

# How Do Different Cues Affect Proxy Reporting of Transit Use?

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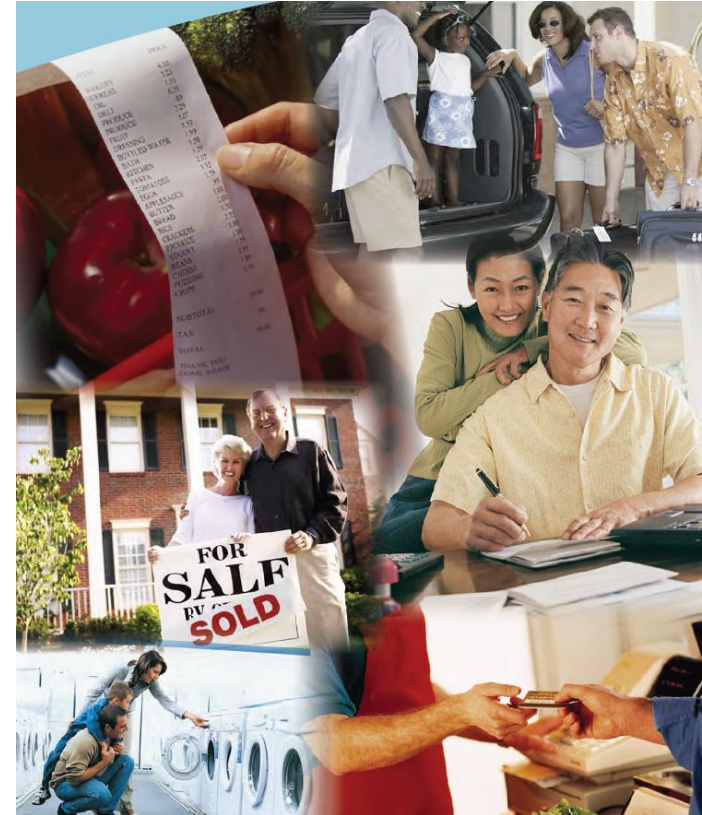
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# Consumer Expenditure Survey

- Consumer Expenditure Quarterly Interview Survey
  - Interviewer asks a HH respondent to report less-frequent and recurrent expenses
  - 3-month reference period



# Proxy Reporting

- Assumption: Proxy reports are of poorer quality
- Certain behaviors associated with spending can limit issues with proxy reporting (Kojetin & Miller, 1993):
  - Conversation
  - Participation
  - Observation



# Proxy Reporting (cont.)

- Certain expenditures more observable than others



- Hypothesis: Adding person-directed cues to question about less observable expense will increase reporting

# Public Transportation Question Changes

## 2017 quarter 1

- 1) Do [you or any members of your household] use mass transportation services such as a bus, subway, mini-bus or train? (Do not include expenses covered by employer-provided transit subsidies. Include commuter rail, light rail, and trolleys as mass transit)

## 2017 quarter 2

- 1) Do [you/you or any members of your household] pay out-of-pocket for public transportation services such as bus, subway, train, or passenger ferry?



# Public Transportation Question Changes

## 2017 quarter 1 - No (person) cues

- 1) Do [you or any members of your household] use mass transportation services such as a bus, subway, mini-bus or train? (Include ... Do not include...)
- 2) What is the usual MONTHLY cost to use mass transit to go to - Work?
- 3) What is the usual MONTHLY cost to use mass transit to go to - School?
- 4) What is the usual MONTHLY cost to use mass transit to go to - Other places?

## 2017 quarter 2 - Person cues

- 1) Do [you/you or any members of your household] pay out-of-pocket for public transportation services such as bus, subway, train, or passenger ferry?
- 2) What are the names of all household members who use mass transit?
- 3) What is [your/NAME's] usual out-of-pocket cost?
- 4) (-Select time period)
  - 1) Day (to Q5)
  - 2) Week
  - 3) Month
- 5) How many days per week usually?



# Findings: Fewer Reporting, but Increased Amounts

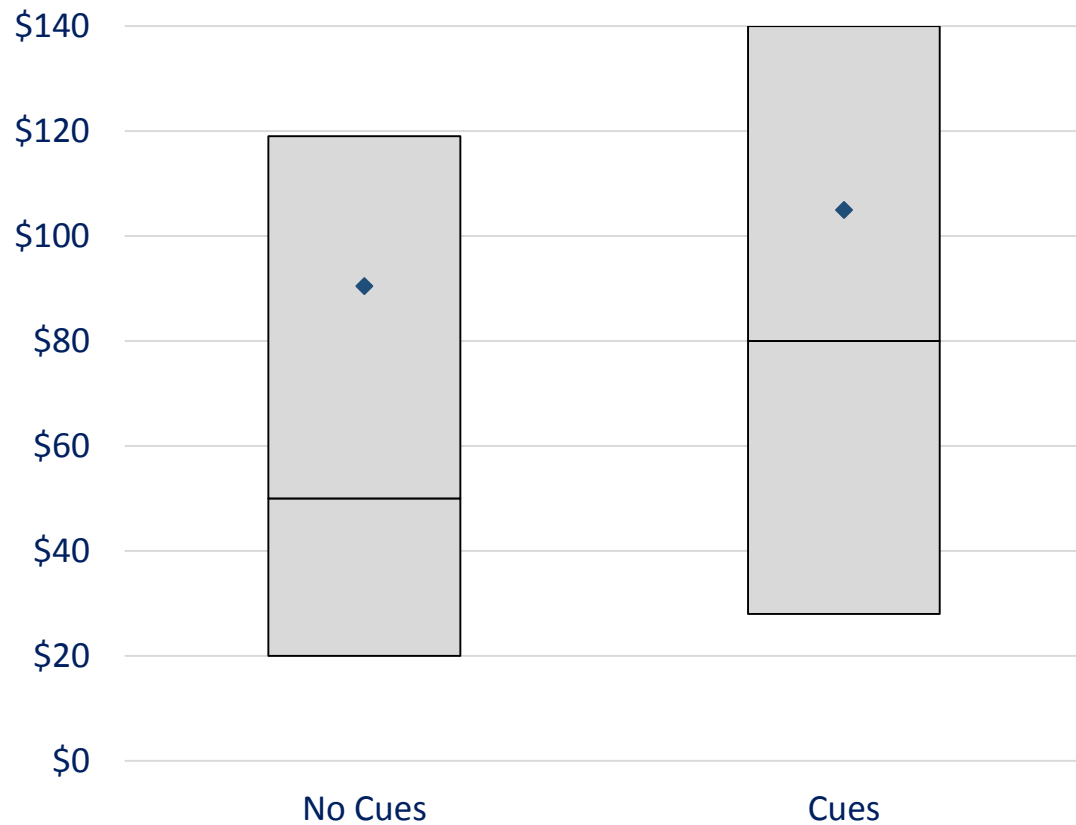
- Overall proportion of HHs reporting (non-subsidized) public transportation expenses declined [not significant]
- Amounts reported (for HHs reporting amount) increased

	No Cues (N=495)	Cues (N=443)
Mean*	\$75.13	\$89.45
Median*	\$40.00	\$50.00

\*Significant difference; Wilcoxon-Mann-Whitney;  $Z=2.56$ ,  $Pr>Z = 0.011$ )

# Findings: Large Change in Amounts for 2+ HHs

## Multi-member HHs (N=591)



➤ Increase in median amounts from \$50 to \$80



# Findings: Large Change in Amounts for 2+ HHs

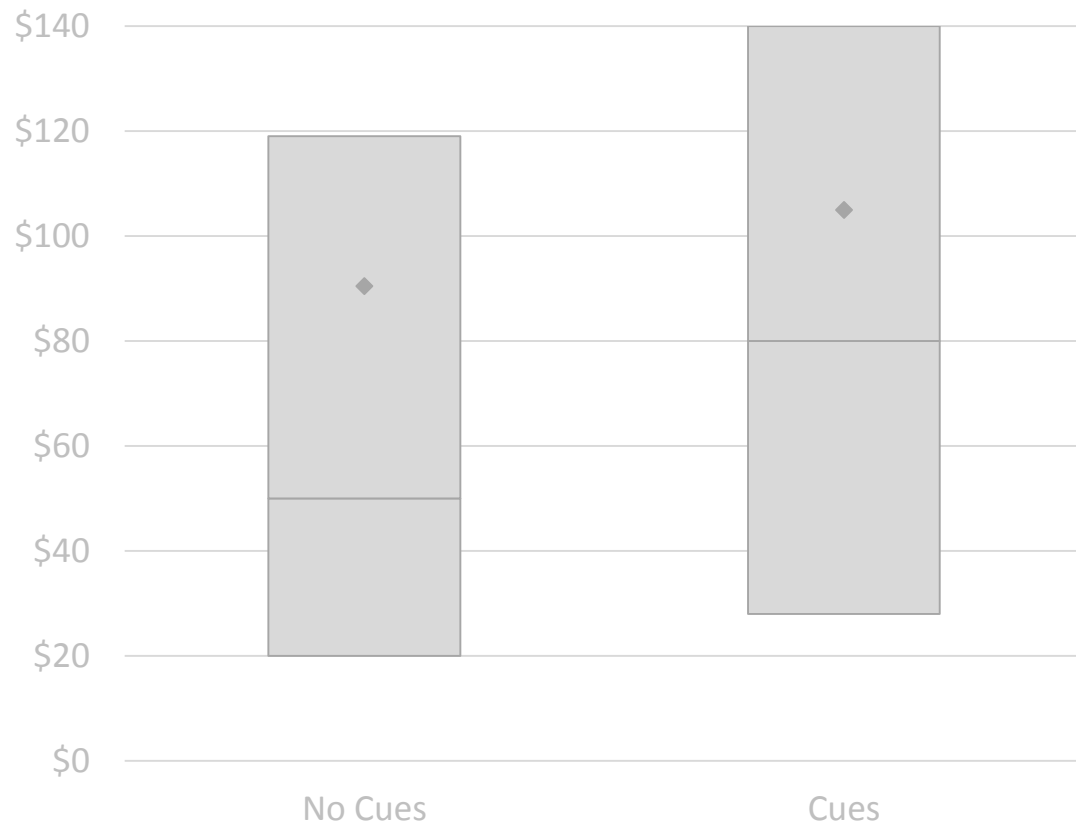
## Multi-member HHs (N=591)



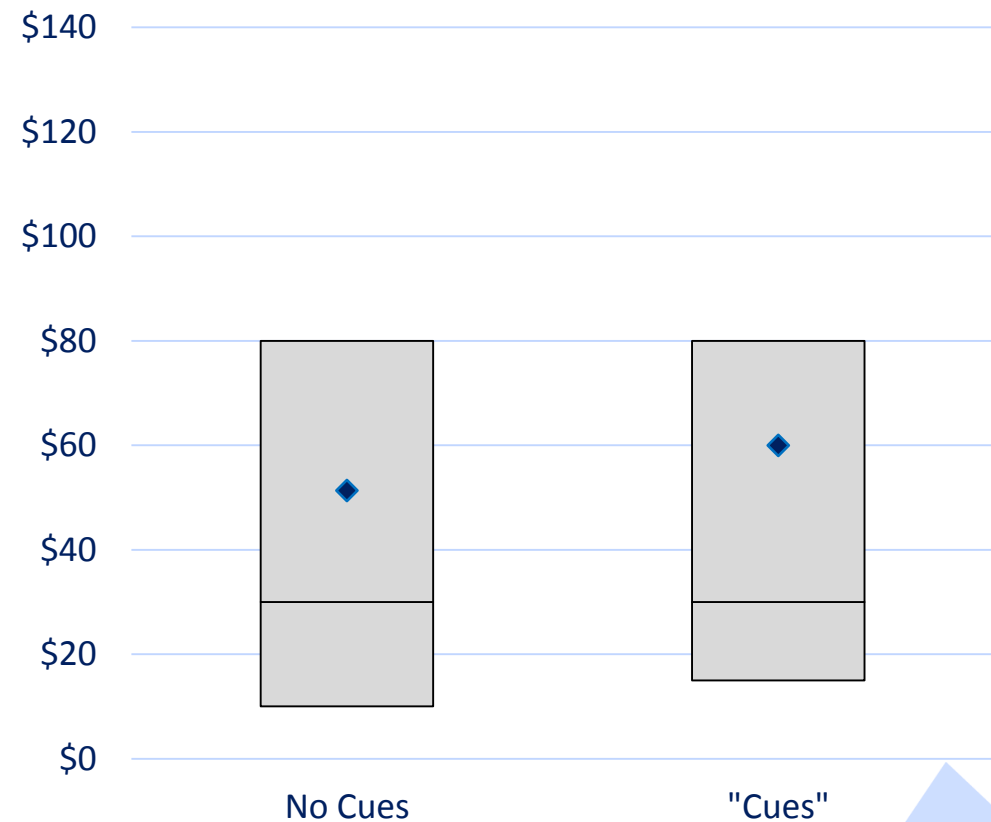
- Increase in median amounts from \$50 to \$80
- Within multi-member HHs getting cues (for HHs reporting amount), 36% proxy reported an amount

# Findings: Limited Change in Amounts for Single HHs

## Multi-member HHs (N=591)



## Single-member HHs (N=347)



# Summary

- Proportion of HHs reporting any public transportation expense did not change after person cues added to question
- Amounts reported by HHs with expenses significantly higher after person cues added
- Examining change in amounts by HH size, increase attributable to higher amounts in HHs with multiple members

# Conclusion

## Caveats

- Analysis did not control for other factors
- Unclear if increase in amounts reported for others (2+ HHs) led to the overall increase in amounts reported
  - Proxy reporting was occurring in multi-member HHs

## Take Away

- Person cues a potential tool to improve accuracy of proxy reporting

# Contact Information

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