

# Data Analyst Nanodegree Program

## First Project

### Outline:

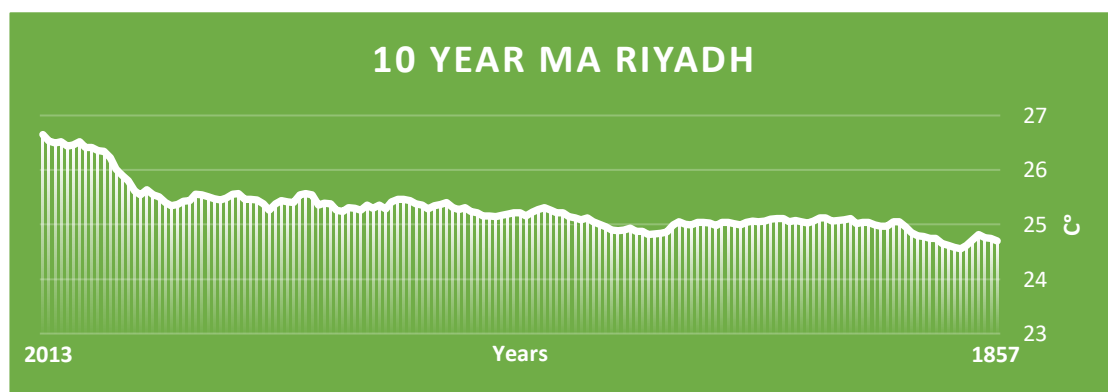
First I used SQL queries to :

- 1- extract all cities to see if my city exists " SELECT \* FROM city\_list ".
- 2- extract average global temperatures by year " SELECT \* FROM global\_data ".
- 3- extract average temperatures for Riyadh city by year  
" SELECT \* FROM city\_data WHERE city='Riyadh' ".

Second I used Microsoft office excel to :

- 1-I imported the data from the text/CSV file to the excel.
- 2- I calculated a ten years moving average using the "AVERAGE()" function.
- 3- then I created two line charts (10 year MA Global,10 year MA Riyadh).

### line charts:



**Observations:**

- Riyadh's temperature on average ( $25.21^{\circ}\text{C}$ ) is hotter than the Global temperature on average ( $8.53^{\circ}\text{C}$ ). and the difference has been consistent over time (the difference has been always about  $17^{\circ}\text{C}$ ).
- The global temperature has been getting hotter.
- Also Riyadh's temperature has been getting hotter.
- Riyadh's temperature has been increasing as well as the global temperature , both of them has been almost increasing in the same way.
- The increase in Riyadh's temperature over the period from 1992 till 2013 has been higher than the global temperature over the same period (Riyadh's temperature increased  $3.41^{\circ}\text{C}$  and the global temperature increased  $0.77^{\circ}\text{C}$ ).