



Ipsos Poll Conducted for Reuters

Syrian Intervention 9.09.13

These are findings from an Ipsos poll conducted for Thomson Reuters from August 19-23, 2013; August 26 (9pm) – 30, 2013; August 30-September 3, 2013; and September 5-9, 2013. For the survey, samples of 1,448 ; 708; 1,195; and 1,450 Americans 18+ were interviewed online, respectively. The precision of the Reuters/Ipsos online polls is measured using a [credibility interval](#). In this case, these polls have credibility intervals of plus or minus 2.9 percentage points; plus or minus 4.2 percentage points; plus or minus 3.2 percentage points; and plus or minus 2.9 percentage points. For more information about credibility intervals, please see the appendix.

The data were weighted to the U.S. current population data by gender, age, education, and ethnicity. Statistical margins of error are not applicable to online polls. All sample surveys and polls may be subject to other sources of error, including, but not limited to coverage error and measurement error. Figures marked by an asterisk (*) indicate a percentage value of greater than zero but less than one half of one per cent. Where figures do not sum to 100, this is due to the effects of rounding.

SYRIAN INTERVENTION

Q1. How much, if anything, have you seen, heard or read about the current situation in Syria?

	<u>Aug. 19-23,</u> <u>2013</u>	<u>Aug. 26 (9pm)</u> <u>- 30, 2013</u>	<u>Aug. 30 -</u> <u>Sept. 3, 2013</u>	<u>Sept. 5-9,</u> <u>2013</u>
A great deal	11%	27%	25%	22%
A fair amount	25%	34%	36%	36%
A little bit	36%	27%	30%	34%
Not heard anything at all	28%	13%	9%	8%
<i>Total heard or read anything</i>	<i>72%</i>	<i>87%</i>	<i>91%</i>	<i>92%</i>
<i>Total not heard or read anything</i>	<i>28%</i>	<i>13%</i>	<i>9%</i>	<i>8%</i>

Q2. As you may have heard, there is fighting in Syria between government forces and anti-government groups. In your opinion, should the United States intervene in Syria, or not?

	<u>Aug. 19-23,</u> <u>2013</u>	<u>Aug. 26 (9pm)</u> <u>- 30, 2013</u>	<u>Aug. 30 - Sept.</u> <u>3, 2013</u>	<u>Sept. 5-9,</u> <u>2013</u>
Should intervene	9%	20%	19%	16%
Should not intervene	60%	53%	56%	63%
Don't know	31%	27%	25%	21%

Q3. There have recently been reports of the Syrian government using chemical weapons such as Sarin Gas against protestors. In your opinion, if the Syrian government is using chemical weapons against Syrians, should the United States intervene in Syria, or not?

	<u>Aug. 19-23,</u> <u>2013</u>	<u>Aug. 26 (9pm)</u> <u>- 30, 2013</u>	<u>Aug. 30 -</u> <u>Sept. 3, 2013</u>	<u>Sept. 5-9,</u> <u>2013</u>
Should intervene	25%	29%	29%	26%
Should not intervene	46%	44%	48%	52%
Don't know	29%	27%	24%	22%

Q4. As you may have heard, the Obama Administration decided last month to arm the anti-government rebels in Syria. Do you agree or disagree with this decision? (*n=1,061 for Aug. 19-23, 2013; n= 708 for Aug. 26-30; n=1,195 for Aug. 30-Sept. 3; n=1,450 for Sept. 5-9*)

	<u>Aug. 19-23, 2013</u>	<u>Aug. 26 (9pm) – 30, 2013</u>	<u>Aug. 30 – Sept. 3, 2013</u>	<u>Sept. 5-9, 2013</u>
Strongly agree	7%	12%	8%	7%
Somewhat agree	20%	20%	21%	18%
Somewhat disagree	25%	26%	23%	24%
Strongly disagree	22%	15%	26%	29%
Don't know	26%	27%	21%	21%
<i>Total agree</i>	<i>27%</i>	<i>32%</i>	<i>30%</i>	<i>26%</i>
<i>Total disagree</i>	<i>47%</i>	<i>41%</i>	<i>50%</i>	<i>53%</i>

Q5. Is the reason that you disagree with this decision because you think it goes too far or does not go far enough? (*Asked of all those who said they disagree with the Administration's decision, n=528 for Aug. 19-23, 2013; n= 270 for Aug. 26-30; n=622 for Aug. 30-Sept. 3; n=804 for Sept. 5-9*)

	<u>Aug. 19-23, 2013</u>	<u>Aug. 26 (9pm) – 30, 2013</u>	<u>Aug. 30 – Sept. 3, 2013</u>	<u>Sept. 5-9, 2013</u>
The decision to arm the anti-government rebels does not go far enough	11%	5%	9%	9%
The decision to arm the anti-government rebels goes too far	89%	95%	91%	91%

Q6. As you may have heard, anti-government rebels are reporting that government forces used chemical weapons, resulting in an estimated death toll of 500-1,300. In your opinion, what is the best response to the current situation in Syria? (Select all that apply) (*n=1,061 for Aug. 19-23, 2013; n= 708 for Aug. 26-30; n=1,195 for Aug. 30-Sept. 3; n=1,450 for Sept. 5-9*)

	<u>Aug. 19-23, 2013</u>	<u>Aug. 26 (9pm) – 30, 2013</u>	<u>Aug. 30 – Sept. 3, 2013</u>	<u>Sept. 5-9, 2013</u>
The United States should not intervene	37%	38%	40%	45%
The United States should arm the anti-government rebels with light weapons	5%	7%	6%	5%
The United States should arm the anti-government rebels with light and heavy weapons	11%	12%	11%	8%
The United States should fund the anti-government rebels	5%	11%	5%	5%
The United States should invade Syria with American troops	4%	4%	4%	2%
The United States should fund and support a multi-national invasion of Syria	9%	11%	8%	8%
The United States should impose a no-fly zone over Syria	11%	11%	10%	9%
The United States should use air strikes to support the Syria rebels	12%	12%	14%	12%
Don't know	30%	28%	25%	26%

How to Calculate Bayesian Credibility Intervals

The calculation of credibility intervals assumes that Y has a binomial distribution conditioned on the parameter θ , i.e., $Y|\theta \sim \text{Bin}(n, \theta)$, where n is the size of our sample. In this setting, Y counts the number of “yes”, or “1”, observed in the sample, so that the sample mean (\bar{y}) is a natural estimate of the true population proportion θ . This model is often called the likelihood function, and it is a standard concept in both the Bayesian and the Classical framework. The Bayesian ¹ statistics combines both the prior distribution and the likelihood function to create a posterior distribution. The posterior distribution represents our opinion about which are the plausible values for θ adjusted after observing the sample data. In reality, the posterior distribution is one’s knowledge base updated using the latest survey information. For the prior and likelihood functions specified here, the posterior distribution is also a beta distribution ($\pi(\theta|y) \sim \beta(y+a, n-y+b)$), but with updated hyper-parameters.

Our credibility interval for ϑ is based on this posterior distribution. As mentioned above, these intervals represent our belief about which are the most plausible values for ϑ given our updated knowledge base. There are different ways to calculate these intervals based on . Since we want only one measure of precision for all variables in the survey, analogous to what is done within the Classical framework, we will compute the largest possible credibility interval for any observed sample. The worst case occurs when we assume that $a=1$ and $b=1$ and . Using a simple approximation of the posterior by the normal distribution, the 95% credibility interval is given by, approximately:

$$\bar{y} \pm \frac{1}{\sqrt{n}}$$

For this poll, the Bayesian Credibility Interval was adjusted using standard weighting design effect $1+L=1.3$ to account for complex weighting²

Examples of credibility intervals for different base sizes are below. Ipsos does not publish data for base sizes (sample sizes) below 100.

Sample size	Credibility intervals
2,000	2.5
1,500	2.9
1,000	3.5
750	4.1
500	5.0
350	6.0
200	7.9
100	11.2

¹ *Bayesian Data Analysis, Second Edition, Andrew Gelman, John B. Carlin, Hal S. Stern, Donald B. Rubin, Chapman & Hall/CRC | ISBN: 158488388X | 2003*

² *Kish, L. (1992). Weighting for unequal Pi. Journal of Official, Statistics, 8, 2, 183200.*