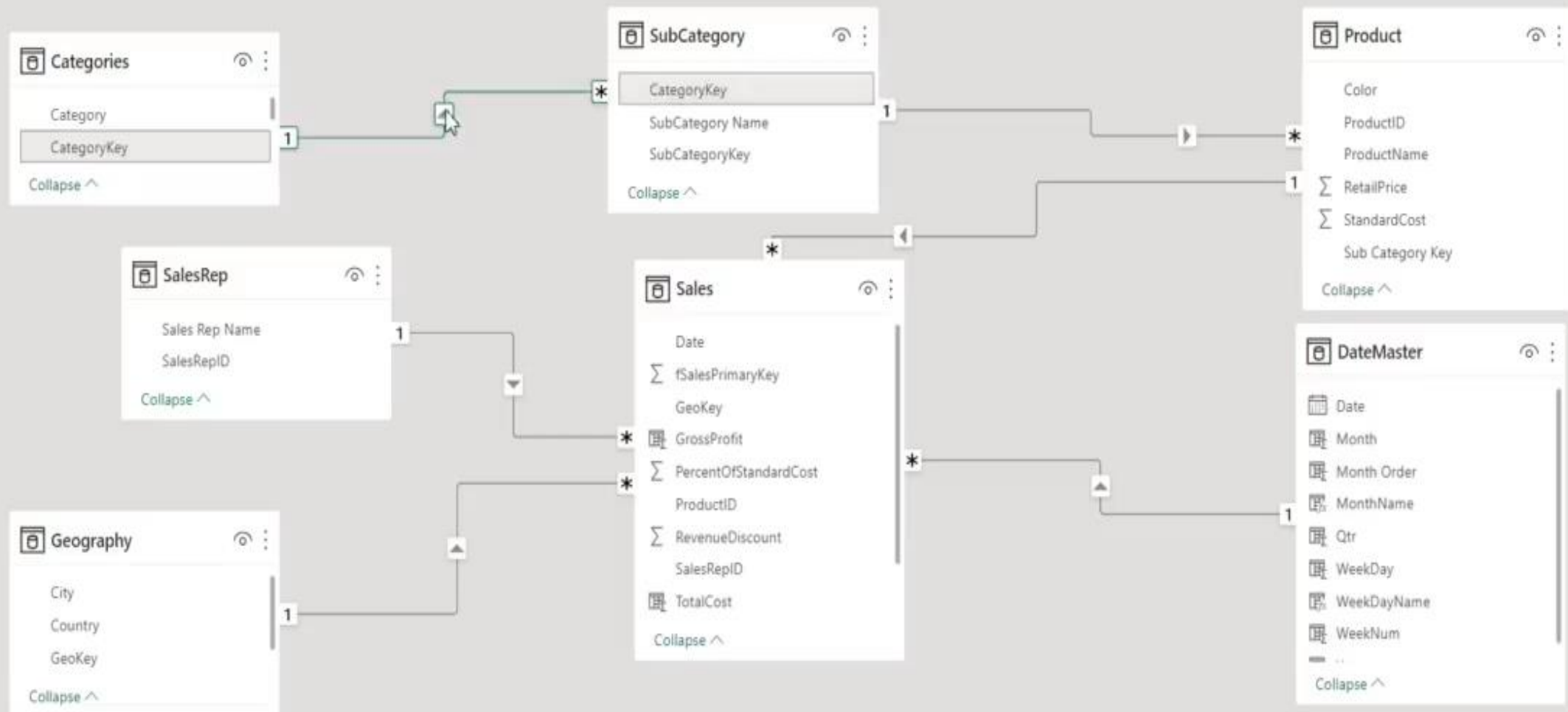


| sales 2016 |
|-----------------------|
| Date |
| fSalesPrimaryKey |
| Location |
| PercentOfStandardCost |
| ProductID |
| RevenueDiscount |
| SalesRepID |
| Units |
| Collapse ^ |

| Categories |
|-------------|
| Category |
| CategoryKey |
| Collapse ^ |



TO THIS..





DATA VISUALIZATION

File

Home

Insert

Modeling

View

Help

Format

Data / Drill

Manage relationships

Relationships

New measure

Calculations

Quick measure

Calculations

New column

Calculations

New table

Calculations

Change detection

Page refresh

New parameter

Parameters

Manage roles

Security

View as

Security

Q&A setup

Q&A

Language

Q&A

Linguistic schema

Q&A

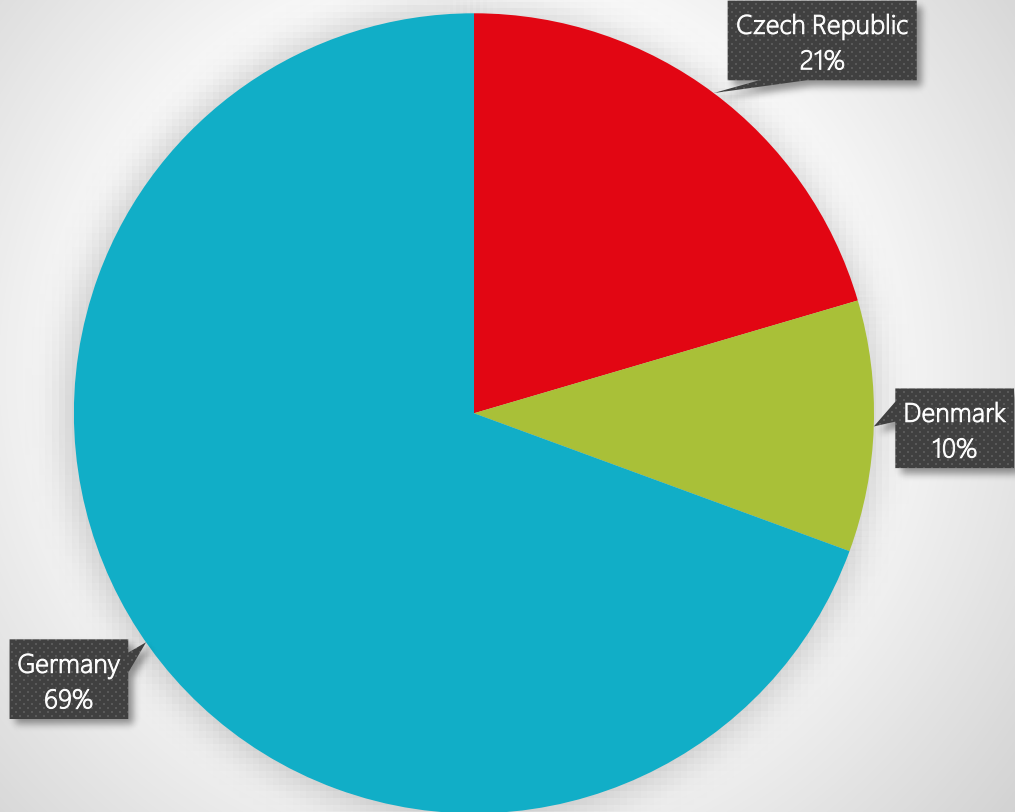




SHARING INSIGHTS

INSIGHT-1

Share of Country In Revenue Generation



Total Revenue: 126.01 M
Germany's Revenue: 87.45 M



Total Revenue: 126.01 M
Czech Republic's Revenue: 25.77 M



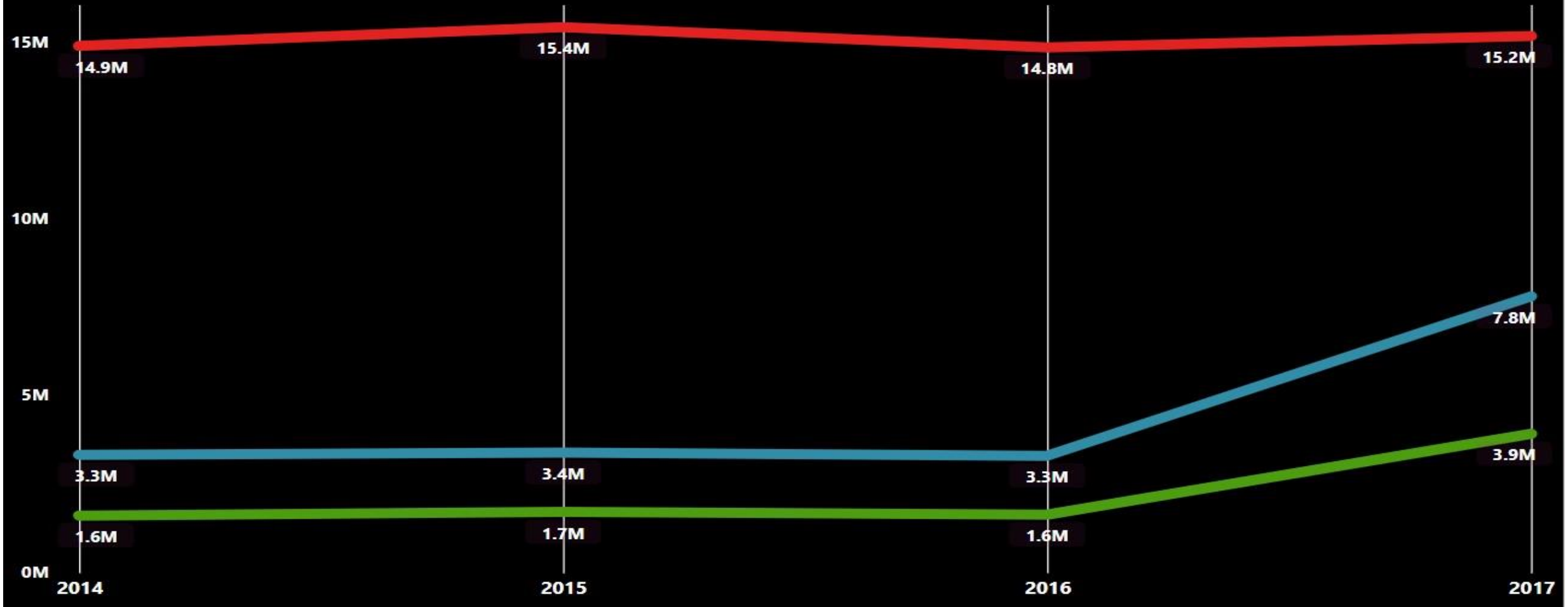
Total Revenue: 126.01 M
Denmark's Revenue: 12.79 M

Germany has the maximum contribution to revenue generation.

INSIGHT-2

GrossProfit (in millions) By Country Over The years (2014-2017)

Country ● Czech republic ● Denmark ● Germany



Germany

The revenue has been almost consistent during all the 4 years.

Czech Republic

A sharp increase in Revenue after 2016.

3.3M -> 7.8M

Denmark

A sharp increase in Profit after 2016.

1.6M -> 3.9 M

INSIGHT-3

AWARD FOR OUTSTANDING CONTRIBUTION

*Ellen Woody From
Germany*

should be awarded as the

“BEST SALES REPRESENTATIVE”

for making the highest profit of

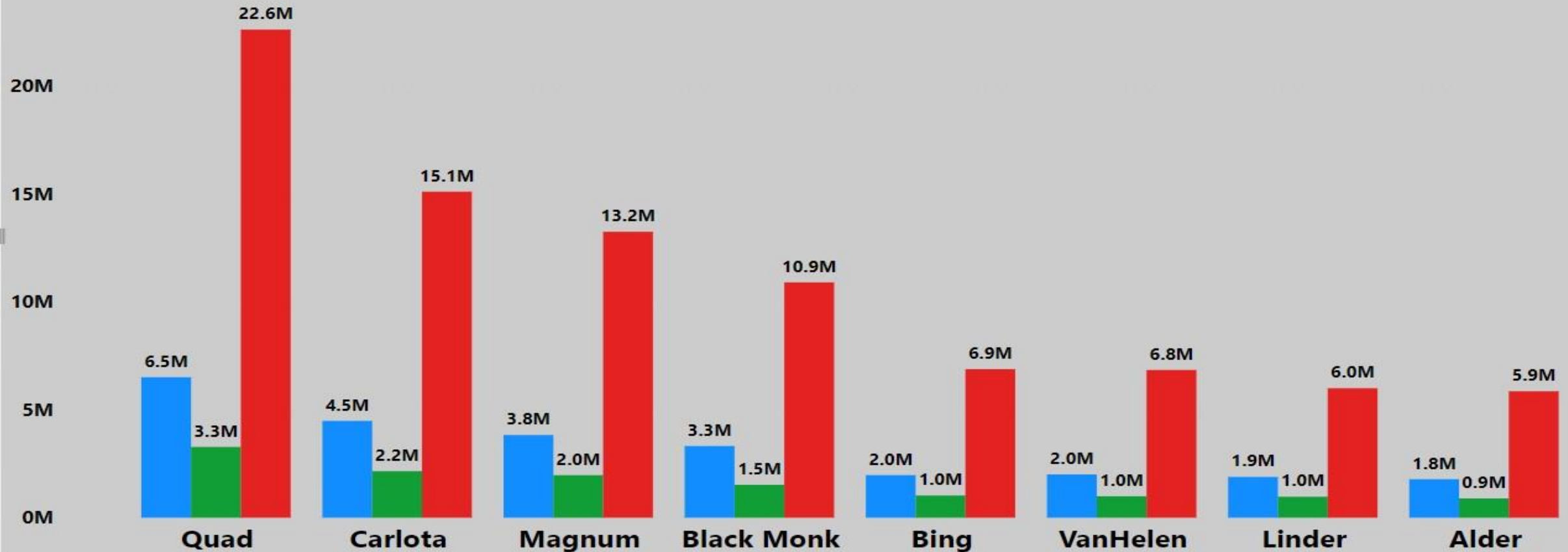
23683452 .00.



INSIGHT-4

Total Revenue by Product Name and Country

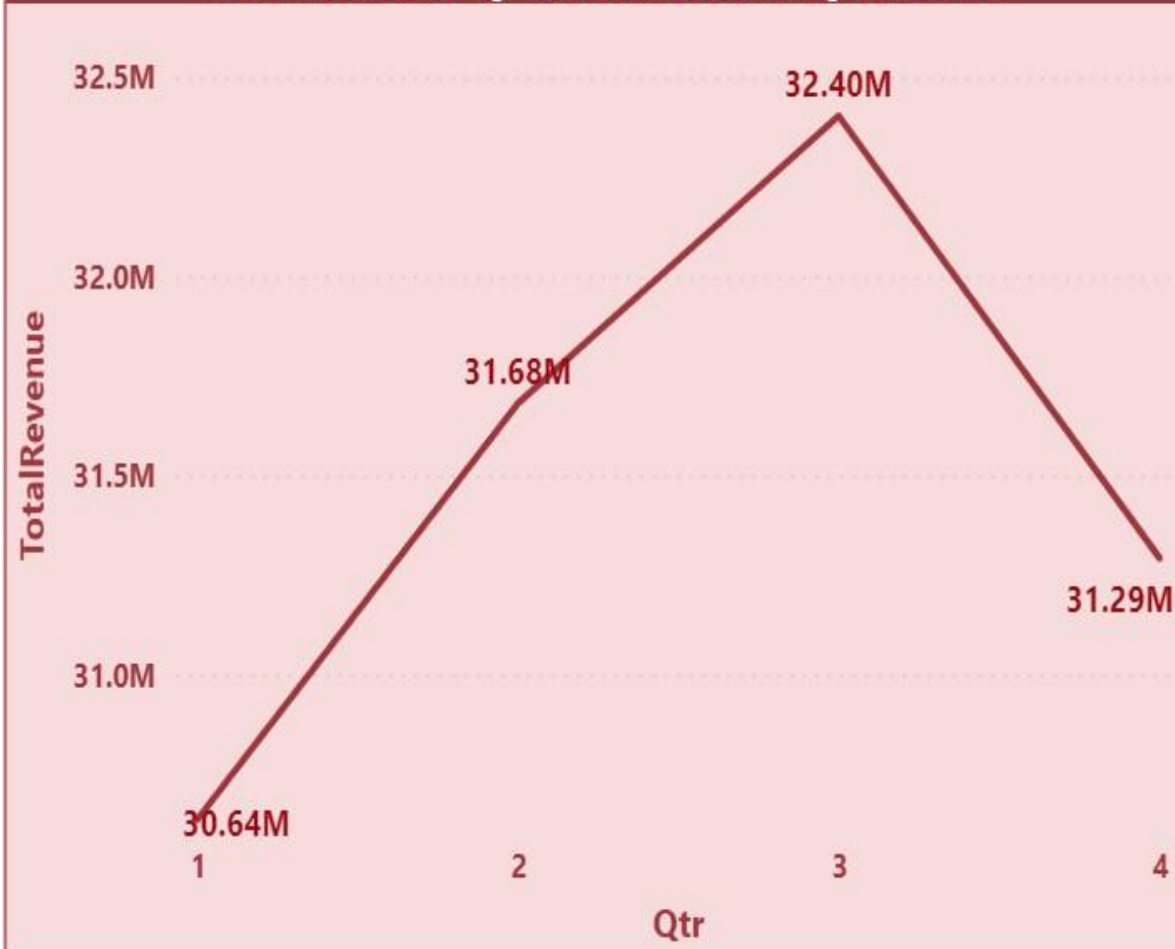
Country ● Czech republic ● Denmark ● Germany



Top 3 Products **Quad, Carlota, and Magnum** should be produced in more Quantities as they have contributed the maximum to the revenue generation in all the countries (Germany, Denmark & Czech Republic)

INSIGHT-5

Total Revenue by Qtr and Quarterly Growth



Maximum revenue has been generated in the 3rd Quarter and the **minimum revenue** has been generated in the 1st quarter.

Gross Profit by Month and Monthly Growth



The month of **July** earned the **maximum profit** followed by **June** and **August**. **Feb** has earned the minimum profit.



Thank You

An Effort By: JASLEEN KAUR