



Mapping Miss USA

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“Should evolution be taught in schools?”

Miss Alabama:

“...I do not believe in evolution, I do not think it should be taught in schools...”

Miss Georgia:

“...I think evolution should be taught but I also think maybe the biblical stuff should be taught as well...”

Miss New Mexico:

“I think evolution should be taught in schools because evolution is based off of science...”

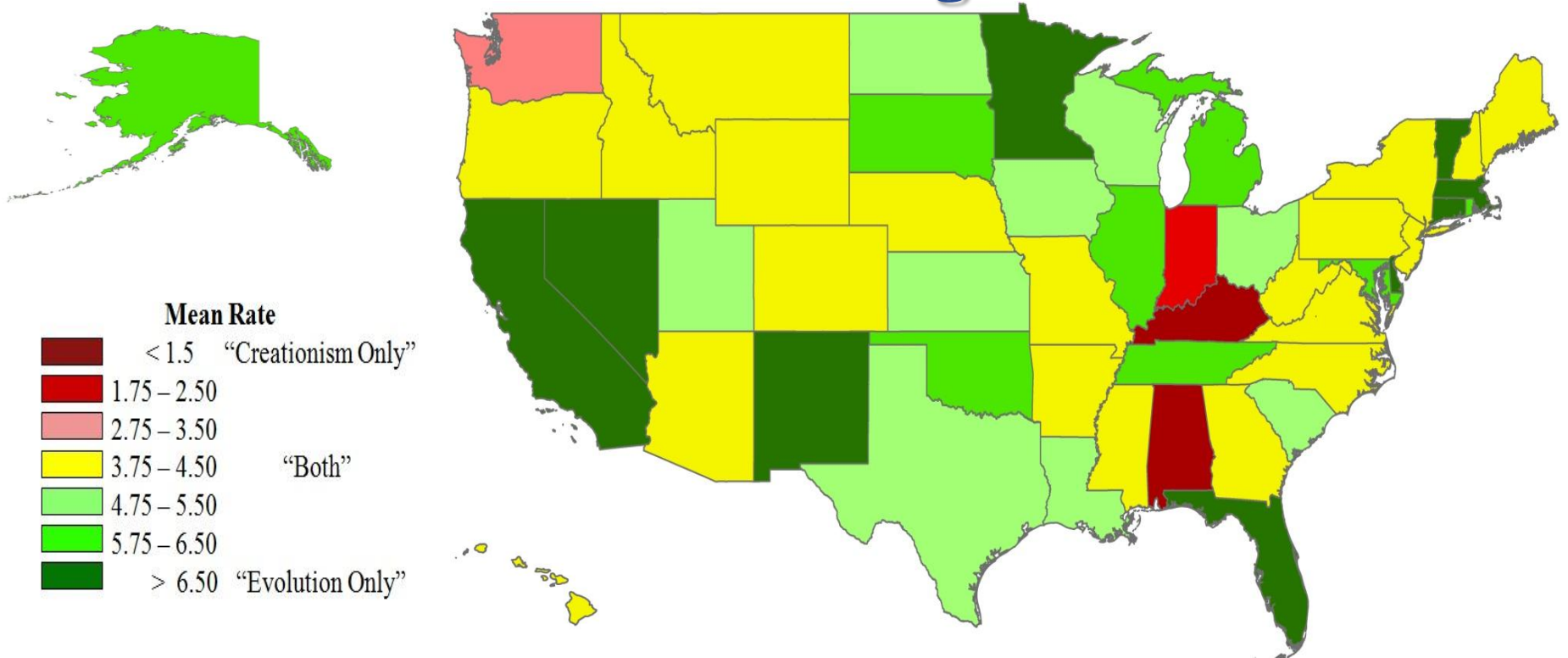
Does Miss USA represent USA?

- **American opposition to evolution:**
 - » Ranked second to last, only surpassing Turkey, in an examination of 34 prominent countries (Miller et al., 2006)
 - » Decrease in public acceptance in past 20 years (Miller et al., 2006)
 - » 44% find creationist view closest to personal views (Newport, 2008)
- **Current Study:**
 - » Examine Miss USA responses to create a visual representation of the women's pedagogical attitudes towards evolutionary theory

Mapping Miss USA

- Transcribed contestants' verbal responses
- Four raters coded each response on a 7 pt. scale
 - » 1 = “Evolution should not be taught”
 - » 4 = “Evolution should be taught alongside creationism”
 - » 7 = “Evolution should be taught without creationism”
- Ratings showed high inter-rater reliability
- Mean ratings were used to produce a thematic map

Should evolution be taught in schools?



- 7.8% of the contestants favor creationism.
- 39.2% of the contestants favor creationism and evolution side by side.
- 52.9% favor evolution (17.6% endorse evolution only).

Predicting Attitudes Toward Evolution

- Past research with KS university sample (Hawley et al. 2011):
 - » Demographic variables are **not** strong predictors
 - Gender, high school size, number of siblings, parents' education, rurality of hometown
 - » Openness to experience (personality) accounts for the most variability
 - Intellectual curiosity and preference for variety
- Future Research Questions:
 - » How do attitudes toward evolution vary across the U. S. by state?
 - » Are some states more homogeneous in their attitudes than other states? That is, is there a high level of within state agreement, or do individuals within a state disagree (e.g., swing states)?

Future research: Methods

- Procedure
 - » Survey the population at large of each of the 50 states and Washington, D.C.
- Measures
 - » Demographic information, including state and zip codes
 - » Evolution Attitudes and Literacy Survey (EALS)
- Analyses
 - » Using ArcGIS create a layered thematic map for each of the EALS constructs:
 - Political Activity
 - Religious Conservatism
 - Creationist Reasoning
 - Evolutionary Knowledge
 - Evolutionary Misconceptions
 - Exposure to Evolution
 - » Examine potential demographic and personality predictors using ArcGIS spatial statistics tools

Does Miss USA represent the USA ?

Miss USA 2011

“Well, I was taught evolution in my high school growing up, and I do believe in it, I mean I'm a huge science geek, so I like to believe in like the big bang theory, and you know, the evolution of humans you know, throughout, you know, time.”

Miss California

