UC SANTA BARBARA



September 3, 2015 Sonia Fernandez

Unraveling the Web

We call them "hunches," "snap judgments" and "gut feelings," these notions we're barely conscious of that can nevertheless inform countless decisions we make each day. But what we call our solid intuitions are often the results of error-prone cognitive biases that we don't even know we have.

For many of us, these mistakes don't affect much, but for people who have jobs that require them to detect deception, this blind spot in judgment becomes a crucial factor in their decisions.

"A lot of times we use quick judgments called heuristics and they're really useful in a lot of circumstances, but they can also lead you down the wrong path," said <u>Norah</u> <u>Dunbar</u>, a professor in the <u>Department of Communication</u> at UC Santa Barbara; Dunbar is head of a project that recently received \$549,061 from the National Science Foundation to develop a video game that can help players tell when they are being deceived.

"I wanted to build a game that would be a good training tool for people in law enforcement, people in the intelligence community," said Dunbar. Often, people who have received intensive training in how to "read" others perform no better than those who have not been trained, she said. While the use of heuristics allows people to make quick decisions with minimal effort, these same cognitive shortcuts can be a challenge to overcome because they are automatic and can be difficult to identify as they are being utilized. Added to that is a very human overconfidence in our own perceptions, which makes it hard to question what we perceive. Called VERITAS (Veracity Education and Reactance Instruction through Technology and Applied Skills), the game would train players to identify the heuristics used in credibility assessments and detect deception using more than just visual cues.

"A lot of deception detection is in learning how to ask the right questions," Dunbar said. Contrary to popular assumptions about how to identify liars through nonverbal cues — they supposedly fidget, look away or exhibit some similar behavior seasoned deceivers tend to actually do the opposite and build a rapport with the person they are trying to deceive, she explained, a tactic that makes it even more difficult to identify the liars.

A simulated interactive interview teaches players to follow a line of questioning that would yield verbal cues that could signal whether the subject was being honest or deceptive. By putting it in game format, the training module could be more palatable to its audience than traditional training, said Dunbar.

"If you do it in a game, it also allows them to make mistakes without real-world consequences," she added. Additionally, the immediate feedback could facilitate the kind of self-evaluation necessary to shift away from erroneous assumptions that need improvement.

Still in its initial stages, this two-year project will also include input from real-life law enforcement. The UCSB Police Department will provide footage of actual interviews that would provide insight into the dynamics of the game.

"The objectives are twofold," said UCSB Police Chief Dustin Olson, "first, to become more aware of cognitive biases that may exist and then identify ways to mitigate these; second, to become more astute in identifying deception." The training game could potentially enable investigators to be more skillful in structuring and evaluating interviews when conducting criminal investigations, he said.

VERITAS is the second educational game to be created by Dunbar. Partnering with the K20 Center during her time at the University of Oklahoma, she recently completed another cognitive bias and deception detection game formulated specifically for the intelligence community. The VERITAS video game, said Dunbar, is intended to be an addition to pre-existing training modules as opposed to a standalone course. Ultimately, she said, the game will be made to be playable by a broader audience that might be interested in deception detection.

About UC Santa Barbara

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