CORONAVIRUS

Social distancing may be messing with our ‘love hormones.’ Here’s why

BY KATIE CAMERO

Long before civilization, early humans hunted in the great outdoors in small groups to survive, understanding that social cohesion could better protect them from predators that lurked in the wild.

Today, humans still rely on social interaction but more so to feel that warm feeling when giving someone a hug or meeting up with an old friend. These actions release hormones called oxytocin, or “love hormones,” that give people a sense of happiness, security and trust, scientists say, according to Psychology Today.

But the new coronavirus is changing how people interact with one another, bringing about feelings of anxiety, fear and loneliness, experts say, as levels of oxytocin decrease in your body.

Oxytocin is two-faced, however, according to several studies. The hormone has also been shown to be elevated during times of stress and social isolation, research on both animals and humans have revealed.

“If hormones could win popularity contests, oxytocin might well be queen of the day,” the American Psychological Association (APA) reported in 2008. “But more recent research has shown other roles for the hormone, too; Oxytocin levels are high under stressful conditions, such as social isolation and unhappy relationships.”

Oxytocin gained attention in the 1990s when researchers discovered that breastfeeding women were calmer when faced with “psychosocial stress than bottle-feeding mothers,” the outlet reported. Mothers release the hormone in their bodies when their babies suck for milk, which in turn releases milk for the baby.

Oxytocin is also associated with reductions in blood pressure and heart rate, and its release decreases activity in the amygdala, a part of the brain that activates whenever there's a perceived threat, a 2015 study in the journal Behavioral Neuroscience said.

It's produced in a part of your brain called the hypothalamus, where it's then released into the blood or to other parts of your brain and spinal cord where it binds to oxytocin receptors, influencing behavior and physiology as a result, scientists say.

Research on oxytocin levels before and after people used social media showed that in-person interactions increased concentrations of the hormone the most, as opposed to audio or text interaction, according to Paul Zak, a professor of economic sciences and psychology and management at Claremont Graduate University in California, KXAN reported.

And video conferencing is about 80% as effective in producing oxytocin, Dr. Zak told the outlet.

"Emotional connection can happen without physical contact," he said, because it's all about direct eye contact.

Yet, if a person is feeling lonely, they may also show elevated levels of oxytocin in their blood, social psychologist Shelley Taylor, a distinguished professor emeritus at UCLA, told the APA.

This stress-related increase in the hormone then produces physiological changes that "may lead people to seek out more and better social contact," Dr. Taylor said in the article.

She also suggests that anticipated social contact, like a planned FaceTime call, may result in bursts of the hormone.

In short, whether oxytocin makes you feel cuddly or stressed depends on your social situation.

"My view of what oxytocin is doing in the brain is making social information more salient," Larry Young, a behavioral neuroscientist at Emory University in Atlanta, Georgia, told LiveScience. "It connects brain areas involved in processing social

information —whether it's sights, faces, sounds or smells— and helps link those areas to the brain's reward system."

During times of social isolation, however, it's important to stay connected to those you love and care about, psychologist Erin Leyba wrote in an article in Psychology Today.

She suggests setting up FaceTime calls with family members, playing virtual games with kids and reading books out loud with others to secure oxytocin's positive influences during the pandemic.