4. Business Question and Visualization Report

Date	04 Oct 2025
Team ID	XXXXXX
Project Name	Analysis and Visualization of Global
	Food Production Data (1961–2023)
Maximum Marks	5 Marks

Visualization development refers to the process of creating graphical representations of data to facilitate understanding, analysis, and decision-making. The goal is to transform complex datasets into visual formats that are easy to interpret, enabling users to gain insights and make informed decisions. Visualization development involves selecting appropriate visual elements, designing layouts, and using interactive features to enhance the user experience. This process is commonly associated with data visualization tools and platforms, and it plays a crucial role in business intelligence, analytics, and reporting

4.1. Business Questions and Visualisation

The process involves defining specific business questions to guide the creation of meaningful and actionable visualizations in Power BI. Well-framed questions help in identifying key metrics, selecting relevant data, and building visualisation that provide insights.

1. What is the total global rice production from 1961 to 2023?

- Visualization: KPI Card displaying total rice production (269 billion tonnes).
- Screenshot:

269bn

Sum of Rice Production (tonnes)

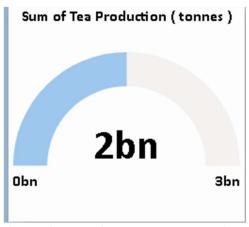
2. What is the total global wheat production from 1961 to 2023?

- Visualization: KPI Card displaying total wheat production (282 billion tonnes).
- Screenshot:

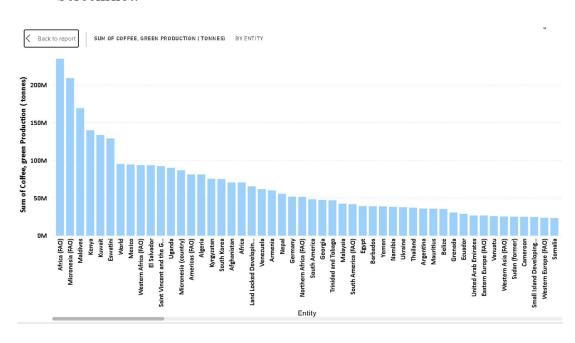
282bn

Sum of Wheat Production (tonnes)

- 3. What is the total global tea production compared to other crops?
 - Visualization: Gauge Chart showing tea production (2 billion tonnes).
 - Screenshot:

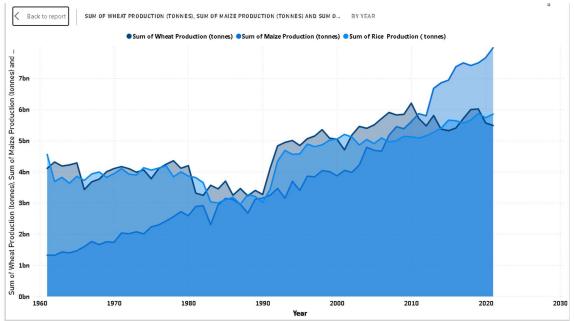


- 4. Which regions are the leading producers of green coffee?
 - Visualization: Line Chart showing coffee (green) production trends across regions (Africa, Asia, America).
 - Screenshot:



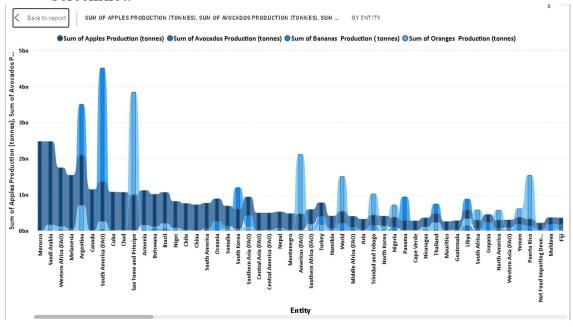
5. How have wheat, maize, and rice production trends evolved annually from 1961 to 2023?

- Visualization: Area Chart showing annual production trends of wheat, maize, and rice.
- Screenshot:



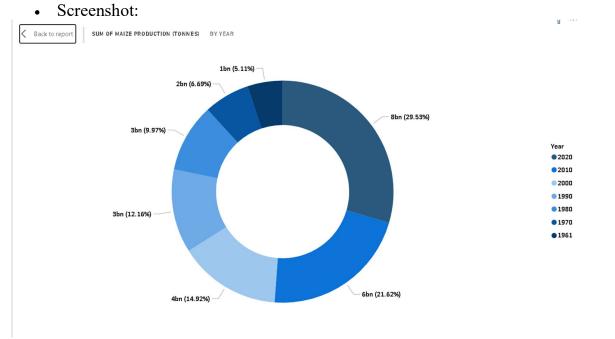
6. What is the regional production distribution of apples, avocados, bananas, and oranges?

- Visualization: Ribbon Chart showing fruit production volumes by entity/region.
- Screenshot:



7. How has maize production grown year by year?

• Visualization: Donut Chart showing annual maize production distribution.



8. Which fruits dominate global production overall?

• Visualization: Funnel Chart comparing total production of grapes (43B tonnes), apples (39B tonnes), bananas (32B tonnes), and oranges (26B tonnes).

