

Manipal School of Information Sciences, Manipal
Second Semester Master of Engineering – ME (Cloud Computing)

First internal test – April 2022

Subject: CDC 5253 – Data Streaming and Visualization Lab

Wednesday April 27, 2022

Time: 2.00 PM – 4.00 PM

Maximum Marks: 30

Use Weather Data in India from 1901 to 2017.csv as input file

Answer all questions

1. Add column average temperature for each year
2. Add row average temperature of each month
3. Add columns Min and Max for each year with corresponding values
4. Create dataframe called 'decade', storing average temperatures of each month in the respective decade. Decade 1910 is from 1901 to 1910.
5. Which year is the hottest year? (Based on avg temp)
6. Which year is the coldest year? (Based on avg temp)
7. Find out which years recorded minimum and maximum temperatures. (Not based on avg temp)
8. How much raise is observed in min and max temperature for each month?