Overcoming Non-Response: Lessons Learned Migrating to a Web-Based Platform

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The Numbers

• Over 1 million students graduate each year having taken the SAT®

• When students register to take the SAT, they are asked to fill out a 43-item questionnaire

• In the mid-1990s, web registration for the SAT began

• By 2002, 44% of the graduating cohort registered on the web
The Population & The Instrument

• The SAT is primarily taken by juniors and seniors in high school

• The SAT¹ is a test that measures critical reading and math reasoning

• The SAT questionnaire includes questions about:
  • high school coursework and activities
  • college preferences and aspirations, and
  • demographic information

¹ through February 2005
Reports on the Cohort

• Summary reports are produced based on the graduating class of seniors
  • If you last took the SAT as a junior (in January 2005) your scores will be part of a summary report on all seniors graduating in 2006

• Issue-Time lag for results
  • Impact of questionnaire modification in 2003 has impact on about 75% students
Web increase → Non-response increase

• Key questions in which non-response caused the most concern:
  • Ethnicity
  • Mother’s Education
  • Father’s Education
  • Parental Income
  • High School GPA
  • First Language Spoken
  • Best Language Spoken
Web increase → Non-response increase

Percent of Non-Response by Registration Type, 2002

- Ethnicity: Paper 16, Web 23
- Mother's Education: Paper 19, Web 33
- Father's Education: Paper 20, Web 35
- Parental Income: Paper 28, Web 54
- HS GPA: Paper 15, Web 24
- First Language: Paper 16, Web 28
- Best Language: Paper 17, Web 18
Intervention

• In 2002-03, a committee met to identify which questions are needed most for scoring, test validity, and equity

• In May 2003, questions on the web were reordered, moving seven key questions to the beginning
Intervention

• Noted ‘for research only’ on parental questions
• Removed option for students to ‘Reset’ or respond ‘I don’t know’
• Added “I do not wish to respond” option
• Removed ‘Cancel’ option to exit
• Required all first-time web registrants to go to questionnaire
• If respondent left ‘key questions’ blank, question reloads
Non-Response in Key Questions

Percent of Web Non-Response by Cohort Year

2 GPA moved from item #1 to #5
Non-Response in Questions that moved back

Percent of Non-Response by Cohort Year

<table>
<thead>
<tr>
<th></th>
<th>2002</th>
<th>2004</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cumulative GPA*</td>
<td>24</td>
<td>16</td>
</tr>
<tr>
<td>Class Rank</td>
<td>56</td>
<td>58</td>
</tr>
<tr>
<td>First Choice Major</td>
<td>32</td>
<td>39</td>
</tr>
<tr>
<td>Certainty of Major Choice</td>
<td>28</td>
<td>30</td>
</tr>
</tbody>
</table>

3 Questions that moved to accommodate key questions; does not include 4 alternate major questions

*GPA moved from item #1 to #5
What’s a Researcher To Do?

• When you have so much to ask:
  • Identify items of most importance and ask them first
  • Identify core questions and link answers over time with unique identifier
  • Explore feasibility of adding ‘I do not wish to respond’ and/or reloading question once
Future Research

• Review non-response percent in the 2005 cohort

• Current effort underway to see if the question prompt is contributing to non-response in the ethnicity question

• Explore ways to match students as they come to the website to answer the questionnaire a little at a time
Questions, Comments, Suggestions

• Please forward any questions, comments, and suggestions to:
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