

Panel B. Best-fitting  $(exp(-(-ln(p))^{\alpha}))^{\beta}$ 

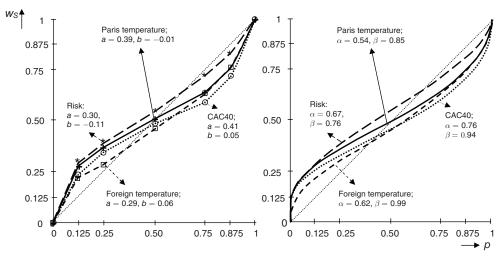


FIGURE 9. AVERAGE SOURCE FUNCTIONS FOR REAL PAYMENT

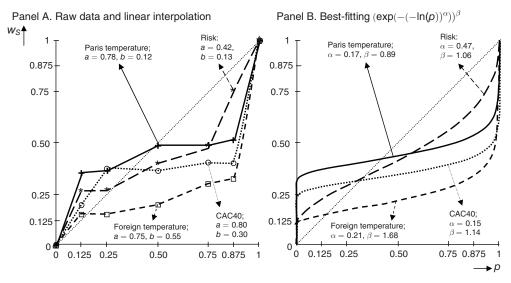


FIGURE 10. SOURCE FUNCTIONS FOR SUBJECT 2 FOR REAL PAYMENT

We next consider tests of pessimism and likelihood insensitivity based on the global parameters a and b. A repeated-measures ANOVA (corrected by the Huynh-Feldt  $\varepsilon$ ) reveals a clear source dependence of the pessimism index b. The insensitivity parameter is not significantly different across sources at 5 percent once the Huynh-Feldt correction is applied.

## D. Results at the Individual Level for Source Functions

To illustrate that the source method can be used at the individual level, Figure 10 displays the curves for the four sources of one subject, subject 2 from the

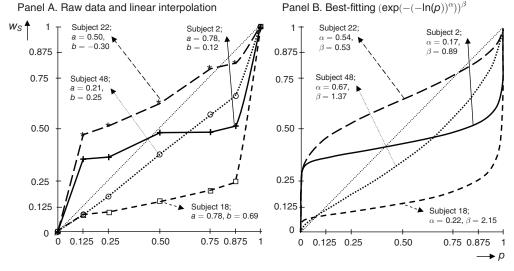


FIGURE 11. SOURCE FUNCTIONS FOR PARIS TEMPERATURE AND 4 SUBJECTS FOR REAL PAYMENT

real-payment treatment. This subject thought long and seriously about each question, and the interview took almost two hours. He exhibits source preference for all sources over foreign temperature. Further, risk is less likelihood insensitive than CAC40 and Paris temperature. In the raw data, the subject slightly violates monotonicity for CAC40, showing that there is noise in the data.

Behavioral implications are that the subject will be more prudent, invest less, and take out more insurance for foreign temperature events than for the other events. The subject will be more open to long shots for Paris temperature and CAC40 than for risk but, on the other hand, will also rather insure for Paris temperature and CAC40 than for risk. An updating of (subjective) probabilities after receipt of new information will affect the subject less for Paris temperature and CAC40 than for risk.

Figures 9 (for a representative agent) and 10 (for subject 2) concerned a withinperson comparison of different attitudes towards uncertainty for different sources, which we take as the main novelty initiated by the Ellsberg paradoxes. We can also use source functions and the above indexes of pessimism and likelihood insensitivity for the—more traditional—between-person comparisons of uncertainty attitudes. Figure 11 displays some comparisons. We selected four subjects with clearly distinct curves for the purpose of illustration. All curves concern the same source, namely Paris temperature. The lowest curve (subject 18) is more pessimistic than all other subjects. This subject will buy more insurance, for instance. The dark middle curve (subject 2) clearly displays more pronounced likelihood insensitivity than the dashed curve that is close to linear (subject 48). Hence, simultaneous gambling and insurance is more likely to be found for subject 2 than for subject 48, and subject 2's decisions will be influenced less by new information (updating probabilities) than those of subject 48 (cf. Larry G. Epstein 2008).

In general, there was more variation in the individual parameter estimates for the ambiguous sources than for risk. It is not surprising, indeed, that risk is perceived more homogeneously across individuals than ambiguity.