

Factors associated with attitudes toward U.S. immigration, 2004–2018

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Outline

- Importance and objectives
- Background and initial analysis
- Data and methods
- Multivariate analysis
 - Odds ratios
 - Marginal effects
- Final considerations
- Research agenda

Importance

- We aim to understand what factors are shaping anti-immigration and pro-immigration feelings
- This topic has become more prominent in the public sphere due to the 2016 U.S. presidential election
 - Recent data captures social context of that election
- Inform the public about overall migration attitudes of the population

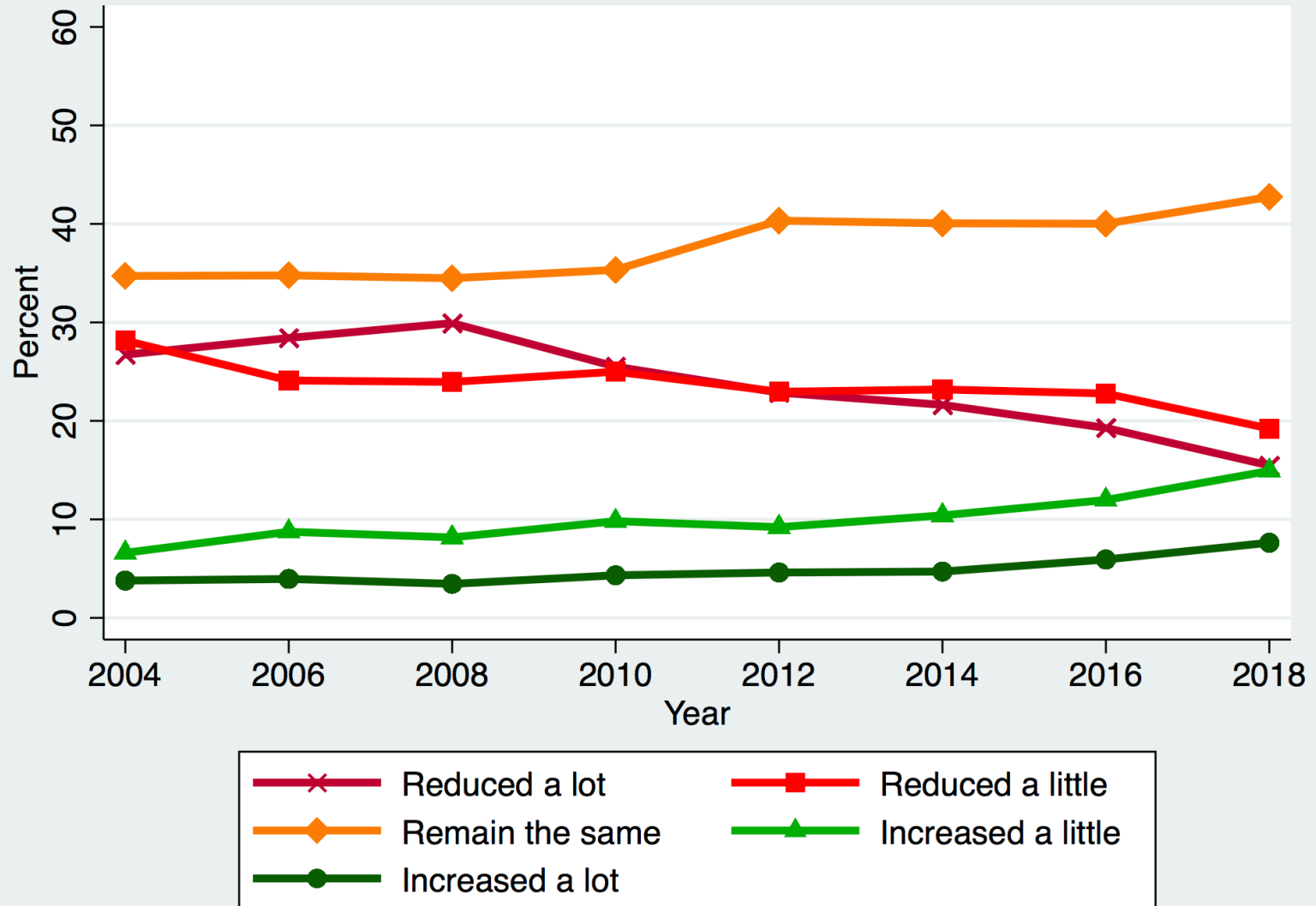
Objectives

- Do correlations of immigrant generation (1st, 2nd, 3+) with immigrant attitudes vary by race/ethnicity?
- Strategies to better understand factors associated with immigration attitudes
 - Several years of data: 2004–2018
 - Disaggregated categories for independent variables
 - Influence of individual-level and county-level variables
 - Models more appropriate to deal with an ordinal variable about immigration attitudes

Variable about migration attitude

- This variable was organized in a way that higher values indicate more positive views toward immigration (pro-immigration scale)
- Do you think the number of immigrants to America nowadays should be...
 1. Reduced a lot
 2. Reduced a little
 3. Remain the same as it is
 4. Increased a little
 5. Increased a lot

Opinion about immigration



Social identity

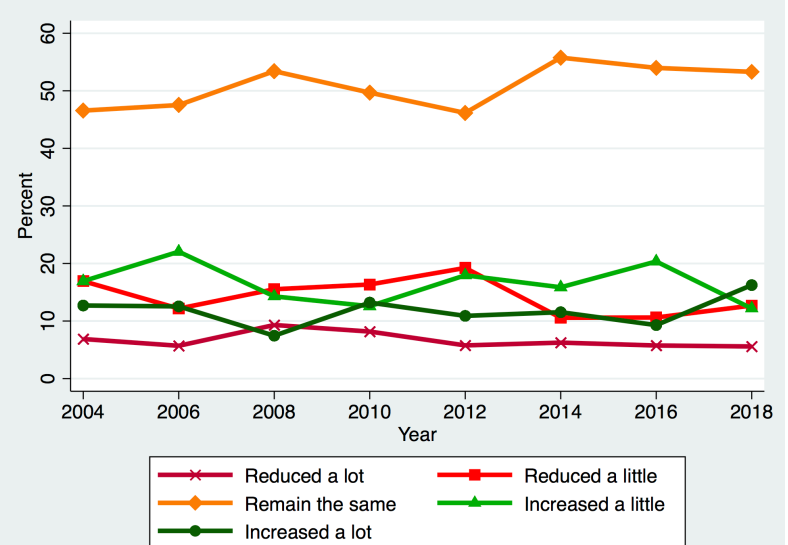
- Formation of social identities is strongly related to attitudes toward immigration (Fussell 2014; Stets, Burke 2000)
 - Immigrants are more pro-immigration, compared to White natives (Haubert, Fussell 2006)
- Latinos tend to be pro-immigrant and are more prone to engage in political activism (Sanchez 2006, 2008)
- Majority groups may have negative immigrant attitudes due to perception that minorities are challenging their standing in society (Berg 2015)

Generation of immigrants

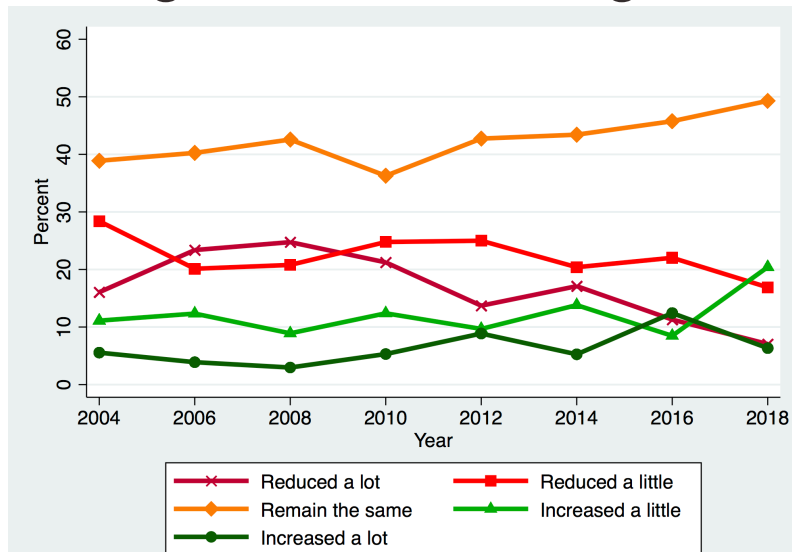
- 1st generation
 - Born outside the U.S.
- 2nd generation
 - Born in the U.S.
 - Parents' born outside the U.S.
- 3+ generation
 - Born in the U.S.
 - Parents' born in the U.S.

Opinion about immigration by generation of immigrants

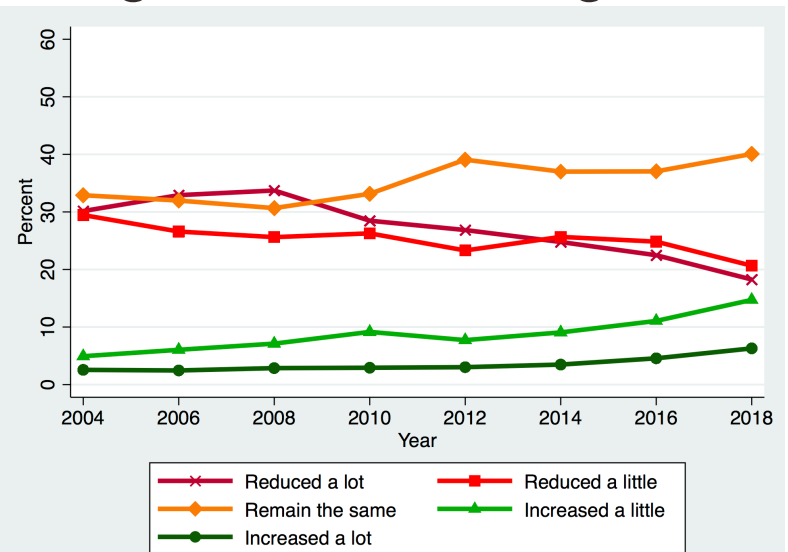
1st generation immigrants



2nd generation immigrants



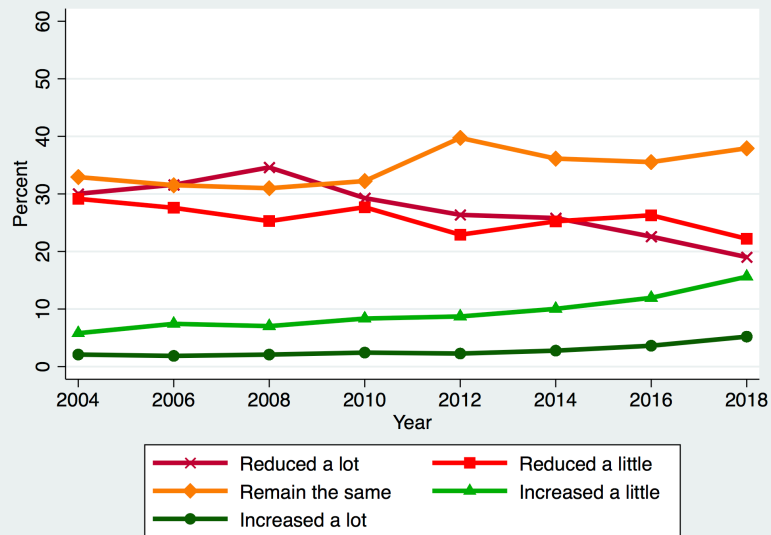
3+ generation immigrants



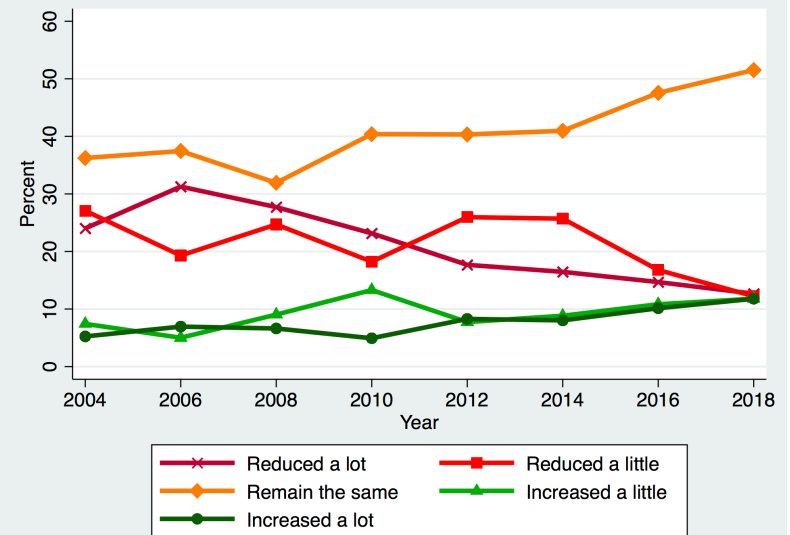
Racial anxiety

- When the majority race believes that minorities are intentionally taking advantage of society resources, anti-minority attitudes increase (Blalock 1970)
- Immigration attitudes have stronger correlations with racial resentment than economic anxiety (Miller 2018)
 - Those with negative opinions towards Black people also tend to have anti-immigration attitudes
 - These opinions are related to a broader perspective of Whites toward minorities

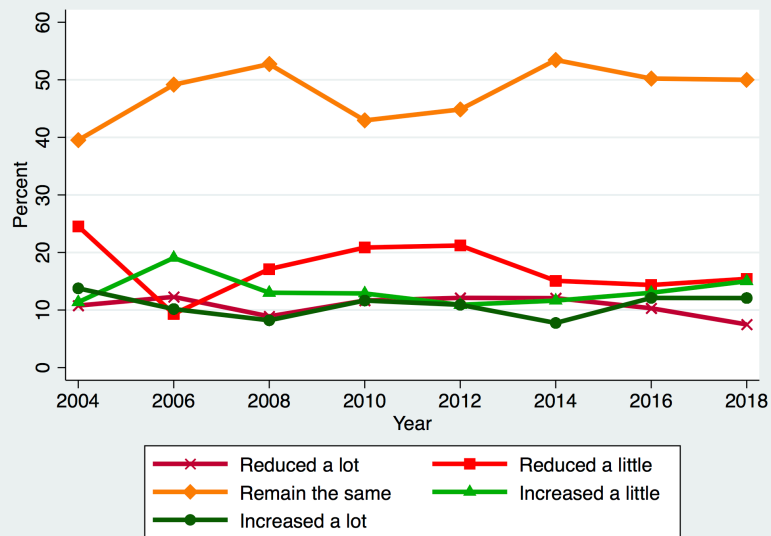
Non-Hispanic White



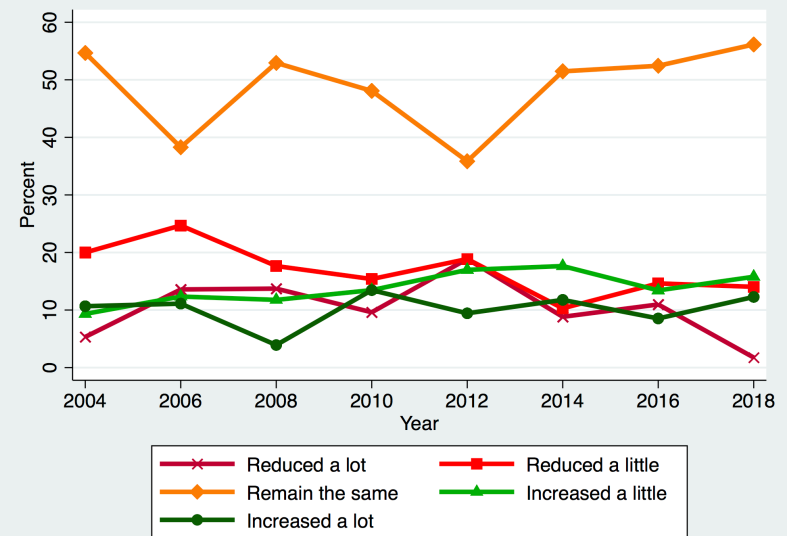
Non-Hispanic Black



Hispanic



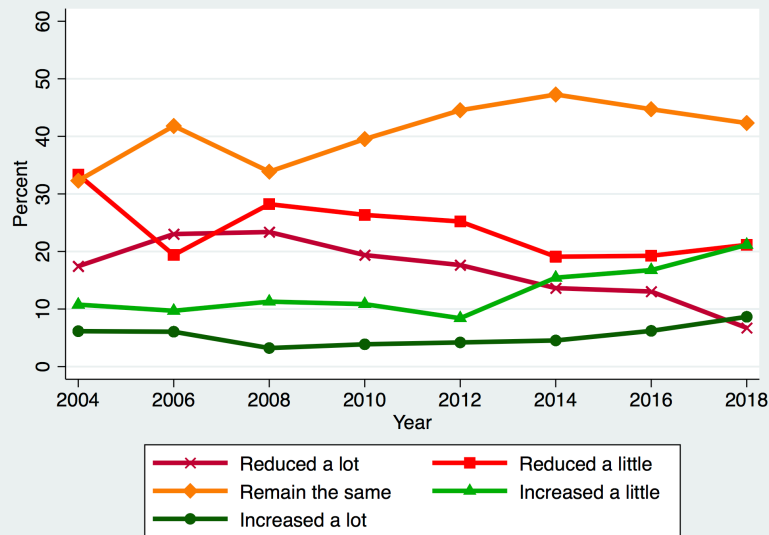
Non-Hispanic other



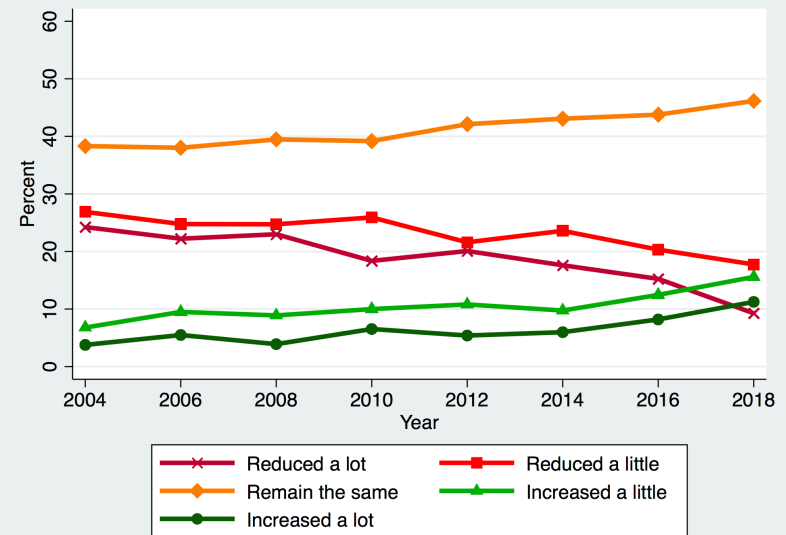
Age and sex

- Age is positively related to anti-legal immigration attitudes (Chandler, Tsai 2001)
 - Older respondents are more likely to want to decrease the number of legal immigrants
 - Those born from the early 1980s to the 2000s, have more positive views toward immigration than others (Ross, Rouse 2015)
- Women are more anti-legal immigration than males
 - Not statistically significant for anti-illegal immigration
- Age and sex have no consistent associations with attitudes toward immigrants (Espenshade, Hempstead 1996; Fetzer 2000)

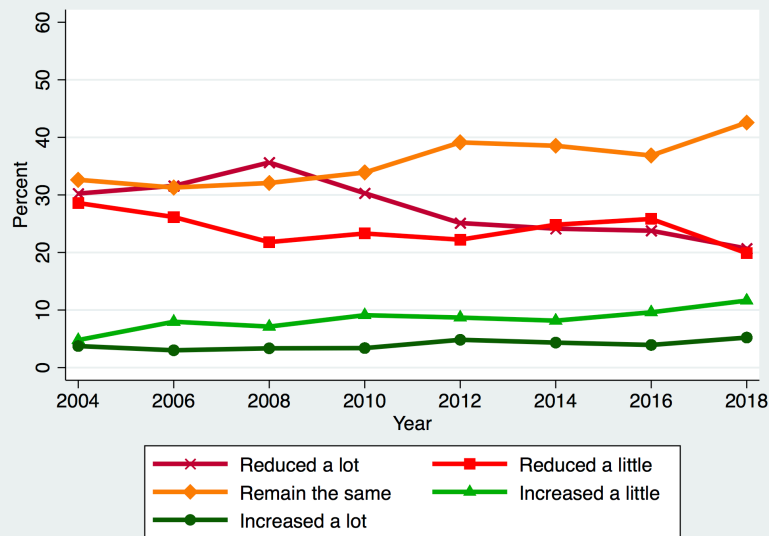
18–24 age group



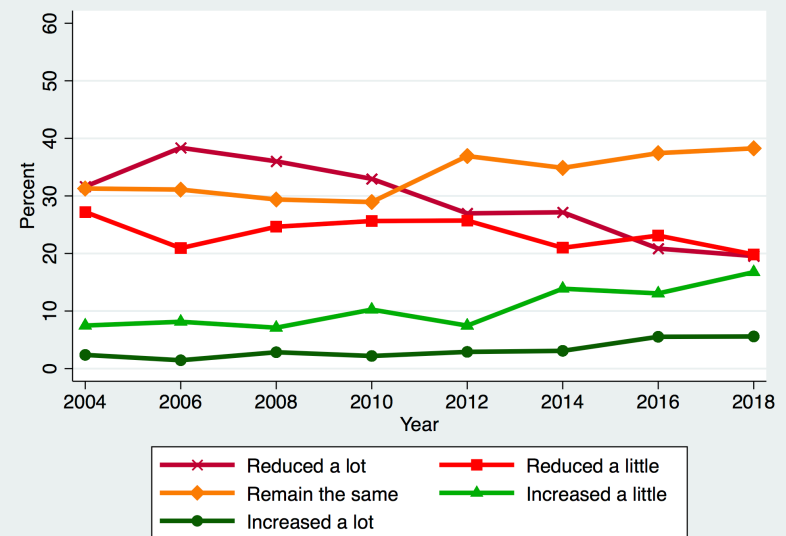
25–44 age group



45–64 age group



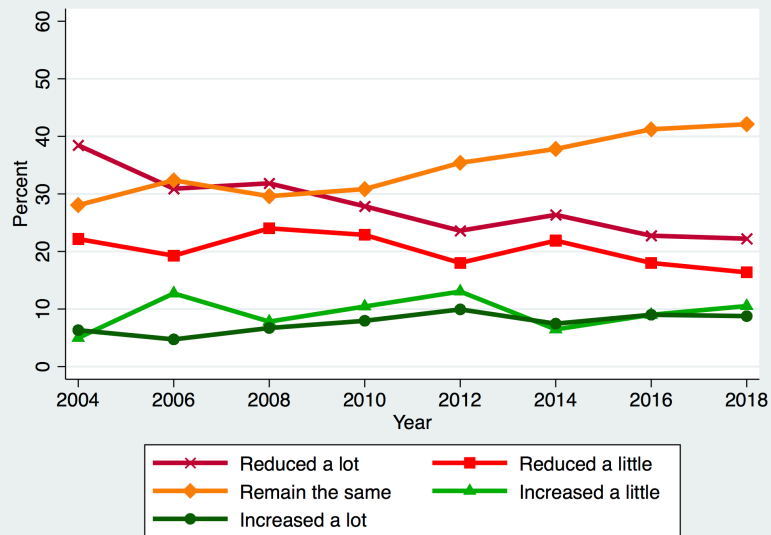
65–89 age group



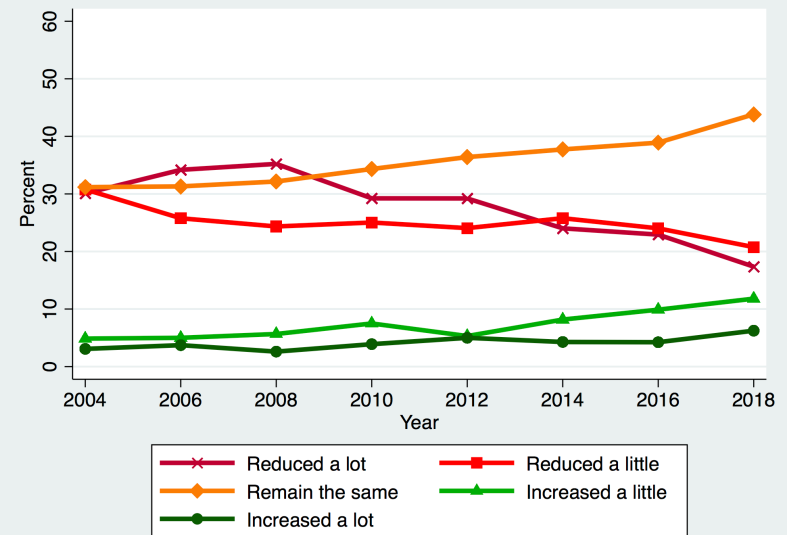
Education

- **Higher educated are more pro-immigration** (Berg 2010, 2015; Burns, Gimpel 2000; Chandler, Tsai 2001; Espenshade 1995; Haubert, Fussell 2006; Hood, Morris 1997)
 - Disagreement about whether education defines an immigration attitude or only teaches them to support a pro-immigrant ideology (Jackman, Muha 1984; Janus 2010)
 - This issue could be investigated with longitudinal data
- **People who live in areas that are predominantly occupied by college graduates have higher individual levels of tolerance** (Bobo and Licari 1989, Moore and Ovadia 2006)

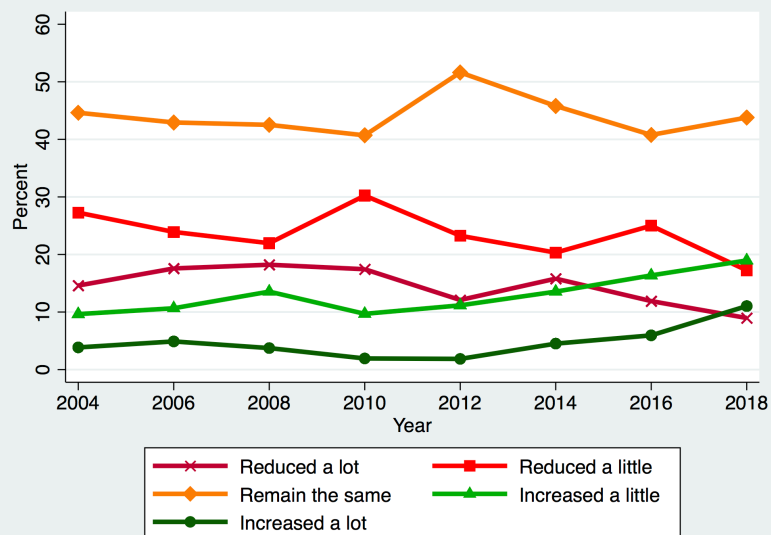
Less than high school



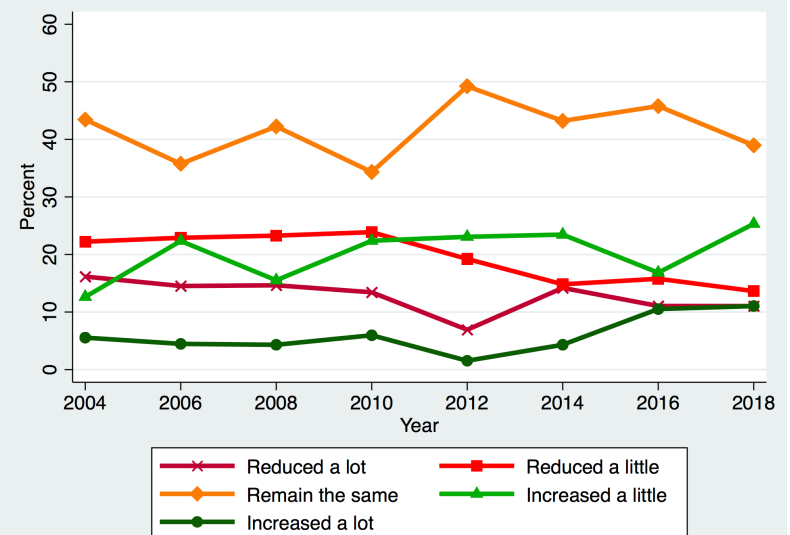
High school



Bachelor



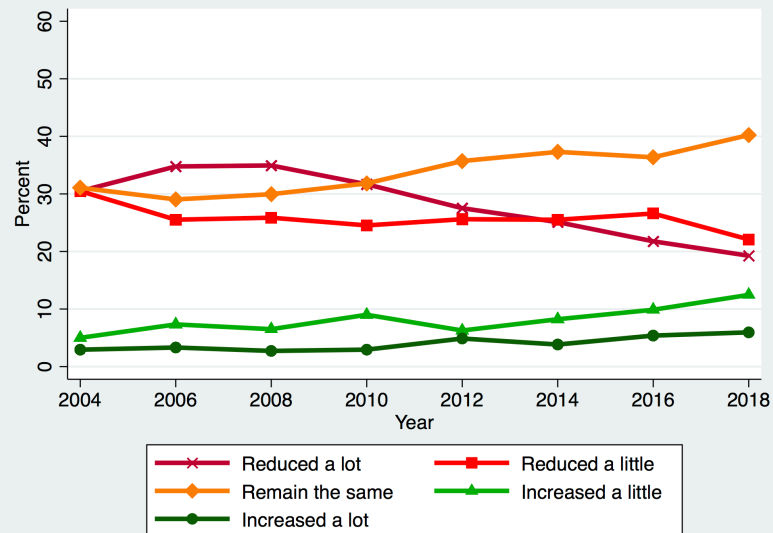
Graduate



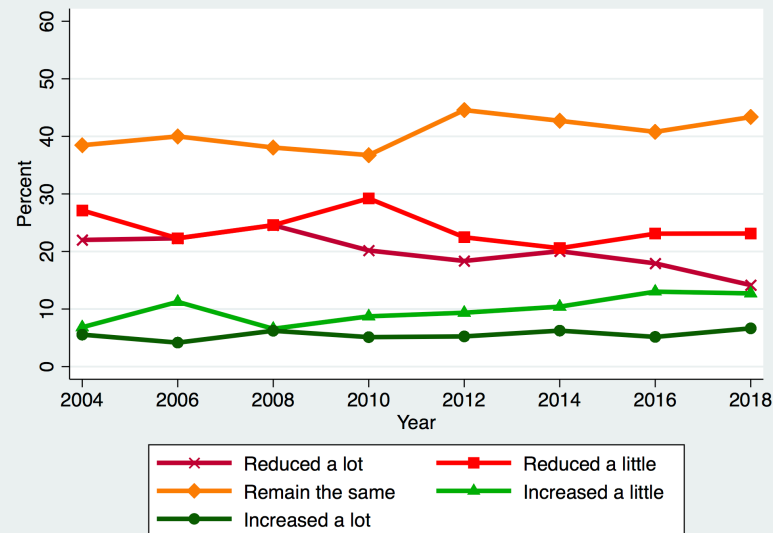
Religion

- Religion seems to play a role in defining a person's attitudes toward immigration (Knoll 2009)
 - Positive attitudes are developed by religious groups that welcome minorities or support specific minority groups
- Areas with higher proportions of evangelical Protestants have lower individual levels of tolerance (Ellison, Musick 1993; Moore, Ovadia 2006)
 - These areas are largely concentrated in the South due to conservative teachings and ideologies
 - It is important to consider contextual and individual religious factors (Ellison, Musick 1993)

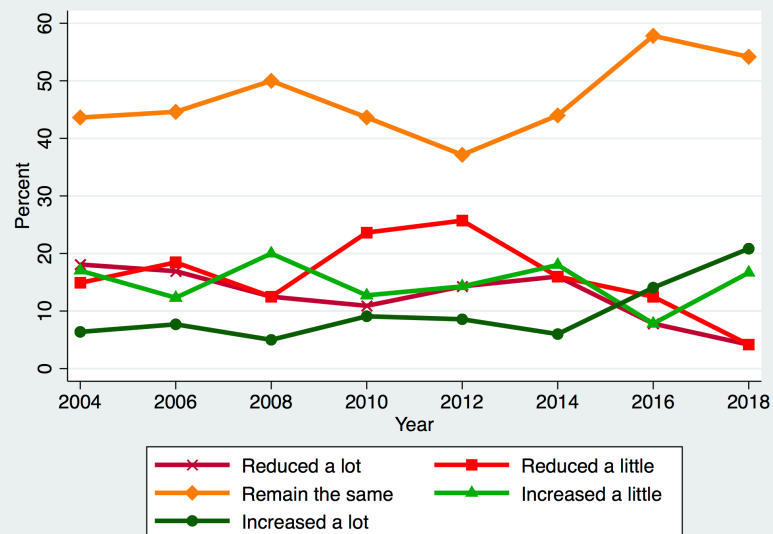
Protestant



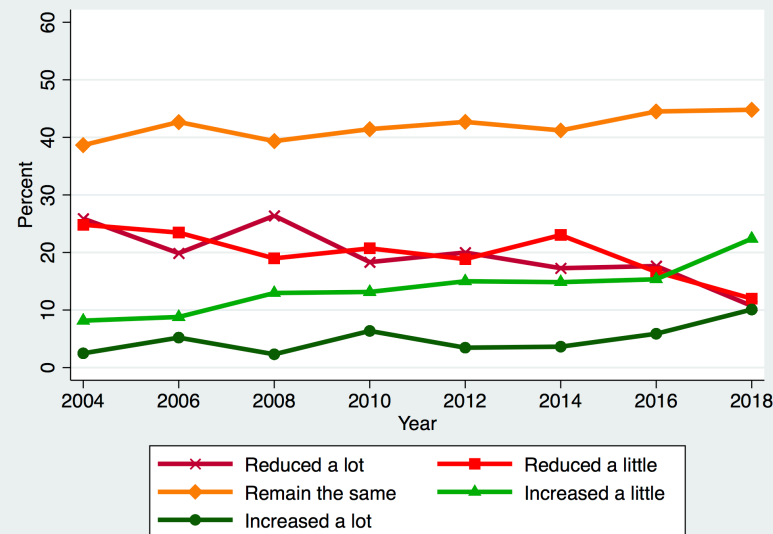
Catholic



Other religion



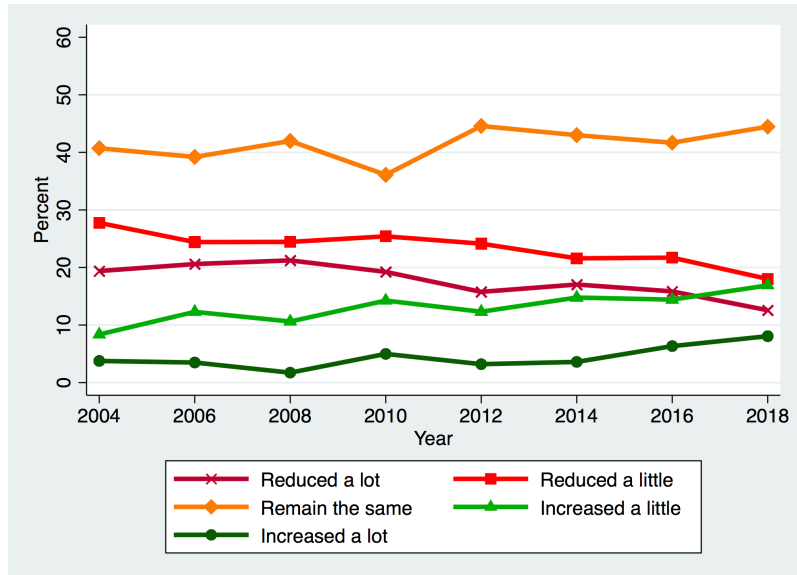
No religion



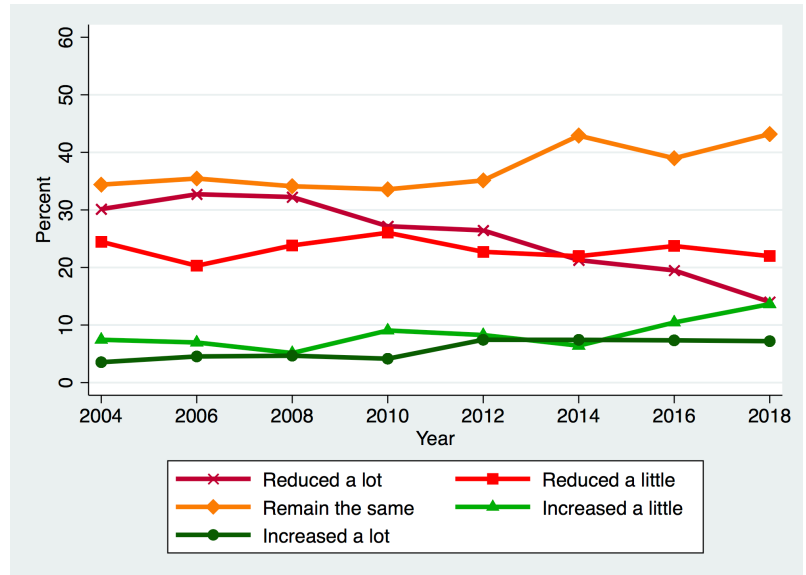
Labor market competition

- Individuals believe that immigrants take their jobs and depress their wages (Burns, Gimpel 2000; Espenshade 1995; Espenshade, Hempstead 1996; Simon, Sikich 2007)
 - This is especially expressed by people of lower socioeconomic status
 - When immigrants have improvements in labor market outcomes, non-immigrants tend to increase negative opinions toward immigrant tolerance (Esses, Dovidio 2011)
- Occupation significantly predicted negative perceptions of immigrants (Haubert, Fussell 2006)
 - Blue-collar and service workers are less pro-immigration

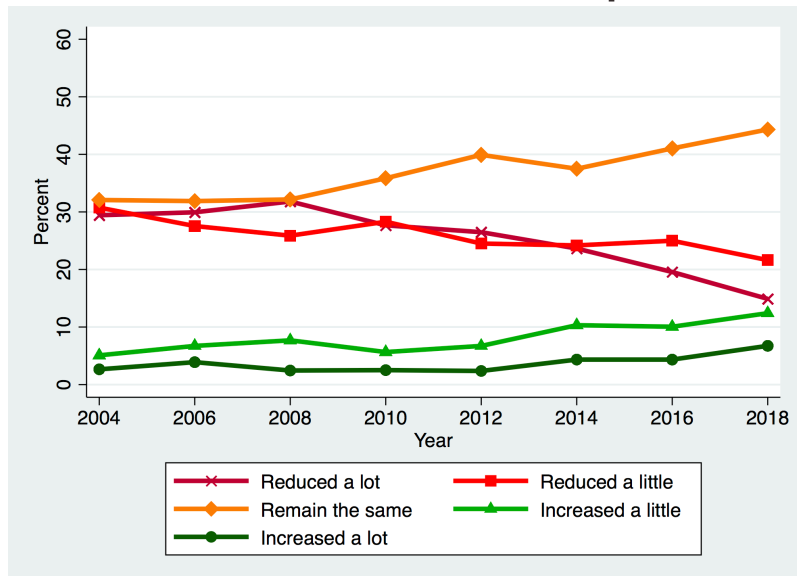
Manag., busin., science, arts



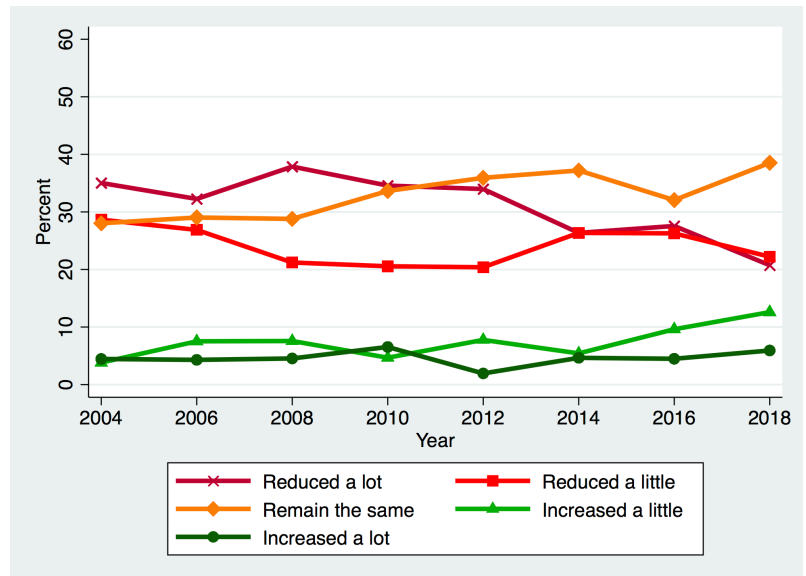
Service occupations



Sales and office occupations



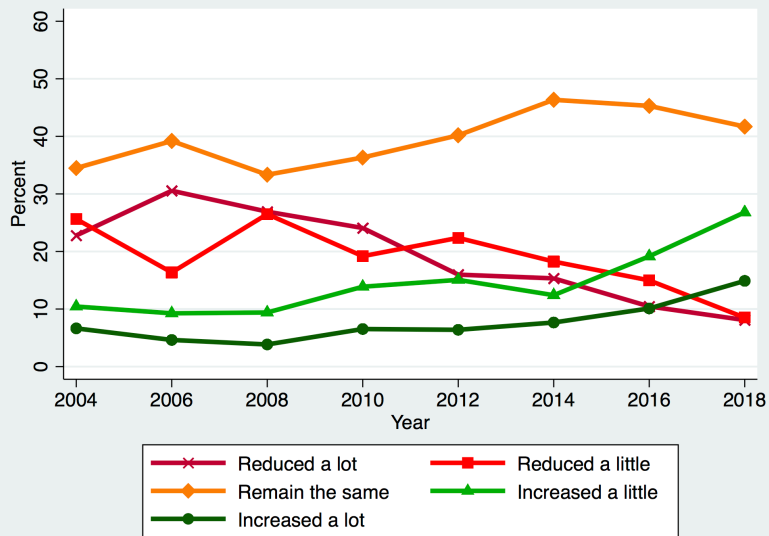
Natural res., constr., maint.



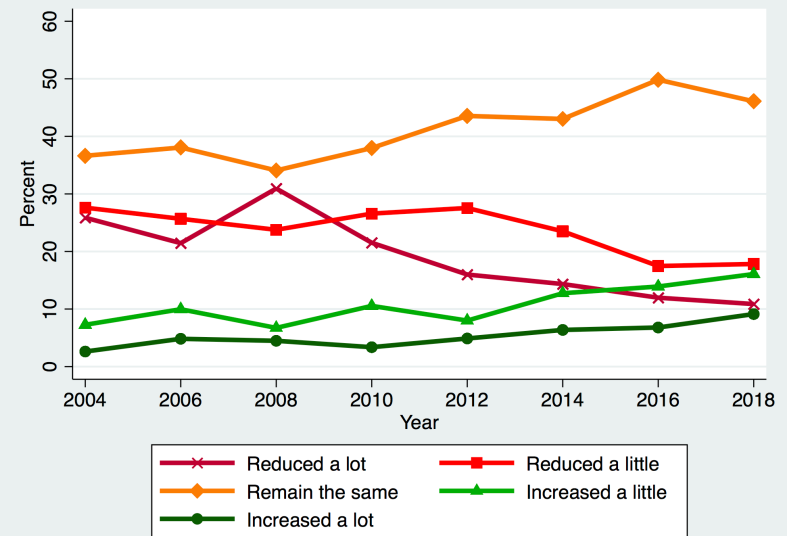
Political ideology

- Liberals are more pro-immigration than conservatives (Berg 2015; Chandler, Tsai 2001; Haubert, Fussell 2006)
- Positive views of conservative candidates is correlated with
 - Resentment towards Black people, association of Muslims with violence, and belief that former President Obama is a Muslim (Klinkner 2016)
 - Belief that immigrants pose a threat to U.S. values, and notion that Blacks, Latinos and Asians will become the majority (Jones, Kiley 2016)

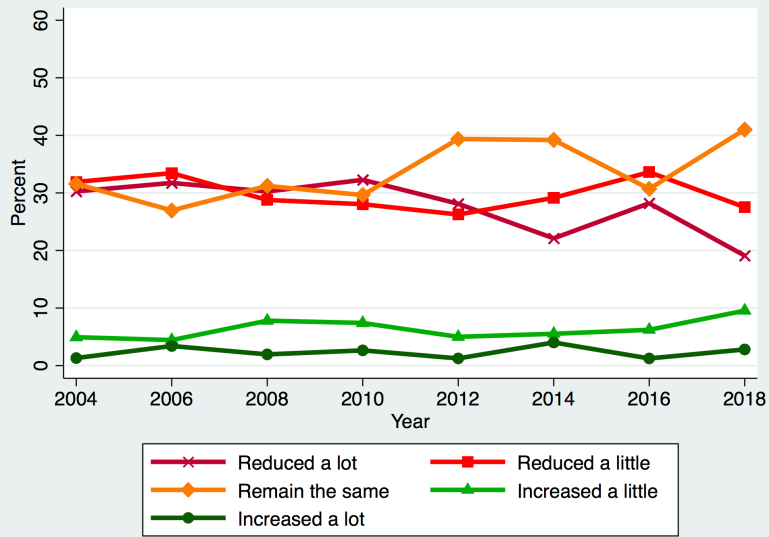
Strong Democrats



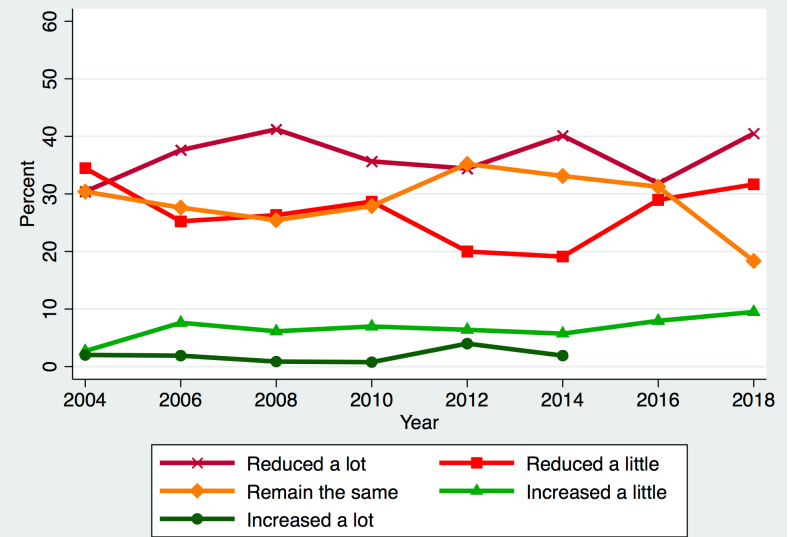
Democrats



Republicans



Strong Republicans



Social interactions

- People tend to dismiss negative thoughts about minority groups through intergroup relations (Cote, Erickson 2009; Ellison et al. 2011; Hood, Morris 1997; McLaren 2003)
 - A majority group member who lives in an area with many immigrants typically holds a positive attitude toward immigration (Dixon 2006)
 - People with positive attitudes toward immigration are typically wealthier and have more experiences with minority groups (Haubert, Fussell 2006)

Data

- Cross-sectional cumulative data from the General Social Survey (GSS), 2004–2018
- Merged 2008–2014 GSS with American Community Survey (ACS) 5-year estimates
 - 2006–2010
 - 2008–2012
 - 2010–2014
 - 2012–2016

Year	GSS sample size
2004	1,953
2006	1,921
2008	1,273
2010	1,364
2012	1,237
2014	1,594
2016	1,804
2018	1,467
Total	12,613

Independent variables

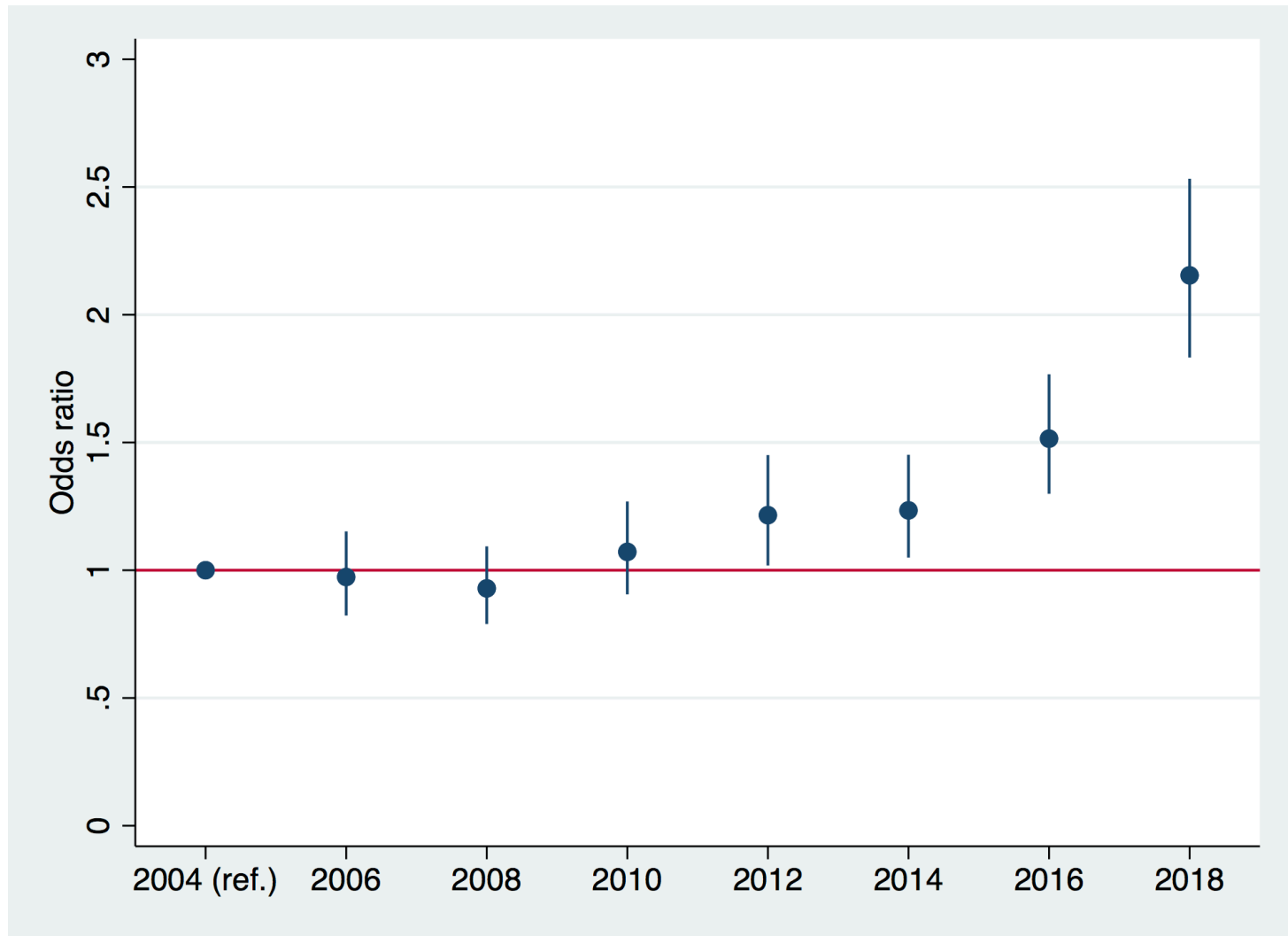
- Individual-level variables
 - Year
 - Generation of immigrants
 - Race/ethnicity
 - Age group
 - Sex
 - Education
 - Religion
 - Occupation
 - Political party
 - Region of interview
- County-level variables (proportions)
 - Unemployment
 - College graduates
 - Protestants/Catholics
 - Immigrants (ACS)

Generalized ordered logit model

- Odds ratios indicate the factor change in odds of
 - Observing values above the specified category
 - Versus observing values at or below the specified category
- For migration attitude
 1. **Above reduced a lot (“wanting more”)**
 2. Above reduced a little
 3. Above remain the same
 4. Above increased a little

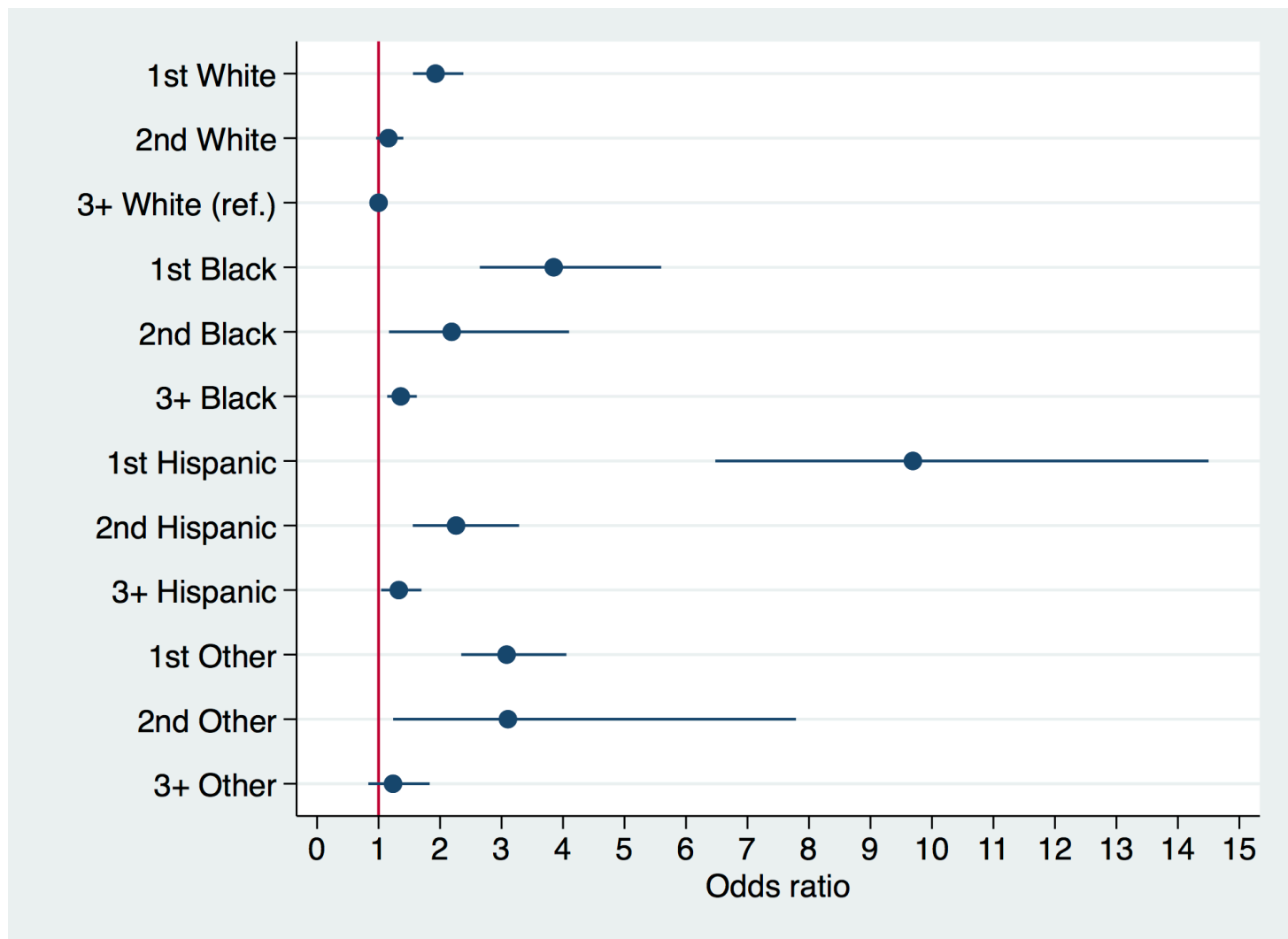
Odds ratios of wanting more vs. less immigration

Year



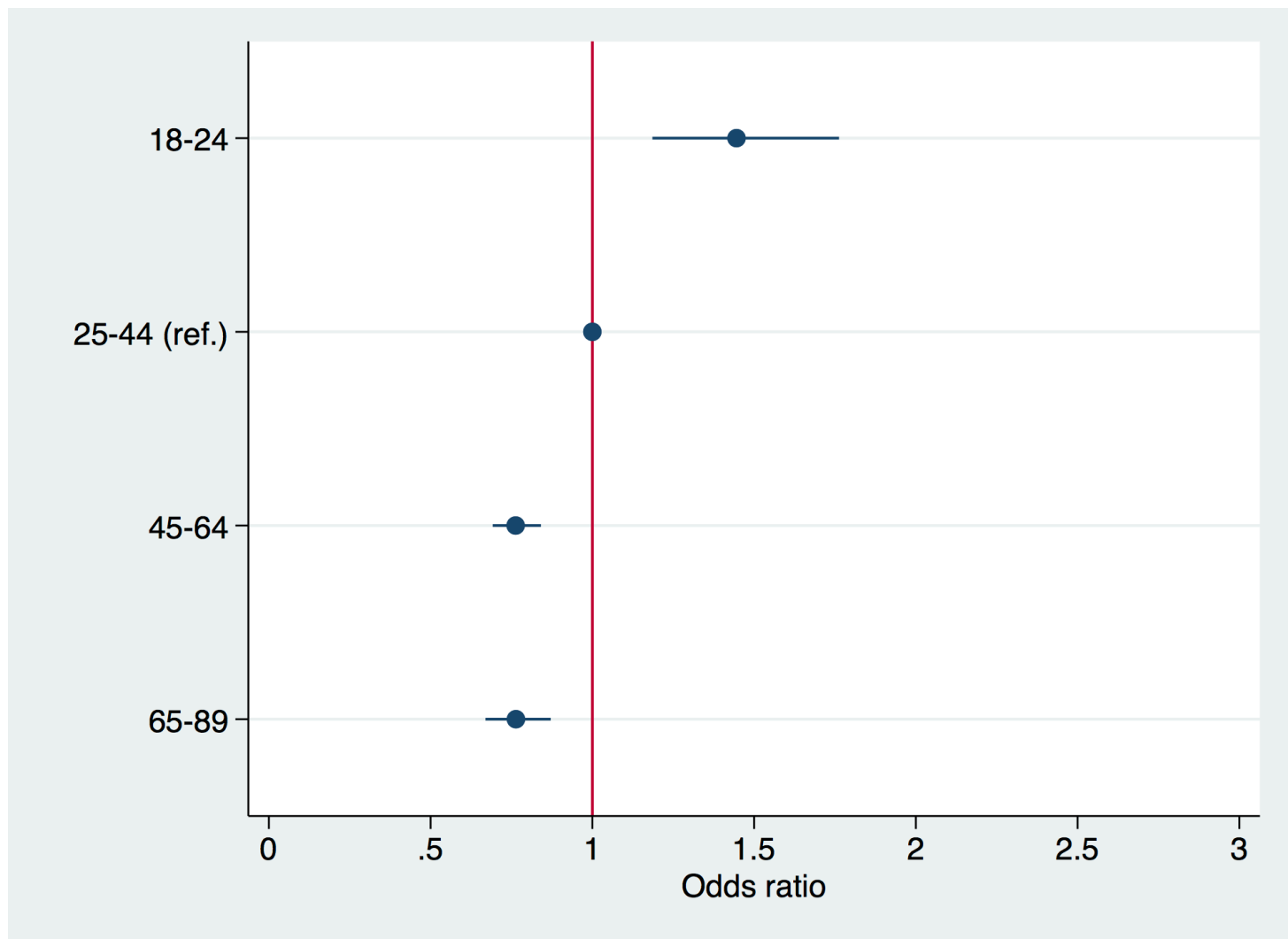
Odds ratios of wanting more vs. less immigration

Generation of immigrant & race/ethnicity



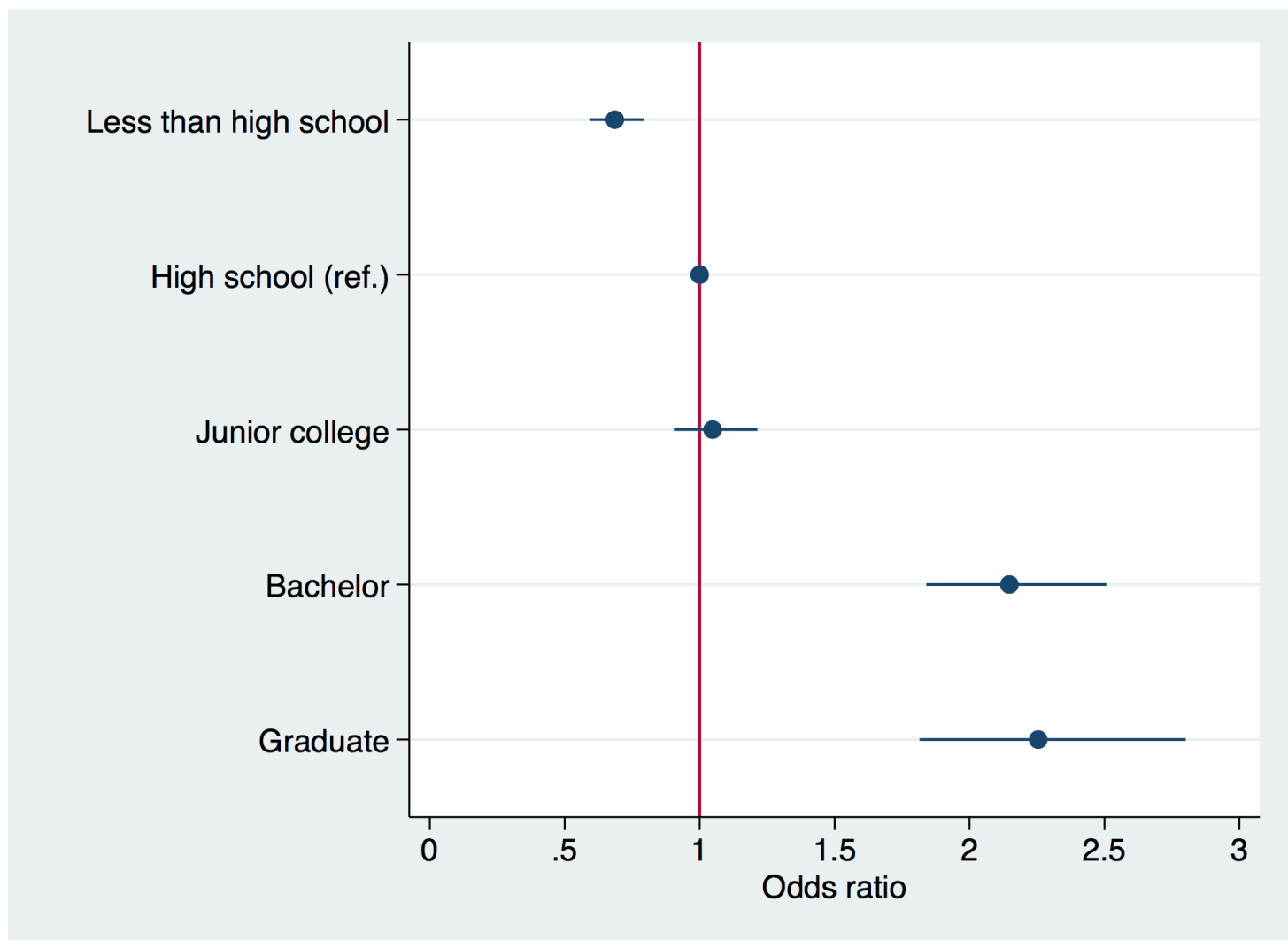
Odds ratios of wanting more vs. less immigration

Age group



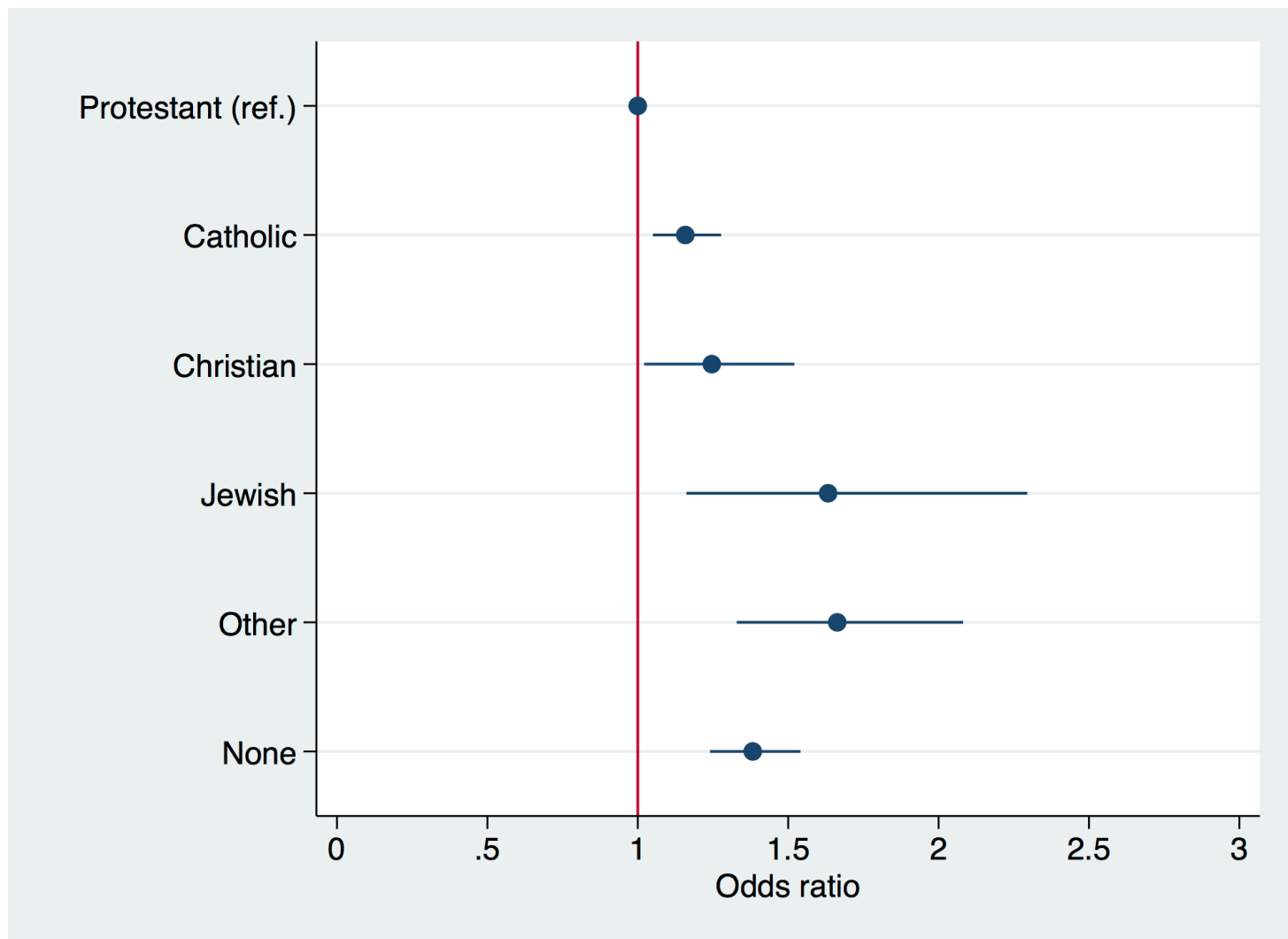
Odds ratios of wanting more vs. less immigration

Education



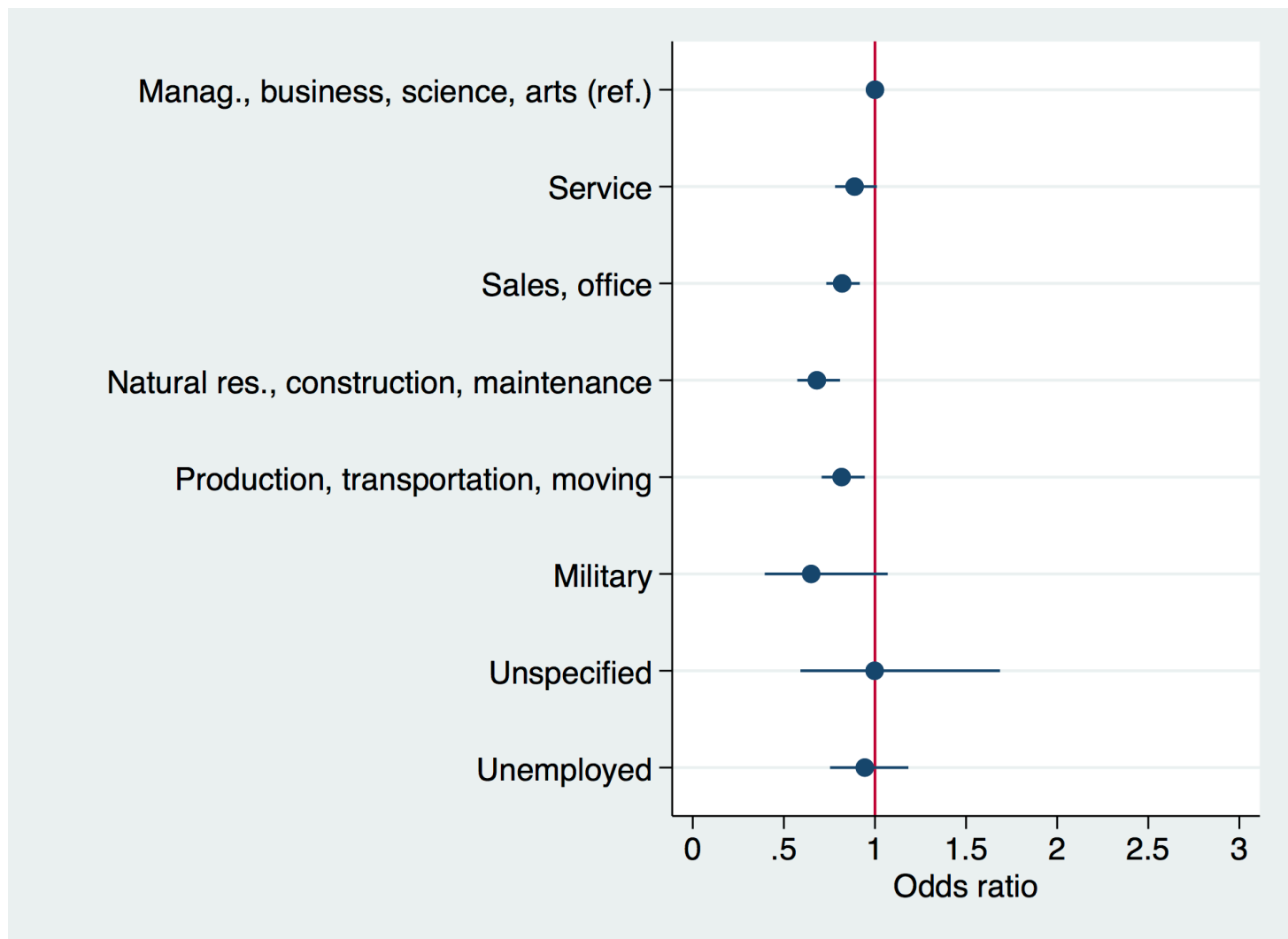
Odds ratios of wanting more vs. less immigration

Religion



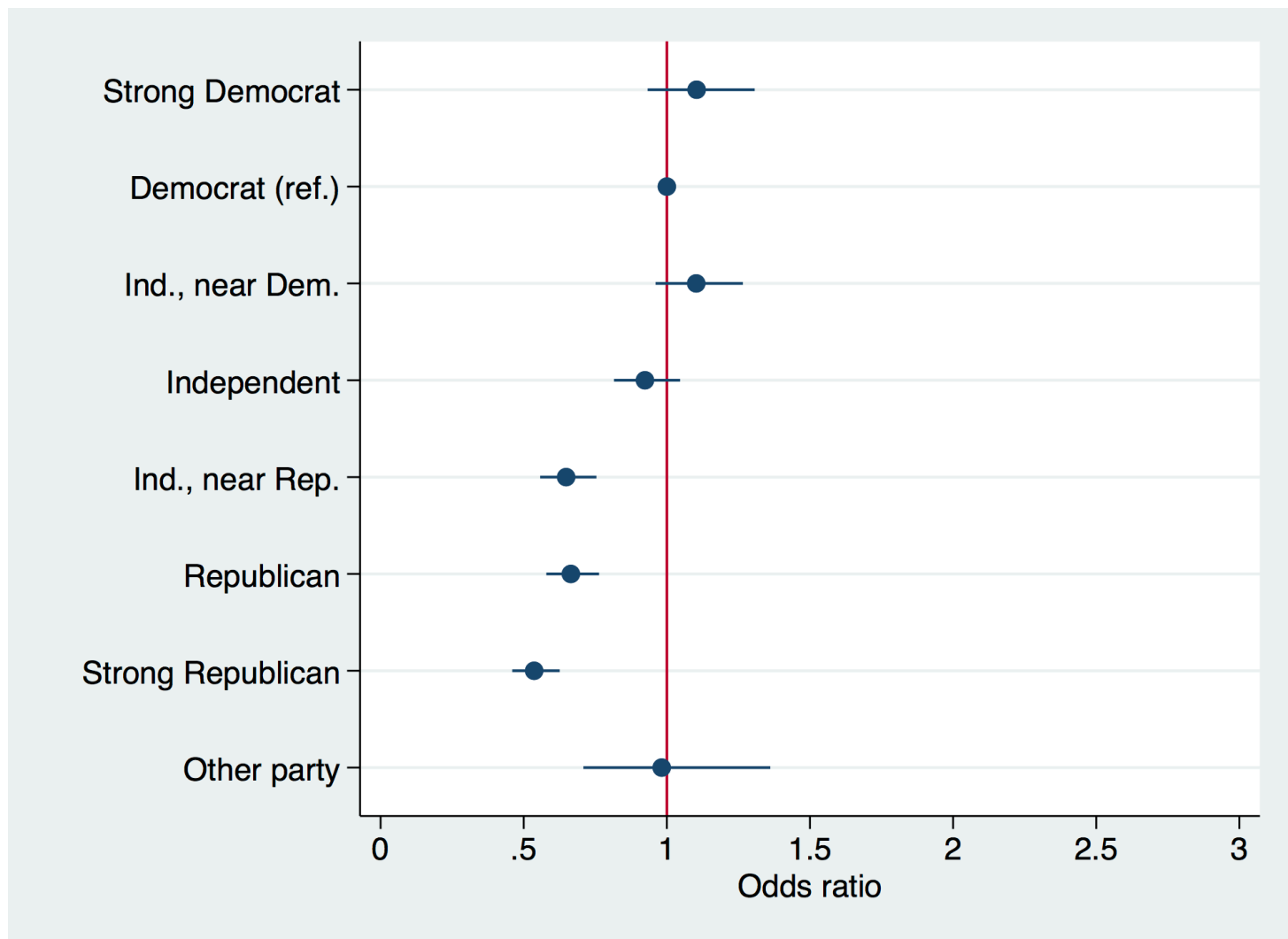
Odds ratios of wanting more vs. less immigration

Occupation



Odds ratios of wanting more vs. less immigration

Political party



County-level variables

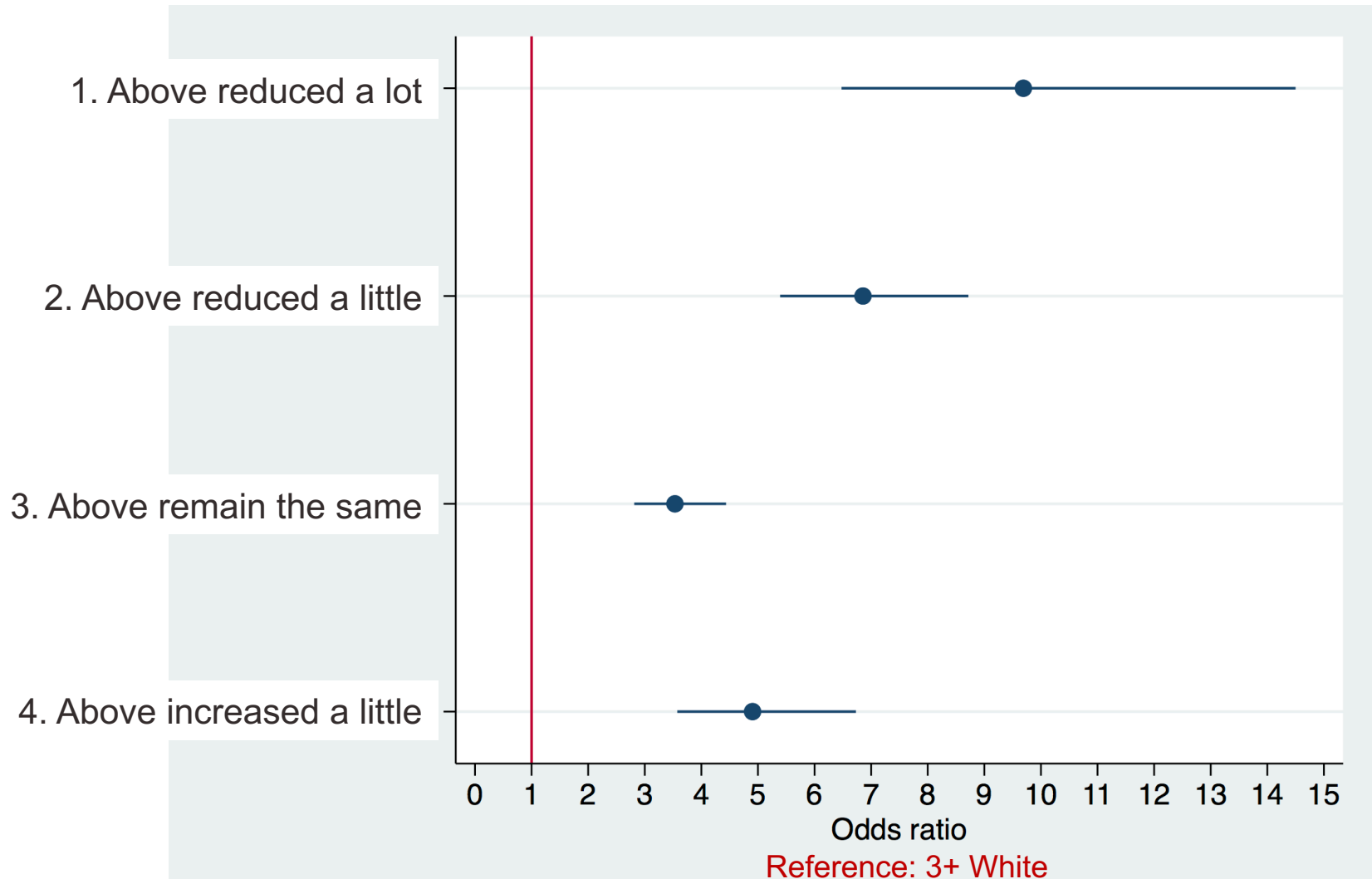
- People in the South Atlantic are less pro-immigration
- Proportion of college graduates & immigrants
 - 1% increase of college graduates: people are 1.4 times more likely to be more pro-immigration
 - 1% increase of immigrants: people are 2.2 times more likely to be more pro-immigration
- Proportion of unemployment & Protestants/Catholics
 - Increases associated with lower pro-immigration attitude
 - Not statistically significant
- Reverse causality
 - Exposure to immigrants shapes attitudes
 - Previous attitude influences selection of place of residence

Variations across the scale

- Models identify if independent variables have associations that vary throughout the migration attitude scale
- Following categories had different odds ratios
 - Generation/race/ethnicity: 3+ Black, 1st Hispanic, 2nd Hispanic, 2nd Other
 - Age group: 18–24, 65–89
 - Educational degree: Less than HS, Bachelor, Graduate
 - Occupation: Military
 - Political party affiliation: Strong Democrat
 - Region of interview: Pacific

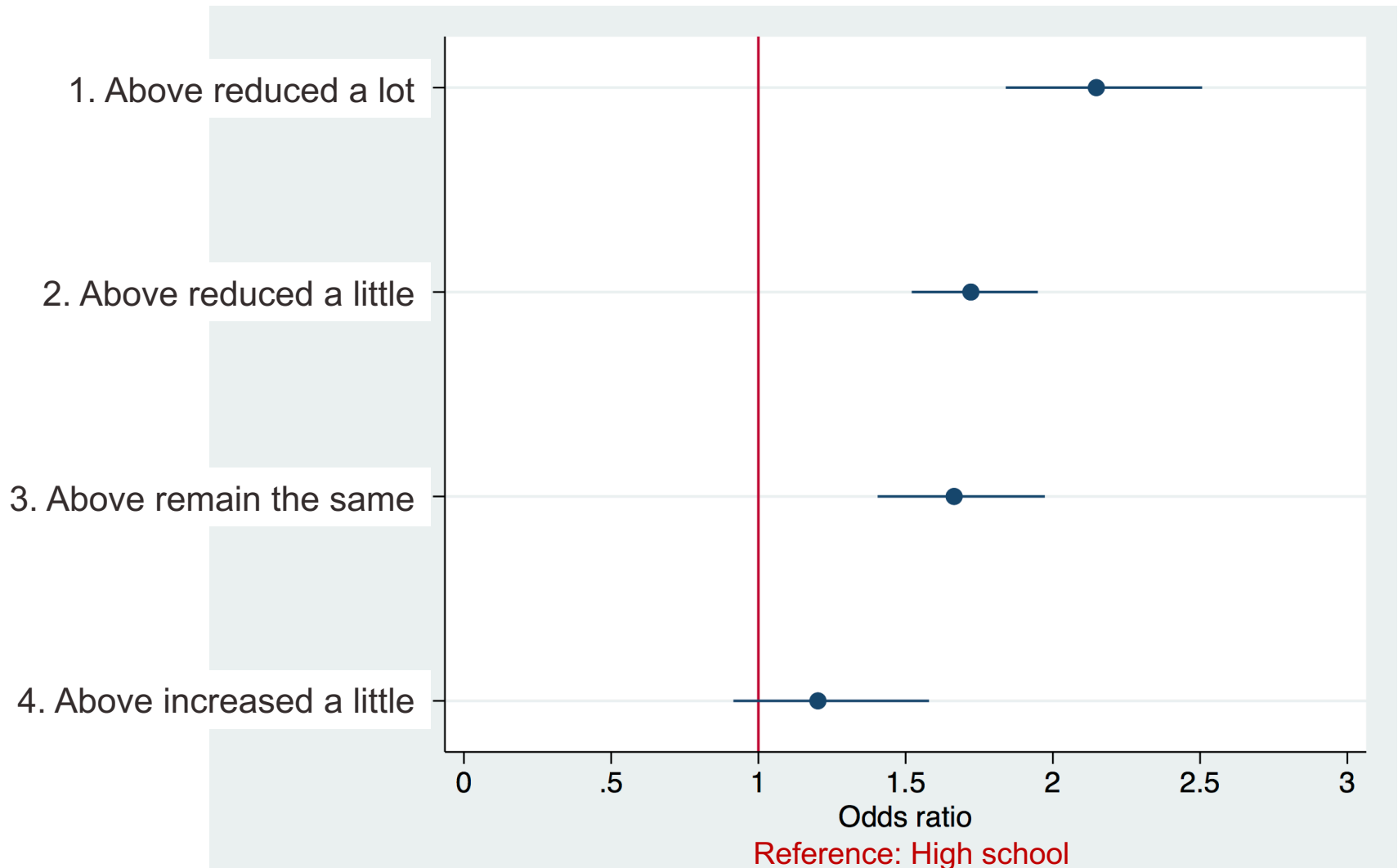
Odds ratios across migration attitude

1st Hispanic



Odds ratios across migration attitude

Bachelor

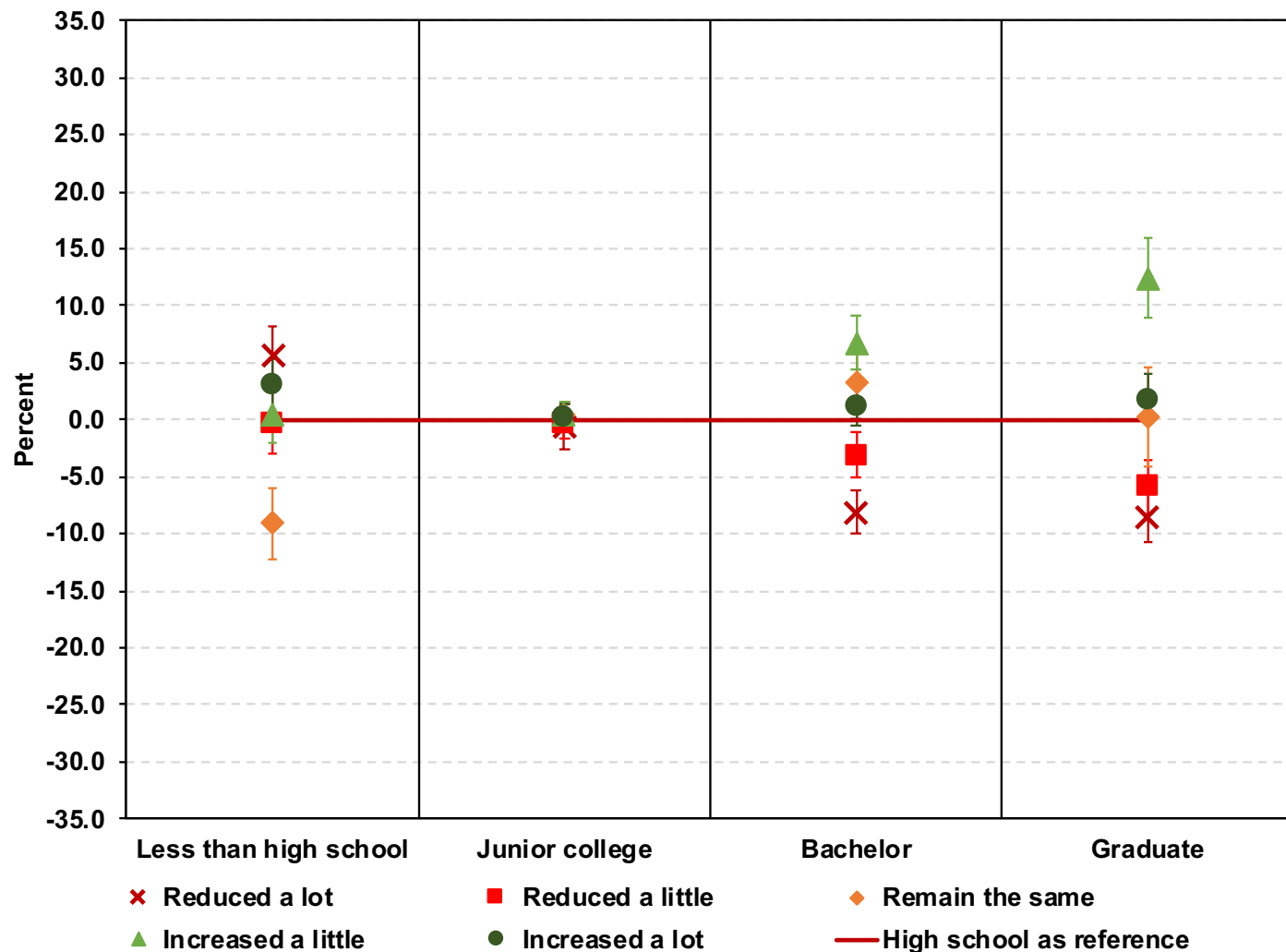


Marginal effects

- Indicate the effect that a change in each independent variable has on predicted probabilities
 - Estimate **individual** predicted probabilities for each category of an independent variable and the dependent variable
 - **Average** these probabilities by the independent and dependent variables
 - Estimate **difference to reference category** for each value of the dependent variable
- Examples: education, political party, generation/race/ethnicity...

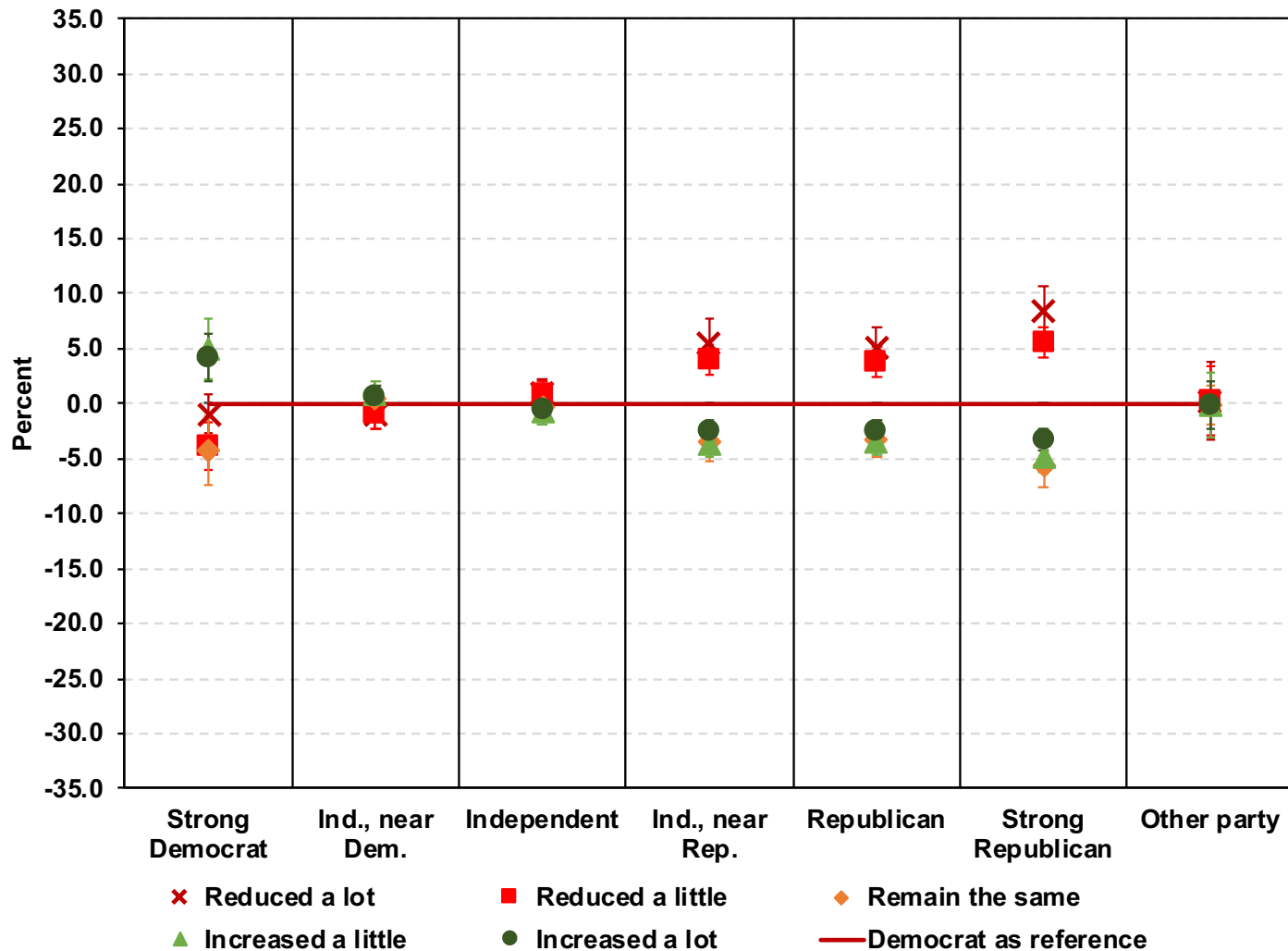
Marginal effects: education

Based on average of individual predicted probabilities at these values:
2018, Men, 25–44, Protestant, Management, South Atlantic



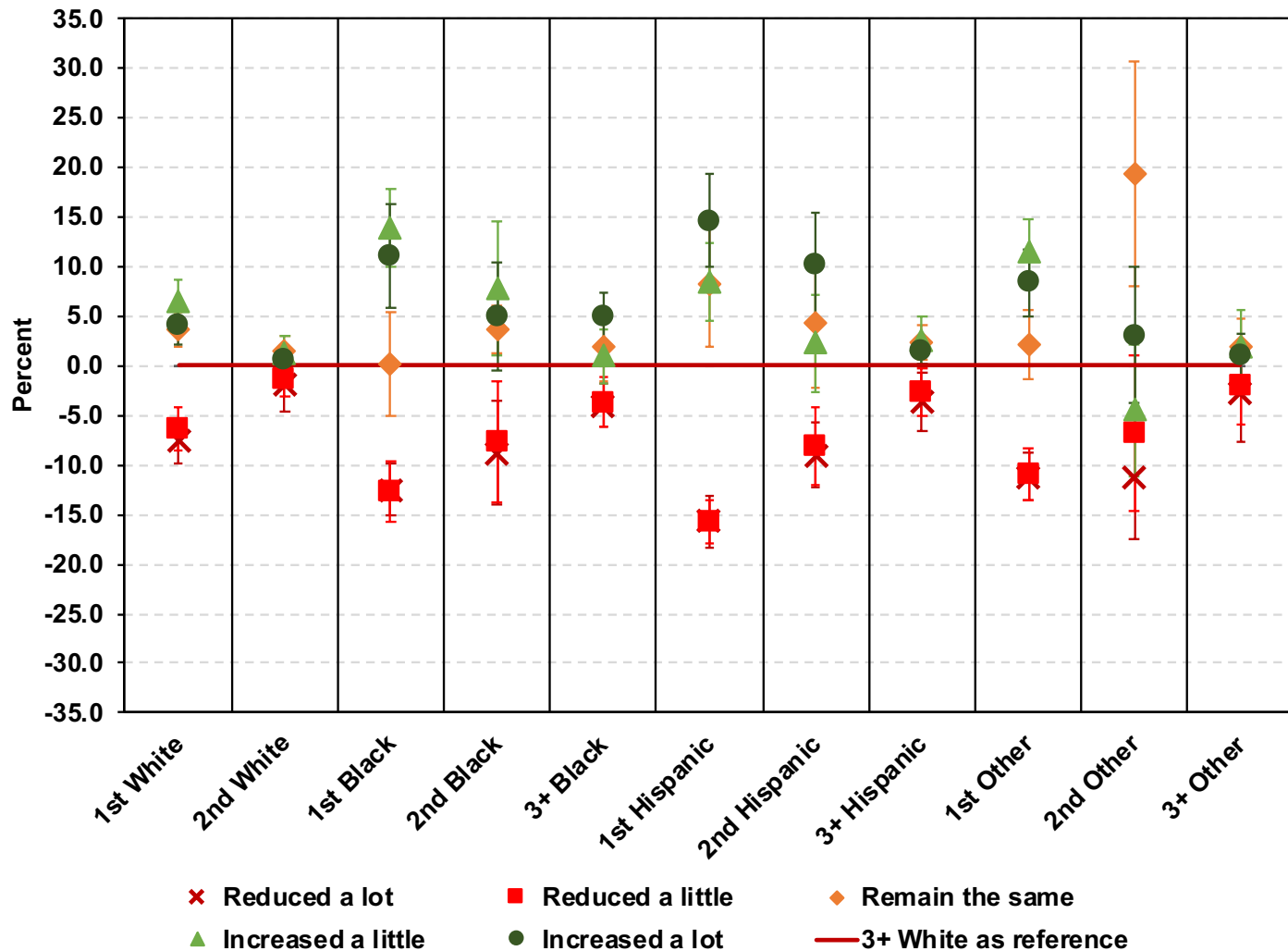
Marginal effects: political party

Based on average of individual predicted probabilities at these values:
2018, Men, 25–44, Protestant, Management, South Atlantic



Marginal effects: gen./race/ethnicity

Based on average of individual predicted probabilities at these values:
2018, Men, 25–44, Protestant, Management, South Atlantic



Final considerations

- ***Social identity seems to be main driver of attitudes***
 - 1st gen. Hispanics tend to be more pro-immigration
- ***Social class difference in terms of attitudes***
 - Pro-immigration:
 - Higher educational attainment
 - Those living in counties with higher proportions of college graduates
 - Anti-immigration
 - Lower end of the occupational stratum
- ***Social interactions shape pro-immigration attitudes***
 - Those living in counties with higher proportions of immigrants
- ***Other factors that increase pro-immigration attitudes***
 - Support for immigration has been increasing over time
 - 18–24 age group
 - Non-Protestants
 - Those with liberal political inclinations

Current research project

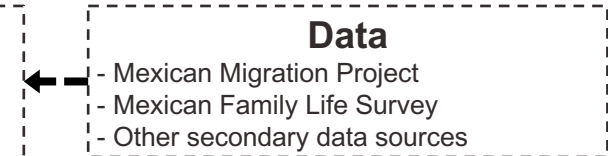
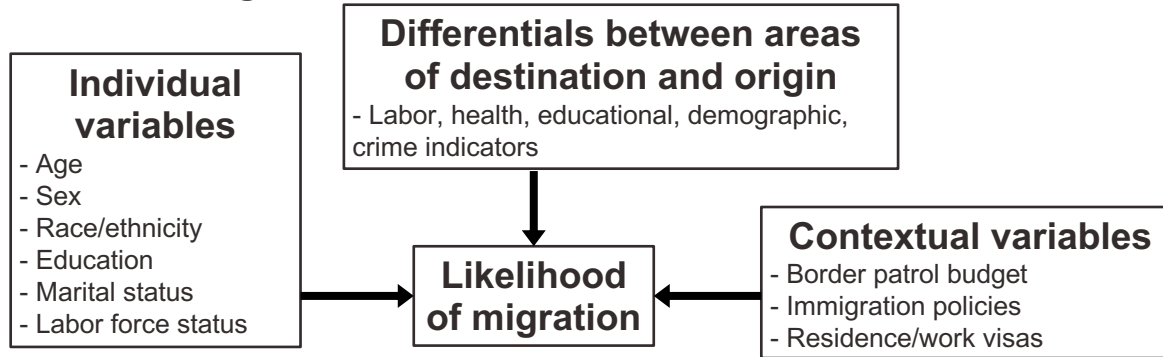
- Estimate factors associated with internal and international migration flows at the local level in the US
 - 1950–2000 Demographic Censuses
 - 2005–2018 American Community Surveys (ACS)
- Analyze restricted data at the Texas Research Data Center (TXRDC)
 - Block group and county of current residence
 - County of residence five years (census) or one year (ACS) before the survey
- Spatial models
 - Influence of neighboring areas at origin and destination on the likelihood of migrating, using a Bayesian statistics approach
(Anselin, Rey 2014; LeSage, Pace 2008, 2009)

Research agenda

- Estimate effects of our predicted migration flows on local **labor, health, and educational outcomes**
- Integrate **external data sources** to include other covariates into our models by county
- Investigate **Mexico-U.S. migration** by merging Census Bureau data to other surveys
- Include a **longitudinal analysis** by linking individuals through time across censuses and surveys (Alexander et al. 2015; Logan, Stults, Xu 2016; Logan, Xu, Stults 2014; Wagner, Layne 2014)
- Conduct **immigration policy simulations** to inform policymakers on the impacts of various policy options
- **Simulate future migration flows** under different hypothetical scenarios (Massey, Zenteno 1999; Klabunde, Willekens 2016)

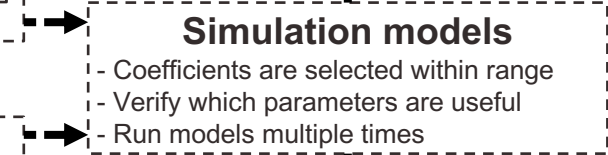
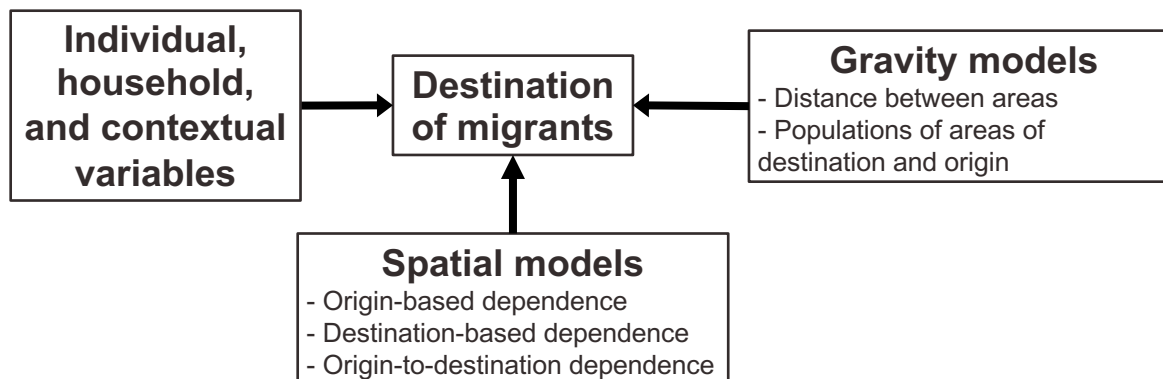
Model migration flows in the US

First set of regressions

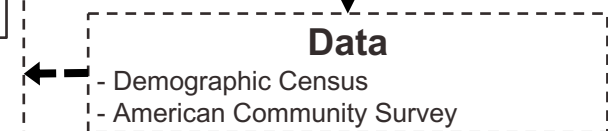


Calibration

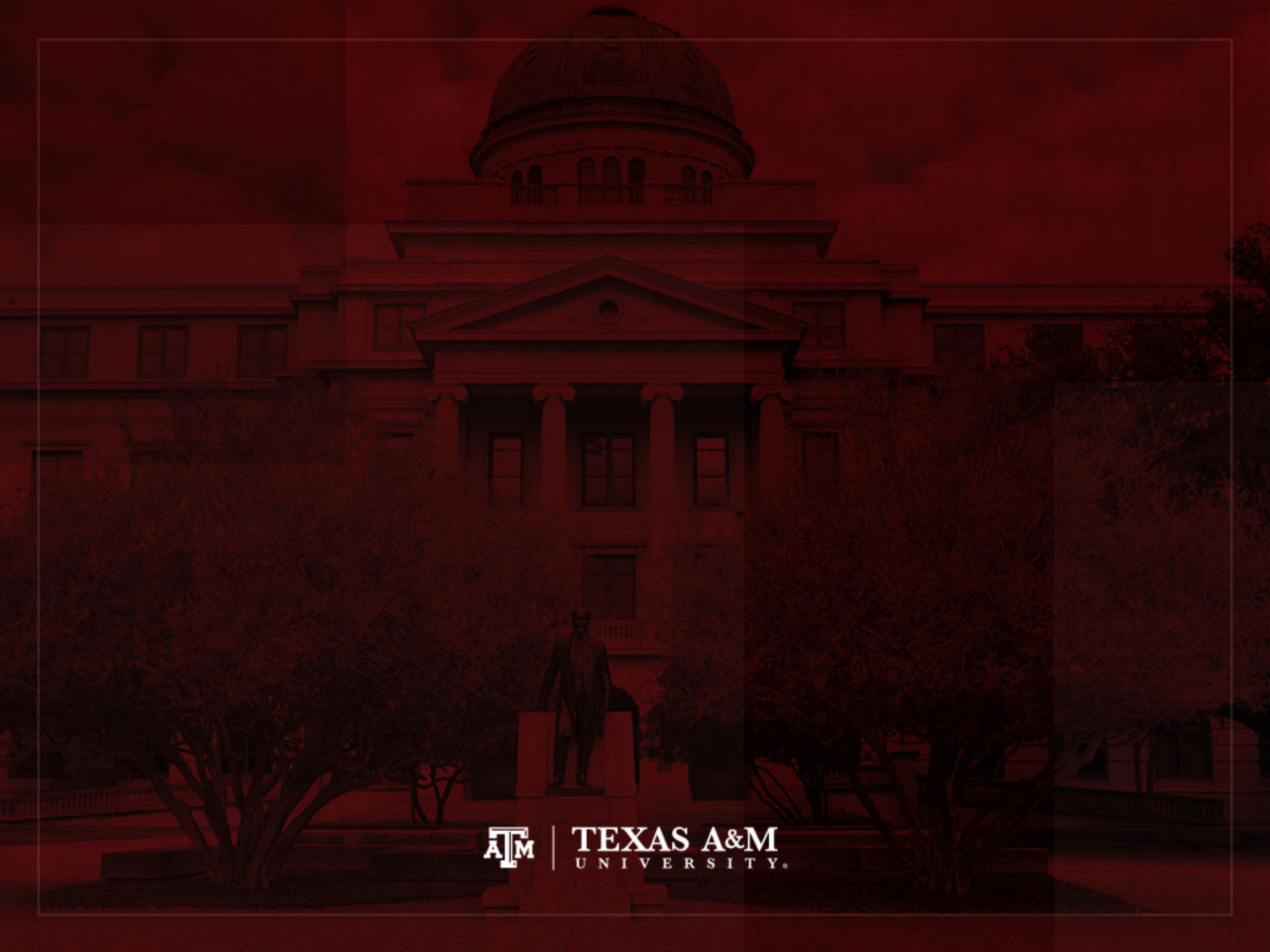
Second set of regressions



Calibration



Conditional on being a migrant



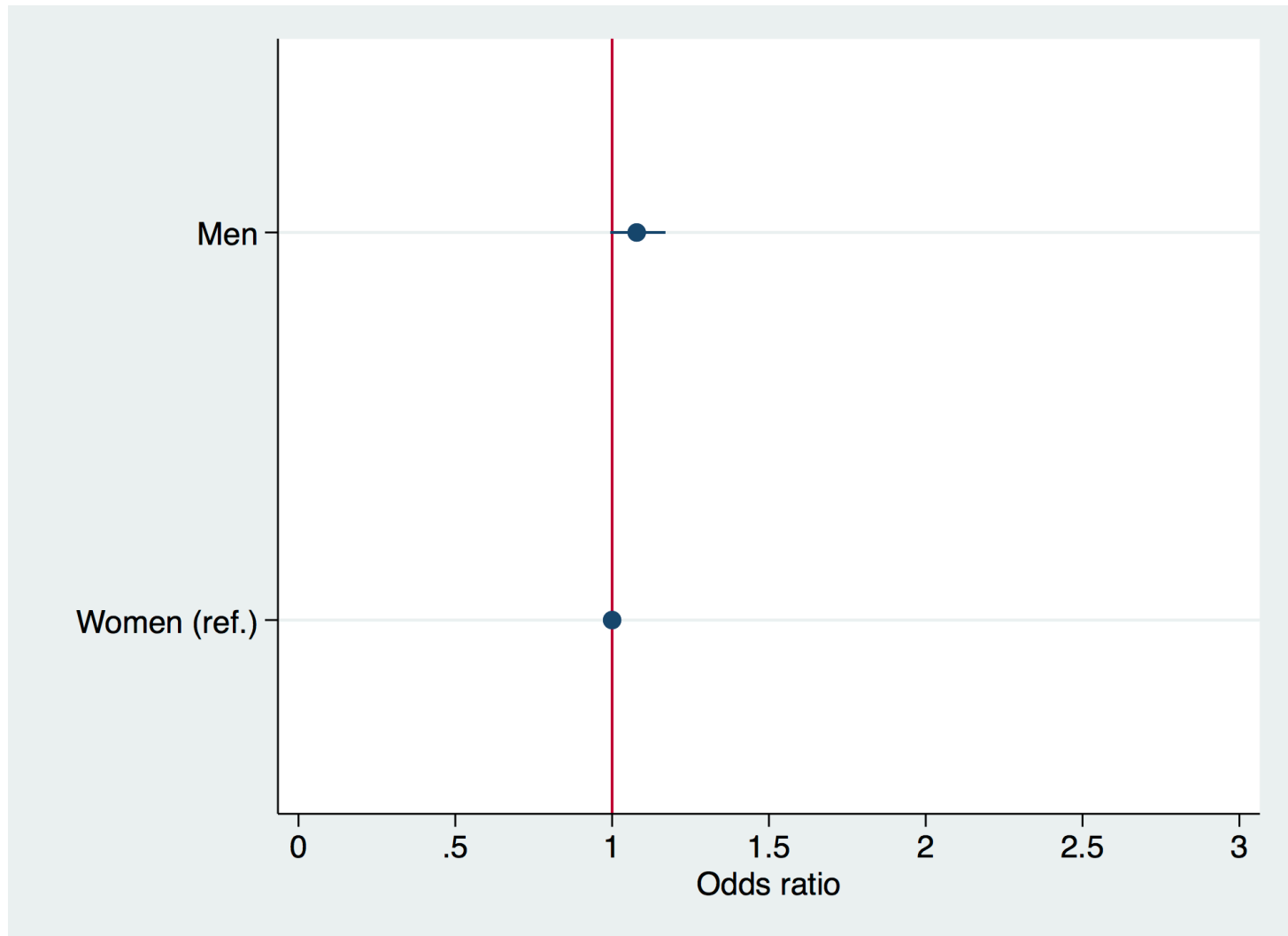
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Sample selection

- Opinion of respondents about how should the number of immigrants to American be nowadays
 - 1996, 2004, 2006, 2008, 2010, 2012, 2014, 2016, 2018
- We investigate only data starting in 2004
 - Because Hispanic origin is available since 2000

Odds ratios of more vs. less immigration

Sex

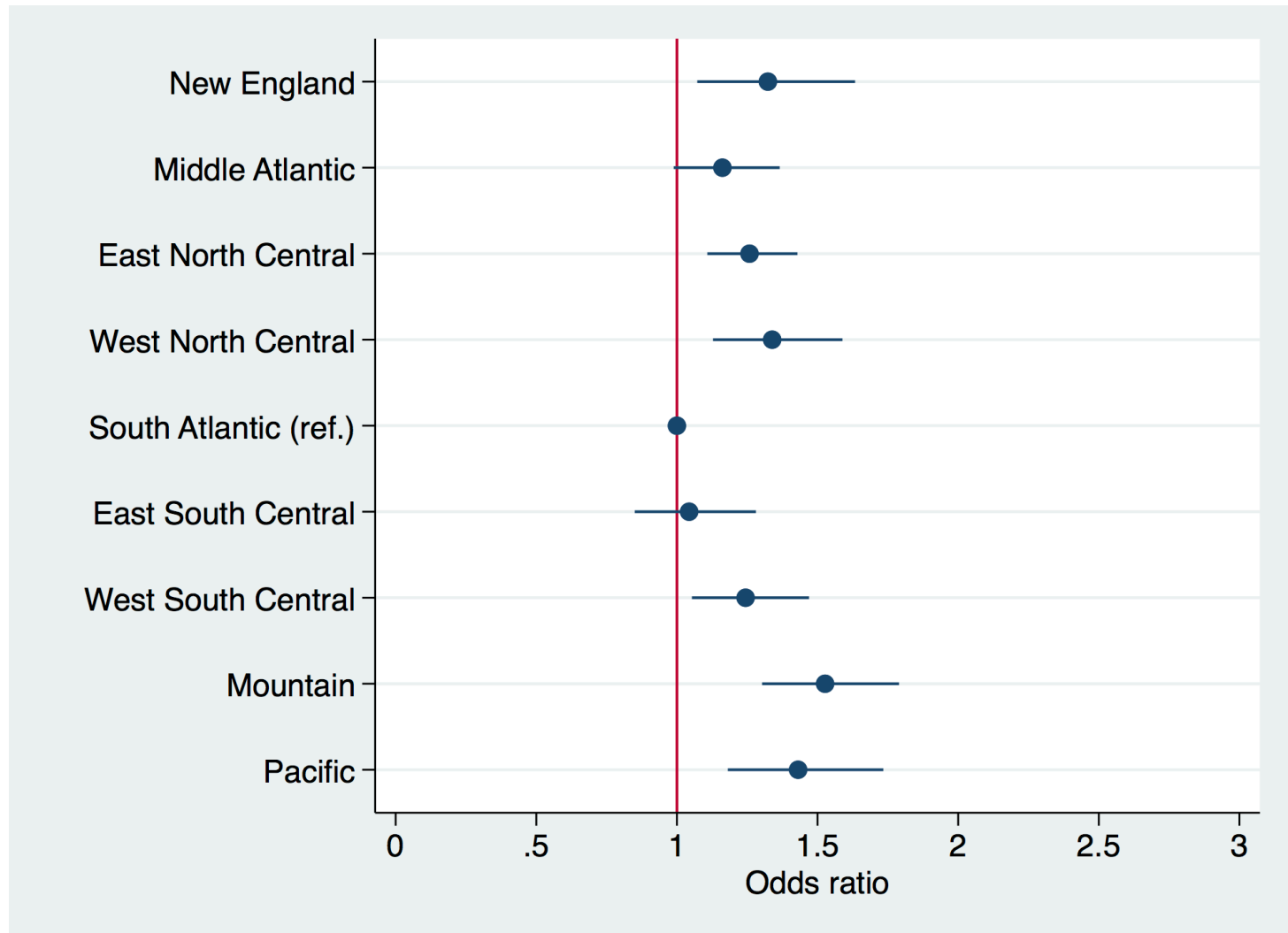


Region of interview

1. **New England:** Maine, Vermont, New Hampshire, Massachusetts, Connecticut, Rhode Island
2. **Middle Atlantic:** New York, New Jersey, Pennsylvania
3. **East North Central:** Wisconsin, Illinois, Indiana, Michigan, Ohio
4. **West North Central:** Minnesota, Iowa, Missouri, North Dakota, South Dakota, Nebraska, Kansas
5. **South Atlantic:** Delaware, Maryland, West Virginia, Virginia, North Carolina, South Carolina, Georgia, Florida, District of Columbia
6. **East South Central:** Kentucky, Tennessee, Alabama, Mississippi
7. **West South Central:** Arkansas, Oklahoma, Louisiana, Texas
8. **Mountain:** Montana, Idaho, Wyoming, Nevada, Utah, Colorado, Arizona, New Mexico
9. **Pacific:** Washington, Oregon, California, Alaska, Hawaii

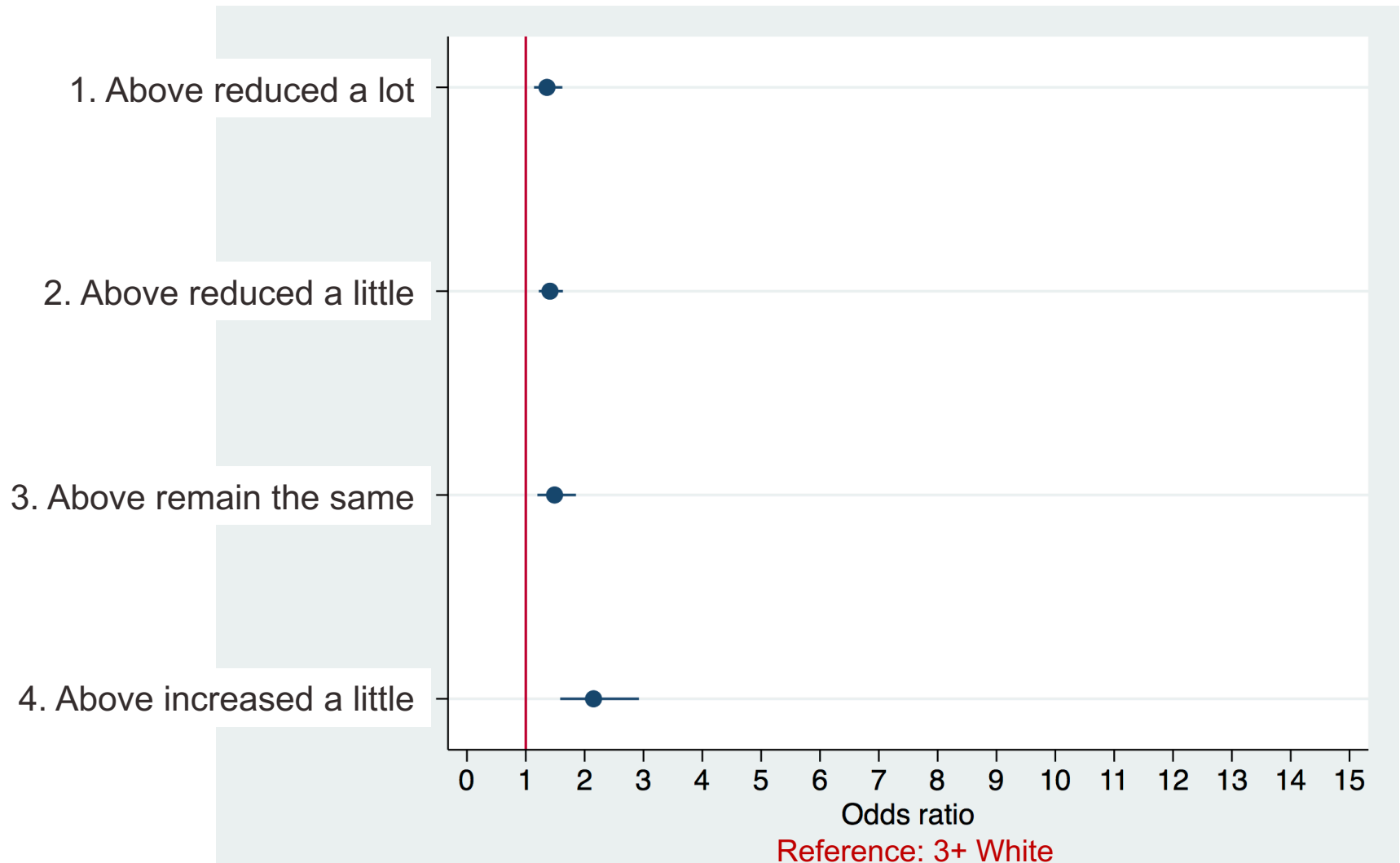
Odds ratios of more vs. less immigration

Region of interview



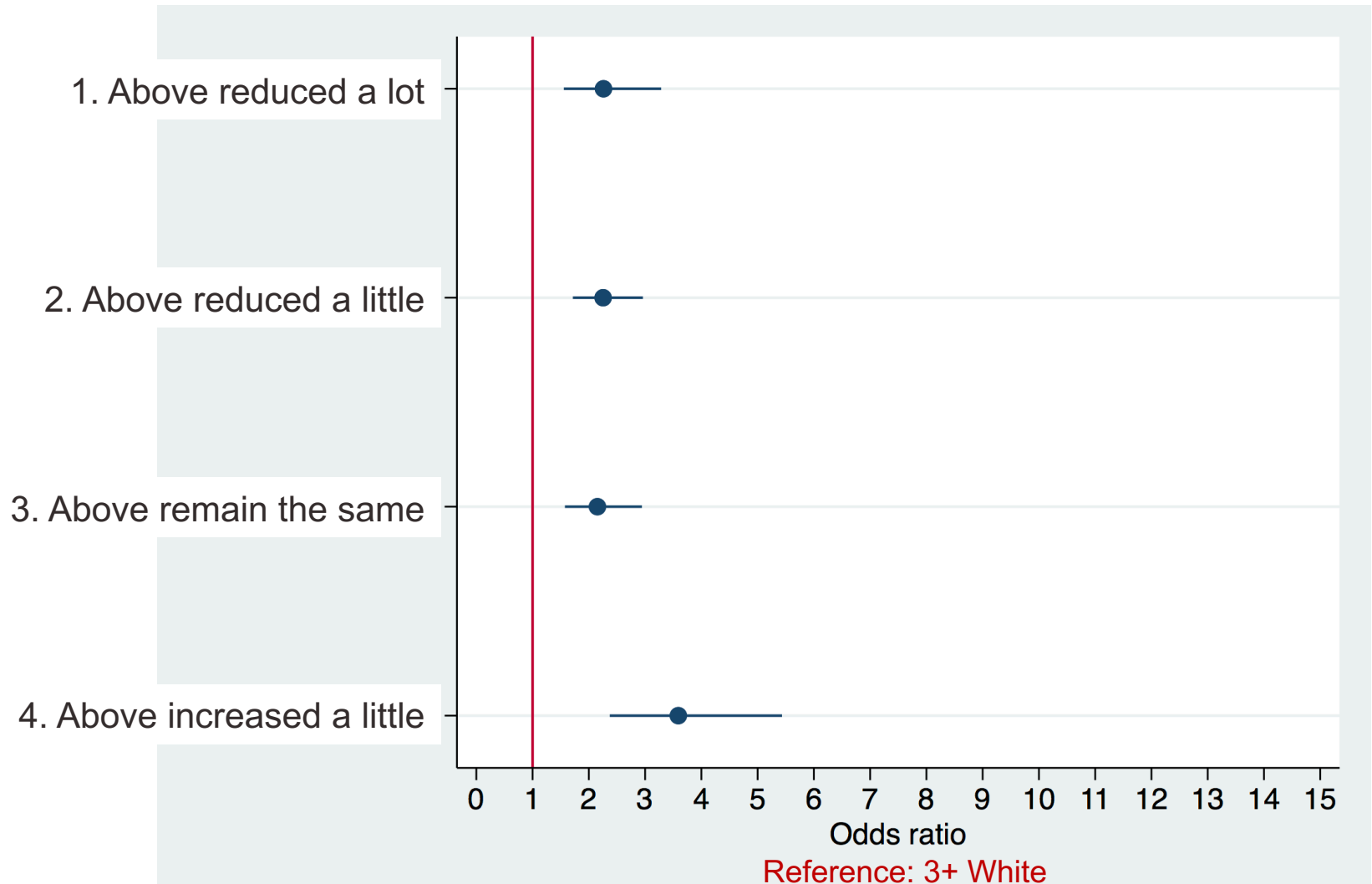
Odds ratios across migration attitude

3+ Black



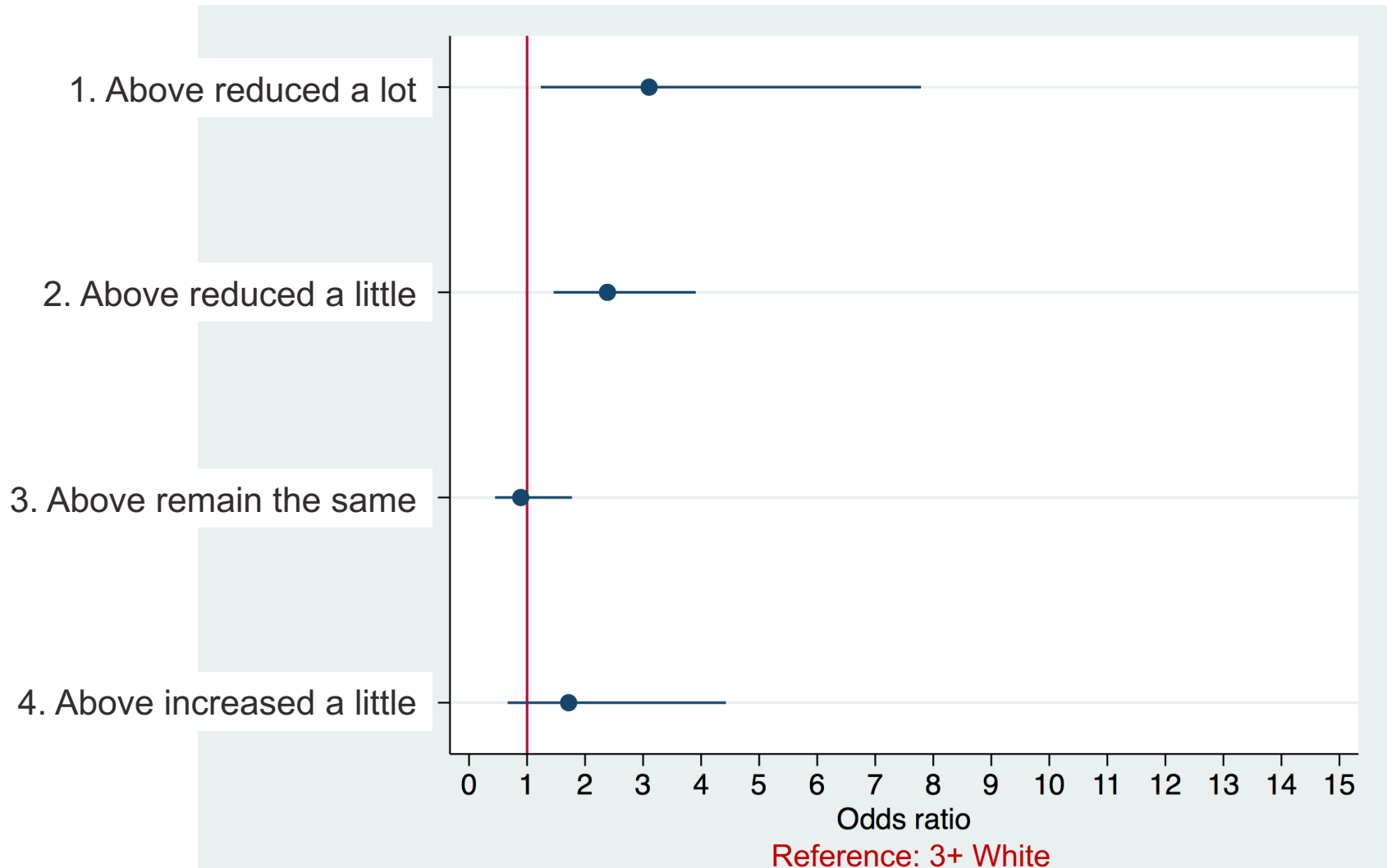
Odds ratios across migration attitude

2nd Hispanic



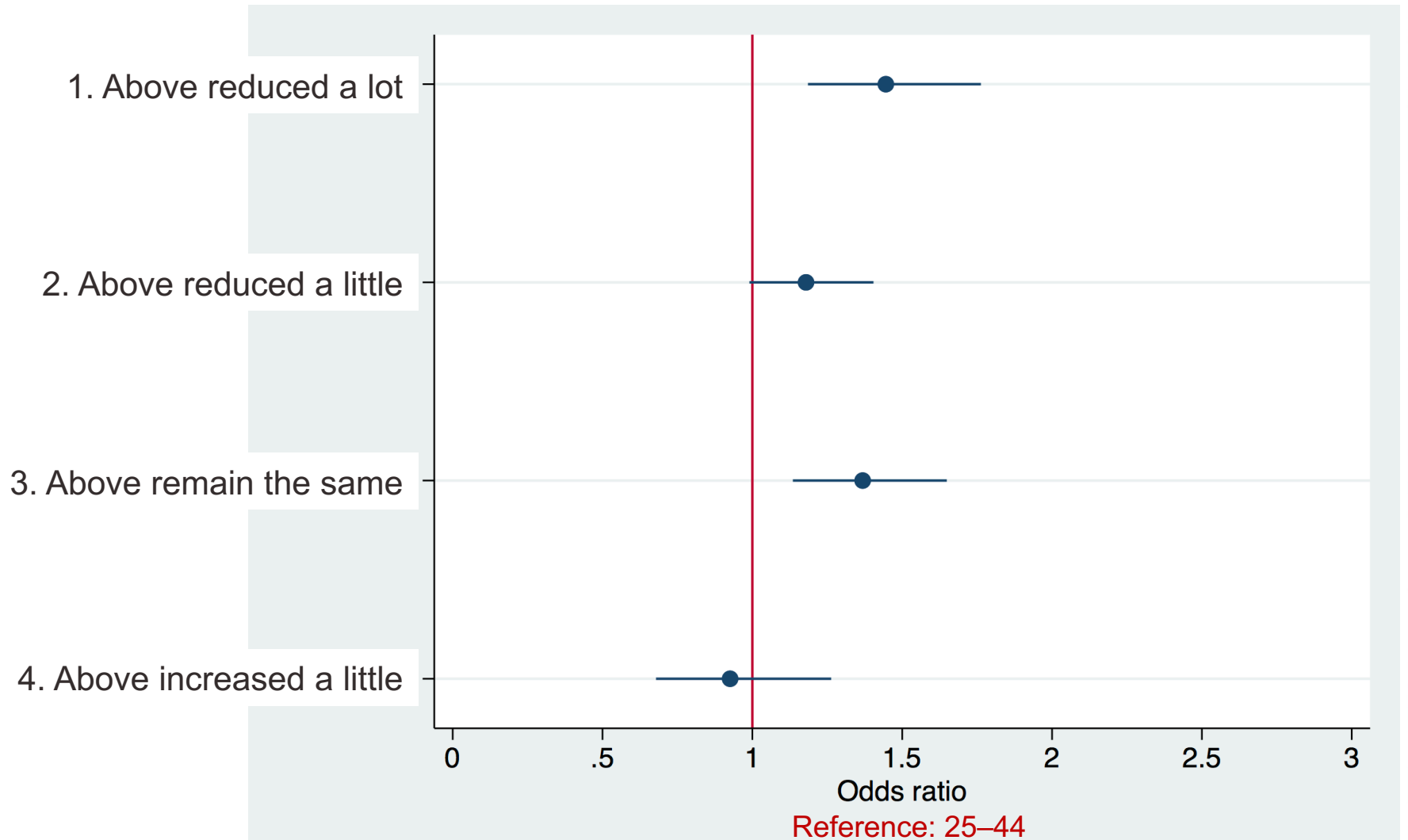
Odds ratios across migration attitude

2nd Other



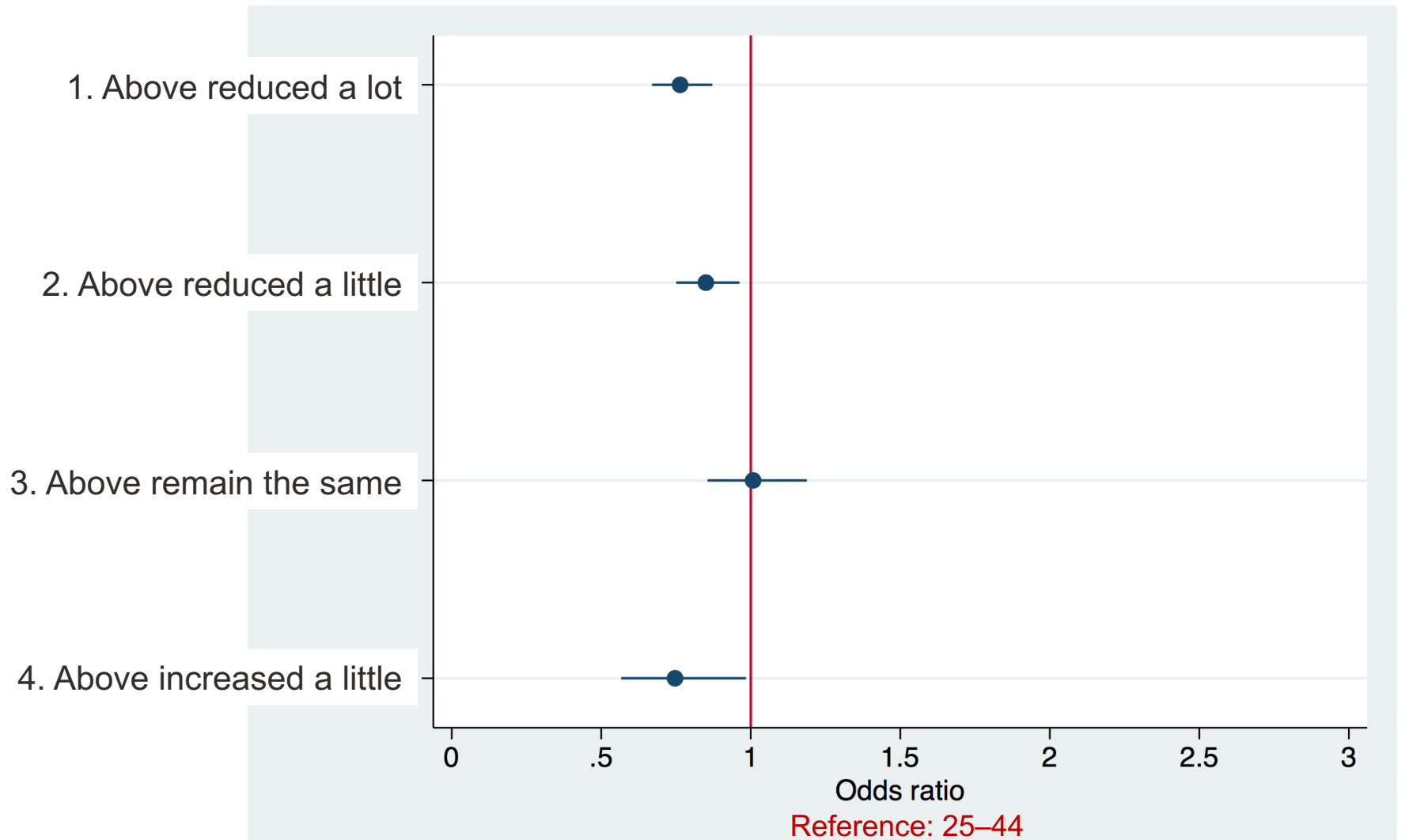
Odds ratios across migration attitude

18–24



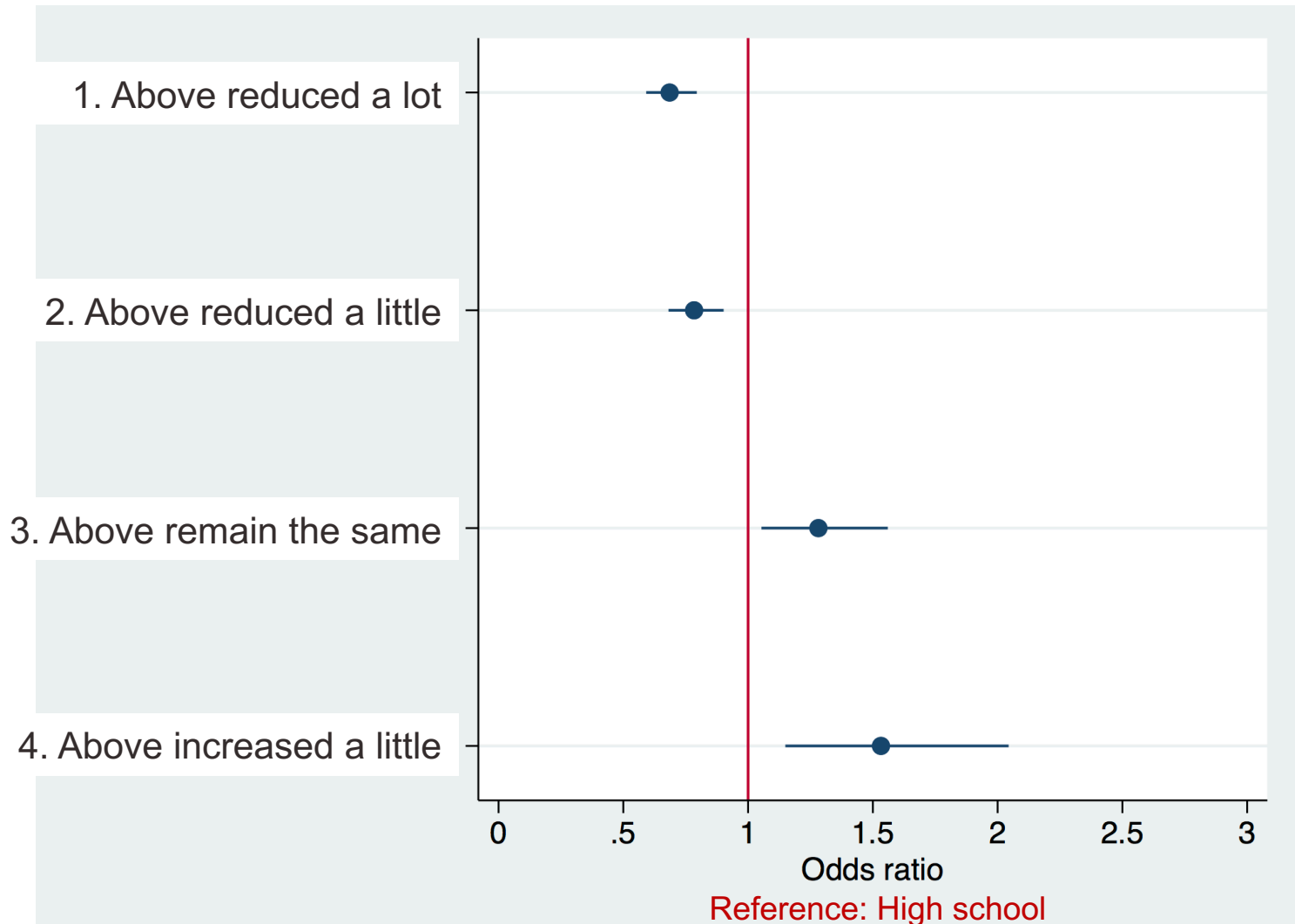
Odds ratios across migration attitude

65–89



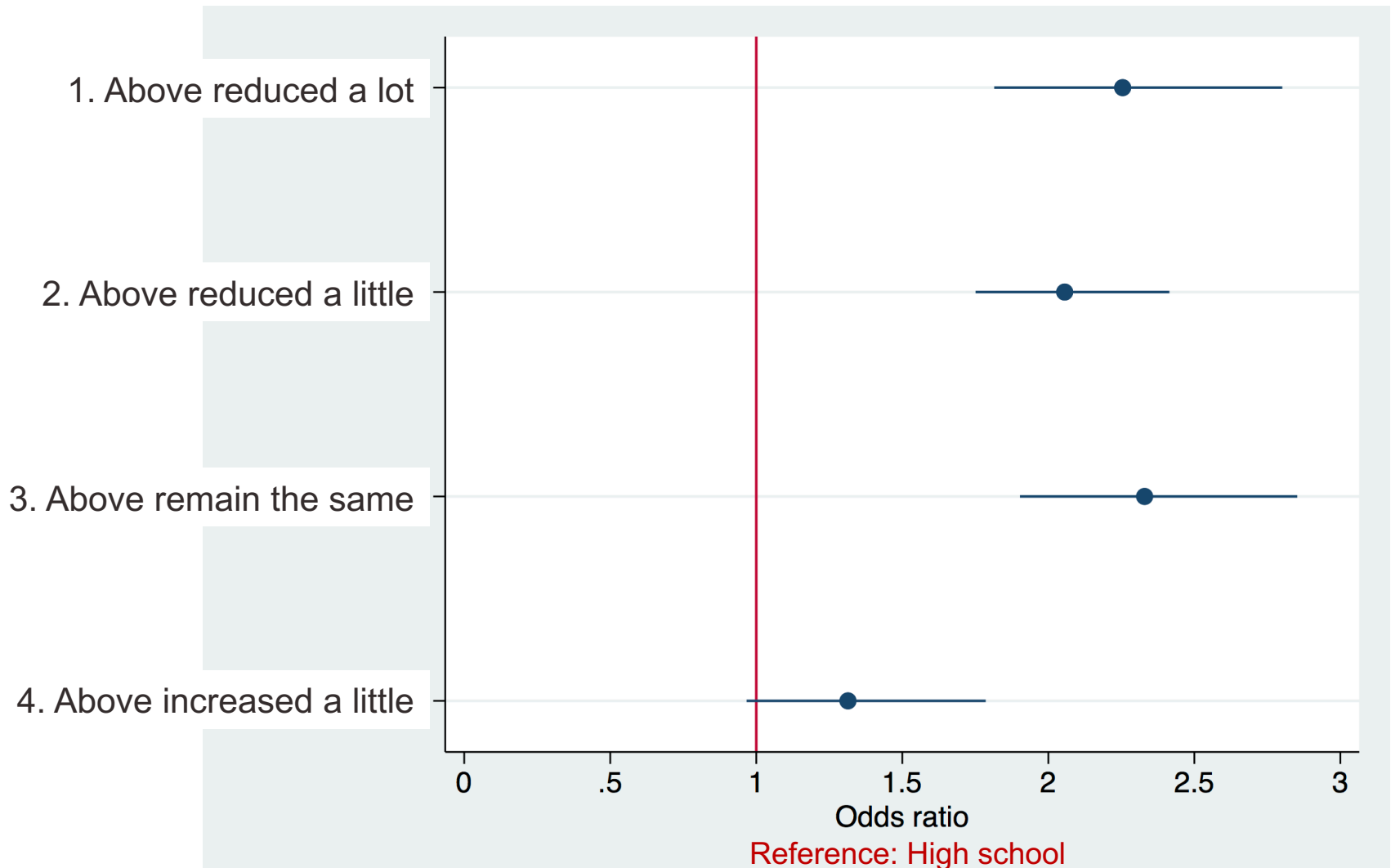
Odds ratios across migration attitude

Less than high school



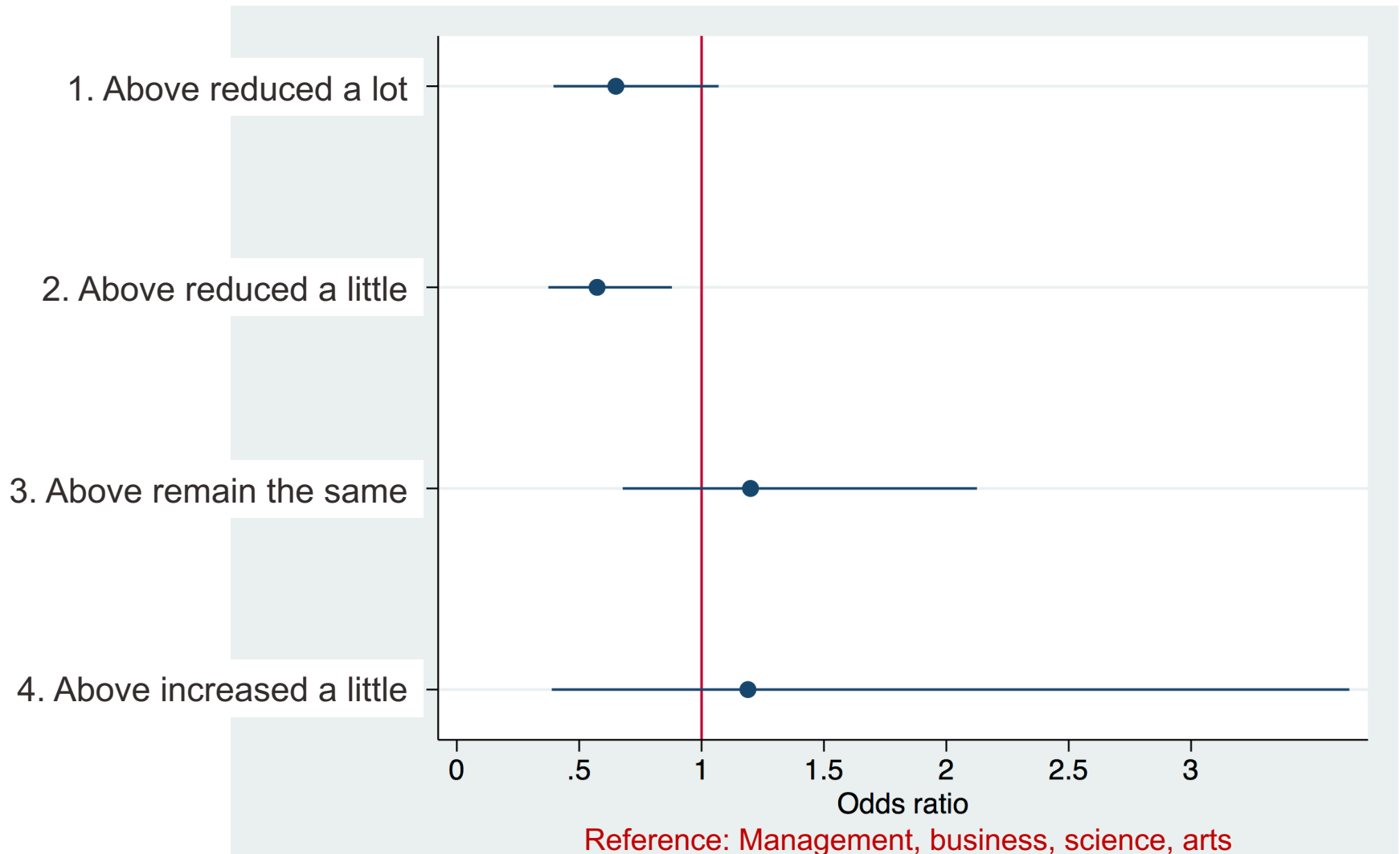
Odds ratios across migration attitude

Graduate



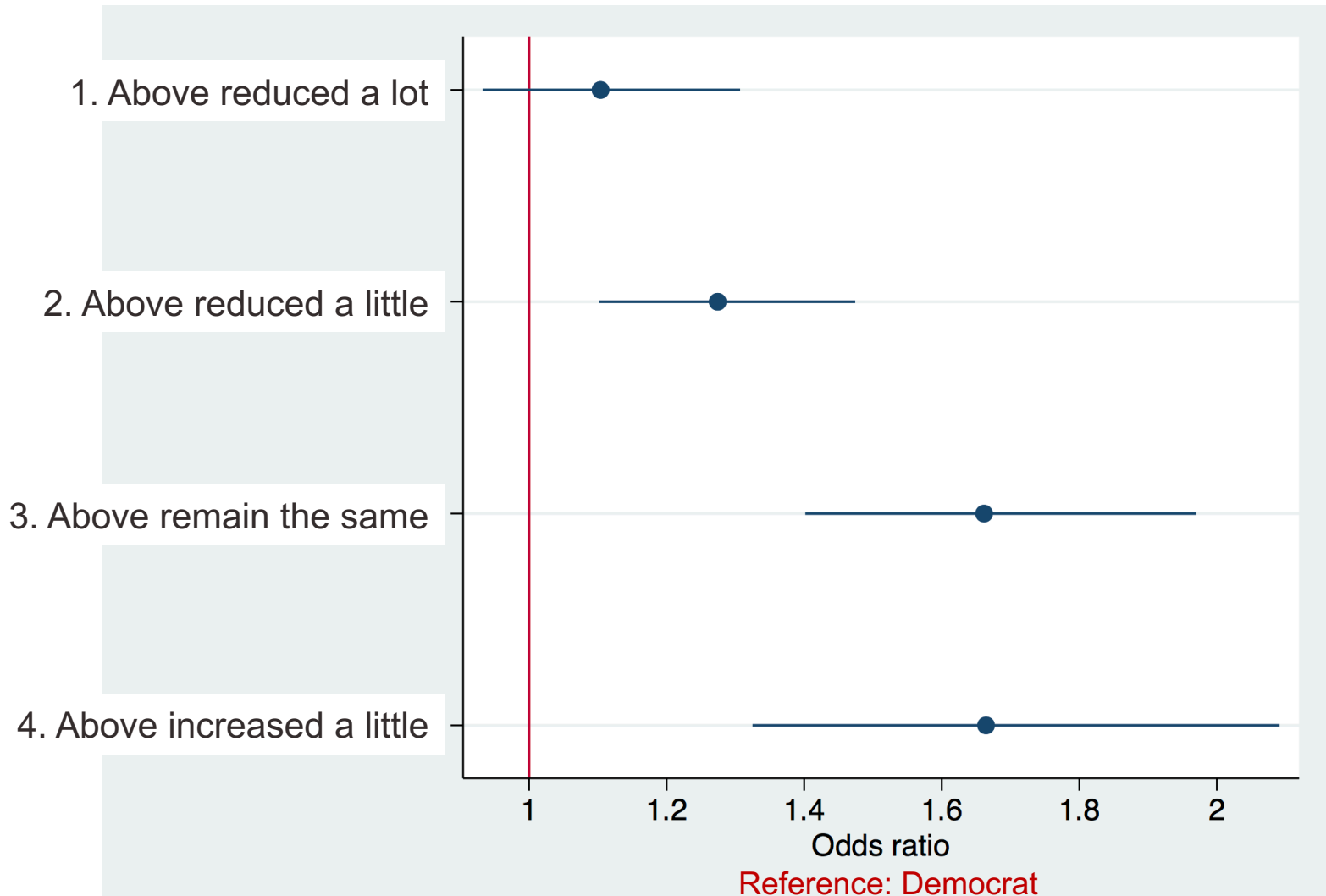
Odds ratios across migration attitude

Military



Odds ratios across migration attitude

Strong Democrat



Odds ratios across migration attitude

Pacific

