SMALL STEPS TO ACCURACY: INCREMENTAL BELIEF UPDATERS ARE BETTER FORECASTERS

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Questions:
How do the best forecasters update their beliefs?

Methods & Data:
Good Judgment Project, 515 forecasters with 80k+ forecasts on 487 real-world geopolitical forecasts. Outcome: Brier score, cross-validated across questions
UPDATING AND ACCURACY MEASURES

Update Measures
Frequency: Number of new forecasts, denoted by red dots in example above (3)
Magnitude: Mean absolute update size, length of vertical lines (27%)

_Brier Score_ = \( \frac{1}{T} \sum_{t=1}^{T} 2(1 - f_t)^2 \)
MAGNITUDE & FREQUENCY PREDICT ACCURACY AT DIFFERENT TIMES

![Graph showing the relationship between standardized brier score and time within the question for different update patterns. The graph compares the performance of large, infrequent, large, frequent, small, infrequent, and small, frequent categories. The x-axis represents time within the question (Start, Middle, End), and the y-axis represents the standardized brier score. The graph illustrates how the accuracy of predictions changes over time for different update patterns.]