Chimpanzees, fruit bats and other animals can transmit Ebola to humans in West Africa. COURTESY YERKES NATIONAL PRIMATE RESEARCH CENTER, EMORY UNIVERSITY

Open wide.

So-called “contagious yawning” among chimpanzees could offer insight into empathy among humans and other animals, a new study says.

Researchers at the Yerkes National Primate Research Center at Emory University studied when chimpanzees yawn by showing them videos of other chimps yawning.

"Yawning is a sort of proxy for empathy," explains researcher Frans de Waal. "It relates to bodily connections between individuals. If you cry, I may cry. If you laugh, I may laugh. Yawn contagion is related to that. And we know that people who are high on empathy also have a lot of yawn contagion, and that is why we selected the behavior."

De Waal and fellow researcher Matthew Campbell discovered that their chimpanzee subjects would yawn anytime they saw a familiar chimp, familiar human or unfamiliar human also yawning. But the chimps would not show such contagious yawning when they saw an unfamiliar chimp or other nonhuman species.
"The interesting part of this study is that they actually identify more easily with members of our species, even members that they don’t know, than with strangers of their own species," de Waal says.

The findings suggest that empathy, while involuntary, is flexible. A chimp may not copy the facial expressions of another chimp it first meets, but it might later on as the two get to know each other.

“That humans known and unknown elicited empathy similarly to group members, and more than unknown chimpanzees, shows flexibility in engagement," Campbell said in a statement. "We can use this information to try to influence this flexible response in order to increase empathy toward unfamiliar chimpanzees, and we hope we will be able to apply such knowledge to humans as well.”