Weather Trends Analysis

First, to extract the data from the database, I used this SQL query below.

Global data:

SELECT *

FROM global_data;

City nearest to me:

SELECT *

FROM city_data
WHERE city = 'Campinas';

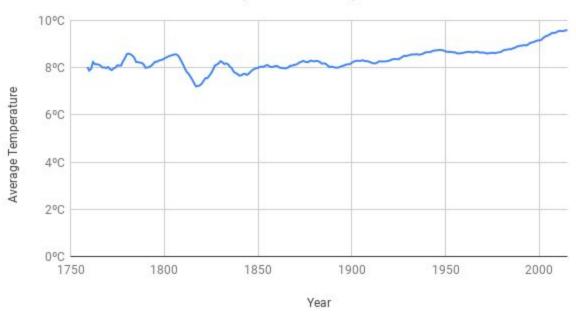
After this, I used the Google Sheets to read the CSV file, to calculate the moving average and to create a line chart.

The moving average was calculated with a space of 10 years, below is the function used in the Google Sheets.

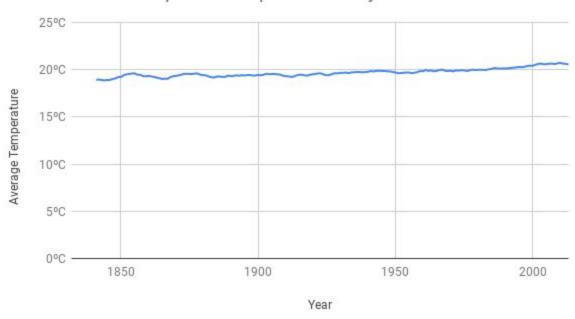
fx	=AVERAGE(B2:B11)		
	А	В	С
1	year	avg_temp	10-years MA
2	1750	8.72	
3	1751	7.98	
4	1752	5.78	
5	1753	8.39	
6	1754	8.47	
7	1755	8.36	
8	1756	8.85	
9	1757	9.02	
10	1758	6.74	C11
11	1759	7.9	=AVERAGE(B2:B11)
12	1760	7.19	7.877

After calculated and created the line chart.





Campinas Temperature 10-years MA



In Campinas, my city, compared to the global moving average, is well above or is warmer, it can be noticed in the overall graph that the average temperature is at 10, in my city, it is around 20.

Between 1800 and 1850 it seems that my city did not follow the global temperature low, but with the lack of data in this range it is not possible to draw conclusions about this, however, in the following years, the city average followed the global temperature rise.

The general tendency is increasing the temperature of the planet, including in my city, it is possible to see following this tendency, and it seems to be a continuous elevation.

It is possible to note that in the range of 100 years between 1900 and 2000, it is the period in which the temperature rise begins to be more apparent.