

Class 09: Topic 8: Measures of Center

Held: Monday, 11 February 2008

Summary: We consider more ways to talk about distributions, particularly ways to identify the *center* of a distribution.

Notes:

- Homework for Wednesday: Activities 8-9, 8-17, 8-18, 8-22, 8-23. The quiz percentages file for 8-17 is stored in `/home/rebelsky/Stats115/Data/MarriageAges.csv`. The quiz percentages file for 8-18 is stored in `/home/rebelsky/Stats115/Data/QuizPct.csv`.
- Preparation for Wednesday: Overview and Preliminaries 1-3 for Topic 9.
- I plan to assign partners for this week of class.
- Homeworks for sections 3, 4, and 5 returned. We'll discuss some issues.
- Dumb question: Why, when I added the length of monarch reigns to 1066, did I not get the year in which Elizabeth II's reign began?

- Preparation: Overview and Preliminaries for Topic 8.
- Handouts: R notes on activity 8.
- Due: Activities 6-26, 6-30, 7-8, 7-12.

Overview:

- A few past topics: Homework, skew, etc.
- Ways to think about center.

Notes on Homework

- I graded the homework from Topic 3; your grader graded the homework from Topics 4 and 5.
- I noted some potential academic honesty issues on Topic 3
 - It's fine if you work together
 - But you must mention on your work that you worked together.

Notes on Previous Topics

- Did anyone have any questions about the figure on p. 103.
- How should you arrange a two-way table? Which are the rows, which are the columns?

A Note on Skewness

- A few of you have noted that skewness seems backwards, because a chart in which most of the data are clumped to the left is skewed right, and vice versa.
- But skewness is really supposed to describe what a distribution behaves relative to a symmetric distribution (more precisely, a normal distribution).
 - A distribution that is skewed right has extra data points to the right.
 - A distribution that is skewed left has extra data points to the left.
- You can also think of skewness in terms of its effect on the mean: In a distribution that is skewed right, the mean is to the right of the median.

Measures of Center

- As you may recall, we have been talking informally about the center of a distribution
- Today, we look more formally at those issues.

Copyright © 2008 Samuel A. Rebelsky. This work is licensed under a Creative Commons Attribution-NonCommercial 2.5 License. To view a copy of this license, visit <http://creativecommons.org/licenses/by-nc/2.5/> or send a letter to Creative Commons, 543 Howard Street, 5th Floor, San Francisco, California, 94105, USA.