ABSTRACT:

A substantial body of research demonstrates that people are often overconfident in their judgment. Although researchers have identified some of the sources of overconfidence, the full picture as to why people are overconfident remains incomplete. In this talk, I will discuss how overconfidence can arise in situations imbued with two types of uncertainty. Psychologically, people tend to represent uncertainty as either aleatory (a draw from a distribution) or as epistemic (a lack of knowledge). Sometimes, both types of uncertainty are present simultaneously. For example, a traveler planning a trip might have a sense of the distribution of possible temperatures at their destination. The epistemic component arises because the traveler might not know the distribution for sure, but rather have an imperfect impression of it. I will discuss experiments showing that people incorrectly account for epistemic uncertainty when combining the two types, leading to overconfidence. In some cases people appear to neglect or insufficiently account for epistemic uncertainty, whereas other evidence points toward people confounding their epistemic certainty about the location of a distribution (e.g., being sure about the average temperature in a given city) with the aleatory uncertainty within that distribution (e.g., variability around the mean temperature).