UNIVERSITY OF ILLINOIS
URBANA-CHAMPAIGN

Lab Exercise

GEOG 489 Programming for GIS   **Spatial Data Manipulation: Vector**
Lab 2

Due: March 1st, 11:59:59 PM
Grading: 5 points
Late penalty: 1 point subtraction per day (No points after 5 days)

Introduction
This lab covers the fundamental approaches to manipulating vector data with Pandas and GeoPandas. You will be asked to load two datasets with different formats (i.e., *.csv, *.json) and calculate the number of hospitals per county in the State of Illinois.

Things to be submitted: **ONE** Jupyter notebook
                            (GEOG489_Lab2_[YOUR_NET_ID].ipynb).

Tasks

1. Launch CyberGISX (https://cybergisxhub.cigi.illinois.edu/) and create an empty Jupyter notebook (or you can reuse other notebooks created in earlier labs).

2. Copy and paste (or type) the following code into the cell you just created. This will download the lab materials from the GitHub repository to your CyberGISX environment.
    If you want to create a new cell, you can press 'b' on your keyboard or click Insert -> Insert Cell Below on the menu.

    !svn checkout https://github.com/jparkgeo/GEOG489/trunk/Labs/Lab2

3. Navigate to the root folder of your CyberGISX environment. You will see a folder named 'Lab2'. Go inside of the folder and open 'Lab2_spatial_data_manipulation_vector.ipynb'.

4. Finish the tasks described in the notebook and save the notebook in your local directory for submission.
    Name schema: 'GEOG489_Lab2_[YOUR_NET_ID].ipynb'

Done!! Please submit the deliverables to learn.illinois.edu.