

# “Report on Explore Weather Trends Project”

## Outline

Excel tool is used for (1) Opening the CSV file (2) Creating a line chart

### Query used:

```
select year, avg_temp from city_data where year >=1850 and city = 'Riyadh'
```

```
select year, avg_temp from global_data where year >=1850
```

## Line chart

The average used in the representation of Figure 1 is the moving average and it is calculated with the function (`=AVRAGE(B2,B6)`) a five years range , As you can see in Figure 2.

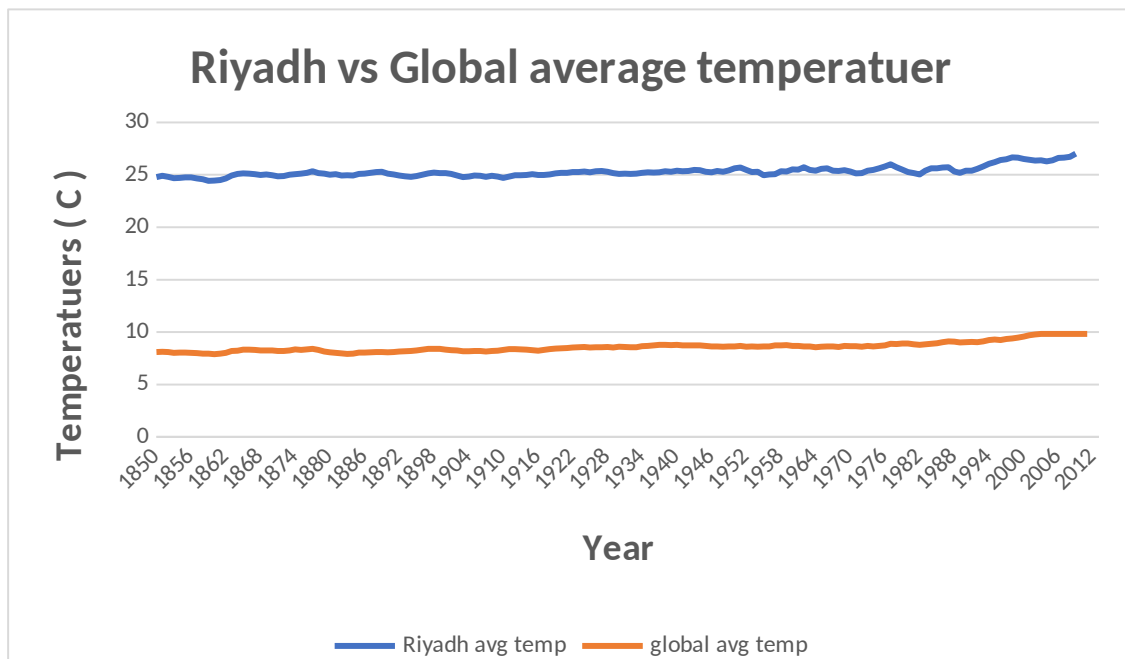


Figure 1: Line Chart

	A	B	C	D	E	F	G	H	I
1	year	avg_temp	Riyadh avg temp			year	avg_temp	global avg temp	
2	1850	24.34				1850	7.9		
3	1851	25.03				1851	8.18		
4	1852	24.85				1852	8.1		
5	1853	24.93				1853	8.04		
6	1854	24.72	24.774			1854	8.21	8.086	
7	1855	24.92	24.89			1855	8.11	8.128	
8	1856	24.57	24.798			1856	8	8.092	
9	1857	24.26	24.68			1857	7.76	8.024	
10	1858	25.01	24.696			1858	8.1	8.036	
11	1859	24.95	24.742			1859	8.25	8.044	
12	1860	24.94	24.746			1860	7.96	8.014	
13	1861	24.13	24.658			1861	7.85	7.984	
14	1862	23.77	24.56			1862	7.56	7.944	
15	1863	24.28	24.414			1863	8.11	7.946	
16	1864	25.03	24.43			1864	7.98	7.892	
17	1865	25.23	24.488			1865	8.18	7.936	
18	1866	24.92	24.646			1866	8.29	8.024	
19	1867	25.22	24.936			1867	8.44	8.2	
20	1868	25	25.08			1868	8.25	8.228	
21	1869	25.3	25.134			1869	8.43	8.318	
22	1870	25.02	25.092			1870	8.2	8.322	
23	1871	24.73	25.054			1871	8.12	8.288	
24	1872	24.87	24.984			1872	8.19	8.238	
25	1873	25.24	25.032			1873	8.35	8.258	
26	1874	24.98	24.968			1874	8.43	8.258	
27	1875	24.43	24.85			1875	7.86	8.19	
28	1876	24.89	24.882			1876	8.08	8.182	
29	1877	25.47	25.002			1877	8.54	8.252	
30	1878	25.51	25.056			1878	8.83	8.348	
31	1879	25.24	25.108			1879	8.17	8.296	
32	1880	24.8	25.182			1880	8.12	8.348	
33	1881	25.63	25.33			1881	8.27	8.386	
34	1882	24.66	25.168			1882	8.13	8.304	
35	1883	25.19	25.104			1883	7.98	8.134	
36	1884	24.8	25.016			1884	7.77	8.054	
37	1885	24.98	25.052			1885	7.92	8.014	
38	1886	24.98	24.922			1886	7.95	7.95	
39	1887	24.81	24.952			1887	7.91	7.906	

Figure 2: Data In Excel

## Observations

- (1) Riyadh city is hotter comparing to the average global temperature.
- (2) The difference of temperatures over years between Riyadh and the global temperature is nearly consist.
- (3) Comparing the change of temperatures between Riyadh and the global, it looks like Riyadh is increasing more in the last years (2004-2006)

- (4) From the overall trends of the global average temperatures, it appears that the world is getting hotter, even with the changes of trends (going up and down) when I observe the overall pictures the world dose gets hotter.