

# Party Allegiance on the Long Ballot: Evidence from South Carolina Ballot Image Logs

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**Motivation:** Are *national* and *local* electoral politics contested on the same partisan dimension?  
**Contribution:** Observed behavior on actual (not self-reported) individual vote choice.

## Data: Ballot Image Logs

Past work relies on either opinion surveys or ecological inference (cf. Gerber and Lewis, 2004).  
 Ballot image logs overcome measurement challenges inherent in surveys and aggregate data:

	Ballot Image Logs	Voter Files	Precinct Returns	Surveys
Individual-level?	✓	✓		✓
Actual vote choice observed?	✓		✓	Self-report
Down-ballot races observed?	✓		✓	
No selection / sampling error?	✓	✓	✓	
Linkable to commercial data?		✓		✓

The South Carolina Election Commission makes public all voters' ballot images.

## Coverage: All votes cast in South Carolina state elections, 2010-2018

General Election	Ballots	Average Number Contests per Ballot (approximate)				
		Federal	State Exec.	State Legis.	Local	Referenda
2010	1,132,656	2	9	1	5	5
2012	1,822,037	2	0	2	6	2
2014	1,193,467	3	9	1	4	3
2016	1,984,439	3	0	2	6	1
2018	1,642,820	1	9	1	3	2

## Example log of three voters (Charleston County - Awendaw)

Each ballot image shows voter's actual votes in all races (with precinct):

VOTER A	
10 Hillary Rodham Clinton	President and Vice President
18 Thomas Dixon	U.S. Senate
27 Dimitri Cherny	CON0001 U.S. House of Representatives
53 Peter J Tecklenburg	Auditor
61 Andrew C Smith.	County Treasurer
104 No	Question 1
107 No	Question 2

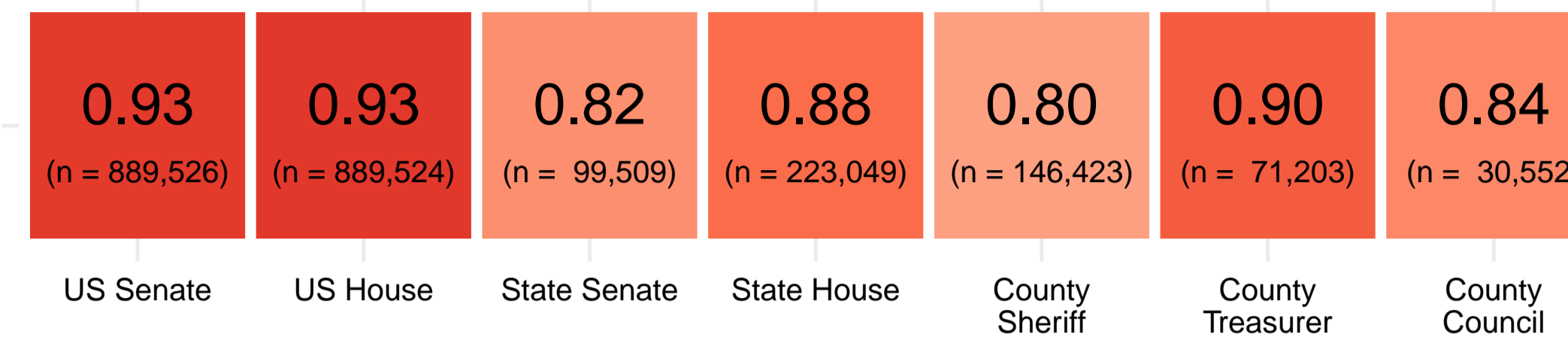
VOTER B	
14 Donald J Trump	President and Vice President
22 Tim Scott	U.S. Senate
30 Mark Sanford	CON0001 U.S. House of Representatives
35 Stephen Goldfinch	SEN0034 State Senate
38 Lee Hewitt	HOU0108 State House of Representatives
41 Scarlett Wilson	Solicitor Circuit 9
44 Al Cannon	Sheriff
47 Julie J Armstrong	Clerk of Court
50 Rae H Wooten	Coroner
54 Elizabeth Moffly	Auditor
59 Mary E Tinkler.	County Treasurer
64 John H Smoak	Soil and Water District Commission
68 Tony E Lewis	CSB City of Charleston
71 Chris Collins	CSB North Area
74 Louis L Smith	CSB North Area
78 Priscilla Jeffery	CSB West Ashley
80 Michael Miller	CSB West Ashley
84 Anita Renee Alston-Gore	SCH0001 Con SB St James Santee District
88 Juanita M Middleton	SCH0001 Con SB St James Santee District
89 Samuel N Robinson	SCH0001 Con SB St James Santee District
104 No	Question 1
107 No	Question 2

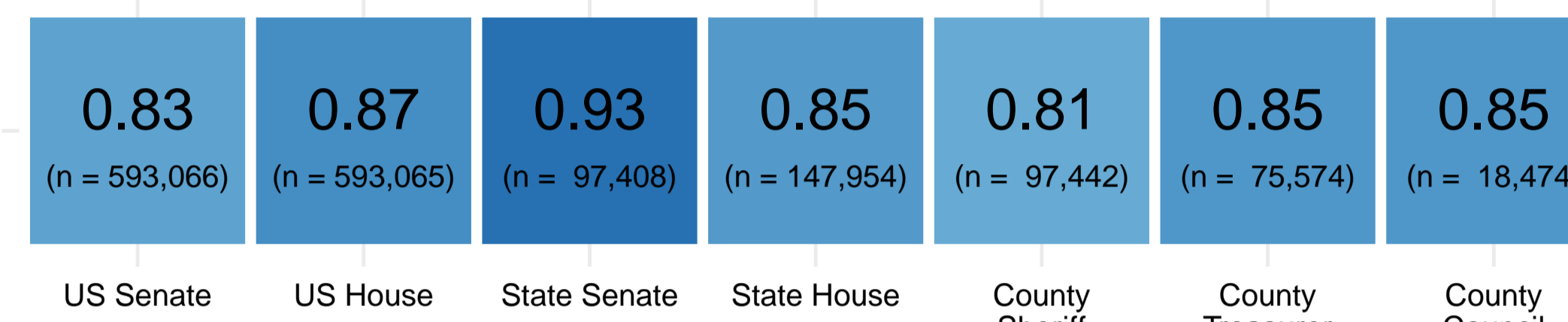
VOTER C	
1 Democratic	STRAIGHT PARTY
10 Hillary Rodham Clinton	President and Vice President
18 Thomas Dixon	U.S. Senate
27 Dimitri Cherny	CON0001 U.S. House of Representatives
44 Al Cannon	Sheriff
47 Julie J Armstrong	Clerk of Court
53 Peter J Tecklenburg	Auditor
59 Mary Tinkler	County Treasurer
84 Anita Renee Alston-Gore	SCH0001 Con SB St James Santee District
86 Thomas L Colleton Jr	SCH0001 Con SB St James Santee District
87 Erma J Harrell	SCH0001 Con SB St James Santee District
103 Yes	Question 1
106 Yes	Question 2

## Voters Split their Ticket between Partisan Offices

Proportion Voting for the same party as President, 2016  
 Among Trump Voters



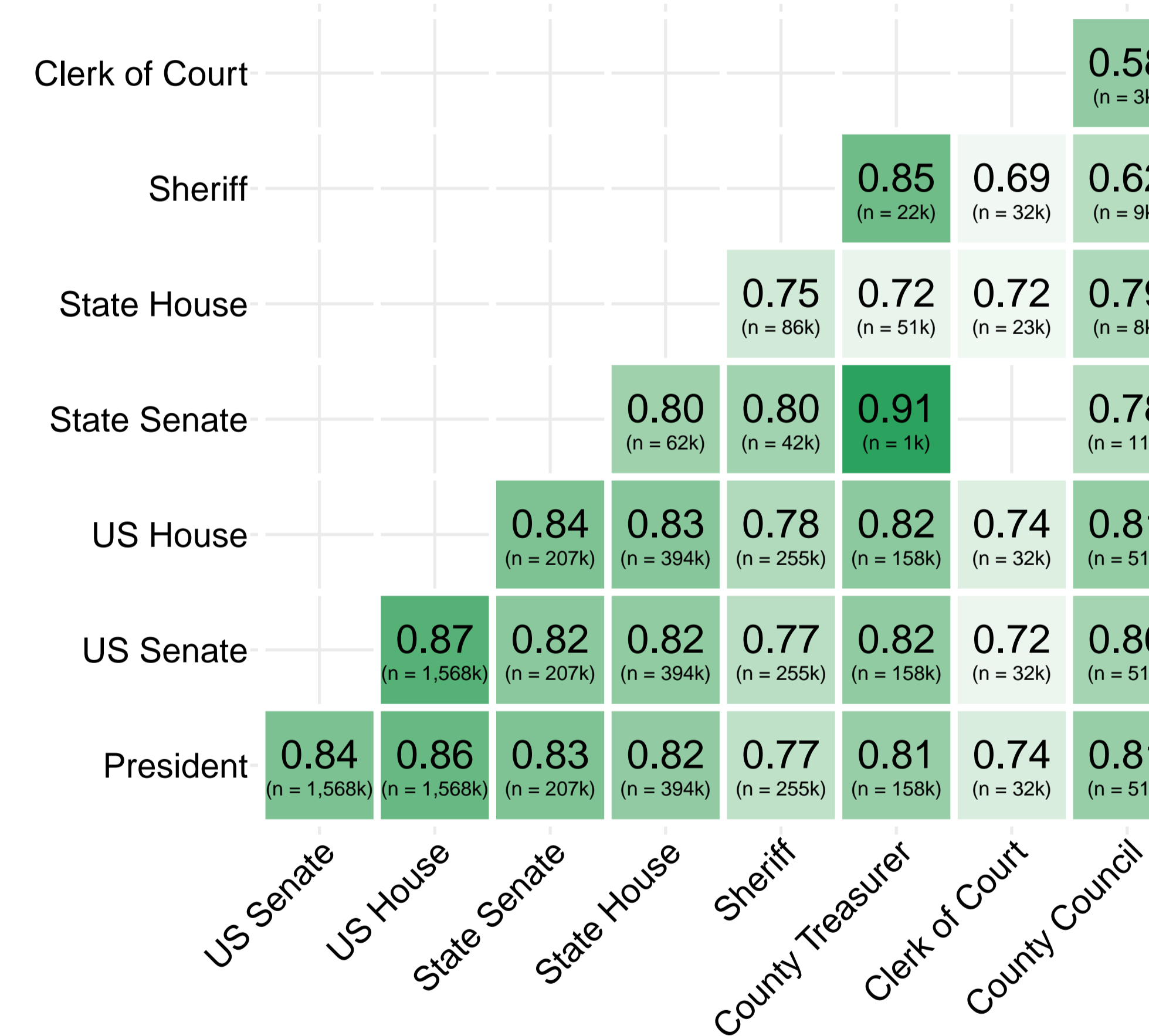
Among Clinton Voters



Each cell shows proportion of straight-ticket voters in districts where the down-ballot race was contested by an opposing party.

Between federal and state-wide offices, ~85% of voters vote the party line. But among state legislative, county council, sheriff, and county executive races, only 50-75 percent of voters vote the party line when the race is contested.

Party-line Voting in 2016, by Pairs of Offices (Contested Races only)



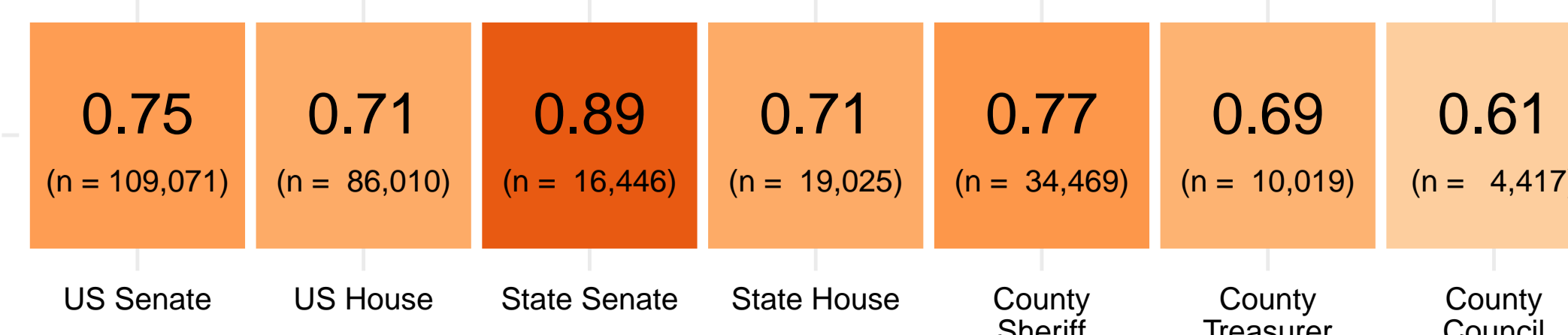
Party-line Vote; (a, b): Voter i votes for Republicans, or Democrats, in both race a and race b

## Split-ticketing Favors Incumbents

Among the voters who defect from their Presidential party choice in contested races with an incumbent, a majority vote for the incumbent.

## Incumbent Voteshare

Among voters who split their ticket with Presidential vote



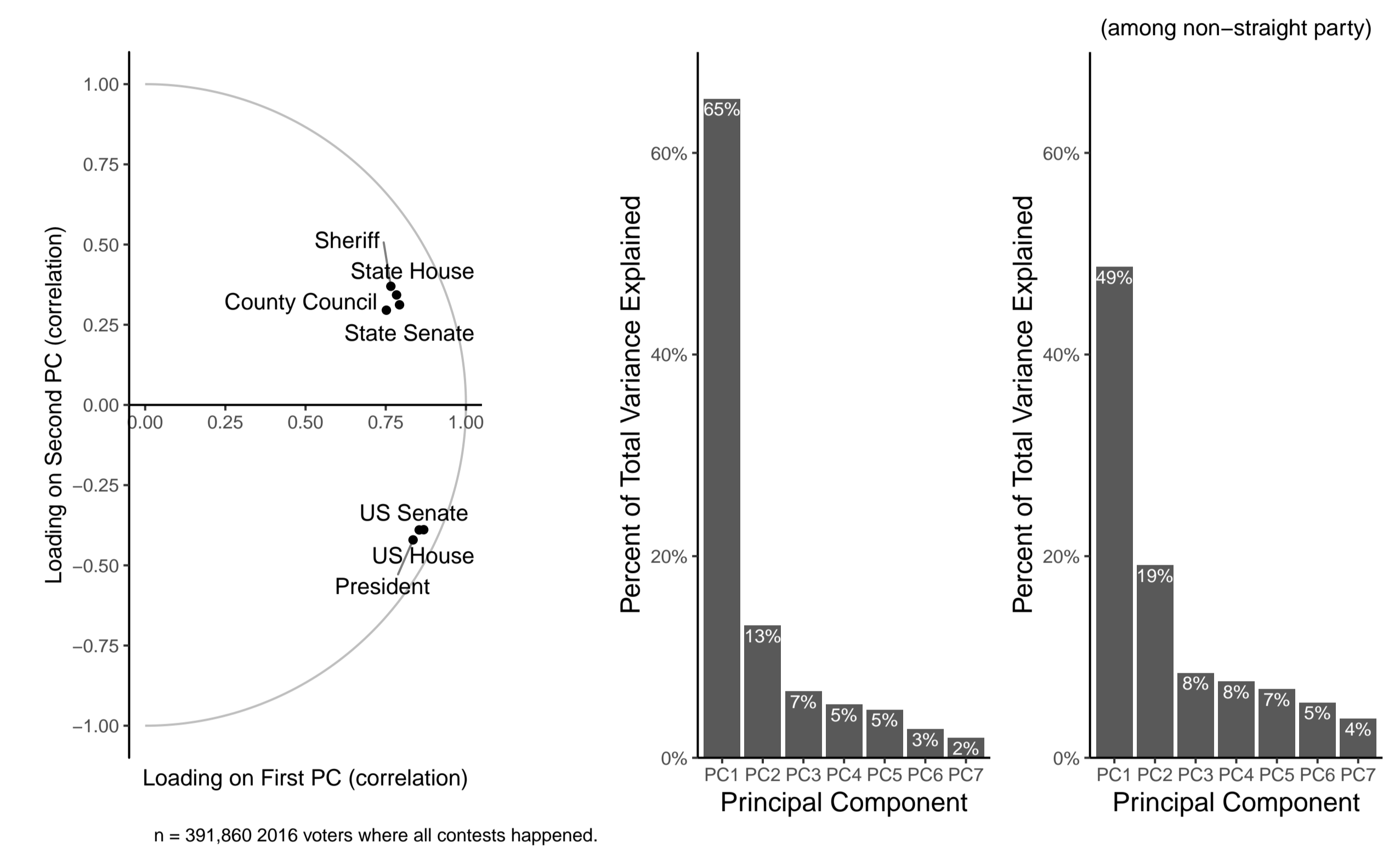
## Voter's Choices Summarized by Two Principal Components

Encode, for each voter's vote

- 1: Democrat candidate / Democratic party ticket
- 0: Abstain / Libertarian / Green / Write-In / No major party ticket selected
- +1: Republican candidate / Republican party ticket

## Principal Component Analysis

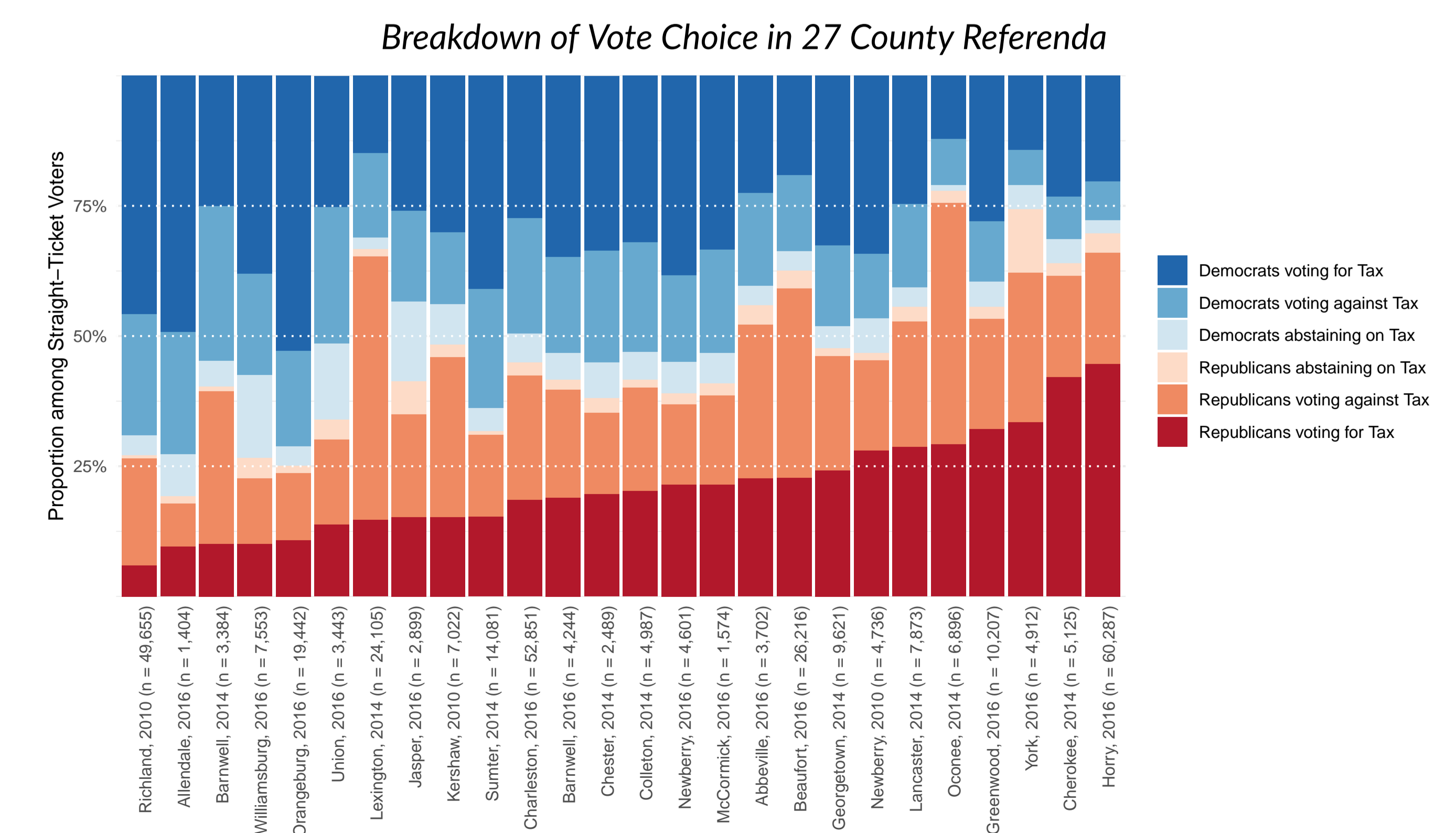
Two linear combinations of votes explain around 70-80% of the variance in votes for partisan offices. They appear to separate (i) Democrat-Republican and (ii) federal - subnational.



\* A component's loading (= eigenvector · √eigenvalue) is equivalent to the correlation with the vector of votes.

## Preferences over Local Tax Hikes are not Partisan

Party allegiance is still lower with referenda. When counties hold a referendum for a sales tax hike to fund local infrastructure, many Republicans vote for more Taxes; and a sizable amount of Democrats vote against.



\* Voter's parties are their choice on the straight ticket. Thus voters who did not select a ticket (about 50 percent) are excluded.