

# Does Size Matter?:

## Text Box Size in Online Surveys

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# First, a Thank You!

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# Why Text Box Size?

Lauren: “I think these text boxes are too big, they are intimidating.”

Jenn: “I like the big text boxes; they let students know we are listening.”

# Why Text Box Size?

- Does text box size impact what survey respondents think or how they respond in some way?
- Would respondents find the large text boxes scary or welcoming?
- If they saw a large text box, would they feel compelled to write a lot – even if they didn't have much to say?
- If we made the text boxes small, would respondents feel disappointed that they had so little room to express their views?

# Why Text Box Size?

**Describe your experience today:**

**Why were you unsatisfied with this order?**

Item arrived late

Seller unresponsive

Item not as described

Incorrect item shipped

Other

**Exhibit Feedback**

**1. Please explain below:**

What did you think overall?

What would you improve?

**1. What is your favorite movie in the following genres?**

Drama

Comedy

Foreign

Western

# Literature

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# What We Know From the Literature

- Most surveys use a combination of closed-ended and open-ended questions.
- Although it can be difficult to extract meaning from large numbers of open-ended questions, it can be valuable to include these items.
  - Collect data closed-ended questions cannot collect
  - Exploratory analysis of unfamiliar concepts
  - Opportunity to explain responses
  - “Venting”
  - Answering “why”

# What We Know From the Literature

- There's a lot of research about how to best format/ask closed-ended questions. (*e.g. Dillman, Christian, & Smyth, 2009; Tourangeau, Couper, & Conrad, 2004*)

...Less so for open-ended questions. (And much of the research explores controversial survey items or non-narrative open-ended questions.)



# What We Know From the Literature

- Respondents take cues from visual elements of **surveys** (e.g., Christian & Dillman, 2004; Couper, Tourangeau, & Kenyon, 2004; Couper, Conrad, & Tourangeau, 2007; Dillman, Christian, & Smyth, 2009; Toepel & Couper, 2007)
- Text box size influences responses for open-ended date and numeric questions (Christian, Dillman, & Smyth, 2007; Couper, Kennedy, Conrad, & Tourangeau, 2011; Dillman, Christian, & Smyth, 2009)
- Larger text boxes = more words and more topics per response (Christian & Dillman, 2004; Behr, Bandilla, Kaczimrek, & Braun, 2014)

# What We Know From the Literature

- But is more better?
  - Evidence that larger text boxes yielded more words...but no new information (*Behr, Bandilla, Kaczimrek, & Braun, 2014*)
  - Larger text boxes for open-ended date and numeric questions yielded extraneous information (approximations, context, etc.) (*Christian, Dillman, & Smyth, 2004*)

# What We Know From the Literature

- Often, major recommendation is to avoid open-ended questions due to:
  - Concerns about survey fatigue
  - Doubts about the value of open-ended questions
  - Difficulty in conducting meaningful qualitative analysis

# Guiding Question

- Does the size of a text box influence quantitative and qualitative measures of data quality?
  - Quantitative measures of data quality:
    - Survey completion rate
    - Item response rate
    - Length of responses
  - Qualitative measures of data quality:
    - Content of responses
    - Tone or valence

# Methodology

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# Design

- Experimental design:
  - Random half of the population received large text boxes
    - 600 pixels wide by 90 pixels high
  - Remaining half of the population received small text boxes
    - 400 pixels wide by 30 pixels high
  - Experimental manipulation applied to all text boxes in survey except for the “other, please specify” boxes.
- All other elements of the survey remained the same
- Analysis:
  - SPSS and Excel for quantitative measures
  - Linguistic Inquiry & Word Count (LIWC) software for qualitative measures

# The Text Boxes

## Large

Do you have any additional comments about Orientation?

## Small

Do you have any additional comments about Orientation?

# About the Surveys

## Orientation Survey

- Administered Fall 2014
- Random sample of half of all new first-year students
- 49.6% response rate (N = 331)
- 25 open-ended items
  - 8 narrative items
  - 17 follow-up probes

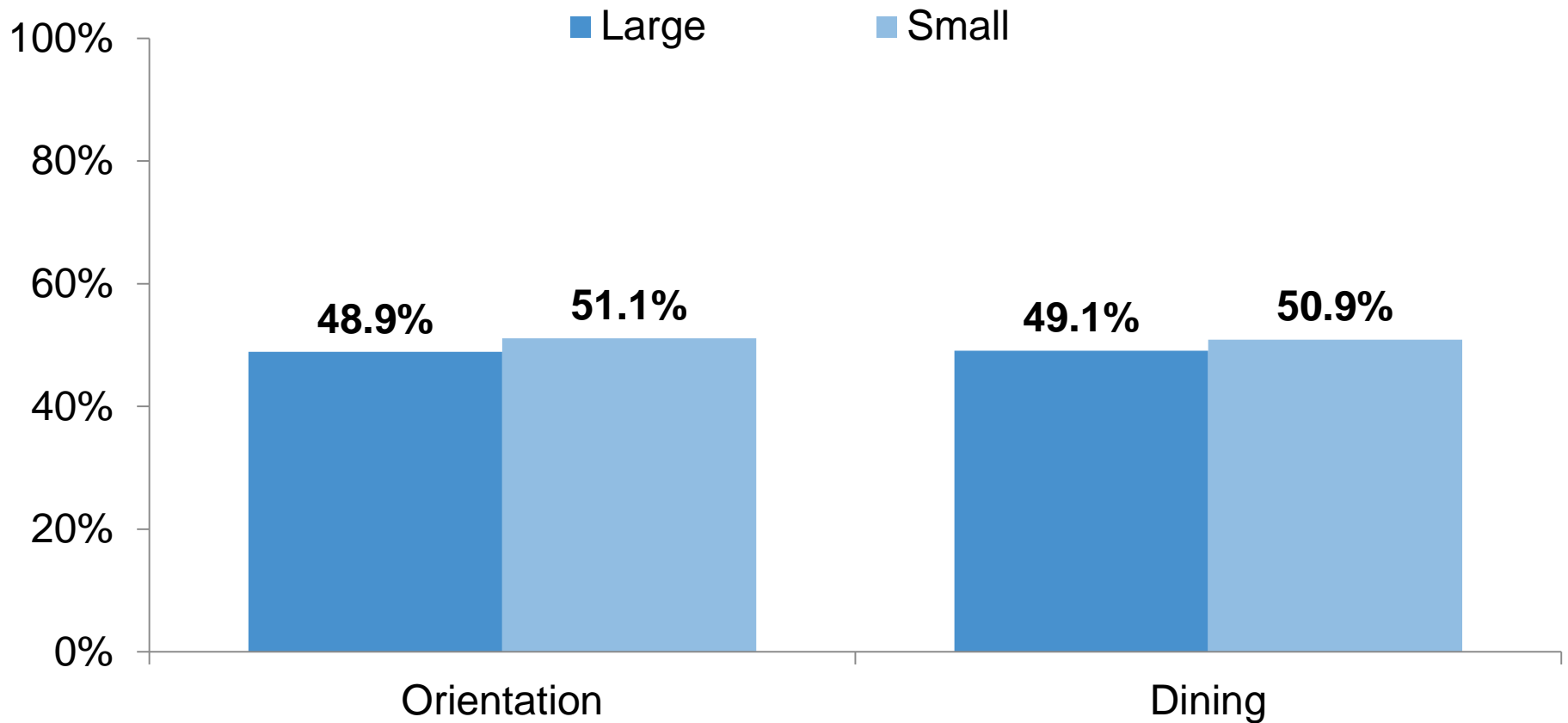
## Dining Services Satisfaction Survey

- Administered Fall 2014
- Random sample of half of all undergraduates
- 39.9% response rate (N = 1,019)
- 16 open-ended items
  - 6 narrative items
  - 10 follow-up probes



# About the Surveys

**Survey Respondents by Text Box Size**



# Results

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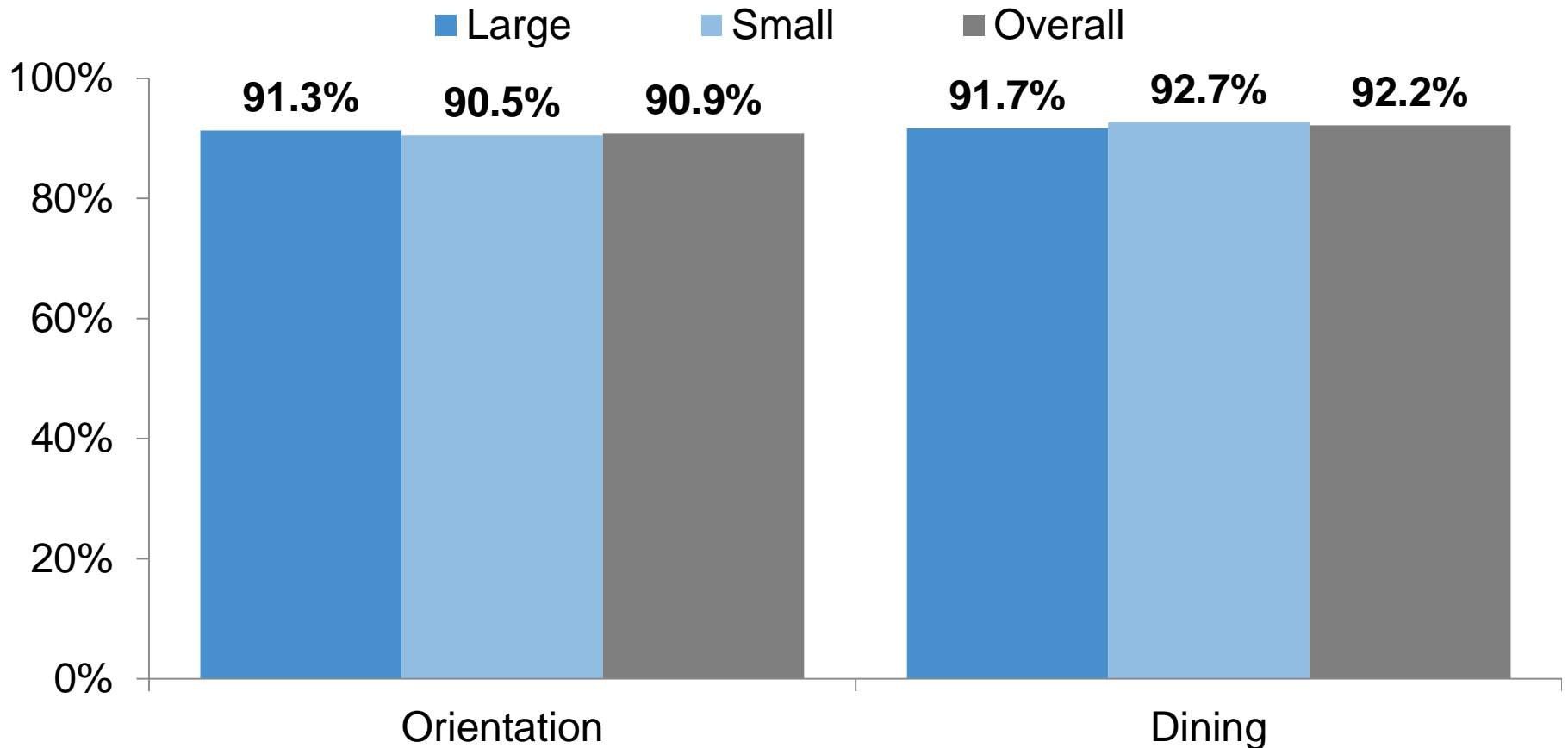
# Results: Quantitative Measures of Response Quality

- Survey completion rate
- Item response rate
- Length of responses

# Survey Completion Rate

*There were no significant differences in survey completion by text box size.*

## Survey Completion Rates by Text Box Size



Survey Completion = Saw at least one open-ended item and completed survey

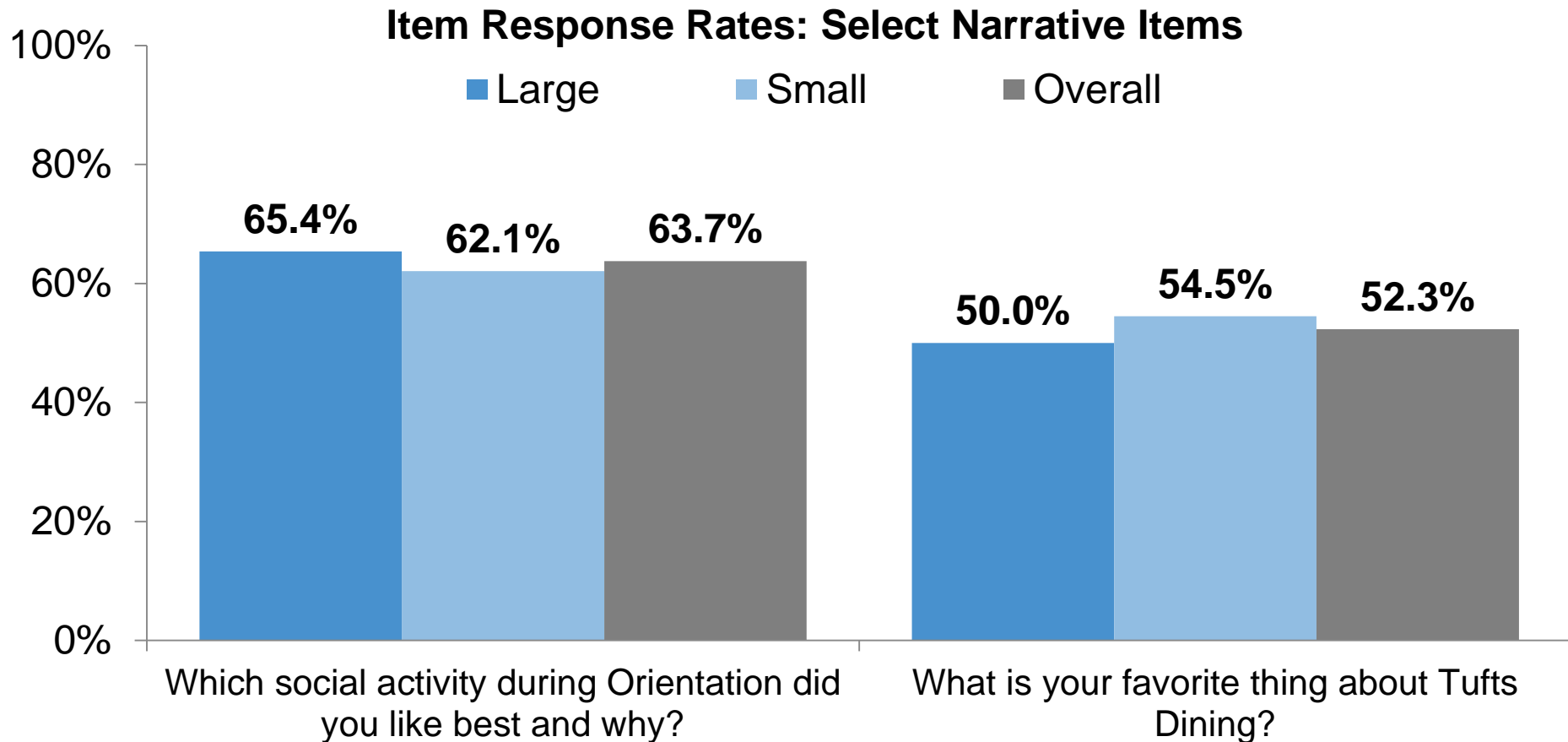
# Results: Quantitative Measures of Response Quality

- Survey completion rate: **No**
- Item response rate
- Length of responses

# Item Response Rates

- No significant differences or discernible patterns in item response rates by text box size
  - Large text boxes yielded higher response rates on 17 out of 41 items
  - Small text boxes yield higher response rates on 21 items
  - 3 items had equal response rates
  - No pattern observed by type or content of the items!
- Probes are difficult to evaluate because they are generally only shown to a minority of respondents

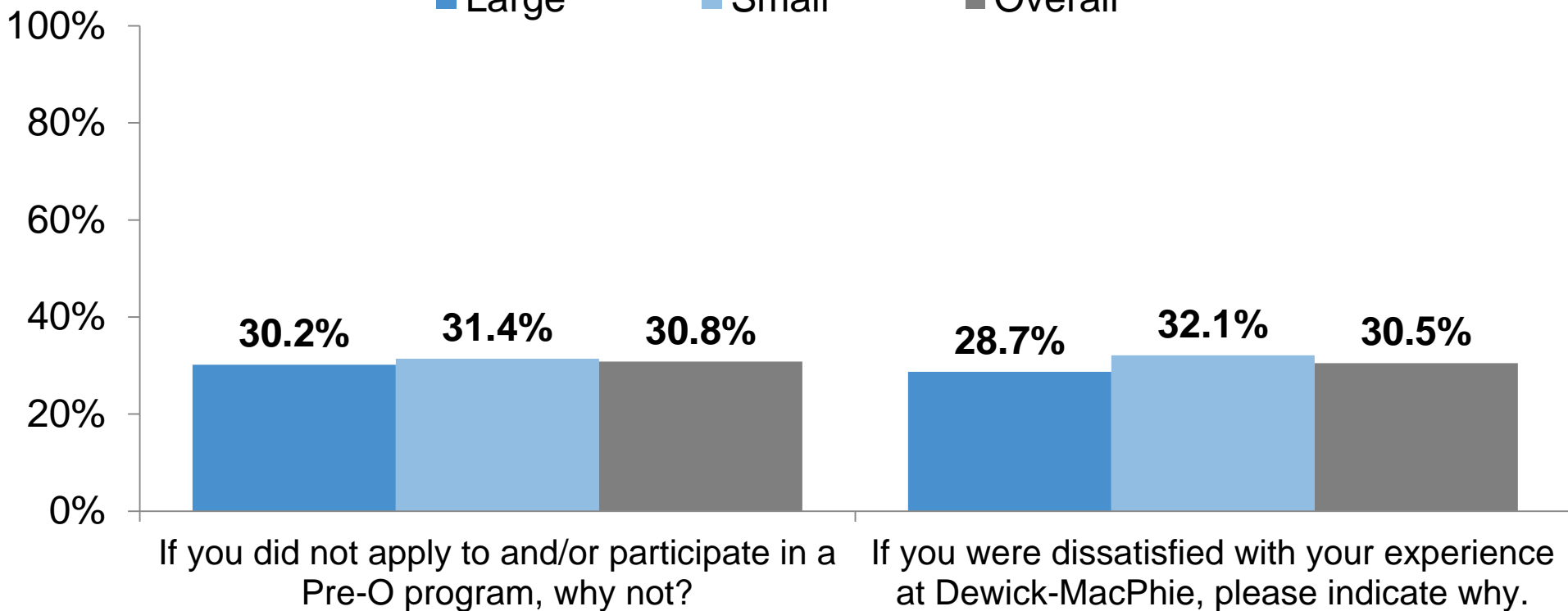
# Item Response Rates: Narrative Examples



# Item Response Rates: Follow-Up Probe Examples

Item Response Rates: Select Follow-Up Probes

■ Large    ■ Small    ■ Overall





# Results: Quantitative Measures of Response Quality

- Survey completion rate: **No**
- Item response rate: **No**
- Length of responses

# Length of Responses (Word Count)

*Larger text boxes systematically yielded longer responses.*

- Large text boxes yielded longer responses to 23 out of 26 questions
  - Difference was statistically significant in 5 cases
- Same pattern for narratives and follow-up probes
- Large text box responses were up to **twice** as long as small text box responses!

# Results: Quantitative Measures of Response Quality

- Survey completion rate: **No**
- Item response rate: **No**
- Length of responses: **Yes—Larger boxes tended to yield longer responses.**

# Summary: Quantitative Measures

- Text box size did not impact:
  - Survey completion rate
  - Item response rate
- Larger text boxes systematically resulted in longer responses
- Implications:
  - Make the boxes as big as you like – it won't impact response rates...
  - ...but expect people to write more in them.
  - Consider: Do you need more information?

# Quantity vs. Quality?

Jenn: “So students do respond to larger text boxes by writing more.”

Lauren: “Yes, but are these extra words meaningful or extraneous?”

# Results: Qualitative Measures of Response Quality

- Content of responses
- Tone or valence

# Content of Responses

- If past studies of text box size considered the content of responses, they focused on the number of themes/topics discussed (Behr, Bandilla, Kaczimrek, & Braun, 2014)
- But IR surveys often are not designed to inspire complex, multifaceted responses
  - There is only so much you can say in response to “What other foods or beverages would you like to have available at Hodgdon?”

# Content of Responses

This led us to . . .

- What versus Why:
- Do respondents provide only the “what” when responding to survey questions? Or do they also provide the “why”?



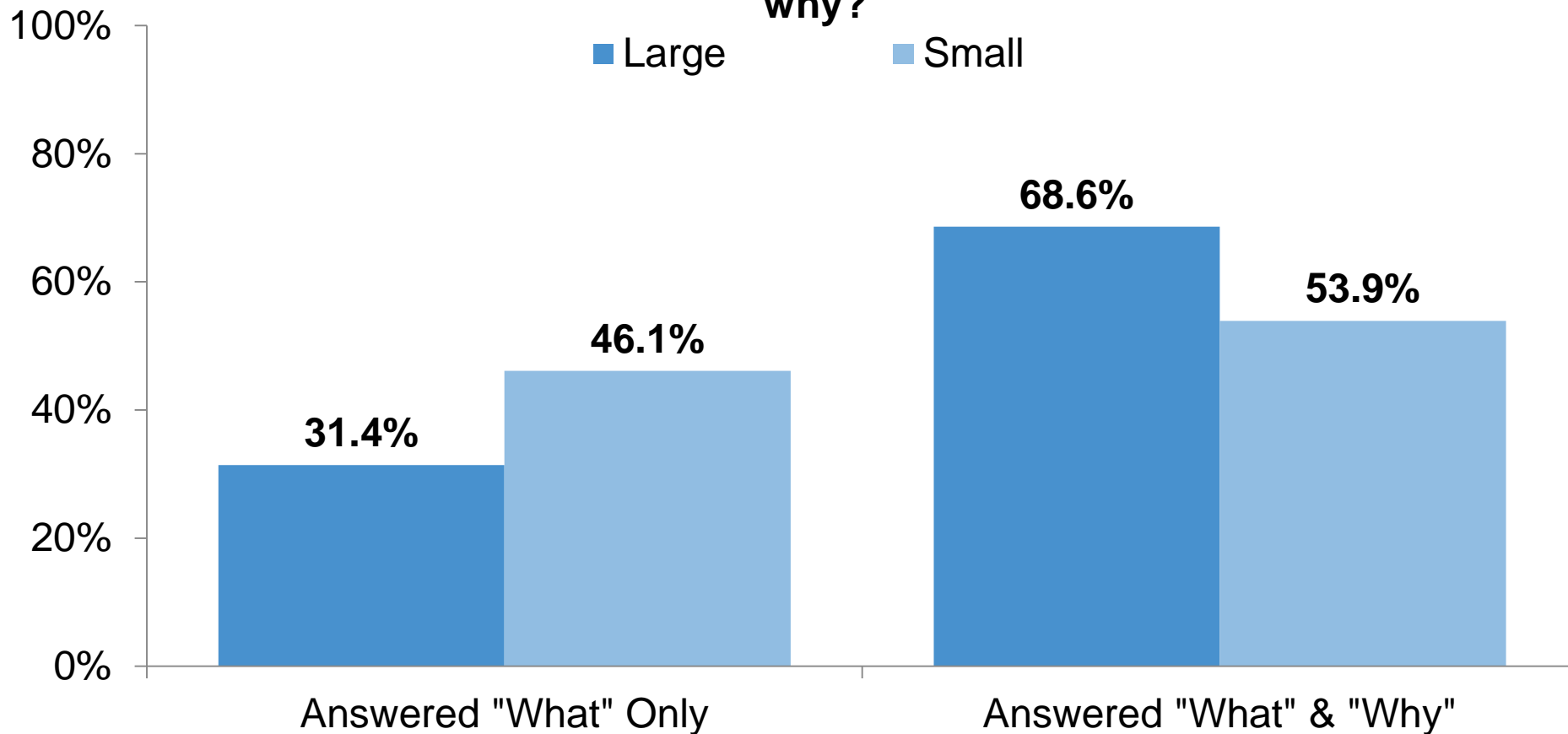
# “What” vs. “Why”

- Example: Which Social Activity Did You Like Best and Why?
  - “What” only: Candle lighting
  - “What and why”: Candle lighting because the whole class is there

# “What” vs. “Why”

*Large text boxes yielded significantly more “why” responses.*

**Which social activity during Orientation did you like best and why?**

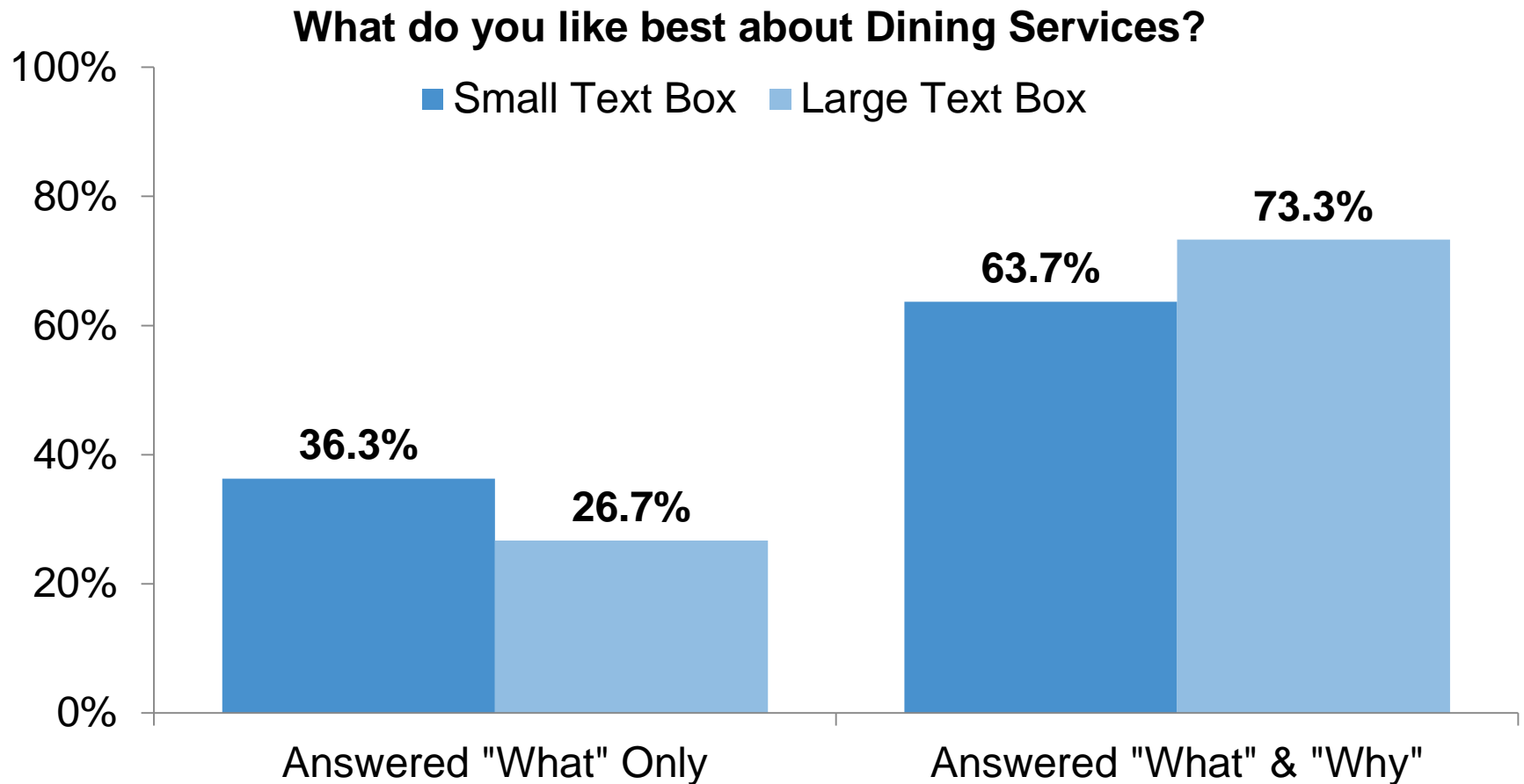


# “What” vs. “Why”

- Example: What do you like best about Dining Services?
  - “What” only: Food and staff.
  - “What and why”: It has delicious food, good variety and the staff is always so friendly and nice.

# “What” vs. “Why”

*Large text boxes yielded significantly more “why” responses—even when the question did not ask “why”!*



# “What” vs. “Why”

- Large text box responses were significantly more likely to contain a “why” in addition to a “what”
  - 15% more respondents included the “why” for this question.
- Most interesting: This is unprompted!
  - It makes sense if the question asked respondents to specifically give a “what and why.” But this one did not!

# Results: Qualitative Measures of Response Quality

- Content: ***Yes—at least in terms of whether respondents explain their responses.***
- Tone or valence of response

# Tone or Valence

- Tone or valence of response
  - Can use “positive emotion” and “negative emotion” word counts from LIWC... although be careful – “no” is considered negative!
  - Can categorize comments according to the overall tone
- Also a difficult task considering many questions do not require a valence, or ask respondents to provide comments of a particular valence.
  - “What’s your favorite thing about Dining Services?” (prompts positive valence)
  - “If you were disappointed, please explain why...” (prompts negative valence)
  - “What foods would you like to see served in Dewick-MacPhie?” (does not prompt a valence)

# Tone or Valence

- “Any other comments about Dining?”
  - Small text boxes contained significantly fewer words but...
    - ...significantly more positive comments
    - ...and used “I” (as in “I think...” and “I wish...”) more frequently.
  - And large text boxes had significantly more negative comments!!
- Also true for comments about Orientation (overall), Orientation Leaders and RAs, and Pre-Orientation Leaders
  - But these findings were not statistically significant
- Thoughts . . . .
  - Maybe people with small text boxes realize they have one last chance to say something, and choose to use it constructively or positively?
  - Maybe people with large text boxes get in the habit of being ranty?



# Results: Qualitative Measures of Response Quality

- Content: ***Yes—at least in terms of whether respondents explain their responses.***
- Tone or valence of response: ***For questions where responses can have varying valences, large text boxes tended to yield more negative responses and small text boxes tended to yield more positive responses.***

# Implications

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# Implications for Survey Research

- Good news: Size of the text box does not appear to contribute to survey fatigue as measured by item response rates and survey completion rates.
- Respondents appear to take cues from the text box size as to how to answer questions; larger boxes tend to encourage:
  - Longer responses
  - Elaboration/explanation
  - Negative tone

# Implications for Survey Research

- Carefully consider the intent of the open-ended question:
  - What is the goal? What kind of response would help achieve this goal?
  - Do you want to know “what” or “what” and “why?”
  - Is the size of your text box aligned with your intent? With the wording of the question?
- The curious case of “additional comments”

# Implications for IR

- Have a question? Design an experiment!
  - Think about ways to embed your experiment in the work you already do
- Indications of questions most salient to students
  - Orientation follow-up probes pertaining to academic advising and registration yielded 100% response rates; most others did not
  - Dining follow-up probes on dissatisfaction with major dining locations yielded higher response rates than others
- LIWC data tended to provide a good overall sense of the “pulse” of a set of comments
  - Perhaps a way to analyze all open-ended survey items?

# Next Steps

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# Next Steps

- Continue research on text box size
- Manipulations:
  - Multiple text box sizes per respondent
  - Varying text box size and prompt
    - Which social activity during Orientation did you like best (and why)?
    - What is your favorite thing about Tufts Dining (and why)?
- Explore impact of mobile device use
  - Does text box size matter in the context of a mobile device?

# Next Steps

- Examine other qualitative elements, such as:
  - Prevalence of nonresponsive answers (e.g. “N/A”, “none,” “I don’t know”)
- Examine class year as potential moderating variable
  - Do seniors – who have done lots of surveys – tend to write less because they’re tired of surveys? ...Or maybe they write more because it’s their last chance?



# Final Thought

*Whatever story you want to tell, tell it at the right size.*

-Richard Linklater

# Thank You! Questions?

- Questions, Comments?
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