METHODS FOR FORECASTING FROM INTENTIONS DATA

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ABSTRACT

Intentions are measures of individuals’ plans, goals, or expectations about what they will do in the future and are often used to forecast what people will do in the future. I develop nine principles from past studies of the predictive accuracy of intentions data that concern how to measure intentions, how to best use intentions to forecast, and reasons why forecasters should be cautious when using intentions. The principles relating to intentions measurement state that intentions should be measured using probability scales and that respondents should be instructed to focus on their own individual characteristics when responding to intentions questions. The principles relating to using intentions to forecast behavior state that intentions need to be adjusted to remove biases, that respondents should be segmented prior to adjusting intentions, and that intentions can be used to develop best- and worst-case forecasts. Further, one principle states that more reliance should be placed on predictions from intentions for behaviors in which respondents have previously participated. Finally, the principles relating to why researchers should be cautious when using intentions data state that researchers should be aware that measuring intentions can change behavior and that respondents who recall the time of their last purchase inaccurately may make biased predictions of their future purchases.

Keywords: Adjustments, biases, bounds, forecasting, intentions, purchase intentions, purchase probabilities, segmentation.

Organizations routinely measure individuals’ intentions (i.e., their predictions of what they will do in the future) to forecast their actual behavior. For example, marketers commonly measure consumers’ purchase intentions to forecast product sales. Jamieson and Bass (1989) report that between 70 and 90 percent of clients of market research suppliers regularly use purchase-intentions data. It seems logical that purchase-intention measures should
be good predictors of behavior because they allow each individual to incorporate whatever factors are relevant in predicting his or her actual behavior and to allow for changes in these factors over time. However empirical evidence shows that intentions are biased measures of behavior, sometimes overstating and other times understating actual behavior rates. Although forecasters have been studying the forecasting accuracy of intention measures since the 1950s (Klein and Lansing 1955; Tobin 1959), there is still a great deal of uncertainty concerning their forecasting accuracy, factors affecting their accuracy, and how to best use these measures to forecast behavior. My purpose in this chapter is to summarize current knowledge about using intention data to forecast behavior and to present a set of nine principles and supporting evidence for how and when to forecast using these data.

NINE PRINCIPLES

Below I list nine principles concerning how to measure intentions, when to use intentions to forecasts how to develop point estimates and forecast bounds using intentions data, and why forecasters should be cautious when using intentions. I define principles as guidelines or prescriptions for how to use intentions to help to make more accurate forecasts and advice concerning situations where forecasters should be cautious about relying on intentions. In the sections that follow I provide support for each of these principles.

How Should Intentions Be Measured?

- Use probability scales, instead of other types of intentions scales, to measure individuals’ predictions of what they will do in the future.
- Instruct respondents to focus on their own individual characteristics when responding to intentions questions.

How Should Intentions Be Used To Forecast Behavior?

- Do not accept intentions data at face value; rather, adjust intentions to remove biases.

How Should Intentions Be Adjusted When Using Data About Behavior

- Use data about past participation in a behavior to adjust intentions data.
- Segment respondents prior to adjusting intentions.
- For best- and worst-case situations, use intentions to determine the bounds of probability forecasts.

When Should Intentions Be Used To Predict Behavior?

- Place more reliance on predictions from intentions for behaviors in which respondents have previously participated.