

# Colorado Results

For 8/9/2012



## Executive Summary

On the afternoon of August 9th, 2012, Gravis Marketing conducted a survey of likely voters in Colorado. The questions ranged from the presidential race preference to opinions on health care and education; the full list of questions are given on page 5. Overall, Romney and Obama remain in a statistical dead heat, with the August 9th poll giving Romney about a 1% lead, with a margin of error of about 4%.

## Analysis

The survey was performed on August 9th from two until four in the afternoon. The total number of survey participants completing the entire survey was 607 individuals across the state of Colorado.

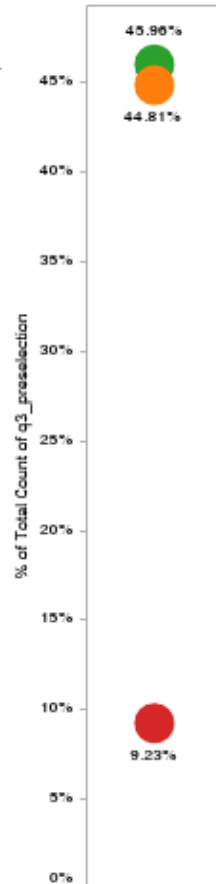
### Who's Ahead, Obama or Romney?

The race continues to be a statistical dead heat, with Romney holding a 1% lead in the most recent poll (top right).

### How is Obama's Approval Rating Affecting Him?

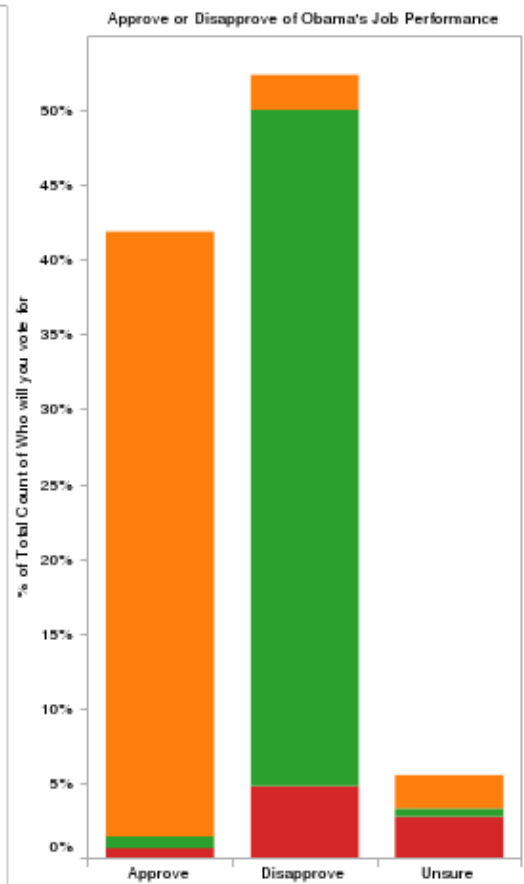
The poll gives Obama a disapproval rating of 52.5% and an approval rating of 42.0%. Of the 52.5% that disapprove of Obama's ability to be president, 45% are planning on voting for Romney, while 5% are unsure, and 2% still plan to vote for Obama. Interesting enough, the 2% that still plans on voting for Obama even though they disapprove of his presidency is about a percent higher than those who plan on voting for Romney even though they approve of Obama's presidency. The group that could decide the election is the red block

Obama or Romney?



Who will you vote for  
 Obama  
 Romney  
 Unsure or other

Approve or Disapprove of Obama?



Margin of error = +/- 4.0%  
 Who will you vote for  
 Obama  
 Romney  
 Unsure or other

## Obama or Romney?

On the afternoon of August 9th, 2012, Gravis Marketing conducted a survey of likely voters in Colorado. The questions ranged from the presidential race preference to opinions on health care and education; the full list of questions are given on page 5. Overall, Romney and Obama remain in a statistical dead heat, with the August 9th poll giving Romney about a 1% lead, with a margin of error of about 4%.

### **Analysis**

The survey was performed on August 9th from two until four in the afternoon. The total number of survey participants completing the entire survey was 607 individuals across the state of Colorado.

### ***Who's Ahead, Obama or Romney?***

The race continues to be a statistical dead heat, with Romney holding a 1% lead in the most recent poll (top right).

### **Who will you vote for**

Obama

### ***How is Obama's Approval Rating Affecting Him?***

Romney

### ***ing Affecting Him?***

Unsure or other

The poll gives Obama a disapproval rating of 52.5% and an approval rating of 42.0%. Of the 52.5% that disapprove of Obama's ability to be president, 45% are planning on voting for Romney, while 5% are unsure, and 2% still plan to vote for Obama. Interesting enough, the 2% that still plans on voting for Obama even though they disapprove of his presidency is about a percent higher than those who plan on voting for Romney even though they approve of Obama's presidency. The group that could decide the election is the red block

45%

40%

35%

30%

25%

20%

15%

10%

5%

0%

45.96%

44.81%

9.23%

### Approve or Disapprove of Obama?

Approve or Disapprove of Obama's Job Performance

50%

45%

40%

rofetovuooylliwohWfotnuoClatoT

35%

30%

25%

fo

20%

%

15%

10%

5%

0%

Approve Disapprove Unsure

Margin of error = +/- 4.0%

#### **Who will you vote for**

Obama

Romney

Unsure or other



under the "Disapprove" bar graph. Overall, the group is 8% of the total, and of the 8%, 5% disapprove of Obama's job performance.

**How Do the Results Look by Age?**

On the whole, the 50+ voters make up of those polled who expressed a preference for a given candidate. The older generation's vote generally favors Romney by around 4%. On the other hand, the younger generation generally favors Obama by about a one percent margin, even though the economy is about the worst economy for a younger generation since at least 80 years.

**Who Wins the Reproductive Health Issue?**

The chart on the following page represents the effect reproductive health may have on this election (page 3). On the whole, Romney and Obama both win their typical areas. But, what about those that are unsure? Well, Obama has the edge among those that think it's ok for one gender to terminate a baby's life and simultaneously are unsure about Obamacare, whereas Romney has the upper hand among individuals unsure about abortion, but simultaneously either do not like Obamacare or are unsure whether they like it.

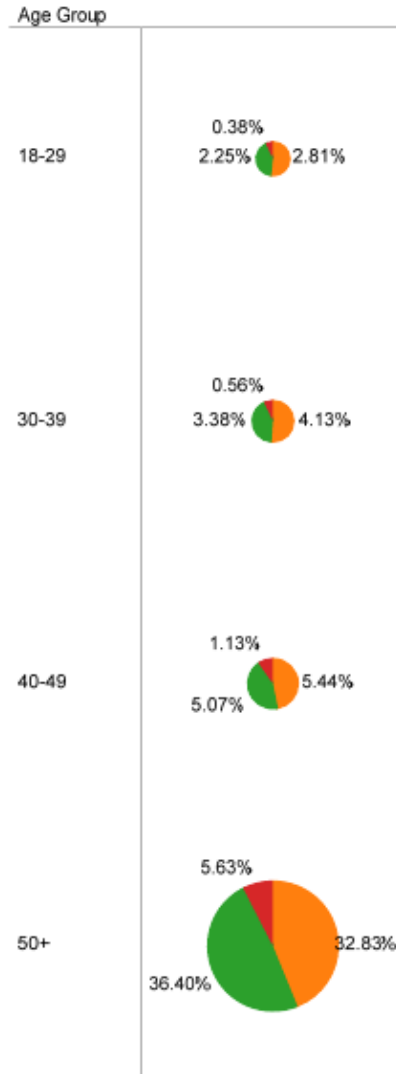
**Who Wins the "It's the Economy, Stupid!" Issue?**

Respondents were asked to rank five issues on a priority scale. Overall, the economy comes out as the most important issue, garnering 67% of the first place votes, followed by tax fairness with 14% and the environment with 5.6%. The economy swallows up the second place votes as well, with 35% of that vote, followed by tax fairness at 28% and the environment with 7%. This issue continues to bode well for Romney, giving Romney a 14 point advantage. Interestingly, Romney wins this issue based upon two age groups, those 30 to 39 years old and those 50+. The other categories are basically even.

**How Do the Numbers Look on the Tax Fairness Issue?**

Tax fairness comes in a very distant second on voters' preferences. The issue, though, is one that gives Obama the edge, largely because of the older and younger generations. Interesting enough, the middle generation appears not so keen on increasing taxes, even if it's on someone else's back.

Presidential vote age breakdown



Who will you vote for  
 Obama  
 Romney  
 Unsure or other

under the “Disapprove” bar graph. Overall, the group is 8% of the total, and of the 8%, 5% disapprove of Obama’s job performance.

### ***How Do the Results Look by Age?***

On the whole, the 50+ voters make up of those polled who expressed a preference for a given candidate. The older generation’s vote generally favors Romney by around 4%. On the other hand, the younger generation generally favors Obama by about a one per- cent margin, even though the economy is about the worst economy for a younger generation since at least 80 years.

### ***Who Wins the Reproductive Health Issue?***

The chart on the following page represents the effect reproductive health may have on this election (page 3). On the whole, Romney and Obama both win their typical areas. But, what about those that are unsure? Well, Obama has the edge among those that think it’s ok for one gender to terminate a baby’s life and simultaneously are unsure about Obamacare, whereas Romney has the upper hand among individuals unsure about abortion, but simultaneously either do not like Obamacare or are unsure whether they like it.

### ***Who Wins the “It’s the Economy, Stupid!” Issue?***

Respondents were asked to rank five issues on a priority scale. Overall, the economy comes out as the most important issue, garnering 67% of the first place votes, followed by tax fairness with 14% and the environment with 5.6%. The economy swallows up the second place votes as well, with 35% of that vote, followed by tax fairness at 28% and the environment with 7%. This issue continues to bode well for Romney, giving Romney a 14 point advantage. Interestingly, Romney wins this issue based upon two age groups, those 30 to 39 years old and those 50+. The other categories are basically even.

### ***How Do the Numbers Look on the Tax Fairness Issue?***

Tax fairness comes in a very distant second on voters’ preferences. The issue, though, is one that gives Obama the edge, largely because of the older and younger generations. Interesting enough, the middle generation appears not so keen on increasing taxes, even if it’s on someone else’s back.



Obama and Reproductive Health

Does Romney's position of limiting abortions affect your vote	Does Obamatcare make you dislike Obama	
Less Likely to Vote for Him	Less Likely to Vote for Him	<p>1.31% 1.96%</p>
	More Likely to Vote for Him	<p>1.96% 0.33% 34.31%</p>
	Unsure	<p>1.31% 1.63% 5.56%</p>
More Likely to Vote for Him	Null	<p>0.33% 0.33%</p>
	Less Likely to Vote for Him	<p>0.65% 3.40%</p>
	More Likely to Vote for Him	<p>0.33% 0.33% 2.61%</p>
	Unsure	<p>0.65% 0.29%</p>
Unsure	Less Likely to Vote for Him	<p>0.33% 0.33% 1.11%</p>
	More Likely to Vote for Him	<p>1.63%</p>
	Unsure	<p>1.63% 2.61% 1.07%</p>

Who will you vote for  
■ Obama  
■ Romney  
■ Unsure or other



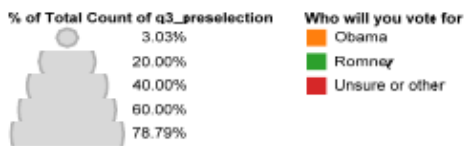
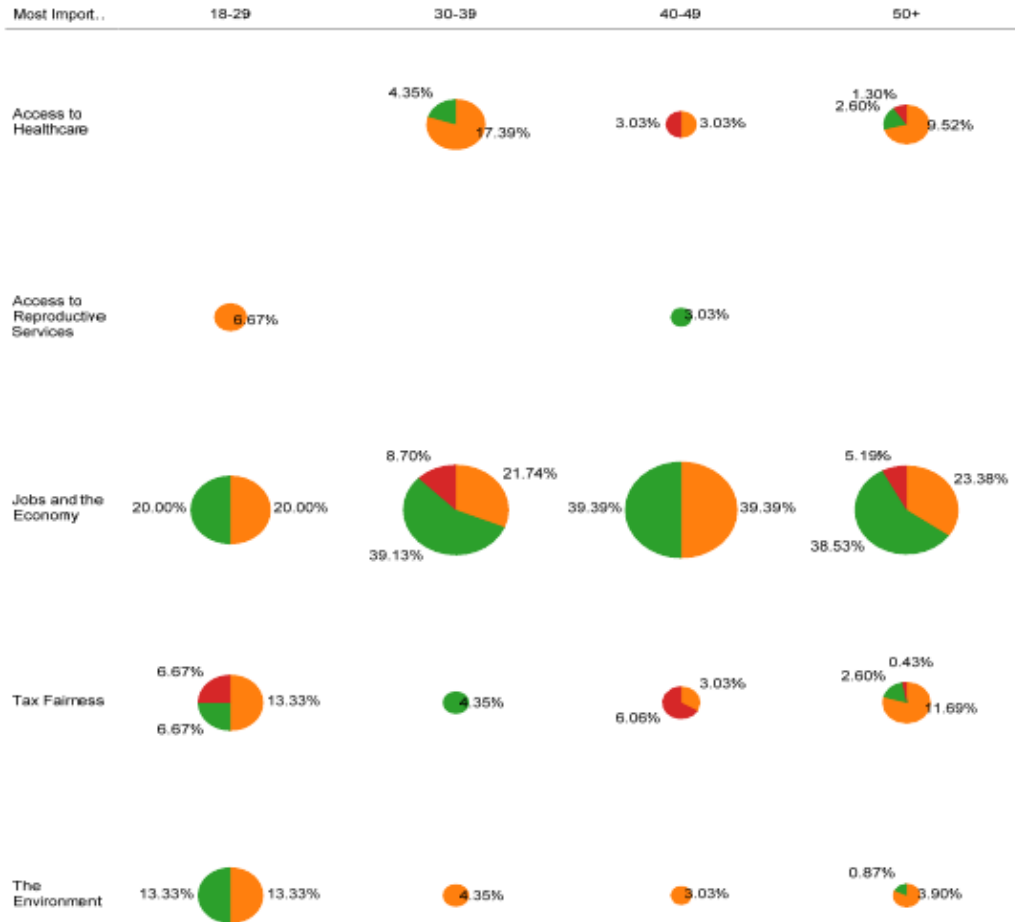


Colorado Results  
For 8/7/2012



Most Important Issue

Age Group









### Survey Questions

1. Are you a registered voter?
2. Do you plan on voting in the presidential election on November 6th?
3. If election held today, for whom would you vote?
4. Do you approve or disapprove of Obama's job performance?
5. Do you have a favorable or unfavorable opinion of Romney?
6. If you were broken down on the side of a road, which presidential candidate would be most likely to help you out?
7. With whom would you prefer to spend Labor Day with having a barbeque? Obama, Romney, unsure.
8. Should Romney release more of his tax returns?
9. Do you have a positive or negative opinion of Sandra Fluke?
10. Do you approve of Governor Hickenlooper's job performance?
11. What political party do you identify with?
12. What's your ethnicity?
13. What's your age group? 18-29; 30-39; 40-49; 50+
14. What's your gender?
15. If you learned that Obama's first signed legislation was the Lily Ledbetter Fair Pay for Women Act, would that make you more or less likely to vote for Obama?
16. If you learned that Mitt Romney is in favor of limiting access to reproductive health services, including contraceptives and abortions, would that make you more or less likely to vote for him?
17. If you learned the Affordable Care Act expanded access to reproductive health services, would that make you more or less likely to vote for Obama?
18. Which of the following is the first most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
19. Which of the following is the second most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
20. Which of the following is the third most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
21. Which of the following is the fourth most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
22. Which candidate has your child's best interests in mind?
23. Which candidate is most likely to improve the county's educational ranking?

## Survey Questions

1. Are you a registered voter?
2. Do you plan on voting in the presidential election on November 6th?
3. If election held today, for whom would you vote?
4. Do you approve or disapprove of Obama's job performance?
5. Do you have a favorable or unfavorable opinion of Romney?
6. If you were broken down on the side of a road, which presidential candidate would be most likely to help you out?
7. With whom would you prefer to spend Labor Day with having a barbeque? Obama, Romney, unsure.
8. Should Romney release more of his tax returns?
9. Do you have a positive or negative opinion of Sandra Fluke?
10. Do you approve of Governor Hickenlooper's job performance?
11. What political party do you identify with?
12. What's your ethnicity?
13. What's your age group? 18-29; 30-39; 40-49; 50+
14. What's your gender?
15. If you learned that Obama's first signed legislation was the Lily Ledbetter Fair Pay for Women Act, would that make you more or less likely to vote for Obama?
16. If you learned that Mitt Romney is in favor of limiting access to reproductive health services, including contraceptives and abortions, would that make you more or less likely to vote for him?
17. If you learned the Affordable Care Act expanded access to reproductive health services, would that make you more or less likely to vote for Obama?
18. Which of the following is the first most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
19. Which of the following is the second most important issue in the race for president this year: Jobs and the economy, access to healthcare, access to reproductive services, tax fairness, the environment?
20. Which of the following is the third most important issue in the race for president this year: Jobs and the economy,

access to healthcare, access to reproductive services, tax fairness, the environment?

21. Which of the following is the fourth most important issue in the race for president this year:  
Jobs and the economy,

access to healthcare, access to reproductive services, tax fairness, the environment?

22. Which candidate has your child's best interests in mind?

23. Which candidate is most likely to improve the county's educational ranking?

```

CROSSTABS
  /TABLES=q1_voter q2_election q3_preselection q4_boapprove q5_mrfavorable q6
_road q7_bbq q8_tax q9_fluke q10_hick q11_party q12_x001F__race q13_age q14_s
ex q15_ledbetter q16_healthservices q17_obamacare q18_first q19_second q20_th
ird q21_fourth
q22_children BY q23_edu
  /FORMAT=AVALUE TABLES
  /STATISTICS=CHISQ CORR
  /CELLS=COUNT EXPECTED
  /COUNT ROUND CELL.

```

## Crosstabs

[DataSet1]

### Warnings

No measures of association are computed for the crosstabulation of q1\_voter \* q23\_edu. At least one variable in each 2-way table upon which measures of association are computed is a constant.

### Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
q1_voter * q23_edu	281	36.8%	482	63.2%	763	100.0%
q2_election * q23_edu	281	36.8%	482	63.2%	763	100.0%
q3_preselection * q23_edu	281	36.8%	482	63.2%	763	100.0%
q4_boapprove * q23_edu	281	36.8%	482	63.2%	763	100.0%
q5_mrfavorable * q23_edu	281	36.8%	482	63.2%	763	100.0%
q6_road * q23_edu	281	36.8%	482	63.2%	763	100.0%
q7_bbq * q23_edu	281	36.8%	482	63.2%	763	100.0%
q8_tax * q23_edu	281	36.8%	482	63.2%	763	100.0%
q9_fluke * q23_edu	281	36.8%	482	63.2%	763	100.0%
q10_hick * q23_edu	281	36.8%	482	63.2%	763	100.0%
q11_party * q23_edu	281	36.8%	482	63.2%	763	100.0%
q12_x001F__race * q23_edu	281	36.8%	482	63.2%	763	100.0%
q13_age * q23_edu	281	36.8%	482	63.2%	763	100.0%
q14_sex * q23_edu	281	36.8%	482	63.2%	763	100.0%

/TABLES=q1\_voter q2\_election q3\_preselection q4\_boapprove q5\_mrfavorable q6\_road  
q7\_bbq q8\_tax q9\_fluke q10\_hick q11\_party q12\_x001F\_\_race q13\_age q14\_sex  
q15\_ledbetter q16\_healthservices q17\_obamacare q18\_first q19\_second q20\_third q21\_fourth  
q22\_children BY q23\_edu /FORMAT=AVALUE TABLES /STATISTICS=CHISQ CORR  
/CELLS=COUNT EXPECTED /COUNT ROUND CELL.

## Crosstabs

[DataSet1]

### Warnings

No measures of association are computed for the crosstabulation of q1\_voter \* q23\_edu. At least one variable in each 2-way table upon which measures of association are computed is a constant.

### Case Processing Summary

	Cases Valid Missing Total		
	N	Percent	N Percent
q1_voter * q23_edu	281	36.8%	482 63.2%
q2_election * q23_edu	281	36.8%	482 63.2%
q3_preselection * q23_edu	281	36.8%	482 63.2%
q4_boapprove * q23_edu	281	36.8%	482 63.2%
q5_mrfavorable * q23_edu	281	36.8%	482 63.2%
q6_road * q23_edu	281	36.8%	482 63.2%
q7_bbq * q23_edu	281	36.8%	482 63.2%
q8_tax * q23_edu	281	36.8%	482 63.2%
q9_fluke * q23_edu	281	36.8%	482 63.2%
q10_hick * q23_edu	281	36.8%	482 63.2%
q11_party * q23_edu	281	36.8%	482 63.2%
q12_x001F__race * q23_edu	281	36.8%	482 63.2%
q13_age * q23_edu	281	36.8%	482 63.2%
q14_sex * q23_edu	281	36.8%	482 63.2%
q15_ledbetter * q23_edu	281	36.8%	482 63.2%
q16_healthservices * q23_edu	281	36.8%	482 63.2%
q17_obamacare * q23_edu	281	36.8%	482 63.2%
q18_first * q23_edu	281	36.8%	482 63.2%
q19_second * q23_edu	281	36.8%	482 63.2%
q20_third * q23_edu	281	36.8%	482 63.2%
q21_fourth * q23_edu	281	36.8%	482 63.2%
q22_children * q23_edu	281	36.8%	482 63.2%

Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
q15_Jedbetter * q23_edu	281	36.8%	482	63.2%	763	100.0%
q16_healthservices * q23_edu	281	36.8%	482	63.2%	763	100.0%
q17_obamacare * q23_edu	281	36.8%	482	63.2%	763	100.0%
q18_first * q23_edu	281	36.8%	482	63.2%	763	100.0%
q19_second * q23_edu	281	36.8%	482	63.2%	763	100.0%
q20_third * q23_edu	281	36.8%	482	63.2%	763	100.0%
q21_fourth * q23_edu	281	36.8%	482	63.2%	763	100.0%
q22_children * q23_edu	281	36.8%	482	63.2%	763	100.0%

q1\_voter \* q23\_edu

Crosstab

		q23_edu			Total
		1	2	3	
q1_voter 1	Count	136	105	40	281
	Expected Count	136.0	105.0	40.0	281.0
Total	Count	136	105	40	281
	Expected Count	136.0	105.0	40.0	281.0

Chi-Square Tests

	Value
Pearson Chi-Square	. <sup>a</sup>
N of Valid Cases	281

a. No statistics are computed because q1\_voter is a constant.

Symmetric Measures

	Value
Interval by Interval Pearson's R	. <sup>a</sup>
N of Valid Cases	281

a. No statistics are computed because q1\_voter is a constant.

q2\_election \* q23\_edu

Cases

Valid Missing Total N Percent N Percent N Percent q15\_ledbetter \* q23\_edu q16\_healthservices \* q23\_edu  
 q17\_obamacare \* q23\_edu  
 q18\_first \* q23\_edu  
 q19\_second \* q23\_edu q20\_third \* q23\_edu  
 q21\_fourth \* q23\_edu q22\_children \* q23\_edu  
 281 36.8% 482 63.2% 763 100.0% 281 36.8% 482 63.2% 763 100.0%  
 281 36.8% 482 63.2% 763 100.0%  
 281 36.8% 482 63.2% 763 100.0%  
 281 36.8% 482 63.2% 763 100.0% 281 36.8% 482 63.2% 763 100.0%  
 281 36.8% 482 63.2% 763 100.0% 281 36.8% 482 63.2% 763 100.0%

**q1\_voter \* q23\_edu**

**Crosstab**

q23\_edu 1 2 3 Total q1\_voter 1 Count

Expected Count

Total Count

Expected Count

136 105 40 281 136.0 105.0 40.0 281.0

136 105 40 281 136.0 105.0 40.0 281.0

**Chi-Square Tests**

Value Pearson Chi-Square N of Valid Cases

a

281

a.

No statistics are computed because q1\_voter is a constant. Symmetric Measures

Value Interval by Interval Pearson's R

N of Valid Cases

.

.

a

281

a. No statistics are computed because q1\_voter is a constant. q2\_election \* q23\_edu



**Crosstab**

			q23_edu			Total
			1	2	3	
q2_election	1	Count	136	104	37	277
		Expected Count	134.1	103.5	39.4	277.0
	3	Count	0	1	3	4
		Expected Count	1.9	1.5	.6	4.0
Total	Count		136	105	40	281
	Expected Count		136.0	105.0	40.0	281.0

**Chi-Square Tests**

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	12.655 <sup>a</sup>	2	.002
Likelihood Ratio	9.350	2	.009
Linear-by-Linear Association	9.455	1	.002
N of Valid Cases	281		

a. 3 cells (50.0%) have expected count less than 5. The minimum expected count is .57.

**Symmetric Measures**

		Value	Asymp. Std. Error <sup>a</sup>	Approx. T <sup>b</sup>	Approx. Sig.
Interval by Interval	Pearson's R	.184	.057	3.123	.002 <sup>c</sup>
Ordinal by Ordinal	Spearman Correlation	.166	.048	2.817	.005 <sup>c</sup>
N of Valid Cases		281			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

**q3\_preselection \* q23\_edu**

q23\_edu

1 2 3 Total q2\_election 1 Count

Expected Count 3 Count

Expected Count Total Count

Expected Count

136 104 37 277

134.1 103.5 39.4 277.0 0 1 3 4

1.9 1.5 .6 4.0 136 105 40 281

136.0 105.0 40.0 281.0

**Chi-Square Tests**

Value df

Asymp. Sig. (2-sided) Pearson Chi-Square

Likelihood Ratio Linear-by-Linear Association

N of Valid Cases

12.655

a

2 .002

9.350 2 .009 9.455 1 .002

281

a.

3 cells (50.0%) have expected count less than 5. The minimum expected count is .57. Symmetric Measures

Value

Asymp. Error

Std.

a

Approx. T

b

Approx. Sig. Interval by

Interval Pearson's R Ordinal by Ordinal Spearman Correlation

N of Valid Cases

.184 .057 3.123 .002

c

.166 .048 2.817 .005

c

281

a. Not assuming the null hypothesis. b. Using the asymptotic standard error assuming the null hypothesis. c. Based on normal approximation. q3\_preselection \* q23\_edu



Crosstab

			q23_edu			Total
			1	2	3	
q3_preselection	1	Count	131	0	9	140
		Expected Count	67.8	52.3	19.9	140.0
	2	Count	2	101	19	122
		Expected Count	59.0	45.6	17.4	122.0
	3	Count	3	4	12	19
		Expected Count	9.2	7.1	2.7	19.0
Total	Count	136	105	40	281	
	Expected Count	136.0	105.0	40.0	281.0	

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	277.432 <sup>a</sup>	4	.000
Likelihood Ratio	333.429	4	.000
Linear-by-Linear Association	147.048	1	.000
N of Valid Cases	281		

a. 1 cells (11.1%) have expected count less than 5. The minimum expected count is 2.70.

Symmetric Measures

		Value	Asymp. Std. Error <sup>a</sup>	Approx. T <sup>b</sup>	Approx. Sig.
Interval by Interval	Pearson's R	.725	.049	17.566	.000 <sup>c</sup>
Ordinal by Ordinal	Spearman Correlation	.800	.043	22.279	.000 <sup>c</sup>
N of Valid Cases		281			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

q4\_boapprove \* q23\_edu

q23\_edu

1 2 3 Total q3\_preselection 1 Count

Expected Count 2 Count

Expected Count 3 Count

Expected Count Total Count

Expected Count

131 0 9 140

67.8 52.3 19.9 140.0 2 101 19 122

59.0 45.6 17.4 122.0 3 4 12 19

9.2 7.1 2.7 19.0 136 105 40 281

136.0 105.0 40.0 281.0

**Chi-Square Tests**

Value df

Asymp. Sig. (2-sided) Pearson Chi-Square

Likelihood Ratio Linear-by-Linear Association

N of Valid Cases

277.432

a

4 .000

333.429 4 .000 147.048 1 .000

281

a.

1 cells (11.1%) have expected count less than 5. The minimum expected count is 2.70. Symmetric Measures

Value

Asymp. Error

Std.

a

Approx. T

b

Approx. Sig. Interval by

Interval Pearson's R Ordinal by Ordinal Spearman Correlation

N of Valid Cases

.725 .049 17.566 .000

c

.800 .043 22.279 .000

c

281

a. Not assuming the null hypothesis. b. Using the asymptotic standard error assuming the null hypothesis. c. Based

on normal approximation. q4\_boapprove \* q23\_edu

Page 4

Crosstab

			q23_edu			Total
			1	2	3	
q4_boapprove	1	Count	124	2	9	135
		Expected Count	65.3	50.4	19.2	135.0
	2	Count	4	102	24	130
		Expected Count	62.9	48.6	18.5	130.0
	3	Count	8	1	7	16
		Expected Count	7.7	6.0	2.3	16.0
Total	Count	136	105	40	281	
	Expected Count	136.0	105.0	40.0	281.0	

Chi-Square Tests

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	234.128 <sup>a</sup>	4	.000
Likelihood Ratio	286.763	4	.000
Linear-by-Linear Association	104.551	1	.000
N of Valid Cases	281		

a. 1 cells (11.1%) have expected count less than 5. The minimum expected count is 2.28.

Symmetric Measures

		Value	Asymp. Std. Error <sup>a</sup>	Approx. T <sup>b</sup>	Approx. Sig.
Interval by Interval	Pearson's R	.611	.059	12.894	.000 <sup>c</sup>
Ordinal by Ordinal	Spearman Correlation	.706	.052	16.636	.000 <sup>c</sup>
N of Valid Cases		281			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

q5\_mrfavorable \* q23\_edu

q23\_edu

1 2 3 Total q4\_boapprove 1 Count

Expected Count 2 Count

Expected Count 3 Count

Expected Count Total Count

Expected Count

124 2 9 135

65.3 50.4 19.2 135.0 4 102 24 130

62.9 48.6 18.5 130.0 8 1 7 16

7.7 6.0 2.3 16.0 136 105 40 281

136.0 105.0 40.0 281.0

**Chi-Square Tests**

Value df

Asymp. Sig. (2-sided) Pearson Chi-Square

Likelihood Ratio Linear-by-Linear Association

N of Valid Cases

234.128

a

4 .000

286.763 4 .000 104.551 1 .000

281

a.

1 cells (11.1%) have expected count less than 5. The minimum expected count is 2.28. Symmetric Measures

Value

Asymp. Error

Std.

a

Approx. T

b

Approx. Sig. Interval by

Interval Pearson's R Ordinal by Ordinal Spearman Correlation

N of Valid Cases

.611 .059 12.894 .000

c

.706 .052 16.636 .000

c

281

a. Not assuming the null hypothesis. b. Using the asymptotic standard error assuming the null hypothesis. c. Based



on normal approximation.  $q5\_mrfavorable * q23\_edu$

Page 5