

Abstract

According to some recent research, Americans hold a great deal of misinformation about important political issues. Such investigations treat incorrect answers to quiz questions measuring knowledge as evidence of misinformation. This paper instead defines misinformation as misperceptions held with confidence. Two surveys of representative samples of American adults on the Affordable Care Act revealed that most respondents were uncertain when answering quiz questions about law. Confidently held incorrect beliefs were far less common than would have been suggested if certainty were ignored. These misperceptions were most prevalent for aspects of the law on which elites prominently and persistently made incorrect claims. Furthermore, although Americans appear to have learned about the law between 2010 and 2012, misperceptions on many provisions persist.

Keywords: Misinformation, certainty, political knowledge, Affordable Care Act

Misinformed About the Affordable Care Act?

Leveraging Certainty to Assess the Prevalence of Misperceptions

Much research suggests that the amount of correct information that people have about political issues affects their policy preferences and behaviors (Bartels, 1996; Gilens, 2001; Luskin, Fishkin, & Jowell, 2002). Until recently, however, all of this work focused on the possession of correct beliefs and ignored incorrect beliefs (Kuklinski, Quirk, Jerit, Schwieder, & Rich, 2000).

In this paper, we suggest that researchers should distinguish between ignorance (defined as lacking a correct belief on an issue) and misperceptions (defined as holding an incorrect belief with confidence). Whereas ignorance is no doubt lamentable in a democratic society, misperceptions have the potential to be dangerous. We demonstrate one approach for empirically distinguishing between these two forms of lack of correct information and discuss what doing so says about the American public's understanding of the Patient Protection and Affordable Care Act (ACA).

Challenges in Measuring Misperceptions

Studies of the prevalence, predictors, and consequences of incorrect beliefs have often used knowledge quizzes to measure this construct (Hofstetter, Barker, Smith, Zari, & Ingrassia, 1999; Jerit & Barabas, 2006; Kull, Ramsay, & Lewis, 2003). In doing so, they treated all incorrect answers as identifying incorrect beliefs. However, incorrect answers can stem from incorrect beliefs, off-target inferences, or guessing, and traditional knowledge quizzes do not afford a way to distinguish between these alternatives. This makes the proportion of incorrect

answers to quiz questions an error-prone measure of misinformation.¹

Much past research on misinformation has focused on widely disseminated incorrect claims (Hofstetter et al., 1999; Meirick, 2013; Pasek, Stark, Krosnick, & Tompson, 2014), such as that Saddam Hussein was connected to Osama bin Laden (Prasad et al., 2009) and the assertion that President Obama was not born in the United States (Crawford & Bhatia, 2012; Krosnick, Malhotra, & Mittal, 2014; Pasek et al., 2014). In the domain of the ACA, the contention that the law would create “death panels” (Meirick, 2013; Nyhan, 2010) has been the subject of much research. However, focusing on widespread rumors means that researchers have rarely studied instances in which incorrect claims were less widely disseminated through popular media. And we do not know if inaccurate beliefs are any less common on those kinds of topics.

To measure misperceptions, we need to distinguish incorrect answers to quiz questions that are held with confidence from incorrect answers people aren’t sure about. To do so, we followed factual quiz questions with questions asking out how certain the respondent was of each answer. In line with Kuklinski and colleagues, we treat holding incorrect beliefs with certainty as instantiations of misperceptions (Kuklinski et al., 2000; Kuklinski & Quirk, 2001). In contrast, incorrect answers offered with low certainty are treated as markers of ignorance.

The Current Study

We used data from two surveys on the ACA to assess the scope and nature of the incorrect beliefs that Americans held about the law. We combined certainty assessments with incorrect answers to quiz questions to build a measure of misperceptions for each of various

¹ One can try to adjust for guessing related error by assuming that guessing is random. For example, if a quiz question offers two possible answers, then one might assume that respondents who guess the answer have a 50% chance of answering incorrectly. But such adjustments can only be made in the aggregate. And do not deliver individual level measures that we would ideally like. Moreover, much past research shows that guessing is often biased (Attali & Bar-Hillel, 2003). Even when asked to select randomly between offered options, respondents’ selections show systematic patterns (Ayton, Hunt, & Wright, 1989).

attributes of the law in each of the two surveys. We used these measures to describe the scope of misperceptions.

Methods

Data

The two surveys of nationally representative samples of American adults were conducted by GfK Custom Research. 1,251 individuals were interviewed between August 31 and September 7, 2010, and another 1,334 individuals were interviewed between August 3 and August 13, 2012. Respondents were drawn from the KnowledgePanel[®], a group of individuals who had been selected via probability sampling (via random digit dialing and address-based sampling using the USPS Computerized Delivery Sequence File) and agreed to complete online surveys regularly. Respondents who did not have a computer or Internet access were provided those at no cost. The response rates for the 2010 and 2012 surveys (cumulative with panel recruitment, CUMMRR3) were 12.0% and 9.9% respectively (see Callegaro & Disogra, 2008). Weights were constructed to match demographics from the most recent Current Population Survey data available at the time of survey administration, and all the analyses were conducted with weights.

Information and Certainty Measures

Quiz Questions. Respondents reported whether 18 provisions were included in the ACA. A “Don’t Know” option was not provided (cf., Mondak, 2001; Mondak & Davis, 2001).² Twelve of the items were about requirements or provisions in the ACA; the rest were about provisions that were not in the legislation (see Table 1). Items in the law were chosen from a comprehensive summary of the law’s principal provisions. The other six items addressed false claims that had been made frequently in news coverage of the ACA. Instructions for responding to these

² See Luskin and Bullock (2011) for a contrary position.

questions are provided in Online Appendix A; measures and distributions for each item are shown in Table 1 and Figure 1.³ Across both surveys, no more than 3.8% of respondents skipped any question, and 87.8% of respondents answered all 18 questions. Individuals who failed to answer a question were treated as having answered neither correctly nor incorrectly on that question.

Knowledge of the provisions varied widely—in some cases, the vast majority of respondents offered the correct answer (e.g., that individuals under age 26 can stay on their parents' insurance and that large companies were required to provide insurance for their employees). In other cases, individuals performed no better than chance (e.g., fees for drug makers and subsidies for low income individuals; see Table 1). The provisions we asked about also varied widely in the amount of information that was disseminated about them; incorrect claims were made frequently about some plan attributes (e.g. death panels), and little was said one way or another about other plan attributes (e.g., a soda tax or fees for insurance companies).

Certainty. After each knowledge question, respondents were asked, “How sure are you about this?” -- “Extremely sure,” “Very sure,” “Moderately sure,” “Slightly sure,” and “Not sure at all.” Answers were coded as follows: “Not sure at all” = 0, “Slightly sure” = .25, “Moderately sure” = .5, “Very sure” = .75, and “Extremely sure” = 1.

Misperceptions. Respondents were regarded as holding misperceptions if they were very sure or extremely sure when providing an incorrect answer (coded 1, and coded 0 otherwise).

Results

Frequencies of Correct and Incorrect Answers

All provisions. Across the two surveys, respondents answered 64.2% of the items

³ A 19th question was asked in 2010, but it was not included in the analyses reported here, because the question wording made it ambiguous as to whether the provision was in the bill.

correctly, 33.0% incorrectly, and skipped 2.8% of the items (see Figure 1). Across the 18 items, on average, respondents answered 11.6 items correctly and answered 5.9 incorrectly.

Vanishingly few respondents answered all the questions correctly (.05%), and no respondents answered all questions incorrectly. Only 1.2% of respondents declined to answer all the quiz questions.

Between 2010 and 2012, the proportion of questions that respondents declined to answer increased from 1.2% to 4.4% (t-test $p < .001$); this led respondents to appear both less knowledgeable and less misinformed over time (see Table 2). In 2010, respondents answered 65.0% of the questions correctly. In 2012, only 63.4% did, a small but significant decline of 1.6% ($p = .02$). The frequency of incorrect answers declined from 33.8% in 2010 to 32.2% in 2012 ($p = .007$). Among the substantive answers offered, the proportion correct did not differ across years (65.7% vs. 66.2% of answers were correct in 2010 and 2012, respectively, $p = .35$).

Individual provisions. According to the traditional measures, awareness of the elements of the law varied considerably across provisions. Nearly 80% of respondents accurately reported that large companies would be required to provide insurance for their employees, that young adults could remain on their parents' plans, and that insurance companies could no longer drop coverage (Figure 1). On the other hand, a majority of respondents incorrectly reported that the law would not introduce a fee for drug makers (56.3%), that it would require the treatment of illegal immigrants (53.2%), and that insurance companies would not be charged a fee (50.7%). Thus, according to the traditional measure, inaccurate beliefs about some of the less-discussed elements of the plan were common.

Using the proportion correct and incorrect measures, Americans' awareness of many aspects of the law fluctuated between 2010 and 2012. The percentage of Americans correctly

reporting that the law would impose a fine on uninsured individuals rose by 11 percentage points between 2010 and 2012 (Table 2). Americans also became more likely to correctly report that the law prevented discrimination based on preexisting conditions and that it would provide seniors with a drug rebate. In contrast, in 2012, Americans were far less aware of small business tax credits, subsidies for low income Americans, and fees for drug manufacturers. Compared to 2010, respondents in 2012 were also less likely to offer incorrect answers on questions about five of the provisions: fines for the uninsured, preexisting conditions, the ability to stay on parental insurance until age 26, and the end of coverage caps. The only significant increase in incorrect answers was on small businesses tax credits.

Frequency of High-Confidence Answers

In general, respondents were only moderately certain about their answers. Respondents reported that they were “not at all sure” about 19.1% of their answers, “a little sure” about 16.4%, “somewhat sure” about 32.5%, “very sure” about 17.9%, and “extremely sure” about 12.2% of their answers. Respondents chose not to answer the certainty question for 1.8% of the provisions.

When respondents answered the quiz questions correctly, they were somewhat more certain than when they answered incorrectly. Respondents were “very sure” or “extremely sure” for 34.8% of correct answers and for 22.9% of incorrect answers ($p < .001$). In all, respondents answered 22.3% of all questions correctly with high certainty and answered 7.8% of the questions incorrectly with high certainty (see Figure 1). Although confidently held accurate beliefs were more common than confidently held inaccurate beliefs, misperceptions were common.

Certainty Adjusted Measures

All provisions. In contrast to the traditional measures, certainty-adjusted measures suggest that Americans became better informed on the aspects of the ACA. Highly certain correct answers became more common between 2010 and 2012, from 21.2% to 23.3% ($p=.01$), and the percentage of highly certain incorrect answers dropped slightly but nonsignificantly, from 8.1% to 7.4% ($p=.16$; Table 3).

Individual provisions. The proportions of high confidence correct responses and high confidence incorrect responses varied considerably across provisions. Respondents were most knowledgeable about the provision that young adults could remain on their parents' insurance (47.6% answered correctly with high certainty, see Figure 1). Respondents were least knowledgeable about fees for drug manufacturers; only 10.1% answered this question correctly with high certainty. The percentage of misperceptions ranged from a low of 3.1% about whether large companies would be required to provide insurance for their employees, to 17.9% about whether the law mandated treatment of illegal immigrants.

Furthermore, compared to a by-definition perfect negative correlation across provisions between the prevalence of correct and incorrect answers ignoring certainty ($r=-1.00$), the correlation between the prevalence of highly certain correct answers and highly certain incorrect responses was much weaker ($r=-.61$). This implies that the provisions about which people were most accurate were not necessarily the provisions about which misperceptions were least common.

Between 2010 and 2012, using certainty-weighted answers, respondents' understanding about some of the provisions of the law improved. Compared to 2010, respondents in 2012 were much more likely to know about fines on the uninsured ($d=13.9$, $p<.001$, Table 3), allowing young adults to stay on their parents' plans ($d=9.5$, $p<.001$), requiring large employers to offer

insurance ($d=8.4$, $p<.001$), and outlawing denial based on preexisting conditions ($d=7.8$, $p<.001$). Respondents in 2012 were also significantly more likely to know that coverage could no longer be capped ($d=3.9$, $p=.02$) and that a soda tax was not part of the plan ($d=3.6$, $p=.02$). Provision of small business tax credits was the only provision about which knowledge significantly declined over time ($d=-3.4$, $p=.03$). These results imply that Americans were learning about the ACA, even though the total number of correct answers did not increase appreciably during this period.

Whereas knowledge gains were principally associated with declines in the prevalence of low-certainly beliefs, knowledge gains were also sometimes accompanied by a reduction in the frequency of misperceptions. Respondents were less likely to provide confident incorrect answers about requirements for large companies to provide insurance ($d=-2.0$, $p=.003$, Table 3), coverage of young adults on their parents' plans ($d=-2.0$, $p=.01$), limits on dropped coverage ($d=-2.5$, $p=.002$), and fines for uninsured individuals ($d=-2.3$, $p=.03$). The only item on which misperceptions increased significantly between 2010 to 2012 was a requirement to disclose medical conditions to employers ($d=1.8$, $p=.02$).

Discussion

Traditional measures of knowledge accuracy suggested that many Americans were misinformed about the law's contents. Indeed, a large percentage of people answered incorrectly about at least some of the law's provisions. However, taking certainty into account revealed that many Americans were unsure about the incorrect answers they gave and were more often uninformed than misinformed about the law.

Much past research on misinformation has assumed that anyone who answered quiz questions incorrectly was misinformed. Instead, however, many of our survey respondents were

unsure about the incorrect answers they gave, perhaps because they had merely guessed incorrectly. By allowing individuals to tell us when they were confident about the veracity of their answers, we could distinguish between ignorance and misperception.

Distinguishing between misperceptions and unconfidently held incorrect information yielded a different story about the prevalence of misinformation about the ACA, as well as how this phenomenon changed over time. Although a majority of respondents answered questions about fees for drug makers and insurance companies incorrectly, few respondents were confident about their incorrect answers, suggesting that ignorance was largely at play. It is perhaps unsurprising that these provisions were relatively unknown; they were not a major component of the administration's advocacy (U.S. Department of Health and Human Services, 2013), criticism of the law (ObamaCare Facts, n.d.), or widespread rumoring (Holan, 2013).⁴ In contrast, "death panels," a healthcare ID card, and required treatments for illegal immigrants were answered inaccurately with confidence quite often, in line with their status as topics of widespread rumoring (Holan, 2013; TruthorFiction.com, 2015). Notably, misperceptions about these provisions remained largely static from 2010 to 2012.

In contrast to the proportion correct measure, which indicated that people learned about some measures and became less informed about others, the confidence-adjusted measures documented increases in knowledge of some of the most widely discussed provisions of the ACA. Awareness of employer mandates, parental insurance coverage, fines for the uninsured, and the end of preexisting conditions increased from 2010 to 2012 (cf. ObamaCare Facts, n.d.).

⁴ Because many of the provisions of the law were not associated with consistent terminology and the words used were common to articles about the law (e.g. "drug" and "fee" appeared many times in news articles although it was not a widely discussed provision), there was no way to identify the prevalence of discussion about these provisions in a news search. Instead, we considered whether information about the law or formal responses to rumors about the law mentioned these provisions we examined as a way of indexing their commonality. A Lexis-Nexis search of the prevalence of related terms is shown in Online Appendix B, but we do not use it for analyses due to concerns about comparability across items.

These were many of the same provisions for which the prevalence of misperceptions decreased over time. Hence, the confidence-adjusted measures suggest that discussion of the plan between 2010 and 2012 increased awareness of the law's key provisions.

Limitations and Future Studies

There are limitations inherent in using certainty measures to distinguish misperceptions from ignorance. First, picking a particular threshold for the level of certainty that distinguishes ignorance from misperception is subjective. Some researchers have suggested that answers to factual question may reflect 'expressive responding' (Bullock, Gerber, Hill, & Huber, 2013; Prior, Sood, & Khanna, 2013).⁵ For instance, Republicans who disliked Democrats may have said that they were certain that a disliked provision was in the ACA, despite not knowing whether the provision was in the bill, simply because it was disliked. People might also have reported higher certainty for answers that confirmed their preexisting attitudes. As expressive responding would present challenges for all knowledge measurement, future studies should assess whether certainty-adjusted measures are more or less sensitive to these processes. And finally, individuals who hold identical beliefs with identical levels of certainty may nonetheless answer certainty questions differently either because of overconfidence (Ortoleva & Snowberg, 2013) or because they interpret the meanings of the rating scale points differently. Hence, differences in knowledge and misinformation we observed may be due to shifts in the accuracy of beliefs among individuals who expressed consistently high (or low) certainty. All of these concerns suggest that confidently held answers are not a perfect metric for the substantive beliefs that people have, though using certainty seems likely to yield a better indicator than a simple tally of correct or incorrect responses.

Conclusion

⁵ Although Berinsky (2015) finds evidence that expressive responding is relatively rare.

This study indicates that the practice of ignoring distinctions between individuals who are certain about incorrect information (i.e. hold misperceptions) and those who are simply unsure can alter the substantive conclusions that researchers make. Incorrect answers to questions about the Affordable Care Act were far more common than confidently held incorrect responses. Further, confidently held misperceptions were most common for quiz items where inaccurate rumors appeared to be spreading as opposed to those where little information was available. Further, where accurate information was widely disseminated, respondents tended to hold more confidently held correct information over time. These increases were associated with a corresponding reduction in both less confidently held information and some reduction in confidently held incorrect information. Similar changes were not observed, however, for less-widely discussed provisions of the law. Thus, despite widespread inaccuracy in response to quiz questions about the ACA, our results provide hopeful evidence that most Americans were not mired in a web of misinformation and that additional information about the law can alter their beliefs.

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Table 1 - Question Wordings and Descriptive Statistics for Knowledge Questions

Short Form	Full Wording	Status	Proportion Saying Provision Is in Law
Require Large Companies to Provide Insurance	Require companies with 50 or more employees to provide health insurance to their employees or pay a fine to the federal government if they do not.	In Law	80.5%
Cover Under 26 on Parents' Plan	Allow young adults to get health insurance by being included in their parents' health insurance policies until they turn 26.	In Law	79.2%
Prevent Dropped Coverage	Require a health insurance company to continue a person's health insurance as long as he or she pays for it and has not broken any rules of the health insurance plan.	In Law	78.1%
Tell Employers of Conditions	Require that anyone applying for a job must tell the employer if he or she has ever had any serious diseases.	Not in Law	20.1%
Soda Tax	Require that fast food restaurants that sell unhealthy food or drinks to pay a fee to the federal government.	Not in Law	23.9%
Make Insurance for Sale	Make health insurance available for sale so that any American can buy it if he or she wants to.	In Law	71.6%
Small Business Credits	Give federal tax credits to some very small companies if they buy health insurance for their employees.	In Law	71.5%
Prevent Preexisting Condition Denial	Require health insurance companies to sell health insurance to U.S. citizens and legal immigrants who don't have health insurance and have a serious medical problem.	In Law	69.5%
Charge Smokers	Require insurance companies to charge an additional fee of \$1,000 a year to anyone who buys insurance from them and smokes cigarettes.	Not in Law	30.7%
Give Seniors Drug Rebate	Give seniors with high prescription drug costs a \$250 rebate this year.	In Law	65.5%
Fine For Uninsured	Require that if a U.S. citizen does NOT have health insurance, that person will have to pay a fine on his or her federal income taxes unless he or she is allowed not to have the insurance for a series of specific reasons, such as having a very low income.	In Law	64.1%
Prevent Capped Coverage	Prevent a health insurance company from limiting the amount of money that it will pay for a person's health care costs during his or her life.	In Law	59.9%
Create Health Care ID Card	Require every American to show a government health care identification card in order to get medical care at a hospital.	Not in Law	39.8%
Death Panels	Create committees of people who will review the medical histories of some people and decide whether they can get medical care paid for by the federal government.	Not in Law	40.0%
Subsidize Low Income Care	Give money to pay for health insurance to people who are U.S. citizens and have very low incomes.	In Law	54.7%
Fee for Insurance Companies	Require companies that sell health insurance to pay new fees to the federal government each year.	In Law	46.2%
Require Treatment of Illegals	Require some doctors and hospitals to treat illegal immigrants free of charge if they cannot afford to pay.	Not in Law	53.2%
Fee For Drug Makers	Require companies that make drugs to pay new fees to the federal government each year.	In Law	39.8%

Table 2. Proportion of Correct and Incorrect Answers to ACA Quiz Questions in 2010 and 2012

	Proportion Correct				Proportion Incorrect			
	Mean 2010	Mean 2012	Change	Std. Err	Mean 2010	Mean 2012	Change	Std. Err
Average	65.0%	63.4%	-1.56	(.68) *	33.8%	32.2%	-1.62	(.61) **
Require Large Co. Insurance	81.0%	80.1%	-.84	(1.56)	18.5%	15.8%	-2.71	(1.48)
Parents' Insurance	78.2%	80.1%	1.98	(1.60)	20.9%	15.9%	-5.01	(1.52) **
No Dropped Coverage	79.1%	77.1%	-2.01	(1.62)	19.8%	18.7%	-1.10	(1.55)
Tell Employers (F)	79.6%	75.3%	-4.28	(1.64) **	19.4%	20.8%	1.40	(1.57)
Soda Tax (F)	72.2%	73.1%	.91	(1.75)	25.3%	22.7%	-2.69	(1.68)
Make Insurance for Sale	74.2%	69.2%	-4.98	(1.77) **	25.3%	26.8%	1.47	(1.72)
Small Business Credits	76.5%	66.8%	-9.66	(1.76) ***	22.9%	28.3%	5.38	(1.71) **
No Preexisting Conditions	66.5%	72.2%	5.71	(1.81) **	32.5%	24.1%	-8.38	(1.77) ***
Fine Smokers (F)	68.6%	64.0%	-4.56	(1.85) *	30.2%	31.2%	1.07	(1.81)
Senior Drug Rebate	62.5%	68.4%	5.92	(1.87) **	35.7%	27.8%	-7.93	(1.83) ***
Fine for Uninsured	58.4%	69.4%	10.95	(1.88) ***	41.1%	26.4%	-14.63	(1.84) ***
No Capped Coverage	59.3%	60.5%	1.22	(1.93)	39.0%	35.1%	-3.95	(1.90) *
ID Card (F)	58.7%	56.5%	-2.19	(1.94)	40.5%	39.1%	-1.36	(1.92)
Death Panels (F)	59.3%	54.3%	-4.98	(1.94) *	39.0%	41.0%	1.96	(1.92)
Subsidize Care	58.2%	51.4%	-6.76	(1.95) ***	40.8%	44.2%	3.35	(1.94)
Fee for Insurance Companies	48.2%	44.3%	-3.91	(1.96) *	50.5%	50.9%	.36	(1.96)
Treats Illegals (F)	46.4%	41.7%	-4.67	(1.95) *	52.5%	53.8%	1.26	(1.96)
Fee for Drug Makers	42.9%	37.0%	-5.90	(1.92) **	55.1%	57.4%	2.28	(1.95)

Note: Refusals were treated as neither correct nor incorrect. $N_s=1251$ in 2010 and 1344 in 2012. P -values and standard errors were generated using weighted two-sample t -tests. * $p<.05$; ** $p<.01$; *** $p<.001$.

Table 3. Proportion of Correct and Incorrect Answers with High Certainty to ACA Quiz Questions in 2010 and 2012

	Proportion Correct and Highly Certain				Proportion Incorrect and Highly Certain			
	Mean 2010	Mean 2012	Change	Std. Err	Mean 2010	Mean 2012	Change	Std. Err
Average	21.2%	23.3%	2.15	(.85) *	8.1%	7.4%	-.72	(.51)
Require Large Co. Insurance	30.3%	38.7%	8.36	(1.86) ***	4.0%	2.0%	-1.97	(.67) **
Parents' Insurance	42.6%	52.2%	9.52	(1.95) ***	5.2%	3.3%	-1.98	(.80) *
No Dropped Coverage	27.0%	28.8%	1.82	(1.76)	5.6%	3.1%	-2.47	(.80) **
Tell Employers (F)	26.9%	25.6%	-1.24	(1.73)	4.6%	6.4%	1.80	(.89) *
Soda Tax (F)	19.6%	23.2%	3.65	(1.61) *	6.5%	6.8%	.32	(.98)
Make Insurance for Sale	26.7%	28.7%	2.01	(1.76)	8.2%	7.8%	-.39	(1.07)
Small Business Credits	20.8%	17.5%	-3.36	(1.55) *	5.4%	5.1%	-.30	(.88)
No Preexisting Conditions	24.8%	32.6%	7.83	(1.77) ***	6.8%	5.1%	-1.65	(.93)
Fine Smokers (F)	13.9%	14.1%	.22	(1.36)	8.4%	9.0%	.62	(1.11)
Senior Drug Rebate	21.7%	20.0%	-1.72	(1.60)	7.1%	7.9%	.80	(1.03)
Fine for Uninsured	22.4%	36.3%	13.90	(1.76) ***	8.8%	6.5%	-2.32	(1.04) *
No Capped Coverage	19.5%	23.5%	3.91	(1.61) *	8.3%	6.5%	-1.75	(1.03)
ID Card (F)	14.5%	13.3%	-1.22	(1.36)	14.2%	13.2%	-.91	(1.35)
Death Panels (F)	17.2%	16.8%	-.40	(1.48)	10.7%	11.5%	.78	(1.24)
Subsidize Care	19.7%	16.8%	-2.89	(1.52)	9.1%	9.6%	.46	(1.15)
Fees for Insurance Companies	11.1%	11.1%	-.03	(1.23)	7.7%	6.3%	-1.42	(1.00)
Treats Illegals (F)	12.3%	10.5%	-1.81	(1.25)	18.3%	17.2%	-1.09	(1.50)
Fees for Drug Makers	10.0%	10.2%	.19	(1.19)	7.6%	6.2%	-1.41	(1.00)

Note: Refusals to either question were treated as neither correct and highly certain nor incorrect and highly certain. Ns=1251 in 2010 and 1344 in 2012. P-values and standard errors were generated using weighted two-sample t-tests. *p<.05 **p<.01 ***p<.001.

Distribution of Responses to Quiz and Certainty Questions Across Measures

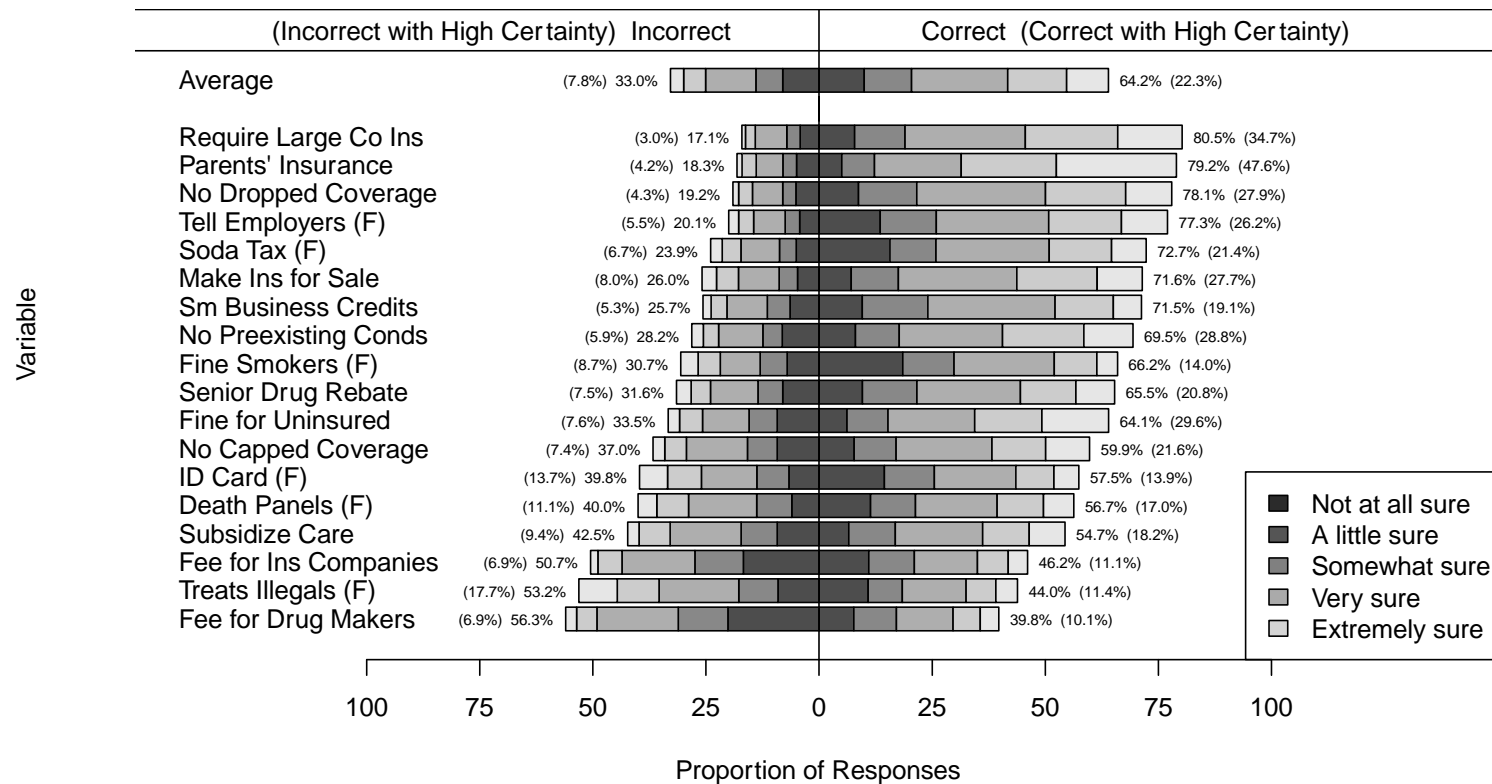


Figure 1 – Distributions of All Certainty-Correctness Combinations Across Both Years. Missing data is included in calculating the percentages but is not shown.

Online Appendix A: Instructions for Answering the Information items

Respondents read the following instructions before answering the questions -

We'd like to find out people's impressions about the law that the U.S. Congress passed back in March 2010 to change the U.S. health care system in many ways.

We'd like to find out people's impressions about what that law says will happen.

Before the law was passed by the Congress, there was a lot of talk in the news about things that the plan might or might not do.

Next, you will read a list of these things, one at a time.

Most the things you'll read were talked about as possibly being in the law.

But only some of the things you'll read are actually in the law that the Congress passed in March.

We'd like to learn your best guesses about which of these things are in the law and which are not.

We will also ask you how sure you are that each answer you give is correct.

It's fine if you are sure of an answer or if you are not sure of an answer. We just want to find out your best guesses.

We want to know what people think without asking someone else for the answers and without looking up the answers on the Internet or in any other way. So please do not do any of these things. Please just give us your best guesses.

Following this introduction, for each question, respondents saw the text "Do you think that the new law will or will not do the following after the law is fully in effect?"

Table B1 - Frequency of Related Terms in News Media

Topic	Search Term (Affordable AND Care OR Obamacare) AND ...	Lexis-Nexis Results			
		2009	2010	2011	Total
Require Large Co. Ins	Require AND Employer	213	262	125	600
Parents' Insurance	Parents	926	1167	1179	3272
No Dropped Coverage	Dropped	265	487	240	992
Tell Employers of					
Conditions	Employee AND Disclose	11	60	10	81
Soda Tax	(Soda OR Pop)	186	306	198	690
Make Ins for Sale	Exchange	480	548	445	1473
Sm. Business Credits	%20Tax Credit%20	197	249	174	620
No Preexisting Conds	(Preexisting OR %22Pre-Existing%22)	251	229	123	603
Fine Smokers	Smoker	30	60	25	115
Senior Drug Rebate	Senior AND (Rebate OR Donut)	28	50	35	113
Fine for Uninsured	(Fine OR Tax) AND Uninsured	267	176	92	535
No Capped Coverage	(Cap OR Limit)	629	790	648	2067
ID Card	%20ID Card%20 OR %20Identification Card%20	15	18	10	43
Death Panels	(%20Death Panel%20 OR Bureaucrat)	59	110	68	237
Subsidize Care	Subsidy	551	392	411	1354
Fee for Ins. Companies	(Cadillac OR %20Insurance Company%20) AND Fee	126	90	47	263
Treats Illegals	Illegal AND Immigrant	84	81	36	201
Fee for Drug Makers	Drug AND Fee	139	16	101	256