First of all, you will generate the data considering the country is bangladesh.

Give all the weather information based on bangladesh's perspective.

You have to generate almost 3000 rows/data, containing data of almost 3-4 years.

The column information is given below.

# Time-

1) Date

2) Month

3) Season

# Ground Station Information

1) Station (Gazipur or Betbunia)

2) Latitude (For Gazipur, 23.9993. For Betbunia, 22.5475)

3) Longitude (For Gazipur, 90.3846. For Betbunia, 91.9963)

4) Band (C-band or Ku-band)

5) Antenna Gain [dB] (for C-band, 54.4. For Ku-band, 61.2)

6) Uplink Frequency [GHz] (for C-band, 4.5-4.8 GHz. For Ku-band, 10.7-12.5 GHz)

7) Elevation (For Gazipur, 49.715. For Betbunia, 47.415)

8) Path Length [km] (It is always 35786 km)

9) Transmitter Power [kW] (For C-band 2200, and for Ku-band 1250)

10) Polarization Type (Horizontal or Vertical)

# Satellite Information

1) Polarization Match (Horizontal or Vertical) (Same as “Polarization Type” Column)

2) Beam Type (Wide or Narrow)

3) Power Settings [kW] (It is always 8.09kW)

4) Satellite Antenna Gain [dB] (For C-band, 111.2. For Ku-band, 125.4)

5) Transmission Mode (always Continuous)

6) Latitude (always 0)

7) Longitude (always 119.1, because it Bangabandhu-1 Satellite)

# Weather Information

1) Rain Rate [mm/hour] (on that day. Put the values considering the season and months of Bangladesh)

2) Surface Temperature [°C] (Put the values considering the season and months of Bangladesh)

3) Total (Barometric) Surface Pressure [hPa] (Put the values considering the season and months of Bangladesh)

4) Humidity Level [in %] (Put the values considering the season and months of Bangladesh)

5) Cloud Thickness [km] (Put the values considering the season and months of Bangladesh)

6) Liquid Water Density in Clouds/Fog [g/m3] (Put the values considering the season and months of Bangladesh)

7) Liquid Water Temperature in Clouds/For [°C] (Put the values considering the Lapse Rate from Earth Surface to Cloud-bottom-height. Temperature degrades by almost 0.6-0.9 °C/km)

# Attenuation Information

1) Atmospheric Attenuation [dB] (usually it is less than 1dB)

2) Rain Attenuation [dB] (if Rain Rate is high, then Rain Attenuation also increases. For C-band, the range is usually 0-5dB. But for Ku-band, the range can go up to 20dB for heavy rainfall)

3) Cloud Attenuation [dB] (For C-band, it can vary from 0.01-0.3dB. And for Ku-band, it can vary up to 2dB)

4) Free Space Path Loss [dB] (for C-band, it varies from 196.58 to 197.14 dB. For Ku-band, it varies from 204.102 to 205.45 dB. Depending on the uplink frequency)

5) Total Attenuation [dB] (This is the summation of Rain Attenuation, Cloud Attenuation and Free Space Path Loss)