Visiting item non-responses in internet survey data collection

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A widely used technique in internet surveys is ‘forced answering’, which requires respondents to enter an ‘appropriate’ response before they are allowed to proceed to the next survey question. Forced answering virtually eliminates sources of respondent error due to item non-response. However, using forced answering might cause respondents to opt out entirely or break off early in the survey, which would increase non-response error. It has been suggested that one way around this is to provide a ‘prefer not to answer’ (PNA) option if forced answering is used, which would allow respondents to continue without providing a response to each question. This study examines effects on item non-response rates of using forced answering and ‘prefer not to answer’ in internet surveys. Findings reveal that use of PNA is not a perfect substitute for leaving questions blank, which brings into question the equivalency of response options that allow internet survey respondents to bypass answering questions and quality versus quantity tradeoffs associated with internet survey design choices.

**Introduction**

Internet surveys are quickly becoming the preferred method of delivery for self-administered surveys. Internet-based surveys have the advantage of offering expanded opportunities for presentation of material, including animations and video, and advanced tracking of responses (Bosnjak & Tuten 2001). Many internet survey programs offer researchers a wide variety of design options that can reduce sources of respondent error, such
as certain biases like acquiescence, extreme reporting and social desirability (Fricker et al. 2005; Miller 2006, p. 113), which are typically high in alternative self-administered methods. Internet survey programs also may allow the capturing of partial responses to surveys and tracking response processes, e.g. such as the order in which respondents proceed through a questionnaire, whether they answer a viewed question, postpone answering before returning or skip a question entirely (Bosnjak & Tuten 2001). The programs also facilitate implementation of embedded experiments (McFadden et al. 2005), such as that reported by the present study.

The shift of research expenditures to internet surveying has been accompanied by increased methodological research. Recently, an entire special issue of Public Opinion Quarterly (2008, Vol. 72, No. 5) was devoted to web (i.e. internet) survey methods. Papers in the issue reflect some of the many ways that the internet can be used – whether alone or in combination with other methods – to conduct surveys (Couper & Miller 2008, p. 831).

Software features such as the ability to require a full and complete response to a question before a respondent is allowed to proceed to the next question, known as ‘forced answering’ (FA), offers the promise of reducing one form of non-response error, item non-response, which is a major component of data quality.

Forced answering offers the potential benefit of virtually eliminating item non-response. But at what cost? Using FA can frustrate or even anger respondents. They may give random or non-truthful responses. Dillman et al. (1998) and Dillman (2007, p. 394) advocate not requiring respondents to provide an answer. If there is a compelling reason for using forced answering, these researchers propose that a response option such as ‘I prefer not to answer’ (PNA) be provided in the response set. In the United Kingdom, for example, the revised Code of Conduct of the Market Research Society has the following provision (B14): Members must take reasonable steps to ensure ‘that respondents are able to provide information in a way that reflects the view they want to express, including don’t know/prefer not to say where appropriate’ (Market Research Society 2010, p. 13).

Providing PNA – or ‘don’t know’ (DK) or ‘no opinion’ (NO) – options may alleviate frustration and provide respondents with a greater sense of control, resulting in greater completion rates. They also may be used by respondents as a way to avoid answering in the same manner as leaving a question blank. PNA responses to all types of question, NO to attitude and/or perception questions, and DK to a question of fact may be substantive answers. Indeed, research on these response options indicates
that respondents tend to use them for a variety of reasons, not all of which are purely what the response is designed to represent (Krosnick 2002). As respondents’ reasons for using these options is unknown to data analysts, they typically treat a PNA (or DK or NO) response as an item non-response.

This study examines how item non-response is affected by the use of forced answering (FA) and ‘prefer not to answer’ (PNA) response options in internet surveys. This paper discusses two key issues. These two issues and the findings from the study reported are important to both practitioners and academic researchers. Both issues relate to research design, specifically the design of research studies that collect data using internet surveys. The first issue concerns whether using a PNA response is the same as the response of leaving a question blank. We address this issue behaviourally by looking at item non-response. If use of PNA and leaving a question blank are essentially the same, then the number of item non-responses in the absence of FA should be the same regardless of whether one or both responses are available. Alternatively, they may not be equivalent, which leads to the second issue.

The second, more applied, issue is related to the first: does providing a PNA option in the presence of FA result in more (or fewer) item non-responses than the number of items left blank when FA is absent? While using FA in an internet survey normally eliminates item non-response, it is possible that providing a PNA option will result in more item non-responses than the number of blank questions in a non-FA survey.

The answers to these issues concern quantity versus quality trade-offs in internet research design choices. If adding PNA serves to increase item non-response, its inclusion could negatively impact data quantity. However, if PNA is not equivalent to leaving an item blank (i.e. if it is a substantive response) its inclusion could positively impact data quality.

**Background**

Most studies involving item non-response options such as PNA or DK or NO have focused on the use of DK or NO in non-internet modes of delivery (Bush & Hair 1985; Leigh & Martin 1987). A notable exception to comparative studies examining item non-response that did include an internet survey sample is one conducted by Heerwegh and Loosveldt (2008) that compared item non-response in a face-to-face versus an internet survey among a sample of freshmen university students in Belgium. Although average item non-response rates were small, the internet survey
did yield a considerably higher average item non-response rate than did the face-to-face survey.

Researchers have debated the pros and cons of providing explicit ‘opt-out’ responses such as DK or NO. Those who oppose use of PNA/DK/NO response options argue that they reduce effective sample sizes without posing significant improvements to data quality (Poe et al. 1988) and that, most of the time, respondents can venture a valid opinion towards attitudinal questions when pressed to do so (e.g. Cannell et al. 1979; Smith 1984; Visser et al. 2000; Krosnick 2002). For instance, Beatty and Herrmann (2002) varied questionnaire instructions and use of DK in an experimental design involving paper-and-pencil self-administered surveys. Findings revealed that item non-response rose considerably when questionnaire forms included a DK option, but was virtually non-existent when respondents were instructed to answer every question, even ‘when difficult to do so’.

On the other hand, those in favour of offering PNA/DK/NO response options argue that pressuring people to provide substantive responses for which they honestly have no knowledge or opinion increases random responses that can negatively impact data quality (Converse 1964; Schuman & Presser 1981). The preponderance of advice leans towards minimising PNA/DK/NO options as they increase item omissions. But, when making a decision regarding this issue, a researcher should consider factors such as the topic content, mode of delivery, length of the questionnaire, and question requirements, to name a few.

The issue of whether or not to include PNA/DK/NO response options has taken on new meanings given that internet researchers can now use software features to disallow item non-response altogether. Several authors have attempted to distil the findings of methodological research into principles for constructing internet surveys (Dillman et al. 1998; Couper 2000, 2008; Dillman 2007). One of the principles is based on using forced answering (FA). If FA must be used, these researchers propose that a meaningful response option be provided. Examples of such responses include PNA for questions of opinion, preference or attitude, and PNA or DK for questions of fact. As the measurement instruments used in the present study (described below) consist primarily of attitude/opinion questions, the focus of this study is on the PNA response.

**Description of the study**

As discussed in the previous section, Dillman et al. (1998) and Dillman (2007, p. 394) recommend against requiring respondents to provide
an answer. By not using FA in a questionnaire the researcher makes it possible for respondents to leave questions blank. However, it is possible that providing PNA and allowing blank response options results in more item non-responses than occur when leaving a question blank is the only response option. In other words, PNA and leaving a question blank, as response options, may not be the same because some questions may be left blank unintentionally. Non-equivalency of the options raises the practical question of whether, from the standpoint of item non-response, the researcher is better off using FA with PNA or not using FA, with or without PNA. The present study investigates these questions.

A problem that emerged in the literature was a lack of consistency in the measurement of item non-response. At one time or another, the following measures have been used: mean number of items omitted per questionnaire, percentage of questionnaires partially or fully completed, and mean percentage of questions answered or omitted (Houston & Ford 1976). The dependent variable in the present study is the mean number of item non-responses.

Mean item non-responses reflect the average number of questionnaire items left unanswered by respondents (i.e. items left blank or responded to by use of the PNA option):

- there are no item non-responses when FA is used without PNA
- when FA and PNA are used, PNA responses are the number of item non-responses
- when FA and PNA are not used, the item non-responses are the number of blank questions
- when FA is absent, but PNA is available, the number of item non-responses is the sum of blank questions and PNAS.

Two issues are investigated, which are illustrated in Figure 1. The first issue concerns the practical equivalency of a response option, such as PNA, and the option of leaving a question blank. Note, both options may be made available only if FA is absent. If PNA responses are perfect substitutes for what otherwise would be items left blank, then in the absence of FA, the expected number of item non-responses would be at B′ of Figure 1. If there is no overlap between the meaning of PNA and leaving a question blank, then the expected number of item non-response would be at a point such as B″ of Figure 1. It is possible that providing the PNA response complements rather than substitutes for leaving an item blank, i.e. the two options interact resulting in more item non-responses than expected from their independent
contributions. If this is the case, the expected item non-responses would be at a point such as $B''$ of Figure 1. Alternatively, if the PNA is not a perfect substitute for leaving an item blank, the expected number of item non-responses would be on a line connecting points $B'$ and $B''$ of Figure 1.

The second issue concerns the practical consequences of PNA not being a perfect substitute for leaving a question blank. If PNA is not a perfect substitute for leaving a question blank, then it is possible that the use of FA with PNA may actually increase the number of item non-responses compared to not using FA and leaving a question blank as the only non-response option. When FA is present and PNA is not available (point A of Figure 1), the number of item non-responses will be zero (at the possible cost of an increase in sampling unit non-response). As will be reported in our results, completion rates among the experimental groups in the study are statistically insignificant. Our focus, therefore, is on item response.

When FA and a PNA response is provided, there will be an expected number of PNA item non-responses (point B of Figure 1). On the other hand, in the absence of FA and PNA, there will be an expected number of item non-response due to blank responses (point $A'$ of Figure 1).
question is whether the difference between mean number of item non-responses at point B are equal to, larger or smaller than the number at point A’.

From the standpoint of statistical hypothesis testing, the hypothesis test for the first hypothesis is the most straightforward: it is a test for interaction between FA and PNA. If there is no interaction, then adding PNA to the FA absent condition adds PNA item non-response to item skipping non-response and the expected item non-response is at point B'' of Figure 1. If PNA provides a partial substitute or interacts with leaving questions blank, the expected item non-response will be at points such as B'' or B''' of Figure 1. Since we have proposed that our null hypothesis is that PNA is not a substitute for leaving items blank, our first hypothesis is:

**H1:** The interaction between FA and PNA will be insignificant.

The hypothesis test for the second issue amounts to an alternative hypothesis for H – that PNA acts as a substitute for leaving questions blank. If providing PNA responses under FA merely substitutes for the blank responses in the absence of FA, then the mean number of item non-responses when FA is present (\(\bar{n}_1\)) should *equal* the mean number of blank responses when FA is absent (\(\bar{n}_2\)). Therefore, our second hypothesis in null form is: \(H2_0: (\bar{n}_1 - \bar{n}_2) = 0\). Since PNA may be both a substantive answer as well as a non-response, our alternative (maintained) hypothesis is:

**H2:** The mean number of PNA responses when FA is present will be larger than the mean number of blank questions when FA is absent: \((\bar{n}_1 - \bar{n}_2) > 0\).

As noted above, PNA responses are the only observable item non-responses in the presence of FA: blank responses are the only observable item non-responses in the absence of FA and unavailability of PNA.

**Methodology**

**Sample**

The sample consists of 9000 US residents who were members of a commercial panel. Requests for participation were sent by email to all members of the sample. The email identified a university as the sponsor...
of the project. Table 1 provides the demographic characteristics of those responding to the questionnaire. The distributions across demographic categories reflect ‘normal’ characteristics of national panels. The modal demographic categories are Female (71.8%); Age, 45–54 (29.9%); Marital Status, married (51.6%); Education, some college (31.7%); Household Income, $50k–74.99k (19.5%).

Research design

The study was designed as a $2 \times 2 \times 2$ factorial experimental design. The treatment variables are as follows:

- Forcing Answers: Forced (FA), Not forced (non-FA).
- Response Alternative: Use of ‘prefer not to answer’ (PNA), no PNA offered (no_PNA).
- Question order within instrument. There were two orders as described in the following section.

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>% distribution</th>
<th>N</th>
<th>Characteristic</th>
<th>% distribution</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>71.8</td>
<td>944</td>
<td>Highest level of education completed</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>27.8</td>
<td></td>
<td>Did not complete high school</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age (years)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15 to 24</td>
<td>7.4</td>
<td>930</td>
<td>High school or GED</td>
<td>21.5</td>
<td></td>
</tr>
<tr>
<td>25 to 34</td>
<td>17.5</td>
<td></td>
<td>Technical or vocational school</td>
<td>7.6</td>
<td></td>
</tr>
<tr>
<td>35 to 44</td>
<td>26.5</td>
<td></td>
<td>Some college</td>
<td>31.7</td>
<td></td>
</tr>
<tr>
<td>45 to 54</td>
<td>29.9</td>
<td></td>
<td>College degree</td>
<td>24.3</td>
<td></td>
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<tr>
<td>55 to 64</td>
<td>15.3</td>
<td></td>
<td>Graduate degree</td>
<td>5.7</td>
<td></td>
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<tr>
<td>65 and older</td>
<td>3.2</td>
<td></td>
<td>Post-graduate degree</td>
<td>5.8</td>
<td></td>
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<tr>
<td>Marital status</td>
<td></td>
<td>943</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Single/never been married</td>
<td>23.1</td>
<td></td>
<td>Average annual household income</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>51.6</td>
<td></td>
<td>Less than $20,000</td>
<td>16.2</td>
<td></td>
</tr>
<tr>
<td>Domestic/common law partnership</td>
<td>9.3</td>
<td></td>
<td>$20,000 to $34,999</td>
<td>23.6</td>
<td></td>
</tr>
<tr>
<td>Divorced/separated</td>
<td>12.9</td>
<td></td>
<td>$35,000 to $49,999</td>
<td>19.3</td>
<td></td>
</tr>
<tr>
<td>Widowed</td>
<td>2.5</td>
<td></td>
<td>$50,000 to $74,999</td>
<td>19.5</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>$75,000 to $99,999</td>
<td>9.7</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>$100,000 and above</td>
<td>7.3</td>
<td></td>
</tr>
</tbody>
</table>

*a The difference between the sum of each distribution shown and 100% represents respondents who answered ‘prefer not to answer’. These ranged from 4.4% to 0.2%.
When the respondent clicked on the link to the website they were randomly assigned one of the eight questionnaire versions.

**Measurement instrument**

The measurement instrument was designed to provide measures for three distinct attitudinal constructs. First, a 15-item inventory related to disposal of possessions developed by Harrell and McConocha (1992) was used to assess *consumer product disposal motives*. A five-category balanced rating scale of importance ranging from Very Unimportant to Very Important was used with these items.

Second, an eight-item scale of *frugality* was included (Lastovicka *et al.* 1992). This scale uses six-category balanced Likert scales, ranging from Definitely Disagree to Definitely Agree.

Third, to measure business ethical beliefs we used Albaum and Peterson’s scale for *ethicality* (Albaum & Peterson 2006). This six-item measure is scaled as six-category balanced Likert scales, ranging from Strongly Disagree to Strongly Agree. Only the fifteen-item and eight-item scales were used in the order-of-presentation covariate-type variable. The six-item scale was presented third to all respondents.

The survey instrument concluded with five standard demographic questions (gender, age, marital status, education, income) and a final question, ‘I enjoyed completing this survey’, which was scaled as a five-category balanced Likert scale, ranging from Strongly Agree to Strongly Disagree. The measurement instrument consisted of a total of 35 questions.

**Results**

A total of 1268 panel members started the questionnaire, representing an overall start or ‘click’ rate of 14.1%. Submissions were received from 945 panel members, representing an overall completion rate of 74.5%. When the click rate is multiplied by the unit response (completion) rate the response rate appears (Han *et al.* 2009, p. 432), which is 10.5% for the present study. Thus, our submitted sample includes only those respondents who saw all 35 questions and responded one way or another. It does not include ‘break-offs’ or respondents who stopped answering questions at any point. For the most part, break-offs occurred immediately following the first question, which was ‘In which state do you reside?’ Chi-square tests indicate no differences in responses to the demographic items across the experimental conditions.
As stated above, the order of presentation of measurement items was rotated in order to serve as a type of manipulation check. Our concern was whether substantive conclusions regarding the effects of FA, PNA and their interaction generalise across questionnaire versions. A repeated measures ANOVA analysis of mean responses to the eight ‘Frugality’ and the 15 ‘Disposal Motivation’ items revealed no significant interactions between order and the FA and PNA experimental manipulations, or their interaction. Based on these findings, we conclude that the effects of FA, PNA and their interaction will generalise across order of presentation. Therefore, we combined the original eight experimental groups to focus on the 2 × 2 analysis of the FA and PNA manipulations.

Analysis also indicates the unit response (completion) rates of the experimental groups do not differ. The completion rates for FA questionnaires were 77.4% versus 73.9% for non-FA groups (z = 1.03, p = 0.15, n.s.). The completion rates for PNA groups were 72.0% vs. 73.9% for non-PNA groups (z = 0.53, p = 0.29, n.s.). The interaction between FA and PNA is insignificant (z = 0.75, p = 0.23, n.s.).

We conducted a 2 × 2 factorial ANOVA to test for main effects of PNA and FA along with the interaction effect. As shown in Table 2, there were significant main effects for both independent variables on item non-responses. The interaction effect of PNA × FA was not significant. Therefore, hypothesis H1 is supported. Similar results were obtained when examining types of questions separately – attitudes and demographics – as shown in Table 2.

Decomposing the observed mean item non-responses in non_FA/PNA questionnaires (1.01) versus non_FA/no_PNA questionnaires (0.19) provides indication of the substitutability of PNA and blank responses. With non_FA/no_PNA, the mean number of blank responses does not statistically differ from zero (p ≤ 0.275, one-tailed test). Providing a PNA option increases mean item non-response by 0.82 to 1.01. This increase is significant at the p ≤ 0.001 level.

The number of mean item non-responses in FA/PNA questionnaires (1.01) is greater than expected from their independent contributions (0.19 + 0.57) = 0.76 (Figure 2). The fact that the interaction between PNA and FA is insignificant implies that this difference (0.25 = 1.01 − 0.76) is statistically insignificant.

In order to test hypothesis H2, we conduct post hoc tests to compare the mean of item non-response in FA/PNA (n₁) with that of non_FA/no_PNA (n₂). Under the first condition, item non-responses consist solely of PNA responses; under the second condition, they consist solely of
As shown in Table 3, the difference between the values under the two conditions is positive; \((\bar{n}_1 - \bar{n}_2) = 0.38 (0.57 - 0.19)\), which is significant at \(p < 0.01\). The results support H2. A one-tailed test that the number of item non-response under FA/PNA is greater than the
number under FA/no_PNA is significant at the $p < 0.02$. Similar results were obtained in analysing differences between these two groups for each type of question.

**Discussion**

With an FA/no_PNA questionnaire, the respondent must either make an appropriate response to a question or break-off participating in the survey (we found between group differences in unit non-response to be statistically insignificant in this study). For FA/PNA questionnaires, a respondent can only make a PNA response – leaving a question blank is not an option. In the absence of other options such as ‘don’t know’ and ‘no opinion’, leaving a question blank is the respondent’s only item non-response in the non-FA/no_PNA condition. With no_FA/PNA questionnaires, a respondent may make a PNA response or leave a question unanswered and both count as item non-responses.

Hypothesis H1 concerns the item omission equivalence of PNA and leaving a question blank. If the options are identical from the perspective of the respondent, then the expected number of PNA responses in the FA/PNA condition should equal the expected number of blank questions in the non_FA/no_PNA condition. That is, a plot of responses would consist of lines A–A’ and B–B’ of Figure 1.

Equivalency does not require identity. For example, PNA might completely substitute for leaving a question blank, but be able to capture additional substantive meaning. If this were the case, the expected number of item non-responses under non_FA would fall between B’ and B” of Figure 1. If PNA and blank responses are independent, non-substitutes for one another, the expected number on item non-responses would be at B” of Figure 1. If allowing PNA and blank questions to complement each other, it is possible for their combination to result in more item non-responses

**Table 3** Difference between mean item non-responses FA with PNA and FA absent and PNA absent

<table>
<thead>
<tr>
<th>Type of question</th>
<th>Respondent group (Mean item non-response)</th>
<th>Mean difference</th>
<th>t</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>FA, PNA</td>
<td>Non-FA, No PNA</td>
<td></td>
<td></td>
</tr>
<tr>
<td>All questions</td>
<td>0.57</td>
<td>0.19</td>
<td>0.38</td>
<td>3.151</td>
</tr>
<tr>
<td>Attitudinal</td>
<td>0.45</td>
<td>0.16</td>
<td>0.29</td>
<td>2.460</td>
</tr>
<tr>
<td>Demographics</td>
<td>0.12</td>
<td>0.02</td>
<td>0.10</td>
<td>3.252</td>
</tr>
</tbody>
</table>
than their independent contributions. In this case, the expected number of item non-responses might be a point such as B ')' of Figure 1.

Our support for H1 implies that PNA and blank question responses are not equivalent. In fact, the lack of significance of the interaction implies that the responses are independent. That is, from a statistical standpoint, providing a PNA response to a non_FA questionnaire simply adds PNA item non-responses to the number of blank questions that would be observed otherwise. Our findings suggest that PNA responses and leaving questions blank are non-equivalent options, which implies they are not equivalent from the perspective of the respondent. Acceptance of the maintained hypothesis H2 suggests that providing a PNA option under FA may increase item non-response beyond what would be experienced if neither FA nor PNA were used. However, our finding which suggests that PNA may be a substantive response for some respondents implies that failure to include it as a response option may compromise the data quality of forced answers where this response is not provided.

**Conclusion**

Although respondents in our study did not utilise the PNA option to a great extent, the fact that they did use it at a rate significantly greater than zero brings into question the equivalency of PNA responses versus leaving questions blank. Were some respondents in the non_FA/no_PNA condition offering responses that did not represent their true attitudes or opinions because they were reluctant to leave items blank? How were respondents who submitted completed responses in the FA/not_PNA conditions responding to questions they did not wish to answer? Answers to questions such as these will require investigations that consider both information processing and the motivational processes that underlie internet respondent behaviours.

A more detailed analysis of the practical and motivational processes that underlie internet respondent behaviours has implications for whether non-response behaviour is random or non-random. The impact of item non-response on survey results depends upon whether item non-response is a random or non-random process. Research on other survey modes indicates that a non-random process is involved, at least at the aggregate level (Ferber 1966; Craig & McGann 1978; Durand et al. 1983).

Research is needed to address a wide spectrum of issues related to item non-response and internet survey design choices, including how use of forced answering interacts with other internet design choices, such as use
of paging versus scrolling (Peytchev et al. 2006), and its use alongside various scale formats such as free-choice (odd-number) scales versus forced-choice (even-number) scales and with check-list type questions (Smyth et al. 2006).

One issue that needs addressing is that of the effect of topic sensitivity on item non-responses in internet surveys. Item non-response is more likely to occur for questions involving some psychological threat (Tourangeau et al. 2000). The topics covered in the present study can be considered to be somewhat innocuous, and this may have contributed to the low level of item non-responses. It may be that the results would differ and that the impact of ‘prefer not to answer’ would be greater with more sensitive topics. Research should explore what topics or question contents are deemed ‘sensitive’ and therefore susceptible to item omission, which could vary across cultures (Roster & Albaum 2010). There is also evidence that item non-responses are systematically related to certain socio-economic and demographic characteristics of survey participants (Peterson & Kerin 1980). Item non-response behaviour has also been related to self-image traits, psychological traits, and values (Omura 1983).

Non-response options (e.g. ‘no opinion’, ‘don’t know’, ‘prefer not to answer’) have equivocal interpretations and respondents use them for reasons that are not necessarily those researchers intend (Krosnick 2002). Possibly, panellists in our study were reluctant to choose the ‘prefer not to answer option’ for our attitudinal questions because this option represented ‘non-compliance’ with their prior commitment to the research institution. They may have more frequently chosen a ‘no opinion’ option, had that been offered. We can only speculate. Our results, however, indicate the options are not behaviourally equivalent, which suggest that not only whether to offer, but how to fashion opt-out responses, is an important area of research for internet researchers.

References

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