

May 21, 2004 -- Giving a dog a good tummy rub may do more than just make Fido feel better. New research shows people may also reap the benefits of petting a pooch, and you don't even have to roll over.

Researchers found petting a dog prompted levels of the "feel good" hormone serotonin to rise in humans and may help fight depression.

"Our preliminary results indicate that levels of serotonin, a hormone in humans that helps fight depression, rise dramatically after interaction with live animals, specifically dogs," says researcher Rebecca Johnson, professor of nursing and veterinary medicine at the University of Missouri-Columbia, in a news release. "This hormone is critical in the psychological well-being of an individual. In addition, we have discovered that there is no substitute for the real thing."

The study also tested the effects of petting a robotic dog and showed interacting with an electronic dog actually caused serotonin levels to drop.

Researchers say the findings provide further evidence that having a dog as a pet can offer valuable social support and companionship.

Johnson presented the findings at the Companion Animals: Fountains of Health conference at Barcelona Autonomous University last month.

One More Reason Dogs Are Man's Best Friends

The study involved 50 dog owners and 50 non-dog owners. Each of the dog owners interacted with their own dog, an unfamiliar dog, and a robotic dog. The non-dog owners visited with an unfamiliar dog and a robotic dog.

After the interactions, both the canine and human participants had their blood and mood (or behavior in the case of the dogs) analyzed.

The study showed that serotonin levels in humans rose significantly after playtime with the live dog.

"In addition to serotonin, we also are seeing increases in the amounts of prolactin and oxytocin, more of those 'feel good' hormones," says Johnson.

"Our research also is trying to determine what types of people would best benefit from being with animals," says Johnson. "By showing this benefit, we can help pet-assisted therapy become a medically accepted intervention that might be prescribed to patients."

"We also need to study how the animals react to this attention," says Johnson. "It's important to know when we take dogs to nursing homes or hospitals for therapy if they are feeling any kind of stress. We need to find the right balance where both animals and humans can benefit from interacting with each other."

The study was funded by a grant from the Skeeter Foundation from Veterinary Pet Insurance.