

## *MRS Silver Medal*

### *Winner: Nick Sparrow*

Developing reliable online polls - IJMR vol 48, issue 6

What the judges said:

This paper raises important issues about the way in which online surveys are administered and the motivations of online respondents. It demonstrates some major differences between results of online and conventional surveys, and suggests that the mode of interview is a significant explanatory factor.

The judges selected this paper as the Silver Medal winner, because of the importance of the issues it raises for the online research industry and the valuable insights it provides.



## **Developing Reliable Online Polls**

**Nick Sparrow**

**Published:**

**International Journal of Market Research**

Nick Sparrow<sup>1</sup>

## ABSTRACT

Based on their success at predicting the outcome of elections opinion polls are used by the media, government and the political parties to measure public attitudes to a very wide range of other issues, helping to shape policy proposals and inform debate.

Despite their importance within the political process, the media, political parties and pressure groups nevertheless want feedback from opinion polls quickly and cheaply. Large scale random probability surveys may provide the best quality data but fail miserably on speed and cost.

Among practical survey methods the telephone has become the most commonly used mode of interview for general population opinion polls despite some doubts over response rates. Online polls have an increasing share of the market, despite the obvious drawbacks of relatively low internet penetration and the fact that they rely on panels of willing participants.

This paper shows that while telephone polls produce answers that are similar to those obtained from large scale random surveys there are sharp differences in results obtained online. The paper shows that these differences cannot be removed by weighting by demographics, newspaper readership or by using attitudinal variables. The research does, however, uncover evidence of significant and disturbing mode effects. In particular, a growing army of professional online panel members seem to race through online surveys, giving responses that explain a good measure of the differences between online and telephone research. These findings suggest that the online research industry needs to devise methods to ensure online respondents carefully consider the answers they give and design questions and answer codes that do not inadvertently lead online respondents to certain answers.

---

<sup>1</sup> Nick Sparrow is Managing Director of ICM Research and has worked as an opinion pollster since 1980 on behalf of The Guardian, BBC, Conservative party and others. He sat on the MRS committee investigating the failure of the polls in the 1992 election and was subsequently awarded the Silver Medal for a paper (see bibliography) explaining methods to improve the accuracy of polls which ultimately led to the most accurate predictions made by the polls in both the 1997 and 2001 elections.

## **RESEARCH METHOD**

In November 2005 ICM conducted two separate research studies, one on issues surrounding crime and punishment and the other including questions on taxation and government spending. In both cases the questions were asked simultaneously online and by telephone among samples of around 1,000 people. The results obtained have been weighted to be representative of all adults by a range of demographic and consumption variables and by recall of votes cast at the last election.

The online survey was conducted among members of the ICM online panel ([www.itsyourview.com](http://www.itsyourview.com)) who were initially recruited via a mix of online advertising and active recruitment of respondents on other conventional surveys conducted by ICM both by telephone and face-to-face. This mirrors the recruitment practices of other specialist online research organisations except that a rather higher proportion of ICM respondents are actively recruited. For the telephone survey, random numbers were dialled using the British Telecom database of all numbers with a random number substituted for the last digit.

In February 2006 250 people drawn from each of the original online surveys were re-contacted by telephone and a selection of questions were asked again, allowing comparison between their original online responses and those collected from the same people by telephone.

Sample details are provided in appendix 1

## **SAMPLING**

Telephone research using random digit dialling results in successful interviews in 20-25% of households contacted. On each successful call efforts are made to interview men and either younger or older people as experience suggests the sample will otherwise contain too few such people. How can we be at all sure that this simple method, with so few quota controls will provide an accurate distribution of the attitudes of all adults across a range of topics?

First, we can compare the un-weighted results obtained by this simple method with Census data updated by the latest National Readership Survey (NRS). Table 1 below shows that, on a range of demographic and lifestyle variables, telephone research conducted in this way provides a reasonable distribution of the adult population.

**Table 1. Comparison of Unweighted telephone survey data with NRS**

	Unweighted	Census/NRS		Unweighted	Census/NRS
<b>Sex</b>			<b>Tenure</b>		
Male	44*	48	Own house	28*	32
Female	56	52	Mortgage	36*	41
<b>Age</b>			Council/HA	17	15
18-24	9	11	Other	18*	12
25-34	16	17	<b>Foreign Holidays in last 3 years</b>		
35-44	21	20	Yes	61	62
45-54	19	17	No	39	38
55-64	15	15	<b>Cars in Household</b>		
65+	20	20	0	22	20
<b>Class</b>			1	45	43
AB	29*	25	2	25	28
C1	22*	29	3+	8	8
C2	18	21			
DE	31*	25	<b>Terminal Education age</b>		
<b>Work Status</b>			Up to 15	23	24
Work Full time	41	44	16-18	46	48
Part time work	14*	11	19+	25*	20
Retired	25	25			
Other	20	20			
ICM Data taken from all telephone Omnibus surveys September-November 2005					
* = Statistically significant differences at 95% confidence level					

An internet panel recruited via advertisements placed on the internet tends to be heavily biased towards younger, more affluent sections of the population. Special efforts have to be made to create demographic balance. Having such information on file means that a representative sample can be drawn from the database and asked to participate in an opinion poll. Results may be weighted in exactly the same way as a telephone poll. (For all analysis in this paper, weights applied are as set out in appendix 1 unless otherwise specified)

The implicit assumption underlying any online or telephone poll might be that demographic balance is all that is required to ensure that answers to other attitudinal questions also reflect the views of all adults. To test this hypothesis ICM included attitudinal questions on the test surveys drawn from authoritative random probability surveys.

The latest British Crime Survey suggests that 43% of adults are confident that the Criminal Justice System is effective in bringing people who commit crimes to justice. The equivalent figure derived from the telephone survey was 46% while the online survey suggests a figure of 29%.

Two questions were included in the second test survey taken from the British Social Attitudes Survey. In the telephone research ICM found that 71% thought the gap between rich and poor people is too large, BSA found 73%. The online survey suggests a figure of 82%.

A further question asked respondents to say how comfortably off they feel. Here there are differences between the telephone survey and BSA. On the telephone survey 29% agreed that they were "living comfortably on present income" while BSA found 40%.

However, the online survey suggests a much lower percentage, that only 16% of people feel they are living comfortably on present income.

These comparisons mirror the findings of earlier research showing a reasonably close match between random probability surveys and telephone polls and where differences do exist, they are less than those observed in comparisons between online and random surveys. (see Curtice and Sparrow 2004)

Clearly our online surveys, weighted to the demographic profile of all adults yield different results and tell a different story to the telephone research and other authoritative survey sources.

## RESULTS

A full list of the questions asked is shown in appendix 2. Tables 2 and 3 below show the headline findings, both in terms of the percentage agreeing with each question and the net scores (i.e percent agreeing less percent disagreeing). The tables show that on some questions the results are reasonably close while others are very different.

**Table 2. Telephone and Online results. Crime and punishment**

	Phone		Online	
	Percent agree	Net score	Percent agree	Net score
	%	%	%	%
Q1. Worried	46	-8	52*	4
Q2. Felt threatened in last year	20	-60	32*	-36
Q3. Been a victim of assault	11	-	15*	-
Q3. Been a victim of Burglary	10	-	13*	-
Q3. Been a victim of car crime	16	-	23*	-
Q4. Approve of guns for police	46	-3	43	0
<b>Q5. Confident in Criminal justice system (BCS Question)</b>	<b>46</b>	<b>-7</b>	<b>29*</b>	<b>-40</b>
Q6. Courts too soft	70	69	84*	82
Q7. Sentences should be served in full	71	44	80*	62
Q8. Life should mean life	79	67	84	78
Q9. Capital punishment for child murders	64	38	61	38
Q9. ... for Police murders	64	38	57*	33
Q9. ... for all murders	55	22	47*	16
Q10. Agree with capital punishment, an eye for an eye	46	-1	54*	21
Q11. Death penalty is a deterrent	38	-18	43*	-1
Q12. Muggers should be spared prison	36	-14	16*	-53
Q13. Approve of tagging	57	20	38*	-4
6 Significant differences between online and telephone survey <i>Bold (Q5) question also asked on British Crime Survey</i>				

**Table 3. Telephone and Online results. Tax and spend**

	Telephone		Online	
	Percent agree	Net score	Percent agree	Net Score
	%	%	%	%
Q1. Taxes higher in 5 years	78	73	77	75
Q2 real improvements in NHS	33	-28	24*	-38
Q3 Real improvements in schools	35	-15	23*	-34
Q4. Govt could cut tax and improve services	69	42	70	57
Q5. If taxes cut economy will grow thereby benefiting public services	57	19	52*	27
Q6 Extend Government services	49	33	44*	24
Q7. Brown is prudent	41	-10	30*	-22
<b>Q8. Gap between rich and poor too large (BSA question)</b>	<b>71</b>	<b>65</b>	<b>82*</b>	<b>81</b>
<b>Q9. Comfortable on current income (BSA question)</b>	<b>29</b>	<b>1</b>	<b>16*</b>	<b>0</b>
Q10, Economic optimism	26	-1	23	-14
6 Significant differences between online and telephone surveys. Bold (Q8 and 9) also asked on British Social Attitudes survey				

Comparison of the data shows up some obvious mode effects. On both the telephone and online surveys response codes were offered to respondents in the same order. However while don't know and refuse alternatives appeared on screen they were not offered to those answering by telephone. As a result online respondents were, on average over twice as likely to click on a "don't know" or "refuse" response. On average these two options were used by 3.6% of telephone respondents and 8.5% of online respondents. Online respondents were Also a little less likely to choose mid point options where offered. Neither of these factors adequately explain the differences observed between the two methods. If don't knows are excluded from the base on both surveys the average discrepancy in results between online and telephone increases from 8.1% to 8.5%.

These results may not surprise some online researchers who have long accepted that demographic weighting is insufficient to make an online poll match results obtained by other research methods. One solution, practiced by YouGov is weight by newspaper readership as an indicator of attitudes more generally. Another route has been to isolate key attitudinal variables across a range of issues and use these as weighting variables.

## ADDITIONAL WEIGHTING

### NEWSPAPER READERSHIP

In the "Tax and Spend" surveys ICM added a newspaper readership question to both the telephone and online survey. Both interview methods produce similar patterns of newspaper readership, are similar to those YouGov find and all are different to the data produced by NRS. This perhaps reflects the fact that NRS asks about all newspapers read "yesterday" for 2 minutes or more while the ICM and Yougov questions ask about first choice newspapers or paper read most often. For NRS the base on which the percentages are calculated is all newspapers read yesterday (i.e allowing for the fact that some people read more than one paper) whereas the base of the ICM/Yougov question is the total sample of people interviewed.

**Table 4. Newspaper readership**

	<b>YouGov Unweighted**</b>	<b>Telephone</b>	<b>ICM Online</b>	<b>Weighted to NRS derived data**</b>
	%	%	%	%
Express/Mail	28	22	22	16*
Sun/Star	14	17	17	22*
Mirror/Record	11	10	8	16*
Guardian/Independent	7	8	8	4*
FT/Times/Telegraph	11	13	13	9*
Other	11	18	13	13*
None	19	11	19	20*

\* Significant differences between NRS and all other surveys in columns above  
 \*\*YouGov unweighted data taken from poll for Daily Telegraph, Fieldwork 22<sup>nd</sup> -24<sup>th</sup> November 2005. Sample 2,616. Weights for this poll also used

This data suggests that the difference we can observe between NRS on the one hand and telephone and online surveys on the other arises because the questions are fundamentally different, not because the samples are not representative by newspaper readership, and hence calls into question whether weighting to NRS estimates can be justified at all.

In the ICM survey the addition of this weighting had a small effect on vote intentions, bringing the online survey estimates more into line with the telephone survey. However, as table 5 below shows, newspaper readership weighting had little effect on the answers to other questions.

**Table 5. Effect of Newspaper readership weighting**

	Telephone	Online	Online plus newspaper readership
	1	2	3
	%	%	%
Q1. Taxes higher in 5 years	78	77	76
Q2 real improvements in NHS	33	24	24
Q3 Real improvements in schools	35	23	24
Q4. Govt could cut tax and improve services	69	70	70
Q5. If taxes cut economy will grow thereby benefiting public services	57	52	53
Q6 Extend Government services	49	44	45
Q7. Brown is prudent	41	30	30
Q8. Gap between rich and poor too large	71	82	83
Q9. Comfortable on current income	29	16	16
Q10, Economic optimism	26	23	22
Average difference		6.9	6.8

### **WEIGHTING BY ATTITUDINAL VARIABLES**

Attitudinal weighting is likely to be most effective if the variables selected are directly linked to the topic of the survey.

#### **Crime and punishment survey.**

ICM experimented with weighting the online sample to the results of the telephone sample on the issue of capital punishment (see column 3 table 6) and alternatively by matching the online sample to the telephone sample on the question of whether respondents had felt threatened in the last year (see column 4 table 6). The rationale for choosing these two variables was that one might expect the issue of capital punishment to be something on which respondents would have fairly fixed pre-existing attitudes and therefore have links to a wider variety of questions on the issue of crime and punishment. Alternatively we reasoned that fear of crime might be important in determining attitudes to crime more generally and to policing and sentencing policies.

Disappointingly the results of these experiments shows that matching the data on capital punishment brings the results of other capital punishment questions further into line with the telephone sample but has little or no effect on any other variables. Similarly matching the results on fear of crime brings the results on other questions on fear of crime and experience of crime into line but has no positive effects on the rest of the data. It is possible that some other attitudinal variable or combination variable may be more effective in bringing the two data sets into line, although it seems unlikely given the relevance of the variables chosen to subject area. Still less likely is the possibility that there are some other attitudinal variables on other subjects that would

prove more effective than attitudes on these particular topics. These experiments suggest there is little correlation between the views people even within the confines of these topic areas and therefore little chance that attitudinal weighting will bring the two data sets into line.

**Table 6. Telephone and Online poll comparisons using different weighting schemes**

	Phone	Online	Online + death penalty	Online + felt threatened
	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>
	%	%	%	%
Q1. Worried	46	52	53	47*
Q2. Felt threatened in last year	20	32	33	<b>20</b>
Q3. Been a victim of assault	11	15	17	12*
Q3. Been a victim of Burglary	10	13	14	11*
Q3. Been a victim of car crime	16	23	24	21*
Q4. Approve of guns for police	46	43	47	42
Q5. Confident in Criminal justice system	46	29	28	31
Q6. Courts too soft	70	84	84	83
Q7. Sentences should be served in full	71	80	81	80
Q8. Life should mean life	79	84	84	84
Q9. Capital punishment for child murders	64	61	64*	60
Q9. ... for Police murders	64	57	61*	57
Q9. ... for all murders	55	47	<b>55</b>	47
Q10. Agree with capital punishment, an eye for an eye	46	54	59	54
Q11. Death penalty is a deterrent	38	43	47	42
Q12. Muggers should be spared prison	36	16	17	16
Q13. Approve of tagging	57	38	39	38

\* Significant convergence with telephone sample, excluding attitudinal weighting variable itself

### Tax and spending survey

On the tax and spend surveys, in addition to demographic weights, ICM matched the stated income levels of those interviewed online to the telephone sample. Further, ICM experimented with attitudinal weighting, first by weighting the online results of Q2 (agree or disagree that extra spending on the NHS has resulted in real improvements) to the results obtained in the telephone survey. As an alternative ICM matched the results to Q8 (gap between those on high incomes and those on low incomes too large, about right or too small) obtained on the online survey to those obtained by telephone. Table 4 shows that neither of these additional weights has a measurable effect in bringing the online data into line with the telephone survey.

**Table 7. Telephone and online comparisons using attitudinal weights**

	Telephone	Online	Online plus income levels and Q2	Online plus income levels and Q8
	1	2	3	4
	%	%	%	%
Q1. Taxes higher in 5 years	78	77	76	75
Q2 real improvements in NHS	33	24	<b>33</b>	24
Q3 Real improvements in schools	35	23	25	23
Q4. Govt could cut tax and improve services	69	70	70	69
Q5. If taxes cut economy will grow thereby benefiting public services	57	52	51	49
Q6 Extend Government services	49	44	46	45
Q7. Brown is prudent	41	30	32	31
Q8. Gap between rich and poor too large	71 (BSA 73)	82	82	<b>70</b>
Q9. Comfortable on current income	29 (BSA 40)	16	16	18
Q10, Economic optimism	26	23	23	24
Total difference		6.9	6.2	6.6
No significant convergence of online to telephone survey as a result of attitudinal weighting				

The main difficulty with the data is that the relationships one might expect to lie within the data sets do not exist. For example we find on the telephone survey that 73% of those who thought prison sentences should be served in full disapprove of muggers being spared a term in prison. Online only 52% fall into the same category. For attitudinal weighting to work we would require much more consistency in such relationships than we have found.

Of course, these attitudinal weights have been devised with the benefit of having two complete data sets. In practice researchers would have to decide beforehand which variables are likely to be important and guess that those weighting variables will be correlated with all other questions in a survey.

From these experiments it would seem unlikely that the use of other attitudinal variables even less closely connected with Crime, Punishment, taxation and spending would be more effective in bringing the two data sets into line.

## WHY?

Results obtained from opinion polls are widely known to be sensitive to precise question wording and to question order. (see Bourdieu 1979, Zaller 1992, Herbst 1993 and Lewis 2001) It follows that results could also be sensitive to the mode by which the interview is obtained, the universe from which samples are drawn and any effects arising from the use of a panel of respondents paid for their participation in surveys. Could any of these factors explain the differences between telephone and online polls?

### 1) The online population

ICM have extracted from the telephone sample those with access to the internet and weighted those respondents to be representative of all adults. Having done so we get results that are very similar to those obtained from the whole telephone sample (i.e including non internet accessible respondents). The fact that only 65% or so of the population have access to the internet access is not itself, a factor that distorts responses to attitudinal questions. (see appendix 3)

### 2) Mode effects

To test for mode effects, ICM recontacted 500 people who had originally answered the questions online, 250 from each of the two test surveys. The recall interviews were conducted in February 2006, three months after the original interviews. Selected questions were repeated yielding the results in table 8 below. The results are astounding as they suggest that for many (although not all) questions a large element of the discrepancy between the online and telephone methods can be ascribed to mode effects. In table 8 columns 1 and 2 show the demographically weighted data from the original surveys conducted in 2005. Column 3 shows the **original** unweighted online responses from 250 people recontacted in February 2006 and column 4 shows their responses on the telephone obtained in February 2006.

The data might be taken as proof that people give more socially acceptable responses when asked by an interviewer but say what they really think on-screen. People may, for example have far less confidence in the criminal justice system than they are prepared to divulge to an interviewer. But this does not explain the differences observed on more straightforward questions about the respondent's own recent experiences such as whether they have felt threatened in the last year. Why should the results to that question asked by telephone be almost half the level recorded by the same people online?

**Table 8. Recall interviews**

	Online	Phone	Original Online	Phone recall
	1	2	3	4
	%	%	%	%
<b>Crime and punishment</b>				
Q2. Felt threatened in last year	32	20	34	18*
Q5. Confident in Criminal justice system	29	46	25	41*
Q6. Courts too soft	84	70	87	74*
Q7. Sentences should be served in full	80	71	84	72*
Q9. Capital punishment for all murders	47	55	45	32
Q12. Muggers should be spared prison	16	36	13	24*
Q13. Approve of tagging	38	57	36	48*
<b>Tax and spend</b>				
Q2 real improvements in NHS	24	33	24	25
Q3 Real improvements in schools	23	35	21	26*
Q4. Govt could cut tax and improve services	70	69	74	82
Q6 Extend Government services	44	49	46	54*
Q7. Brown is prudent	30	41	29	31
Q8. Gap between rich and poor too large	82	71	82	80
Q9. Comfortable on current income	16	29	16	24*
* Significant convergence of views on original online respondents to the views of original telephone survey when asked questions by telephone				

On 9 out of 14 questions in the table above, the results of the recall interviews suggest that it is the mode of interview, rather than nature or outlook of the people interviewed that accounts for a good measure of the differences between the original telephone and online responses. The fact that there is no significant convergence on 5 questions suggests that mode of interview is a significant but not the only factor contributing to the difference observed between online and telephone polls.

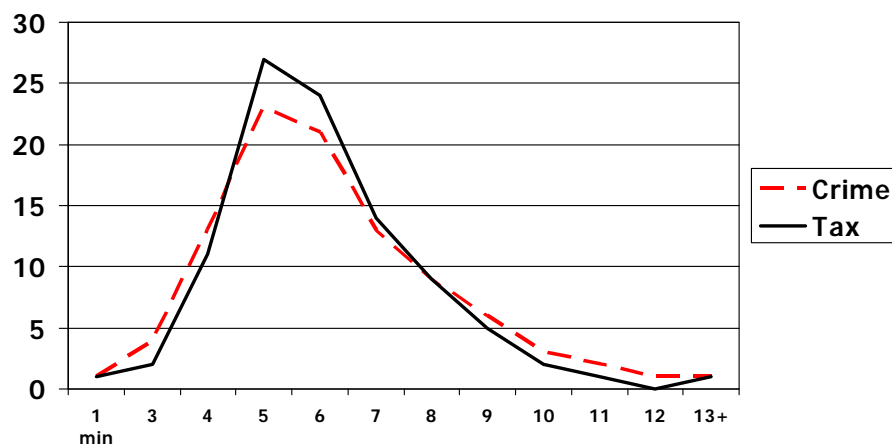
A wealth of comparative testing in the US by Don Dillman and others suggests that self completion questionnaire layout itself has a significant impact on the answers given. Even small design changes in the layout of answer codes result in substantially different answers. This is particularly true of online surveys which afford almost limitless possibilities for screen design and layout.

For example, those answering online are shown possible response codes on screen and click on the most appropriate response. Each response code includes a box to be

clicked alongside the typed answer code. Thus respondents may choose responses by reference to the words, and/or on the position of the chosen code between two extremes. Other research shows relatively large differences in answers given depending on factors such as the size of the boxes used for written answers, lines separating don't know/ refuse answers from other etc.

The research also finds discrepancies between the results obtained online and by telephone that arise out of the length of time respondents spend answering the questions. By telephone the survey took between 6 and 7 minutes to conduct with a very small number taking longer with people who had language or comprehension difficulties. For online interviews we recorded the total length of time each respondent spent answering the questions and have excluded those who suspended the interview and returned to it at a later time to complete the questions. The distribution is shown in chart 1 and includes only those with a broadband connection. On both surveys respondents took an average of 5.6-5-7 minutes to answer the questions online, around a minute less than those questioned by telephone. However, for the online surveys the chart shows a great degree of variation around the mean. Online 31% took less than 5 minutes to answer the crime and punishment questions and 44% took less than 5 minutes on the tax and spend questions.

## Length of time taken to complete on-line survey



If we compare the results obtained from the recall interviews with those originally given we see an average 10% shift in answers given by those who originally spent less than 4 minutes answering the questions online, twice the shift observed among those who spent 6 minutes or more online.

It could be argued that the length of time any respondent spends considering a question asked by telephone (or face to face) is regulated by the reading out process and by the length of time it would seem appropriate to any individual to consider their answer in this conversational environment. Long pauses for thought are unlikely as they will seem embarrassing or awkward. While some people obviously spend longer

online carefully considering their responses, it is also true that some answer very quickly and modify those responses to a much greater degree when asked the same questions again by telephone. Clearly differences between conventional research and online arising out of people considering their responses more carefully both explain differences and point to advantages for online options. But poor quality data may be obtained from people, perhaps motivated by the money they might earn, racing through online questions giving each little thought.

Obviously any effects arising out of the way each question and answer code appears on screen is likely to be more noticeable among those who are expending as little time and energy as possible on the survey questions. Mode does indeed offer an explanation for the discrepancies between our two test surveys, but mode effects are clearly not limited only to the absence of an interviewer.

### 3) Panel effects

Research among people seeking to join the ICM online panel shows that just over half (52%) were motivated to join because they felt it would be an enjoyable way to earn money or enter prize draws. In contrast 20% joined because they thought they would be interested in the topics covered and 19% enjoy answering questions. ICM found that 32% of people applying to join the panel already belong to 3 or more online panels. Just over half those aiming to join the ICM panel and belonging to other panels, reported that they were also registered with Ciao, 34% with YouGov and 30% with Lightspeed. The degree of overlap may however depend on where advertisements are placed for new members. Research by Comley of Virtual Surveys found three quarters of online panellists belong to three or more panels and 68% would like to complete on-line surveys at least "a few times a week". Many of those in the industry concerned about panel conditioning and fatigue ignore the fact that for those looking to earn money from answering survey questions, it makes sense to use internet search engines to join several panels. The research suggest that a group of professional panel participants is emerging, who participate in online surveys for a number of different companies.

Among those people who applied to join the ICM internet panel 72% said they would be more likely participate in surveys if the topic is of interest to them and, of course, online it is relatively easy to establish what each survey is about. In telephone surveys a more general introduction may be used (ICM say each survey is on subjects that affect all people), to avoid potential distortions arising because only interested people participate. Nevertheless when asked to choose between a more interesting survey that offers no reward and a less interesting survey with a £2 reward 80% opted for the latter, confirming that the desire to make money out of answering survey questions is the dominant motivation rather than a desire to register opinions.

The possible emergence of a group of professional online panellists is somewhat worrying for the industry as these respondents may pick up tricks to ensure they complete more surveys and thereby earn more money. They may, for example work out that if they register as a relatively badly off pensioner, they will be asked to participate in more opinion polls, as most internet panels are short of such people. They may claim to own more products or use more services in the hope of being included in surveys aimed at particular ownership or user groups.

Overall, the payment of incentives changes the relationship between the pollster and the respondents. An individual telephoned out of the blue and asked for their views do so simply to help us gauge the attitudes of voters generally. There is no other benefit

to them. An online panellist who wants to earn money is engaged in an exchange of time for money. In such a relationship the temptation is to expend as little time or mental energy as possible for the fee offered.

### Mode effect or panel effect?

Some have argued that the absence of an interviewer means respondents can take their time thinking about their answers and will not feel inhibited in any way to record what they really think. The alternative hypothesis suggested by this research is that the presence of an interviewer regulates the length of time respondents can spend thinking about a question, as they cannot cut an interviewer short, and a long pause for reflection on the phone or face-to-face will seem awkward. Respondents are encouraged to concentrate on the question for the simple reason that they will not want to give answers the interviewer is likely to think are silly or inconsistent. Online there is no consequence for the respondent arising out of taking the most casual attitude to answering the questions. Each answer is accepted by the computer no matter what it is or how quickly it is entered and respondents are thanked at the end with the survey fee being added to their account. Rather than thinking more about how they feel on political and social issues the survey method encourages them to think less, and give knee jerk responses rather than more considered views. These tendencies are likely to be strongest among those motivated primarily by the chance to earn money or win prizes.

### IMPLICATIONS

Comparisons between telephone and online polls represent a stern test of the methodologies. Voters in general may feel it would be time consuming for them to become informed on political and social issues and that any informed views they may develop would not make a jot of difference. Most therefore continue through life in a state of what Anthony Downs called "rational ignorance", a semi-conscious choice not to expend energy on forming opinions that will make no difference to them or anyone else.

Rational ignorance explains observations made by Mueller and others about opinion polls. Suddenly faced with probing questions on issues such as the operation of the criminal justice system and taxation and government spending, it may not be surprising to find some respondents "pontificating in a seemingly authoritative, if basically truthful manner on subjects about which they know nothing or to which they have never given any thought whatsoever" (Mueller 1973) In this context it is certainly possible to imagine that answers obtained from opinion polls are highly sensitive to the methods employed to gather the data.

This paper nevertheless raises some important issues surrounding the way in which online surveys are administered and the motivations of those participating in online surveys.

- 1) If the motivation of panel members is to earn money from participating in online surveys logic suggests respondents will expend as little energy as possible in order to earn the fee. We have found no evidence that leading online research companies deploy any method to regulate the time each respondent must spend on each question.
- 2) A minimum quality standard should be to devise methods to ensure that panel members spend **at least** as much time looking at questions online as they would have to spend listening to an interviewer read them out. In some cases

respondents who then spend even more time considering their response may answer differently to those in any interviewer administered survey, and that deliberation may both change and improve data quality. At present no such claim could be made and indeed the opposite may apply

- 3) It may also be possible to introduce simple check questions, to catch respondents who give contradictory answers, thereby proving they are not giving careful consideration to each question
- 4) .Most online surveys are presented as typed questions and answer lists of the most basic format. Data quality may be enhanced by devising on-screen layouts that make questions easy to read and do not inadvertently encourage respondents towards certain answer codes. There are limitless possibilities, but experimentation may lead each company to devise a house style. Using that style will give answers to online surveys that are at least consistent with other research done by that same organisation.
- 5) Online researchers must pay respondents appropriately for carefully considered answers. Nevertheless, response rates may suffer as some respondents find that online research is not the easy way to earn money they originally thought.

The dilemma for the online research specialists is that they have, hitherto, sold online research as a cheaper alternative to traditional research methods. Even so some online researchers are concerned over a looming price war among online suppliers across Europe driving prices and profit margins even lower. The aim of sound research on the other hand suggests that online researchers should be investing more, in recruiting non professional panel members, in carefully considered and constructed web page question design and in paying panel members appropriately for carefully considered responses.

## APPENDIX 1

### CRIME AND PUNISHMENT SURVEY

**Online survey** completed between November 23<sup>th</sup> and 24<sup>th</sup> 2005 among 1,024 panel members. Interviews conducted throughout Great Britain.

**Telephone survey** conducted between November 23<sup>rd</sup> and 24<sup>th</sup> 2005 among 1,026 adults countrywide.

Results to both surveys have been weighted to be representative of all adults by age, sex, social class, work status, tenure, foreign holidays taken in the last 3 year, car ownership, region and by ICM targets for a recall of past votes in the 2005 election.

### TAXATION AND SPENDING

**Online survey** completed between November 30<sup>th</sup> and December 1<sup>st</sup> among 1,013 panel members. Interviews conducted throughout Great Britain.

**Telephone survey** conducted between November 30<sup>th</sup> and December 1<sup>st</sup> 2005 among 1,013 adults countrywide.

The unweighted and weighted profiles are shown in the table below

	Crime Telephone	Crime Online	Tax and spend Telephone	Tax and spend Online	Weighted to .....
	%	%	%	%	%
<b>Sex</b>					
Male	44	51	41	48	48
Female	56	49	59	52	52
<b>Age</b>					
18-34	26	30	23	27	30
35-54	40	37	37	36	37
55-64	15	14	15	17	14
65+	18	19	20	21	19
<b>Work status</b>					
Work Full time	44	37	45	32	45
Part Time	14	13	11	13	11
Not Working	42	50	43	54	44
<b>Tenure</b>					
Own Home	25	31	27	31	30
Mortgage	40	39	37	38	42
Council/HA	19	8	21	8	13
Other	16	22	16	22	15
<b>Taken foreign holidays in last 3 years</b>					
Yes	63	69	59	69	62
No	37	31	41	31	38

## APPENDIX 2

### CRIME AND PUNISHMENT QUESTIONS

Q1. How worried would you say you are about being the victim of a crime? Would you say you are .....

Very worried  
Fairly Worried  
Not very worried  
Not at all worried

Q2. [British Crime Survey question] Has there been a time in the last year when you have felt your personal safety was threatened or that you would be a victim of crime?

Yes  
No

Q3. Over the course of the last 5 years or so, have you or anyone in your household been the victim of any of the following crimes .....

Assault  
House burglary  
Theft of or from a car

Q4. Would you approve or disapprove if it was decided that the police in this country should now routinely carry guns?

Q5. [British Crime Survey question] This question is about the Criminal Justice System as a whole, that is the police, the Crown Prosecution Service, the Courts, prison and probation services. How confident are you that the Criminal Justice System is effective in bringing people who commit crimes to justice?

Very Confident  
Fairly Confident  
Not very Confident  
Not at all Confident

Q6. Overall, would you say sentences passed by the courts are too harsh, too soft or are they about right?

Q7. Which of the following comes closest to your own view ....

The prison sentences handed down by the courts should be served in full  
People serving prison sentences should be given early release on licence if they show they have reformed

Q8. Specifically on life sentences some people say that if someone is given a life sentence by the courts that life should always mean life, with no chance of parole? Do you agree or disagree?

Q9. Would you yourself approve or disapprove of the re-introduction of the death penalty for the murder of .....

Children  
On-duty policemen and women  
For all murders

Q10. Which of the following two views comes closest to your own?

People who commit murder should themselves face the death penalty, an eye for an eye  
The death penalty is state authorised murder, two wrongs don't make a right

Q11. In the past some people have been found guilty of murder only to be acquitted later. Examples include the four Irishmen found guilty of the Birmingham Pub bombings. Which of the following views comes closest to your own .....

The death penalty is a necessary deterrent, the benefits outweigh the dangers  
The dangers of a wrongful conviction (and therefore hanging the wrong person) outweigh the deterrent value of the death penalty

Q12 Do you approve or disapprove of new directions given to judges which states that a person convicted of a mugging should not be automatically be sent to prison

Q13. As an alternative to prison for some types of crime, some people have suggested the greater use of curfews and electronic tagging as a means of punishing some criminals. Would you approve or disapprove of the greater use of curfews and electronic tagging

## **TAXATION AND SPENDING QUESTIONS**

1. Do you think that overall taxes will be higher or lower at the end of this Parliament than they are now?

Higher  
Lower  
Don't know

2. Do you agree or disagree that extra spending over the last few years has resulted in real improvements in the NHS.

Agree  
Disagree

3. And do you agree or disagree that extra spending over the last few years has resulted in real improvements in state schools.

Agree  
Disagree

4. If the government reformed public services and cut waste it could make services better and reduce tax at the same time

Agree  
Disagree  
DK

5. If taxes are cut the economy will grow faster, which will mean higher living standards AND more money available for public services

Agree  
Disagree  
DK

6. People have different views about whether it is more important to reduce taxes or keep up government spending. Which of these statements comes closest to your own view?

Taxes should be cut, even if it means some reduction in government services such as health, education and welfare

Things should be left as they are

Government services such as health, education and welfare should be extended, even if it means some increase in taxes

Don't know

7. Which of these statements comes closest your view?

Gordon Brown remains a prudent Chancellor who has controlled spending and run the economy well

Gordon Brown is becoming an imprudent Chancellor who has spent too much so that taxes will have to rise

DK

Q8. Thinking of income levels generally in Britain today, would you say that the **gap** between those with high incomes and those with low incomes is

...READ OUT...

1 ... too large,

2 about right,

3 or, too small?

Q9. Which of the phrases on this card would you say comes closest to your feelings about your household's income these days?

1 Living comfortably on present income

2 Coping on present income

3 Finding it difficult on present income

4 Finding it very difficult on present income

7 (Other answer (WRITE IN))

10. How do you think the financial situation of your household will change over the next 12 months?

Get a lot better

Get a little better

Stay the same

Get a little worse

Get a lot worse

Don't know

### APPENDIX 3

Comparison of results. Random telephone vs Internet sub sample weighted to profile of all adults

	Phone All adults	Phone Internet accessible	Differences * = significant
	%	%	
Q1. Worried	46	44	-2
Q2. Felt threatened in last year	20	19	-1
Q3. Been a victim of assault	11	12	+1
Q3. Been a victim of Burglary	10	11	+1
Q3. Been a victim of car crime	16	17	+1
Q4. Approve of guns for police	46	43	-3
Q5. Confident in Criminal justice system	46	42	-4
Q7. Courts too soft	70	77	-7*
Q8. Sentences should be served in full	71	74	+3
Q9. Life should mean life	79	76	-3
Q10. Capital punishment for child murders	64	69	+5*
Q10. ... for Police murders	64	62	-2
Q10. ... for all murders	55	53	-2
Q11. Agree with capital punishment, an eye for an eye	46	43	-3
Q12. Death penalty is a deterrent	38	36	-2
Q13. Muggers should be spared prison	36	34	-2
Q14. Approve of tagging	57	57	0
<b>Sample size</b>	1024	667	

	Telephone All adults	Telephone Internet accessible	* = significant
	%	%	%
Q1. Taxes higher in 5 years	78	78	0
Q2 real improvements in NHS	33	33	0
Q3 Real improvements in schools	35	36	+1
Q4. Govt could cut tax and improve services	69	69	0
Q5. If taxes cut economy will grow thereby benefiting public services	57	59	+2
Q6 Extend Government services	49	53	+4
Q7. Brown is prudent	41	40	-1
Q8. Gap between rich and poor too large	71	75	+4
Q9. Comfortable on current income	29	29	0
Q10, Economic optimism	26	25	-1
<b>Sample size</b>	1013	624	

## References

**Bourdieu, P. 1979.** "Public opinion does not exist". In Communications and class struggle. Edited by A. Mattelart and S. Siegelau. New York: International General

**Comley, P. 2005.** "Understanding the Online Panellist". ESOMAR panel conference. Budapest April 2005. Available at [Virtualsurveys.com](http://Virtualsurveys.com)

**Curtice, J. & Sparrow, N. 2004.** Measuring attitudes of the general public via internet polls: An evaluation. The Market Research Society.

**Herbst, S. 1993.** The meaning of public opinion. Media, Culture and Society 15. 437-454

**Lewis, J. 2001.** Constructing public opinion . How political elites do what they like and why we seem to go along with it. Columbia University Press P8-20

**Sparrow, N. and Turner, J.** Messages from the spiral of silence: developing more accurate market information in a more uncertain political climate. JMRS, 37,4, 1995 pages 357-383

**Zaller, J.R. 1992.** The nature and origins of mass opinion. Cambridge University Press

**Nick Sparrow is managing director of ICM Research. He has been conducting political opinion polls for The Guardian and other media organisations since 1984 and is an industry acknowledged expert on political opinion research. He won the Market Research Society Silver Medal for his work on the development of accurate opinion research, and was pollster for the Conservative Party from 1996 to 2003.**

**ICM is a major opinion and market research company. It offers a full range of quantitative and qualitative techniques to political and business clients.**