## University of California, Los Angeles Department of Statistics

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## Statistics C173/C273

## Project 1

The Democratic Iowa state caucuses will be on Monday 03 February and the primary election in the state of New Hampshire will be on Tuesday, 11 February. We will try to see if there is a cluster of the votes at the county level. In homework 3, exercise 1 we constructed the adjacency matrix **W** for the counties of Iowa and also you have the coordinates for each county seat. Please construct the adjacency matrix for New Hampshire as well. You will need to collect data more for each county:

- a. Percentage of the vote for each candidate.
- b. Economic data. For example, unemployment rate and median income for each county, etc.
- c. Other data that you think are relevant for this project.

Use the BB, BW, Moran's, and Geary's test statistics, etc. to reach a conclusion about clustering of the votes for the candidates. For the Moran's test statistic you can assume constant and non-constant mean. Include maps and other plots in your analysis (see the map below for an example.)

## Unemployment by county in Iowa (2009)

