# Project Development Phase SPRINT-4

Team ID	PNT2022TMID52976
Project Name	Project – Estimate the Crop Yield using Data Analytics

#### **Creation of Story**

#### **Story Link:**

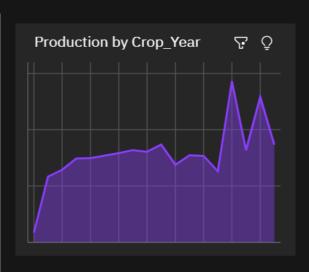
https://us1.ca.analytics.ibm.com/bi/?perspective=story&pathRef=.my\_folders%2 FCROP%2BPRODUCTION%2BIBM%2BPROJECT%2FStory%2FSTORY\_C ROP%2BYIELD&action=view&sceneId=model0000018485dcec7a\_00000000&sc eneTime=5000

# ESTIMATE THE CROP YIELD USING DATA ANALYTICS

#### Seasons with Average Production Production by Season colored by Ō The production levels Season during the Winter is the Season highest being 71,826.42 Kharif Rabi Autumn tonnes per hectare Summer ● Whole Year ○ Winter • It is the least during the Summer which is only 11,522.38 tonnes per hectare • Overall, throughout the year a good production level of above 2 million is observed

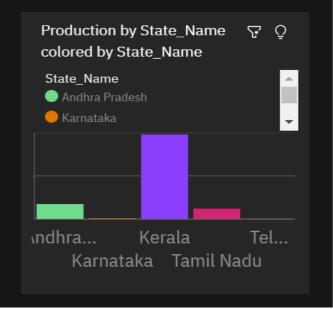
# Production by Crop\_Year

- In 1997, the production was very less having a value of only around 800 million tonnes per hectare
- From 1998 to 2010, there is a stable average production level of 6 to 7 billion tonnes per hectare
- During the years 2011 and 2013, there has been a considerable spike in the production of 14



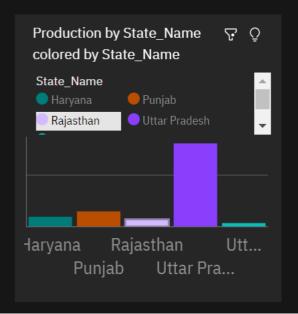
## Southern Zone Production

- In the south, Kerala has the highest production level of over 97 billion tonnes/hectare
- Telangana and Karnataka show the lowest production levels.



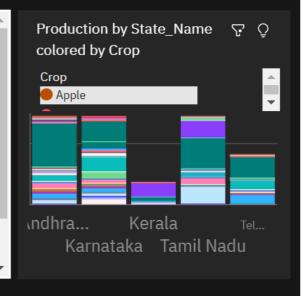
## Northern zone Production

- This shows the crop production in the North
- Uttar Pradesh shows the maximum production level of over 3 billion tonnes/hectare
- Uttarakhand, however has the least which is only around 132 million tonnes/hectare



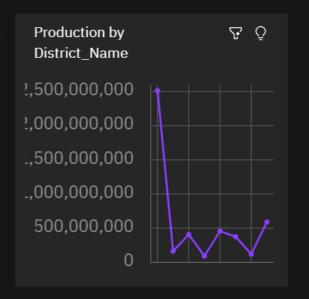
### Production of each crop in the Southern Zone

- This shows how much of different types of crops grow in the South
- **Rice** is the most common crop in the Southern Region
- Various other crops such as jackfruit, banana, etc. are



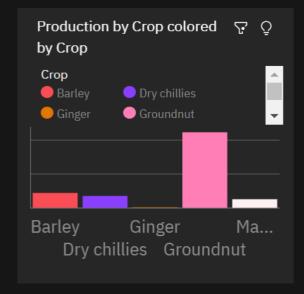
#### Production in each Tamil Nadu Districts

- This chart talks about Production in various districts of Tamil Nadu alone.
- Coimbatore has the maximum production level of over 2 billion tonnes/hectare
- The rest of the districts are more or less stable in terms of production, Kanchipuram having the least



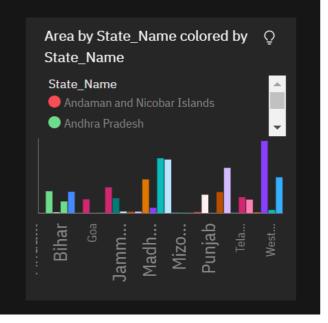
## **Production vs Crop**

- Here we see the production of different crops across India
- Groundnut is grown the most having a production level of over III million tonnes/hectare
- Ginger on the other hand, has only about 821,000 tonnes/hectare



## Area vs State

- This shows us the crop area covered by various states
- Uttar Pradesh stand first with a crop area of 433 million sq. hectare
- Few other States that hold large areas include Madhya Pradesh,
   Maharashtra and Rajasthan



### Area and Production in certain Districts

- This graph is about the crop production and area covered by various districts of India.
- Here, Anantapur in Andhra
   Pradesh holds the largest crop
   area of 18 million hectares and
   produces 81 million
   tonnes/hectare of crop
- Deoghar in Jharkhand, has covers the least area (360,000 hectares) and production (480,00 tonnes/hectare)

