Exploring Weather Trends Project

- **Extract the data**
  3 queries have been ran:

  select * from city_list
  I found Riyadh then I ran the queries below:

  select * from city_data where city = 'Riyadh'
  select * from global_data

- **Open up the CSV**
  CSV file has been opened by using Excel

- **Create a line chart**
  Temperatures comparison has been made between Riyadh temperatures and Global temperatures.
- Plot the *moving average* which calculates a **moving average** of temperatures for 5 years by AVERGE (5 cells) which means (year1+year2+year3+year4+year5/5)
- The graph below visualizes comparison between Riyadh and global temperatures from 1750 to 2002. The X axis represents years and the Y axis represents temperatures average. Blue line represents moving average for global temperatures. Red line represents moving average for Riyadh temperatures.

- **Graph analysis:**

- 1970: A low point of Riyadh temperature (coolest day) and steady cold temperature in Global.

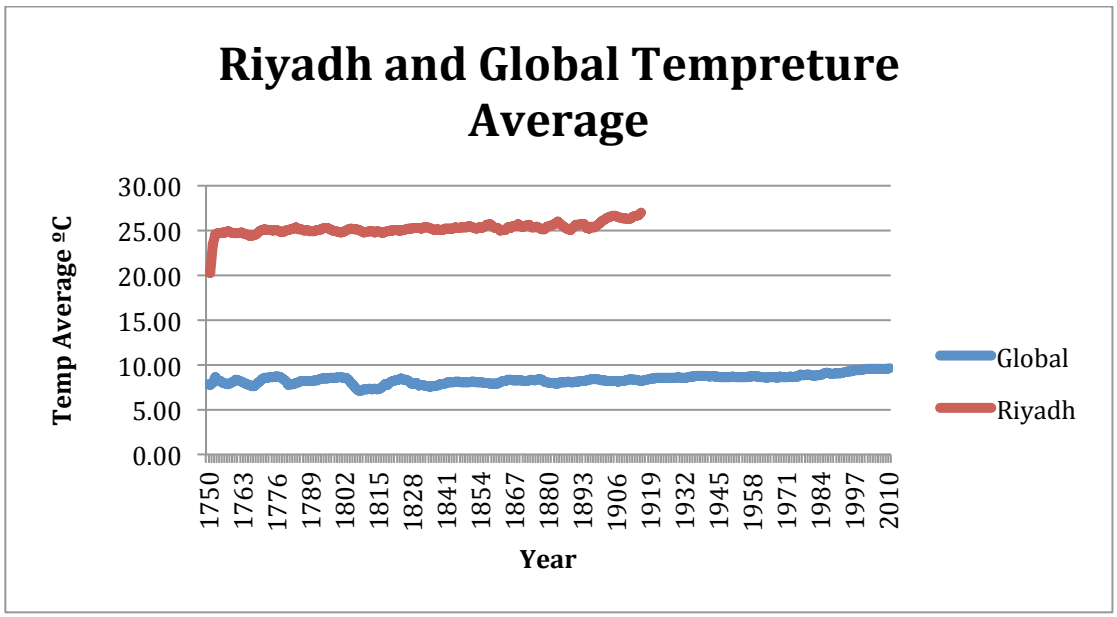
- 1804: A low point of global temperature (coolest day) and steady hot temperature in Riyadh.

- 1912: A peak of Riyadh temperature (hottest day) and steady cold temperature in Global.

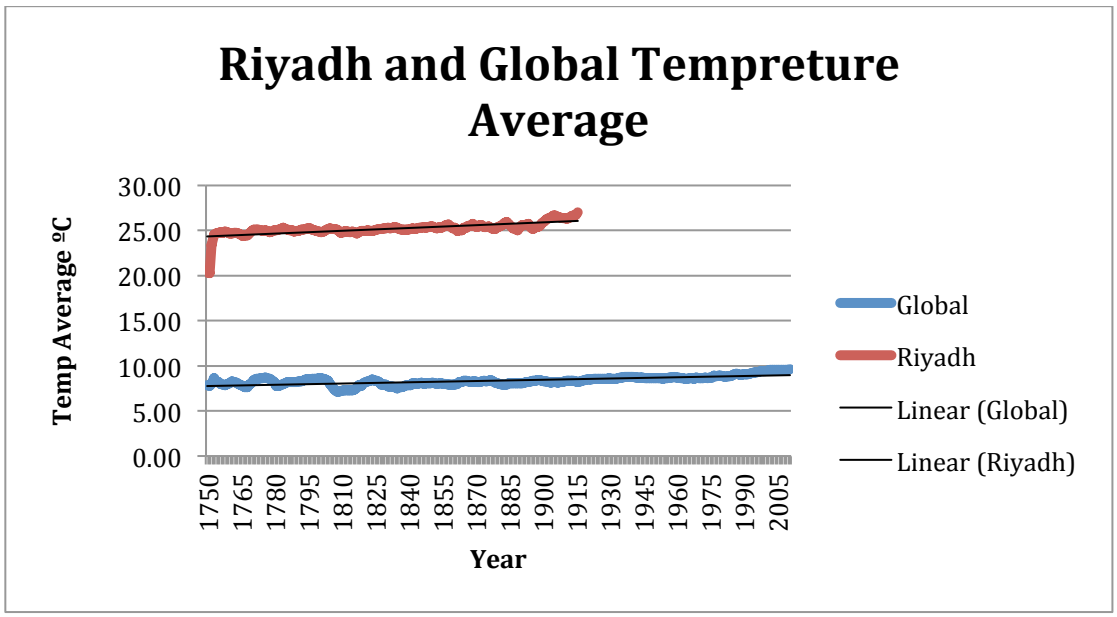
- 2002: A peak of Global temperature (hottest day)

  Define Trends by showing temperatures change over time:

  In graph below from 1901 to 2002 they raise steadily, which means getting increase in hot temperatures in both (Riyadh and global). This can be considered as a similarity. As a difference, when the temperatures are hotter in Riyadh it will be cooler in global. So Riyadh city is hotter than the world. Trends has been consistent over the last few hundred years.


Riyadh and Global Tempreture Average
Temp Average ºC
30.00
25.00
20.00
15.00
10.00
5.00
0.00
1750
1763
1776
1789
1802
1815
1828
1841
1854
1867
1880
1893
1906
1919
1932
1945
1958
1971
1984
1997
2010
Year
Global
Riyadh

Trendline:


Riyadh and Global Tempreture Average
Temp Average ºC
30.00
25.00
20.00
15.00
10.00
5.00
0.00
1750
1765
1780
1795
1810
1825
1840
1855
1870
1885
1900
1915
1930
1945
1960
1975
1990
2005
Year
Global
Riyadh
Linear (Global)
Linear (Riyadh)