

Project Development Phase
Model Performance Test

Date	13 March 2025
Team ID	PNT2025TMID02575
Project Name	Global Food Production Trends and Analysis A Comprehensive Study from 1961 to 2023 Using Power BI
Maximum Marks	4

Model Performance Testing:

Project team shall fill the following information in model performance testing template.

S.No.	Parameter	Screenshot / Values
1.	Data Rendered	No. Of Rows – 11912 No. Of Columns - 25
2.	Data Preprocessing	Fixed column name gaps, Converted numerical columns to Whole Number, Adjusted outliers
3.	Utilization of Data Filters	Year Slicer, Country Slicer

4.	DAX Queries Used	<p>Country Rank = RANKX(ALL('world_food_production_cleaned'[Entity]), [Total Production], DESC, DENSE)</p> <p>Production Share % = DIVIDE([Total Production], CALCULATE([Total Production], ALL('world_food_production_cleaned'[Entity])), 0) * 100</p> <p>Top Crop = VAR CropList = { "Apples Production (tonnes)", "Bananas Production (tonnes)", "Rice Production (tonnes)", "Wheat Production (tonnes)" } VAR MaxCrop = MAXX(</p>
----	------------------	--

		<pre> ADDCOLUMNS(SUMMARIZE('world_food_production_cleaned', 'world_food_production_cleaned'[Entity]), "Production", VAR CropValues = { SUM('world_food_production_cleaned'[Apples Production (tonnes)]), SUM('world_food_production_cleaned'[Bananas Production (tonnes)]), SUM('world_food_production_cleaned'[Rice Production (tonnes)]), SUM('world_food_production_cleaned'[Wheat Production (tonnes)]) } RETURN MAXX(CropValues, [Value])), [Production]) RETURN MaxCrop Total Production = SUM('world_food_production_cleaned'[Apples Production (tonnes)]) + SUM('world_food_production_cleaned'[Avocados Production (tonnes)]) + SUM('world_food_production_cleaned'[Bananas Production (tonnes)]) + SUM('world_food_production_cleaned'[Cocoa beans Production (tonnes)]) + SUM('world_food_production_cleaned'[Coffee, green Production (tonnes)]) + SUM('world_food_production_cleaned'[Grapes Production (tonnes)]) + SUM('world_food_production_cleaned'[Maize Production (tonnes)]) + SUM('world_food_production_cleaned'[Meat, chicken Production (tonnes)]) + SUM('world_food_production_cleaned'[Oranges Production (tonnes)]) + SUM('world_food_production_cleaned'[Palm oil Production (tonnes)]) + SUM('world_food_production_cleaned'[Peas, dry Production (tonnes)]) + </pre>
--	--	---

		<div>SUM('world_food_production_cleaned'[Potatoes Production (tonnes)]) + SUM('world_food_production_cleaned'[Rice Production (tonnes)]) +</div>
--	--	---

		SUM('world_food_production_cleaned'[Rye Production (tonnes)]) + SUM('world_food_production_cleaned'[Soybeans Production (tonnes)]) + SUM('world_food_production_cleaned'[Sugar cane Production (tonnes)]) + SUM('world_food_production_cleaned'[Sunflower seed Production (tonnes)]) + SUM('world_food_production_cleaned'[Sweet potatoes Production (tonnes)]) + SUM('world_food_production_cleaned'[Tea Production (tonnes)]) + SUM('world_food_production_cleaned'[Tomatoes Production (tonnes)]) + SUM('world_food_production_cleaned'[Wheat Production (tonnes)]) + SUM('world_food_production_cleaned'[Yams Production (tonnes)]))
5.	Dashboard design	No of Visualizations -8 (1) Slicer (2) Card (3) Gauge Chart (4) Bar Chart (5) Area Chart (6) Ribbon Chart (7) Donut Chart (8) Text box
6	Report Design	No of Visualizations – 7 (1) Slicer (2) Card (3) Pie Chart (4) Donut Chart (5) Table (6) Line Chart (7) Text box

