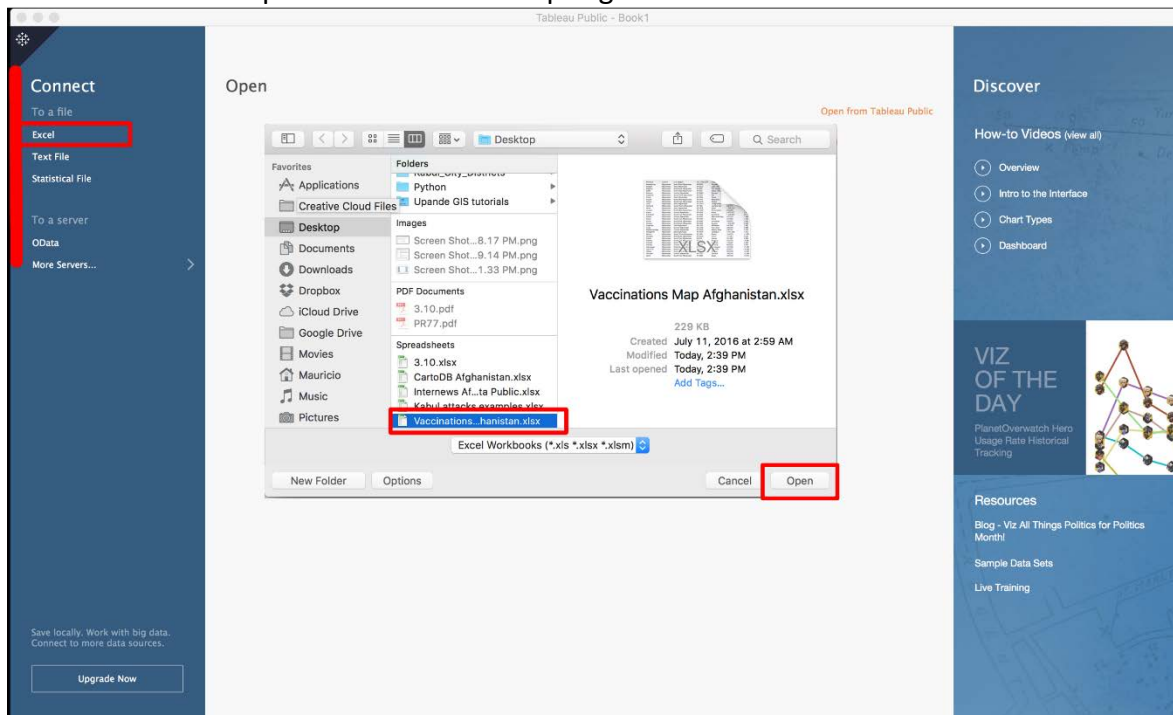Tableau Public

1. Open an account
   a. Go to [Tableau Public](#) and signup a new account, provide all information
2. Download and Install Tableau Public
   a. Go to [Tableau Public downloads](#)
3. Connect a document
   a. Tableau Public can connect to three different filetypes: Excel files, text files and, statistical files in addition server providers.
   b. Click on Excel and open "Vaccinations Map Afghanistan.xlsx" file.

   c. Tableau Public displays the data available in the document. In case an Excel file has more than one sheet select it in the left panel. Tableau Public can also pull data from two sheets from a single document. Click on Go to Worksheet.

d. Name the worksheet *Map* by right clicking on Sheet 1 – Rename Sheet and change it.


MAKING A MAP

4. First of all, maps need geolocation data, whether it is a point map or a filled map. The good news is most map programs have data to identify the location data in the Excel file, but sometimes there are some geo-location issues.
5. In the left panel there are two main panels Dimensions and Measures. Basically, dimensions have no numeric data while measures have numeric data.
6. When the Excel document has map-location data like country and province, Tableau Public generates data columns named Latitude and Longitude from the data provided in the Excel file
7. Also the is an important panel called Show Me located in the upper-right corner. It provides information about the kind of visualization available and what measure or dimension is necessary to create these visualization. For example, fill maps need 1 geo dimension, 0 or more dimensions and 0 to 2 measures.
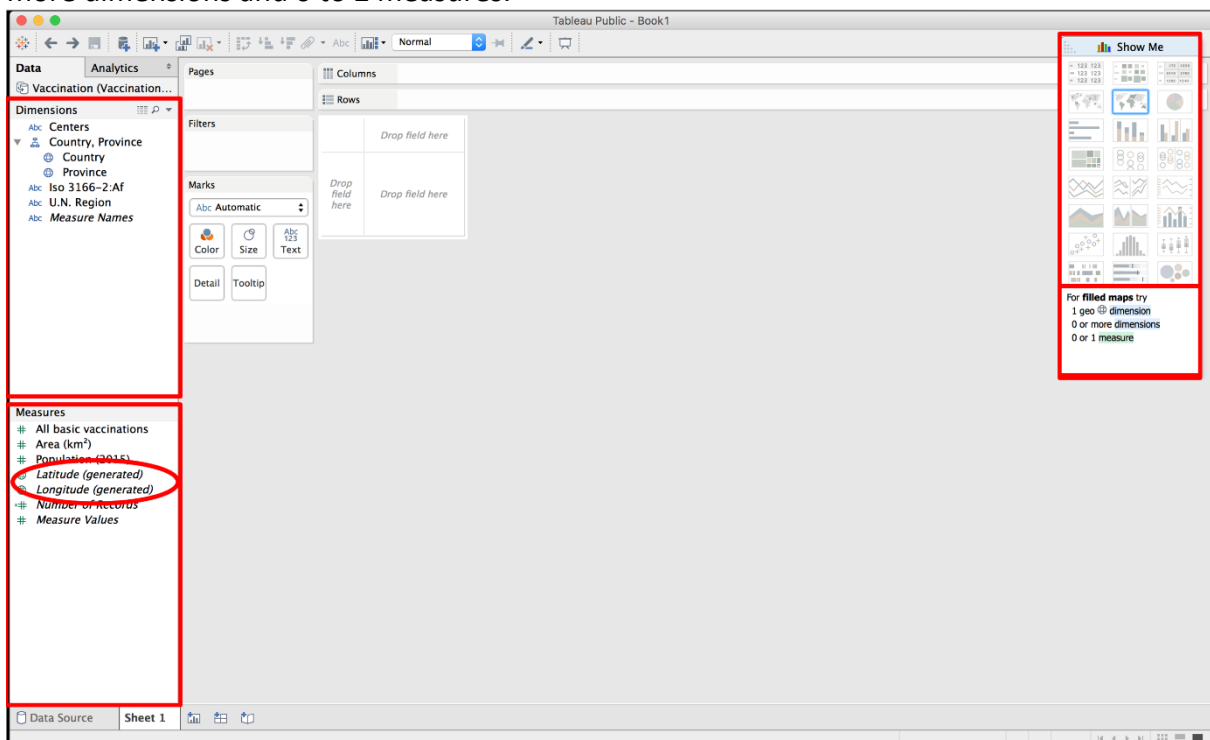

8. Click twice on Country and Province in the Dimensions panel, Tableau Public automatically makes a map and locates the country and provinces on it. But, if it auto-selects point map, to change it go to the Show Me panel and click on filled maps.
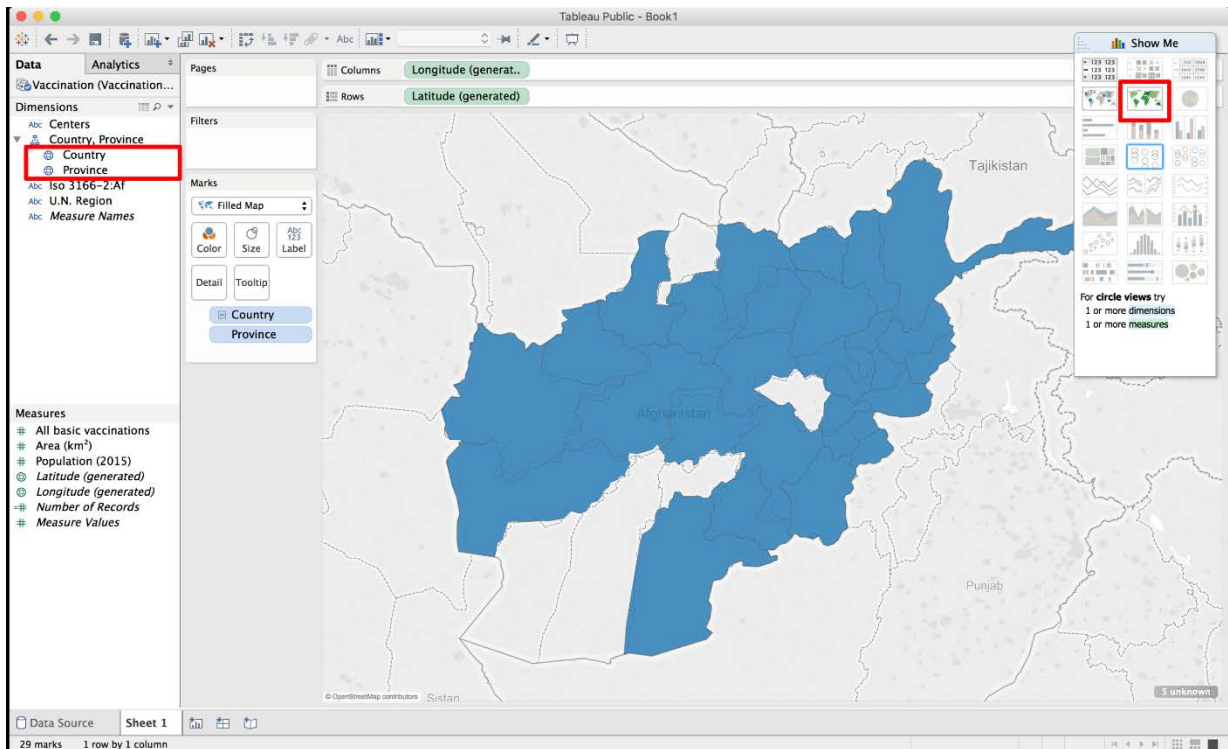
9. It is **VERY IMPORTANT** to save the document as you work on it, because Tableau Public is an internet-based connected program any change or work before be it has been saved will be lost. To save it:
   a. Go to file – save to Tableau Public, provide email and password used in the open account step.
   b. Named the Workbook
   c. Click on save
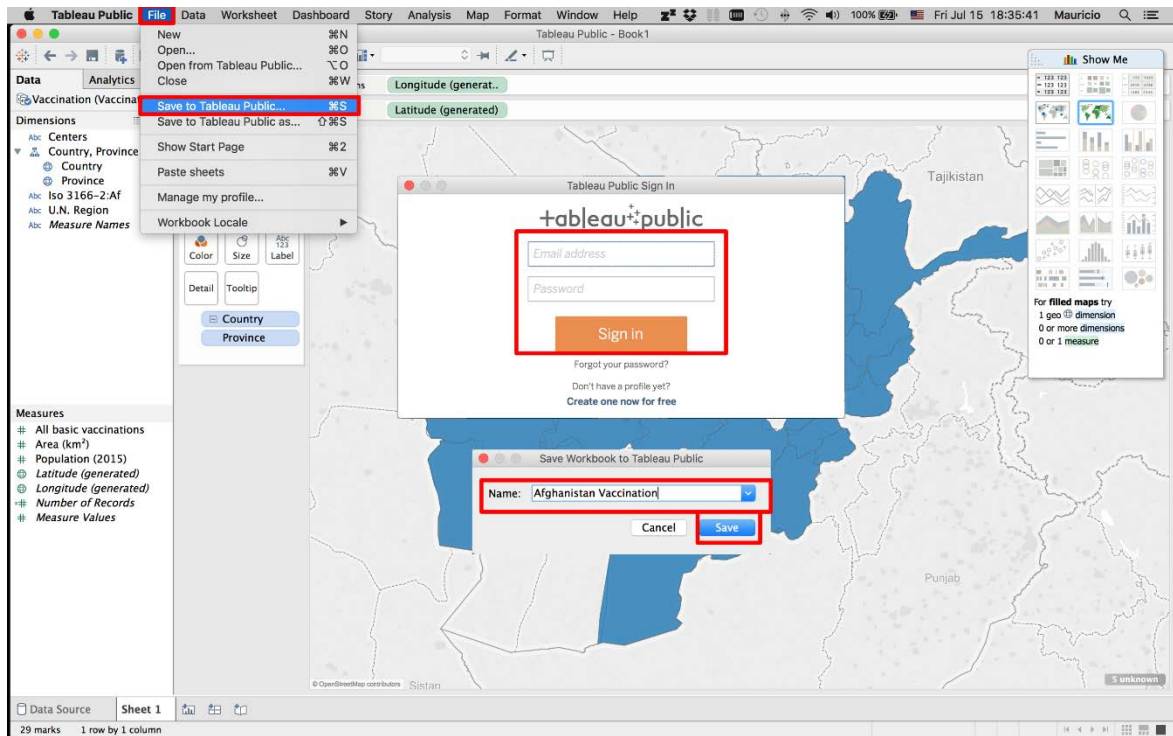
d. Tableau Public will open a tab with the user account and the workbook you just saved in the default browser.
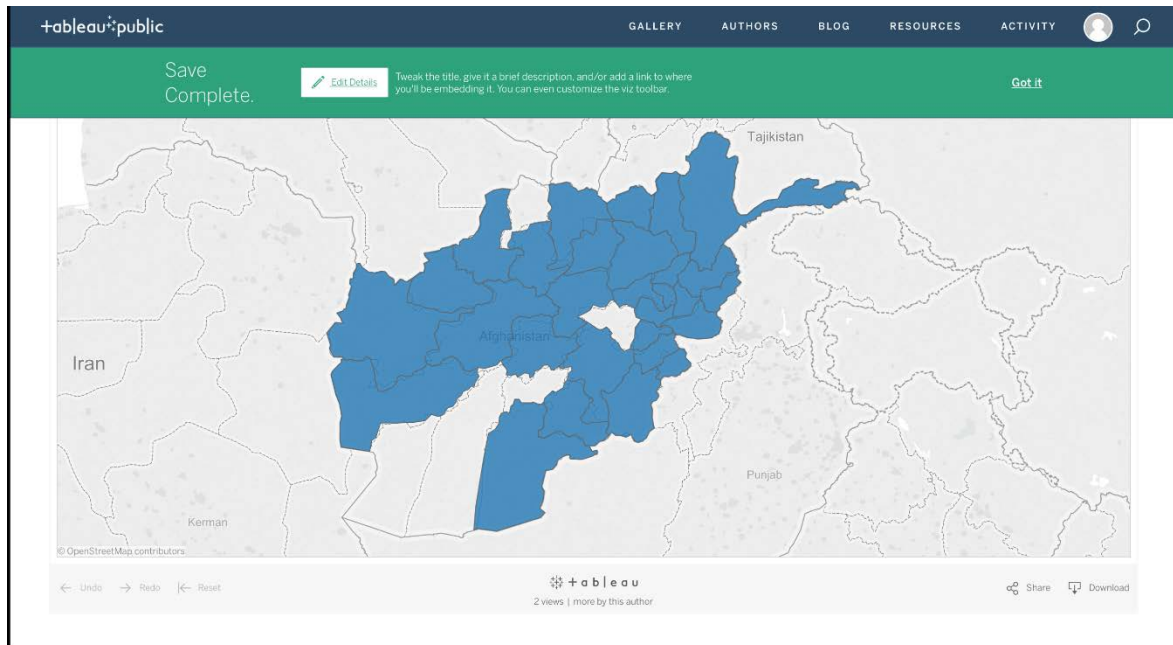

10. Now we have a filled map to work on. But there are 5 unknown locations. To fix them:
   a. Click on the 5 unknown rectangle on the lower-right.
   b. In the new window click on Edit location
   c. The new window shows the **Unrecognized** locations

d. The issue here is Afghanistan has different spelling for its provinces and Tableau Public maybe recognize some. Click on Unrecognized from Helmand and change it for Hilmand. Enter the following changes:
   i. Change Helmand to Hilmand
   ii. Change Jowzjan to Jawzjan
   iii. Change Maidan Wardak to Wardak
   iv. Change Nimruz to Nimroz
   v. Change Urozgan to Uruzgan
e. Click on OK
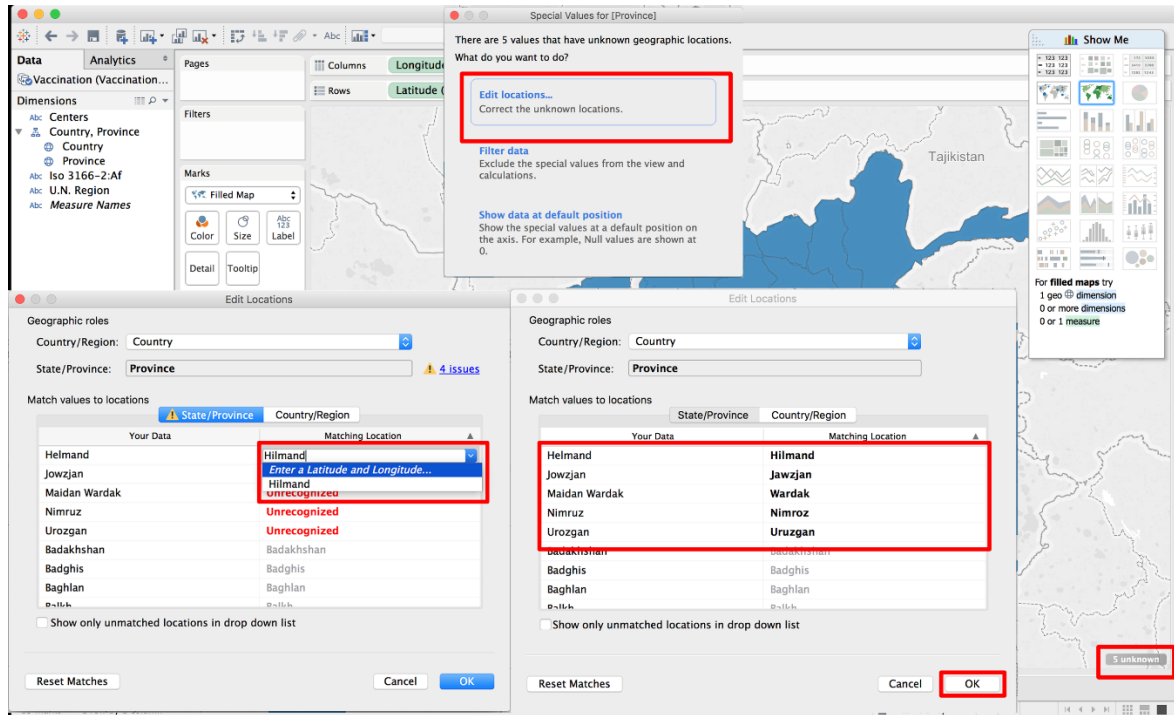
11. Now we have a map with provinces in Afghanistan. To make a choropleth map with the data about vaccination in the provinces:
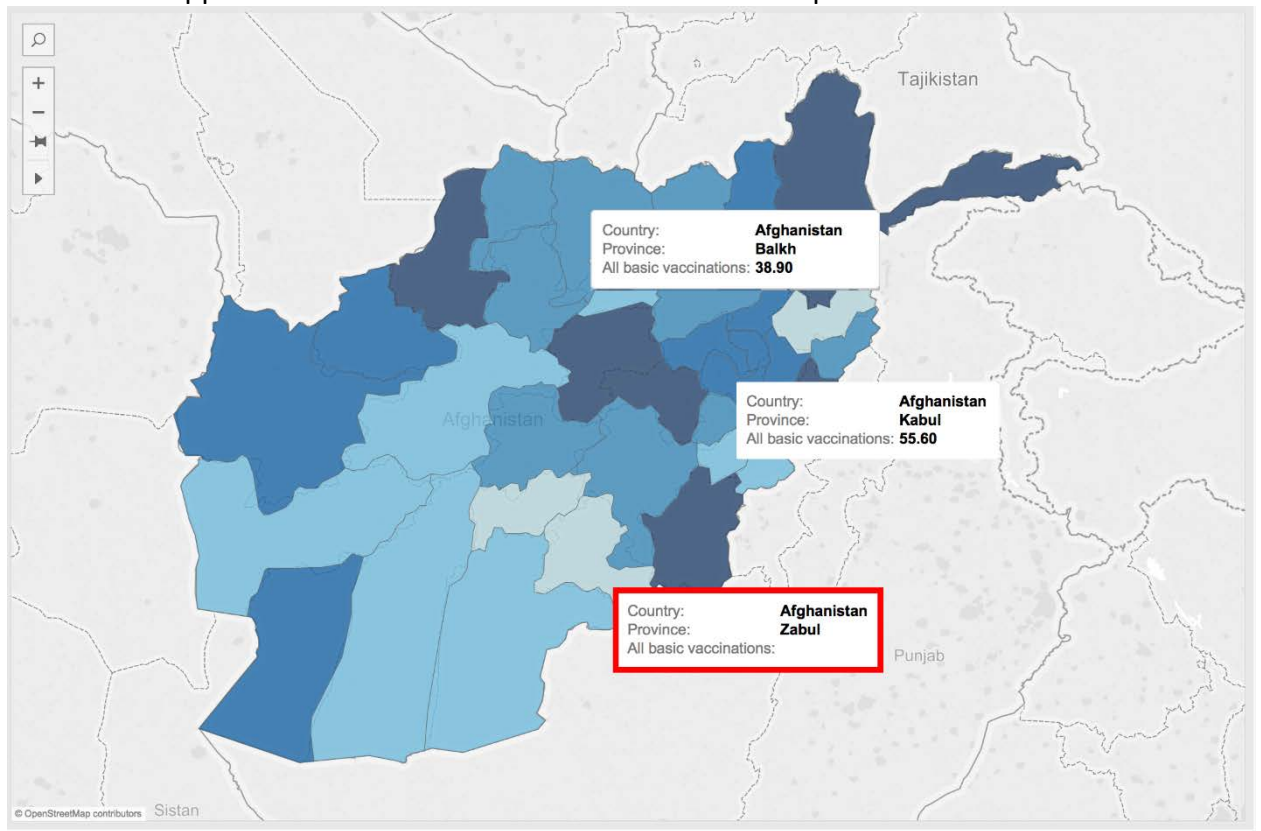   a. Click and drag *all basic vaccinations* from measures to Color in the Marks panel
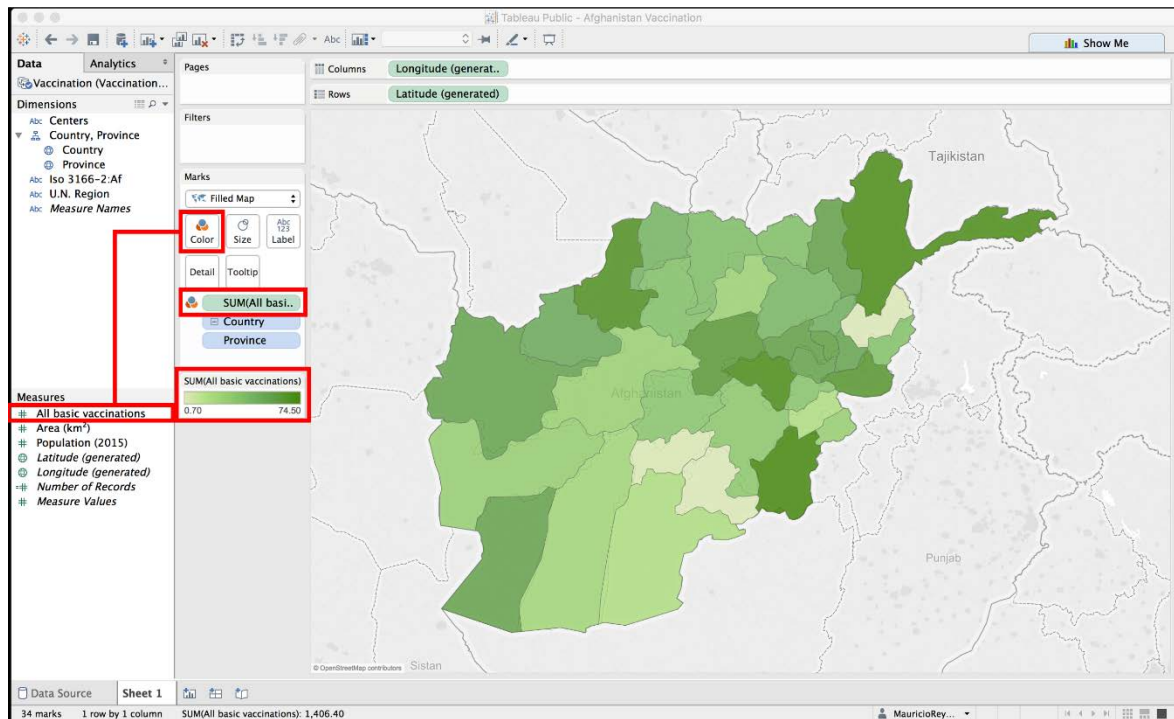
b. In Marks panel there is a new component it mean *all basic vaccination* was add in the color configuration.

c. Also there is a new panel called SUM(All basic vaccination) configuration for the new panel is going to make here.
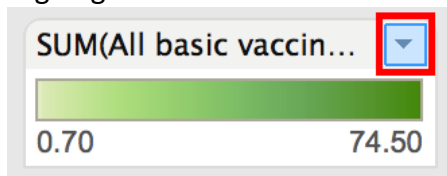

d. By click on the arrow upper-right side in the SUM(All basic vaccination) panel go to Edit Colors, change color by click on palette function (blue as example), and check Step Color check box, then OK
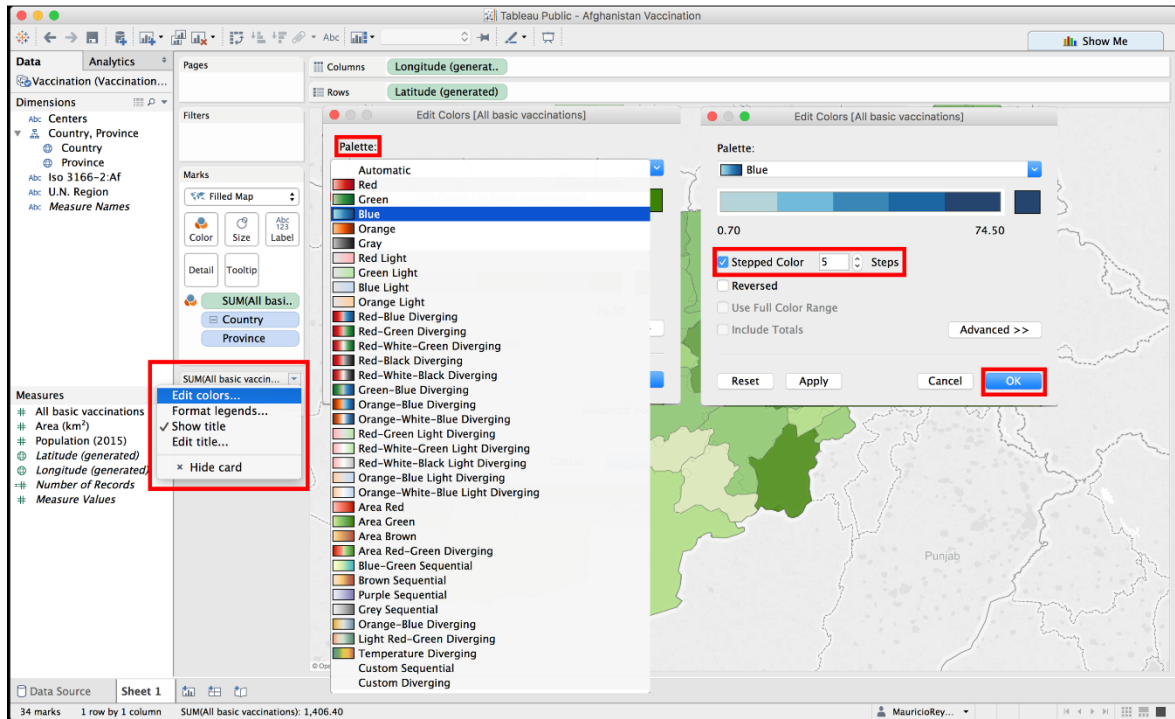
e. Now we have a choropleth map with the all basic vaccination rate data with color intensity determined by the percentage of children who have been vaccinated. Also an automatic infowindow appears with data as the cursor moves over each province.

f. But Zabul province is missing data for all vaccination rates and instead of appearing in white, it displays in the same color as Urozgan, which does have data. To fix this:
   i.   Click and drag *all basic vaccination* into the Filter panel
   ii. Click on all values in the new window then next>
   iii. Go to Special tab and click on Non-null values option
   iv. Click on OK
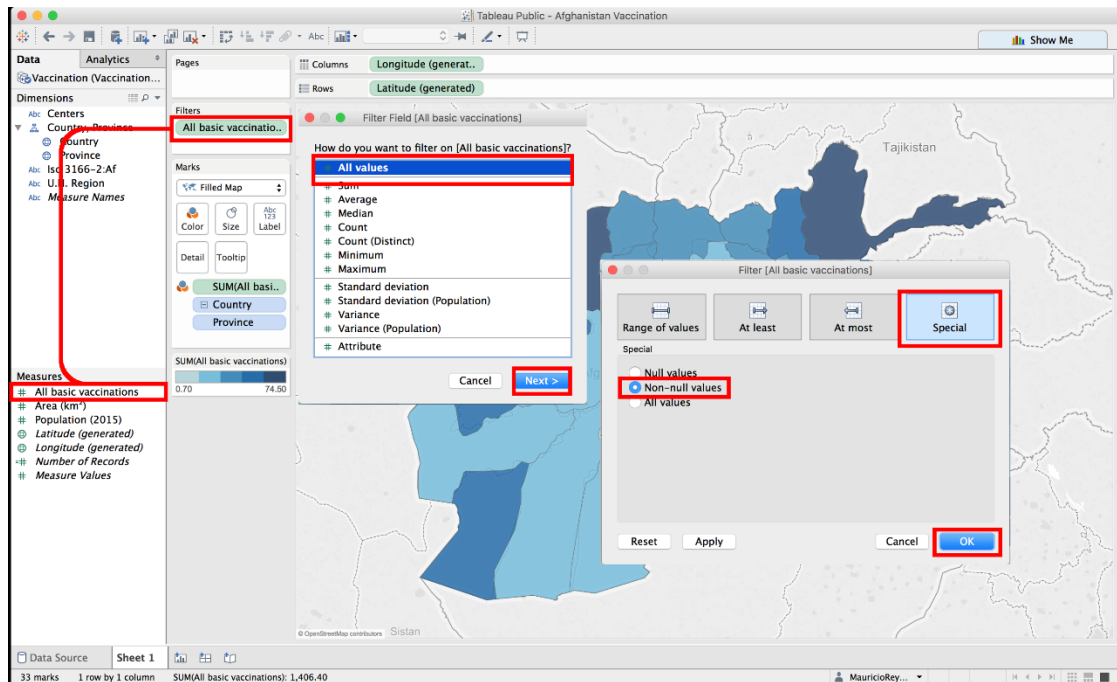
g. Now Zabul province has no color.

MAKING A DASHBOARD

12.   The dashboard is a sheet to organize all the worksheet (map, charts or tables) in one publish sheet. It is a way to organize Tableau visualizations. In the bottom- left click on New Dashboard
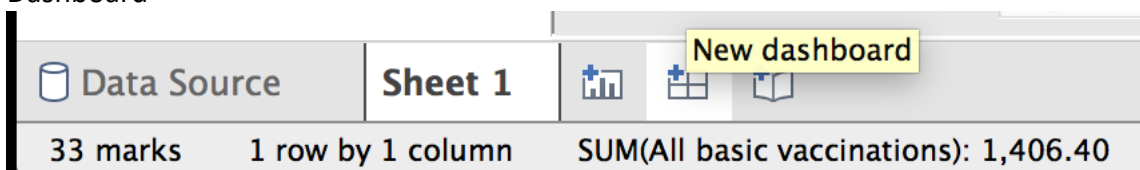

13.   There are three main panels in the Dashboard
   a. Dashboard panel: with all the worksheets available to add in the dashboard
   b. Layout panel: gives the information about the visualizations in the dashboard
   c. Lower Dashboard panel: the configuration of the dashboard like size and title.
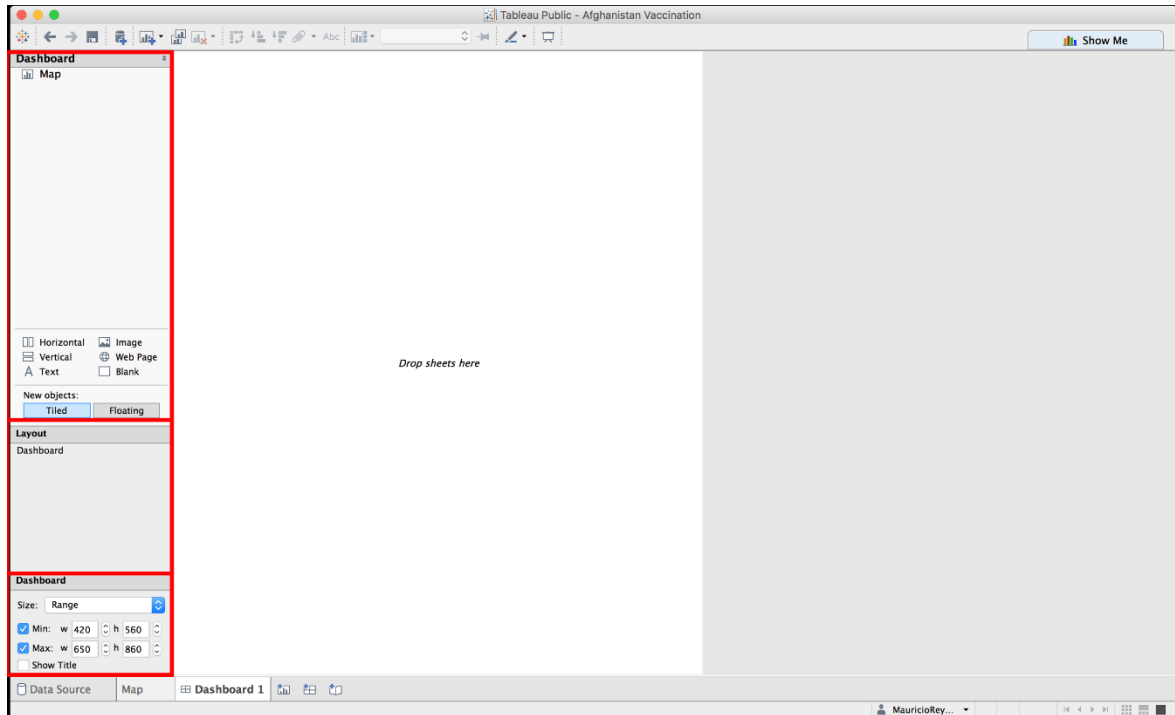
14.   Changing the size of the dashboard is helpful for publishing it on your website with the correct dimensions. Tableau gives many size options to configure for a webpage, blog or article. Go to the lower dashboard panel and change size for a medium blog.
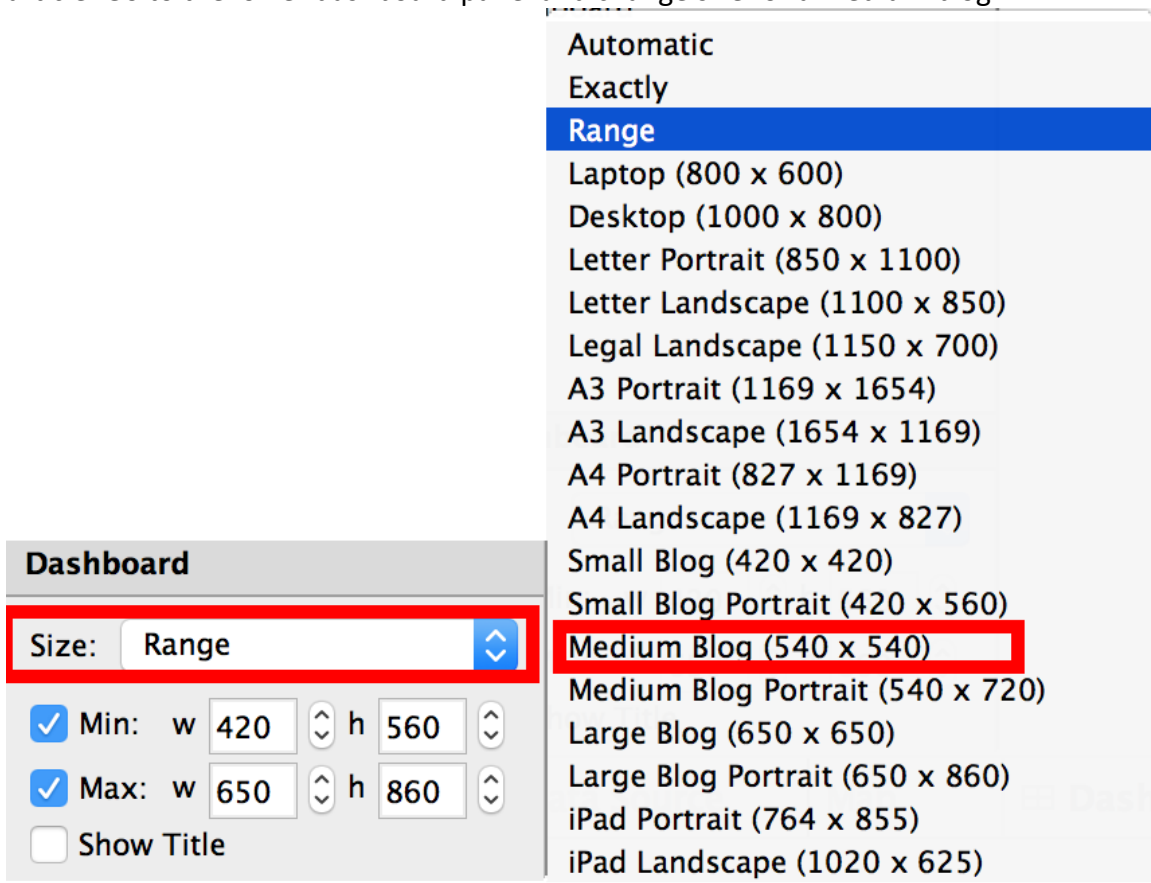
15.   By double click on *Map* from Dashboard panel the visualization in worksheet map is going to move into the Dashboard.
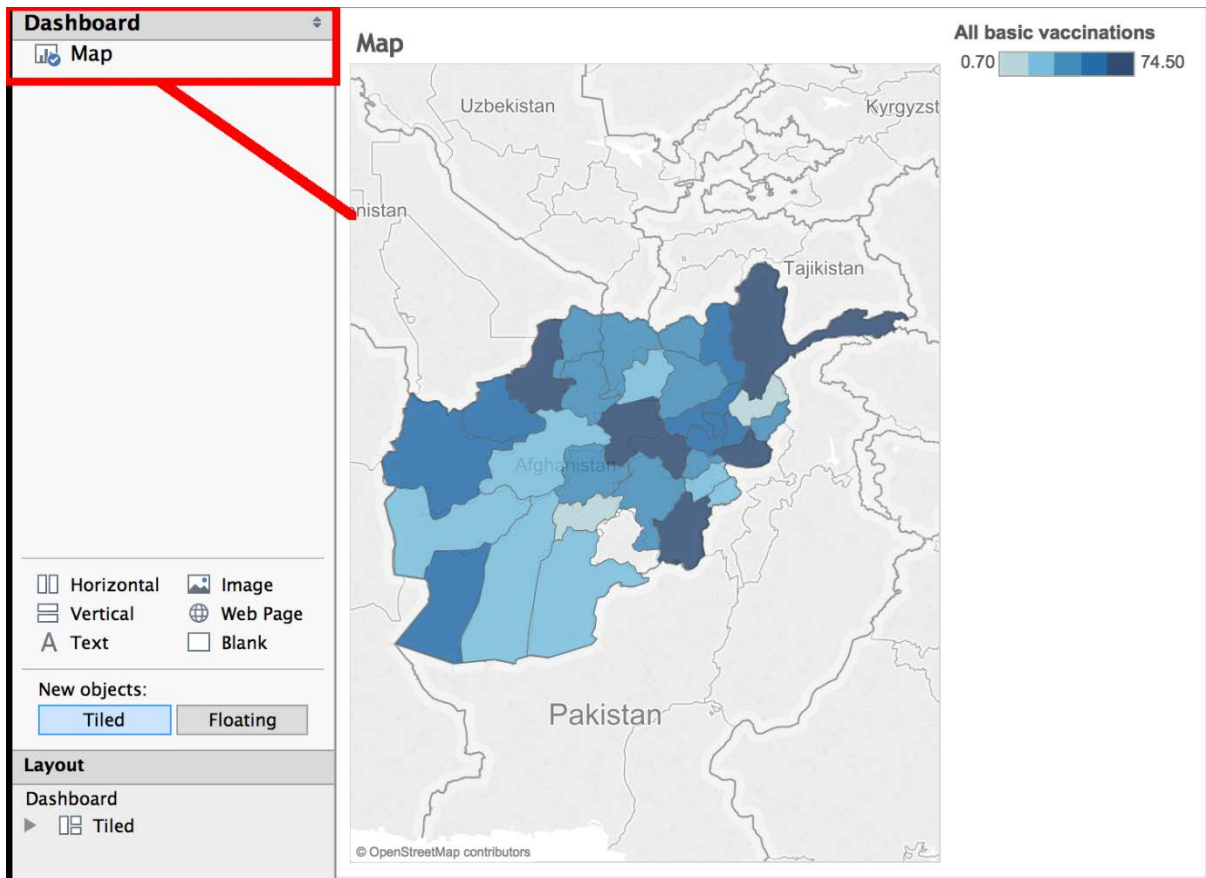

16.   Change the title of the map by double clicking on it. In the new window type *Percentage of children vaccinated in Afghanistan's provinces* (as an example)
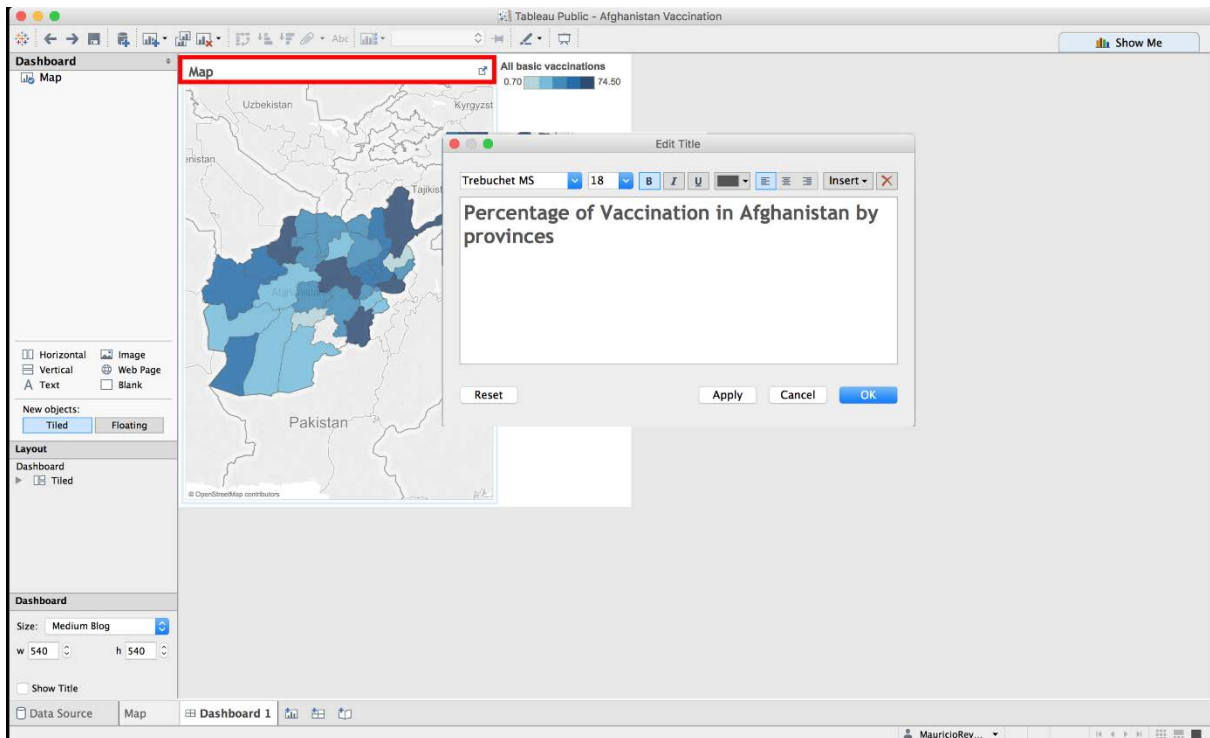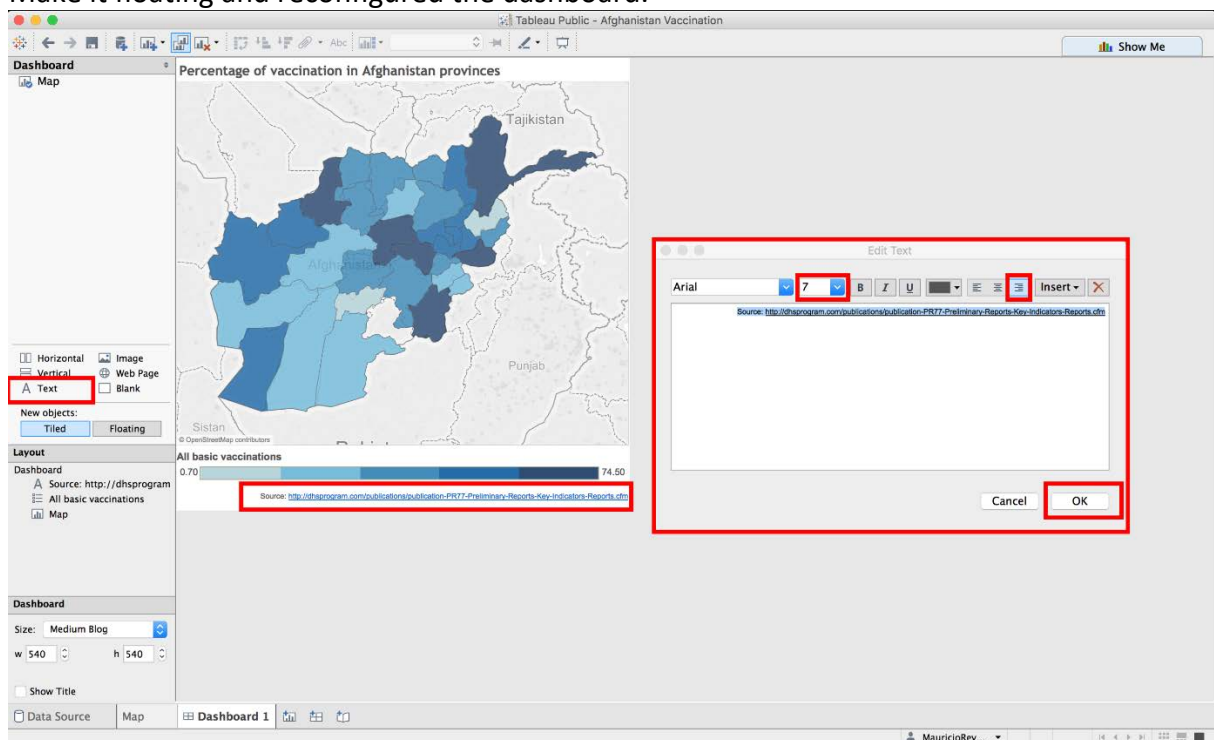
17. To change size of the map and the legend, click on the map, go to the lower dashboard panel and click on floating. Do the same with the legend.
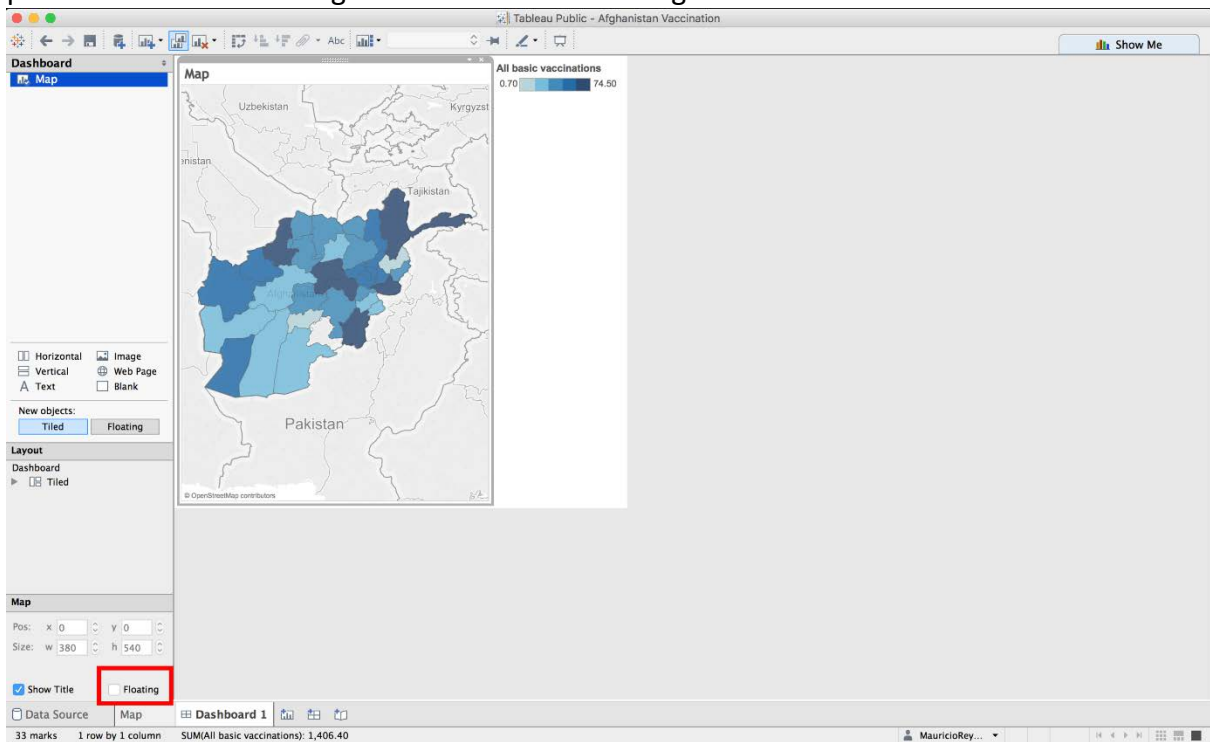
18. The dashboard will look messy. Just click on the map and move the cursor in the corners to resize the map. Also move each element by moving the cursor to the upper-central part of the map. Do the same with the legend.
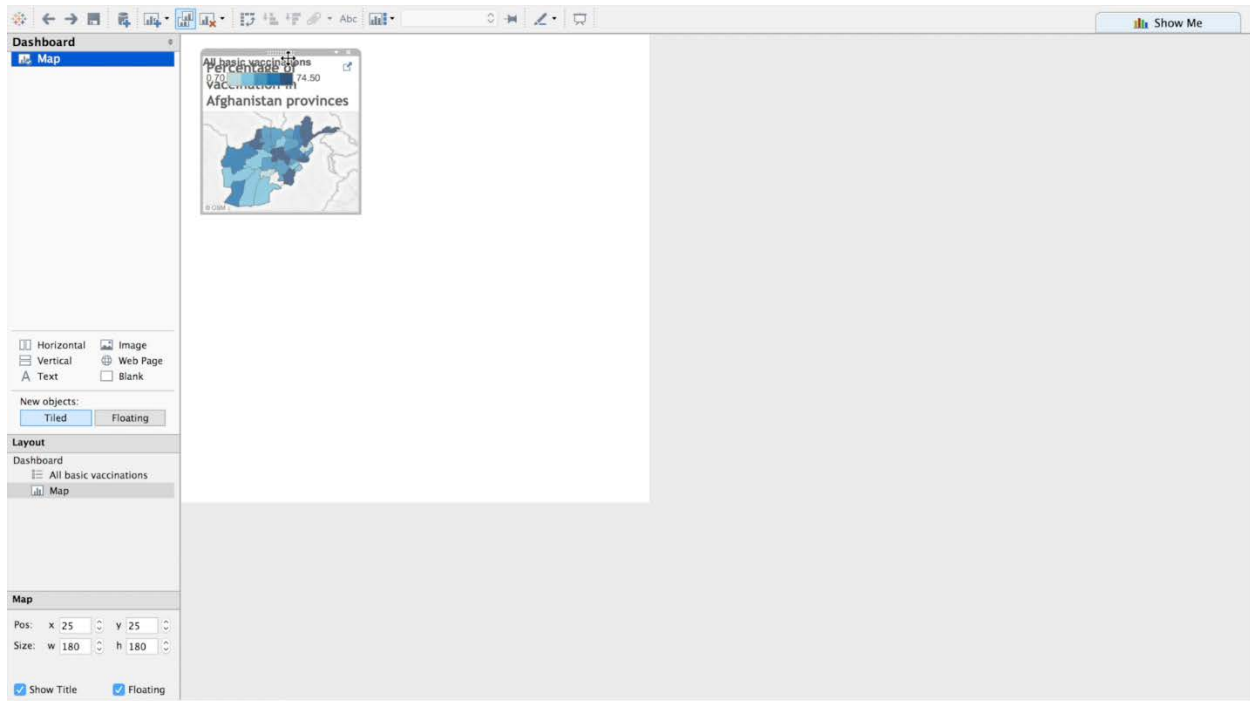
19.   Now to add source or text double click on text and add *"Source: Demographic Health Survey Afghanistan 2015 Key Indicators, http://dhsprogram.com/publications/publication-PR77-Preliminary-Reports-Key-Indicators-Reports.cfm"*, change size letter by 7, align right. Make it floating and reconfigured the dashboard.
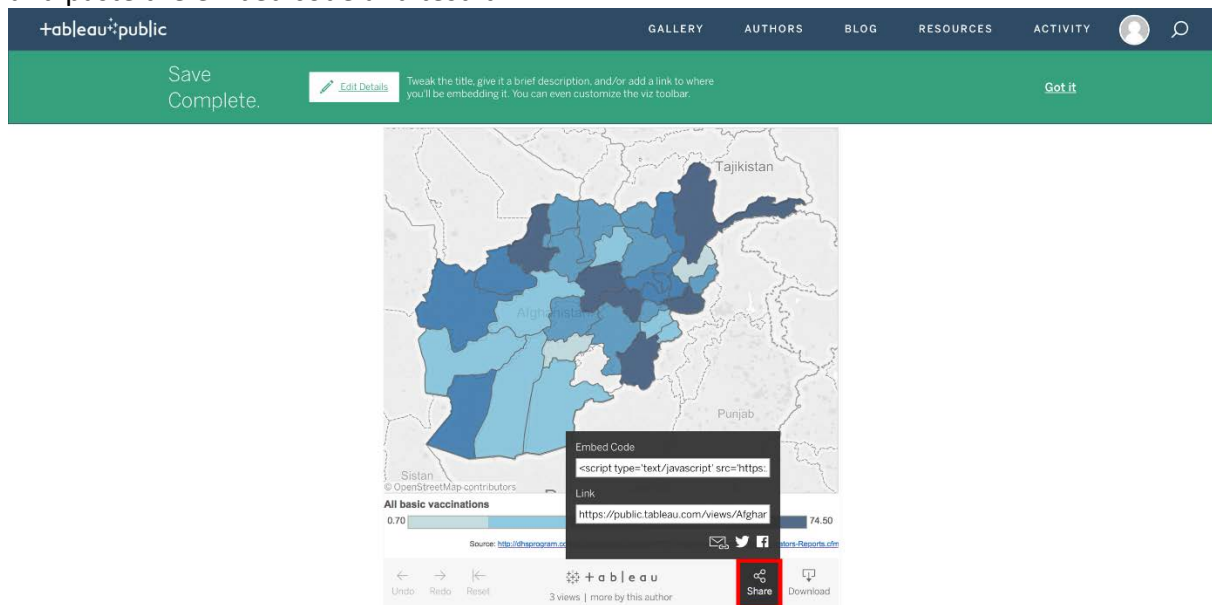

PUBLISH

20. Go to File - Save to Table Public, fill the information with your Tableau account.
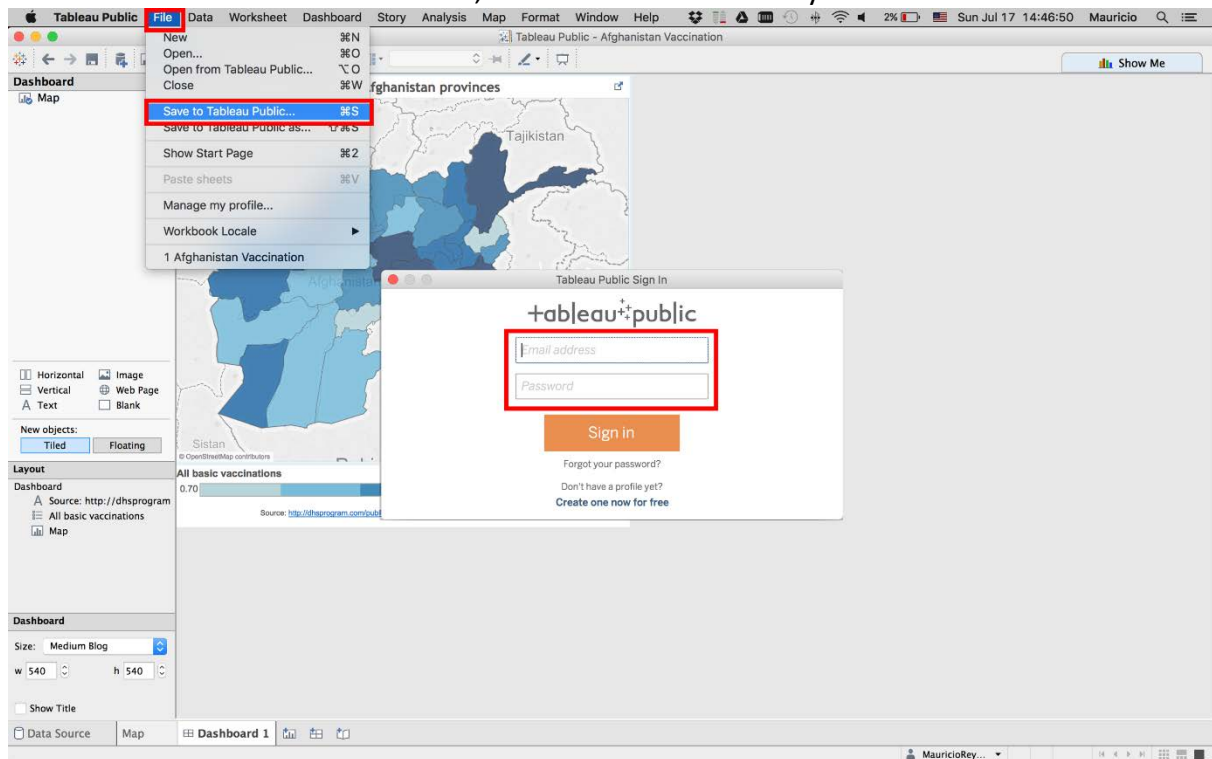
21. Tableau will open a new tab in the default browser with the dashboard. Click on Share, Tableau Public provide link access to the map (or dashboard) and Embed Code.
NOTE: To try the embed code go to http://www.csgnetwork.com/htmlcodetest.html copy and paste the embed code and test it.

ADDITIONAL EXERCISE: MAKING A SIMPLE BAR CHART