

Kunskapskryssning 28–29 september 2023



Endast för eget bruk, får ej spridas

**Forskning
& Framsteg**

A person wearing a red beanie and a dark jacket is walking away from the camera through tall, dry grass. Two dogs are walking ahead of them. The scene is bathed in a warm, golden light, suggesting late afternoon or early morning.

Hunden och människan – *En relation som förändrat världen*

Per Jensen
Linköpings universitet

- Bobbie och familjen Brazier 1923



Domestication of Animals

A BRIEF TIMELINE



PETS



LIVESTOCK



WORK

Source: Science News, PNAS



20,000 BCE

DOG 13,000-34,000 BCE

15,000 BCE

10,000 BCE

5,000 BCE

SHEEP 9,000 BCE

GOAT 8,500 BCE

PIG 8,300 BCE

COW 8,300 BCE

CAT 7,500 BCE

ZEBU 6,000 BCE

LLAMA 4,000 BCE

HORSE 3,300 BCE

ALPACA 3,300 BCE

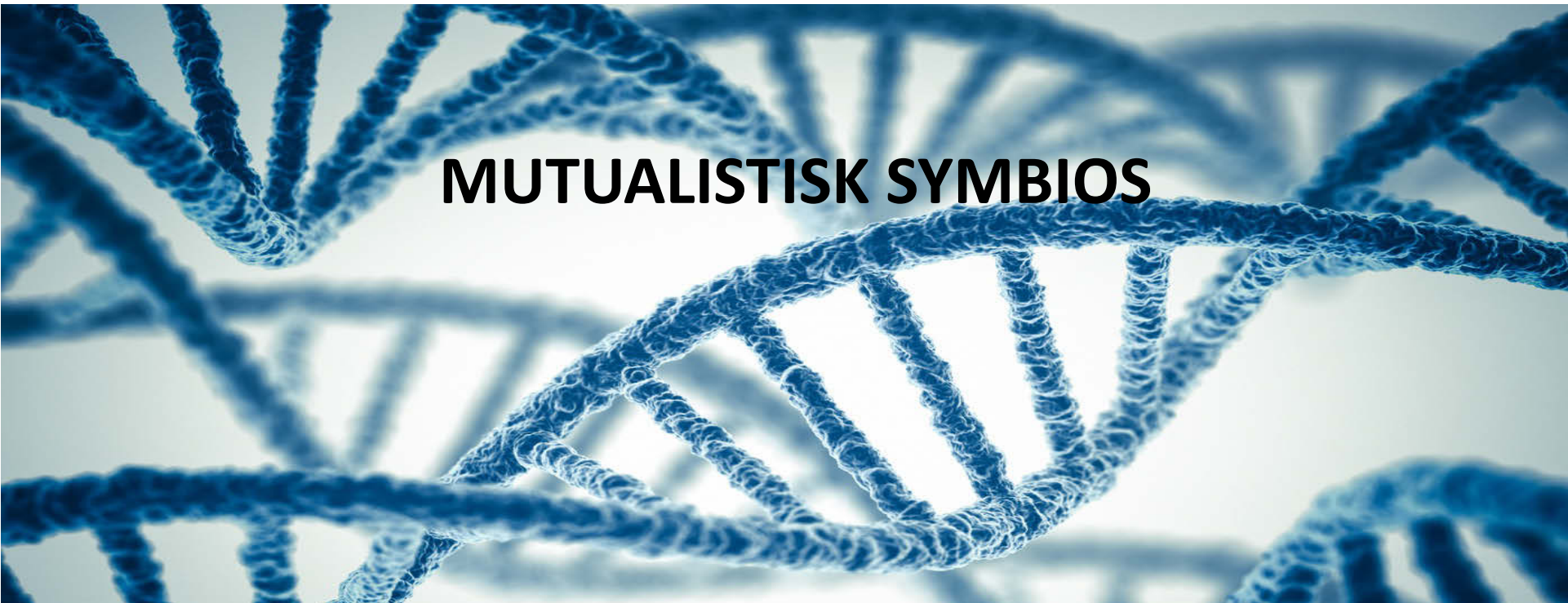
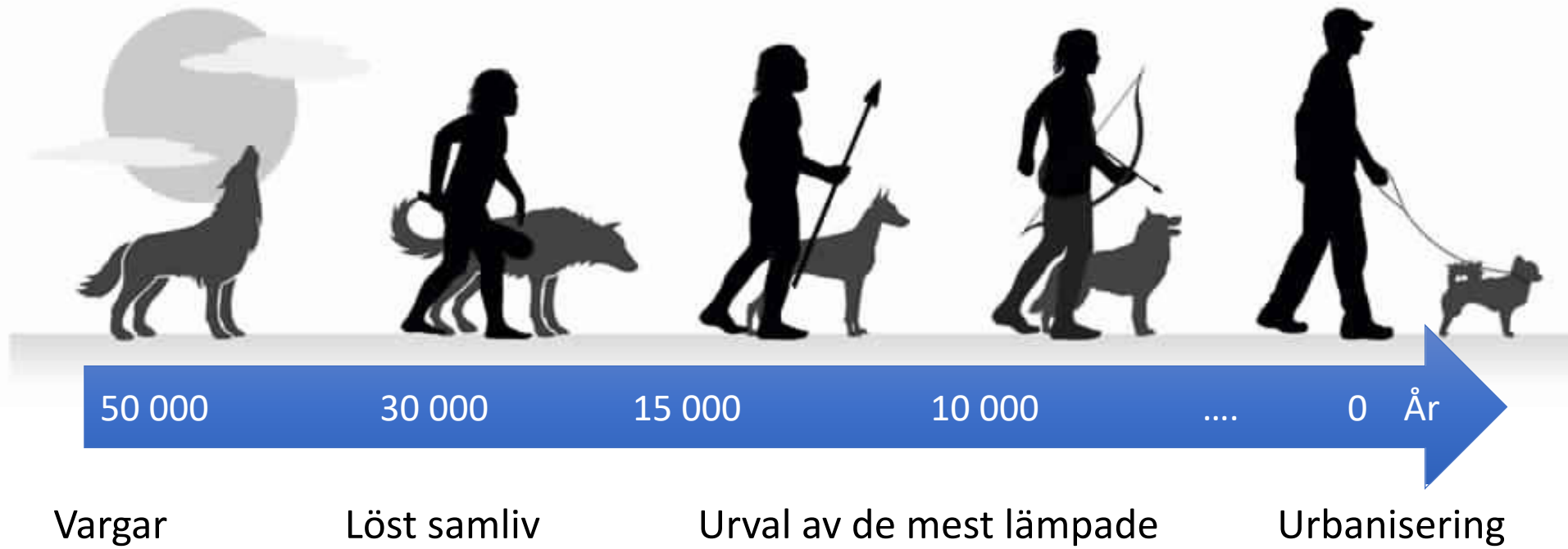








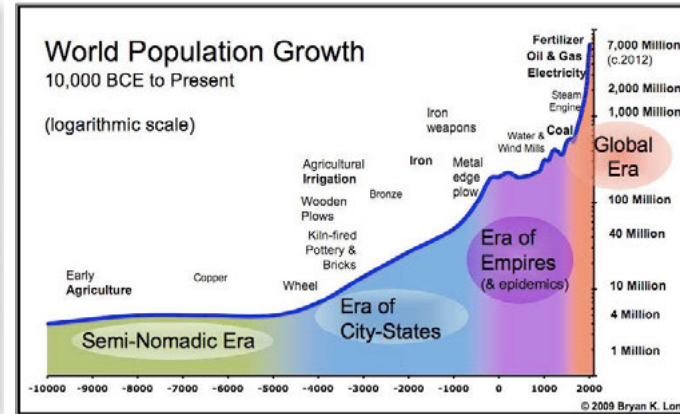
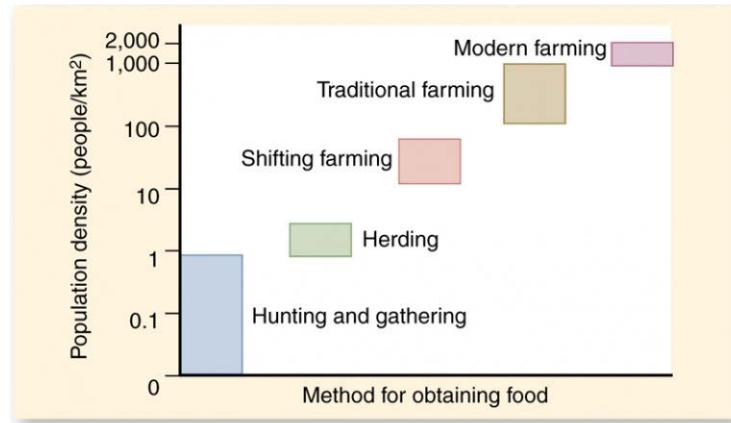
<https://commons.wikimedia.org/>



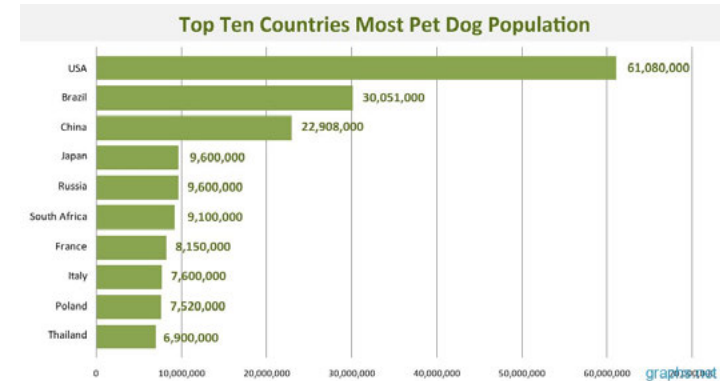
MUTUALISTISK SYMBIOS

Fitness-konsekvenser av hundens domesticering

Människan



>>200 millioner hunder

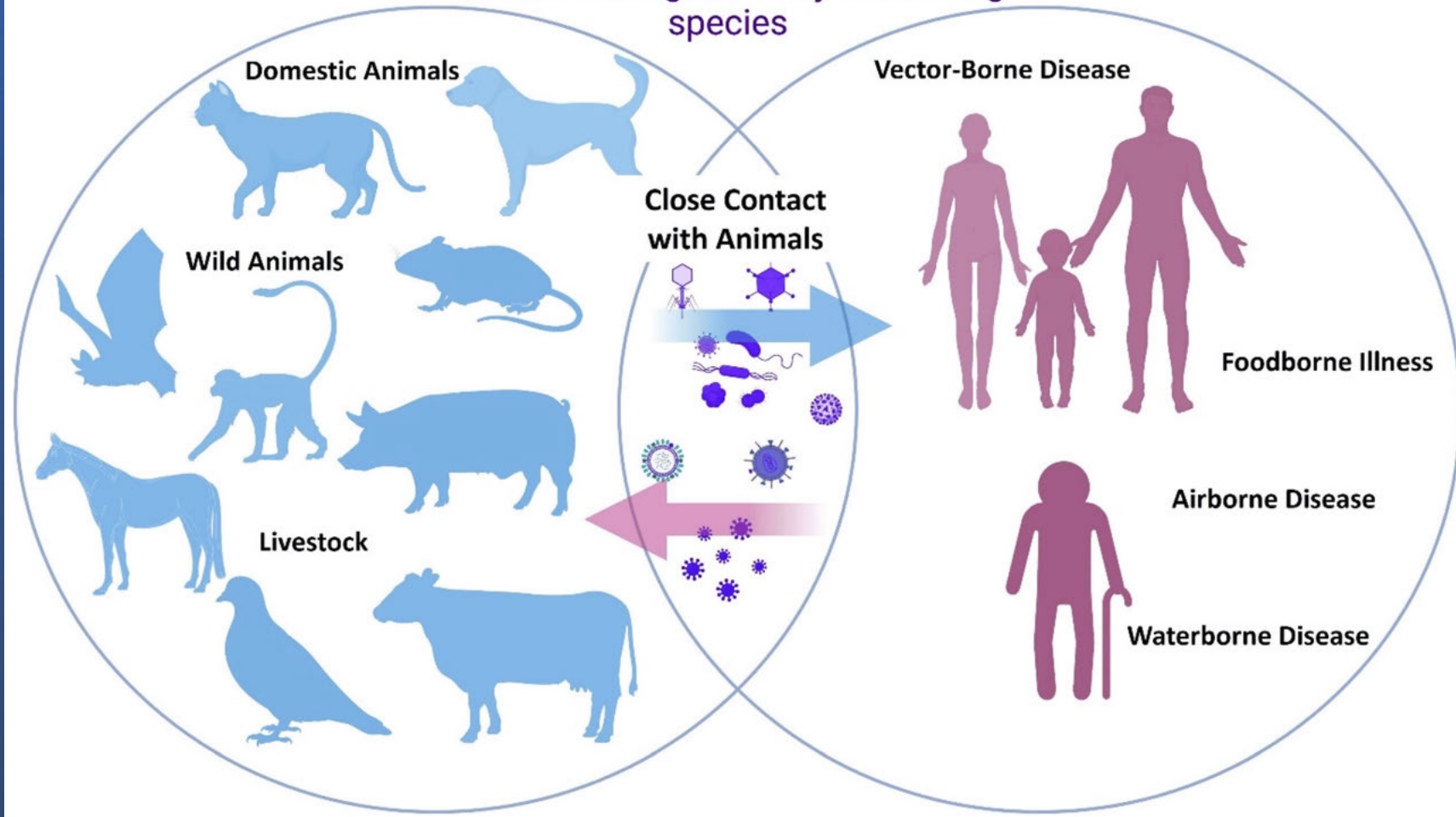


300 000 vargar



ZOONOTIC DISEASE

occurs amongst closely interacting species



- **Mutualistisk symbios:**

- Samevolution, där båda de inblandade arterna får fitness-fördelar av relationen
-



Oxhackare och impala



Clownfisk och havsanemon

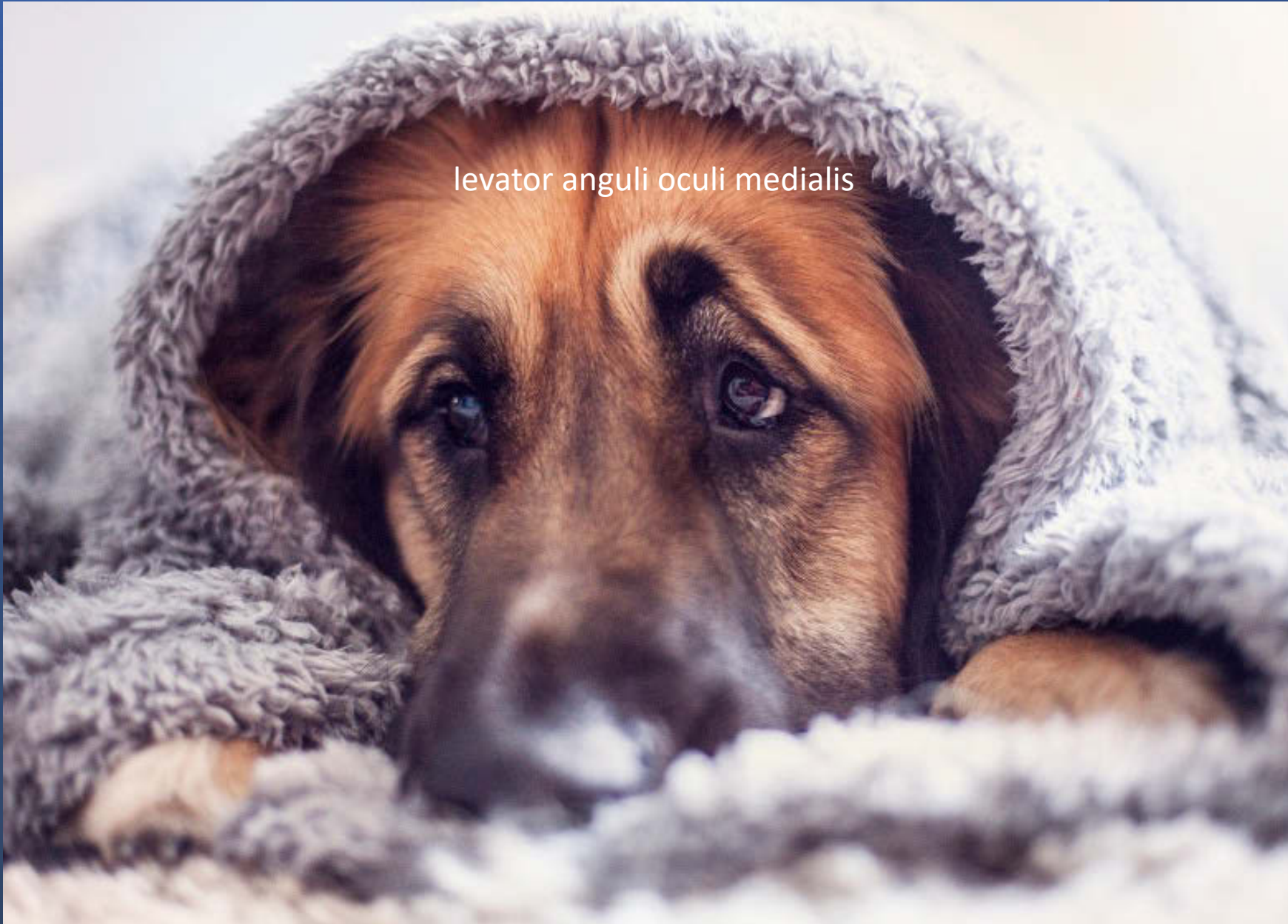


Hund och människa

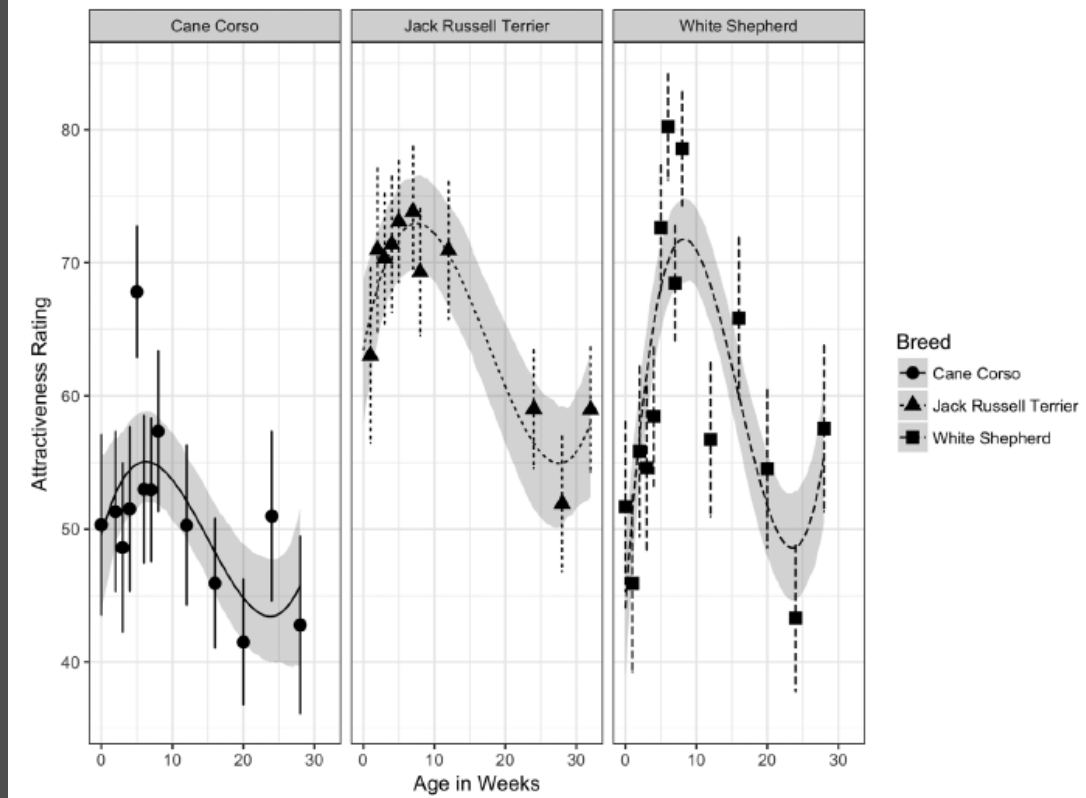
I CAN DIGEST
STARCHES!



levator anguli oculi medialis

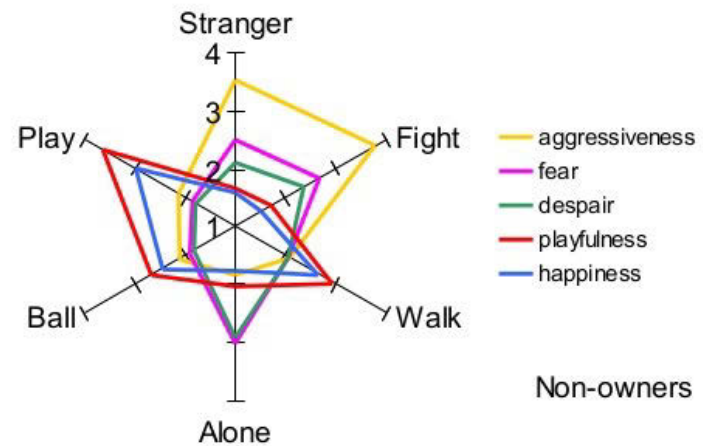






Samevolution hos människa?

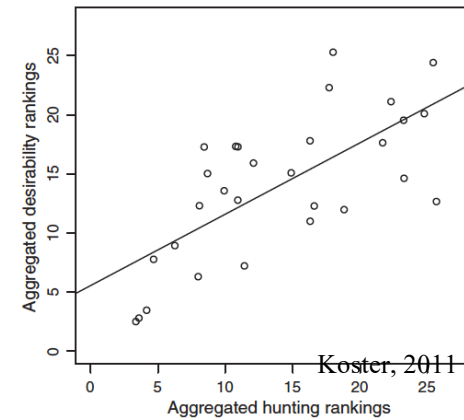
Människor förstår sammanhang och emotionellt innehåll i hundskall



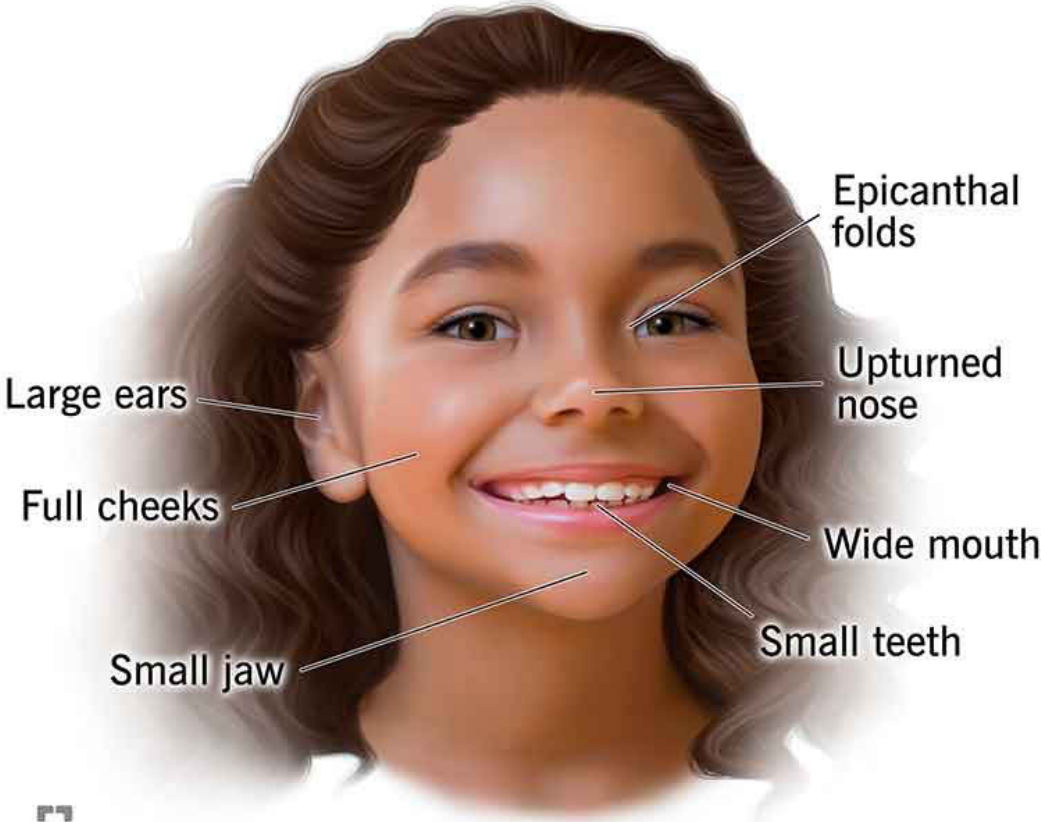
Non-owners

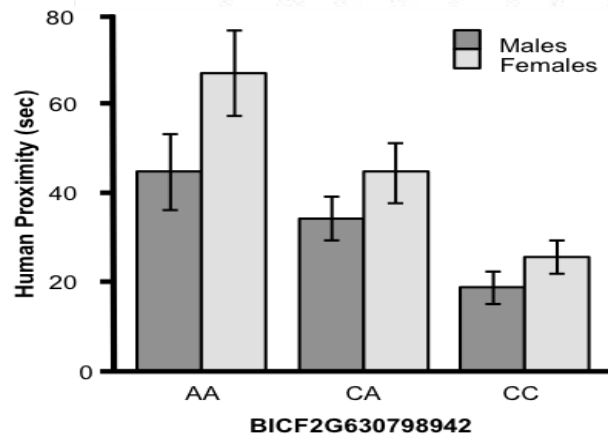
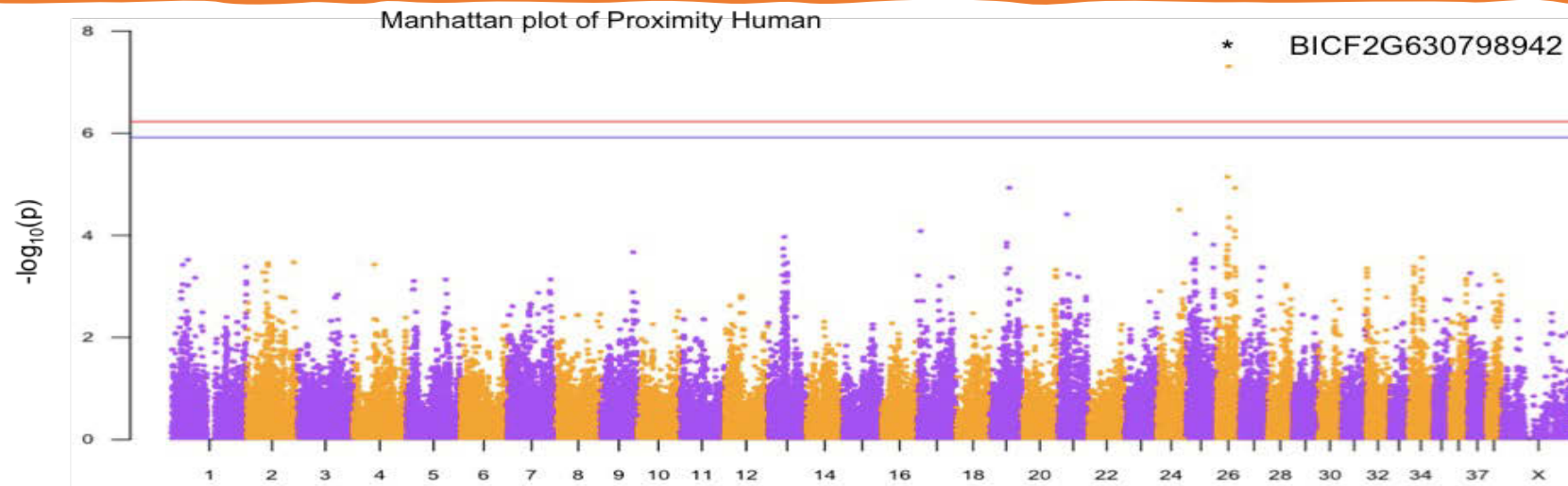
Pongrácz et al. 2005

Män som förstår sig på hundar är mer attraktiva



Williams syndrome





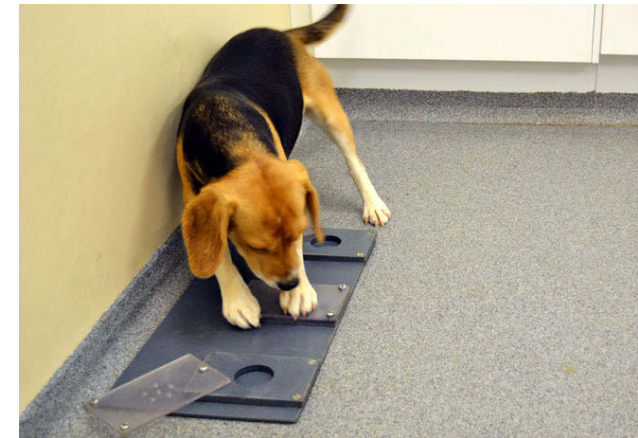
Genetisk koppling:

COMT

ARVCF

SEZ6L

Gener som är inblandade i bl a autism hos människor

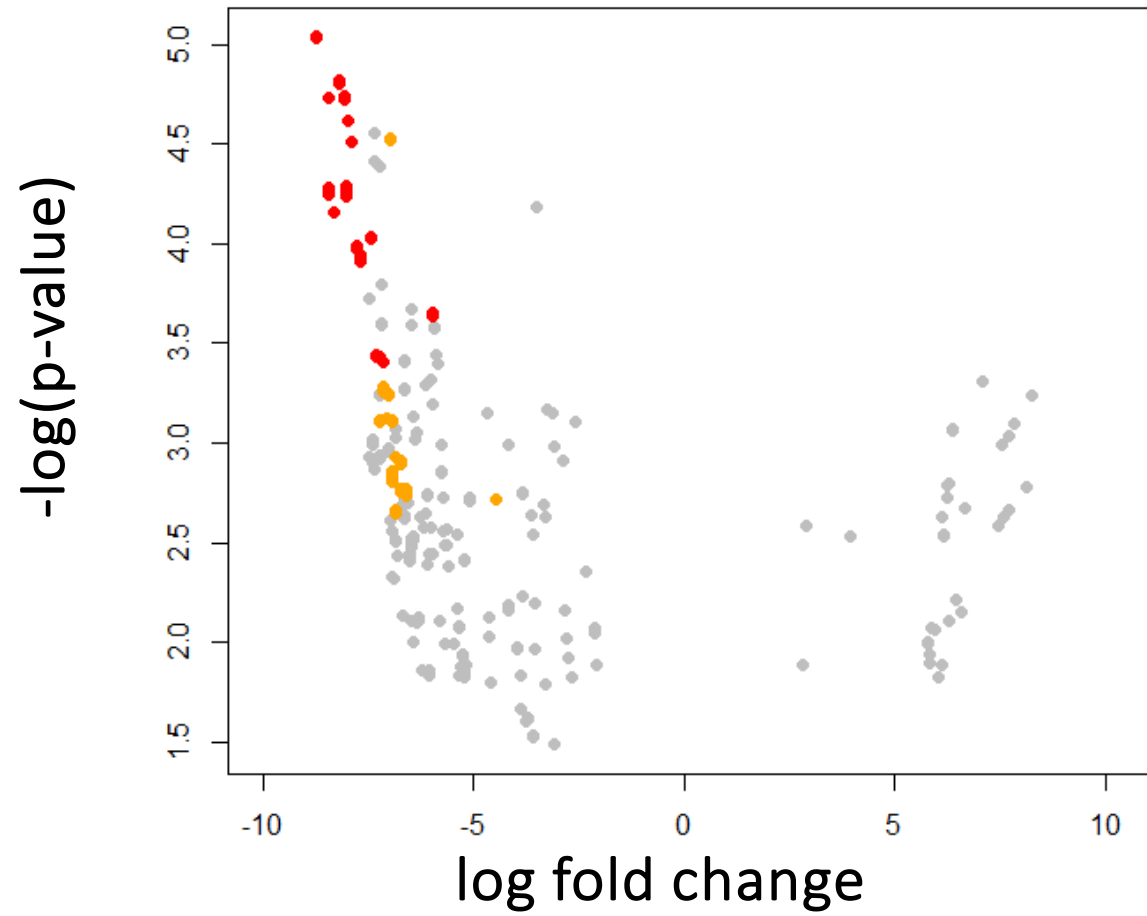


Persson et al, 2016 Sci Rep



Hundar vs. vargar:

● $P < 0.05$ ● Adj.P < 0.1 ● Adj.P < 0.05

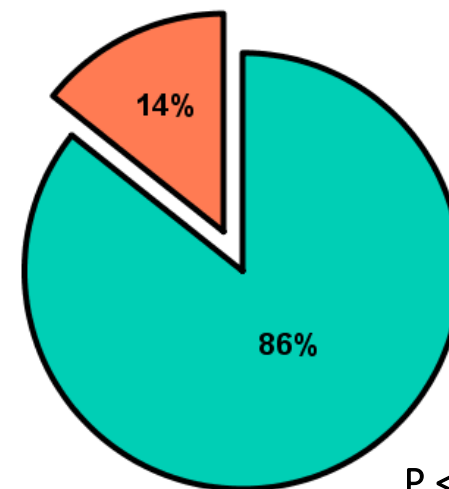
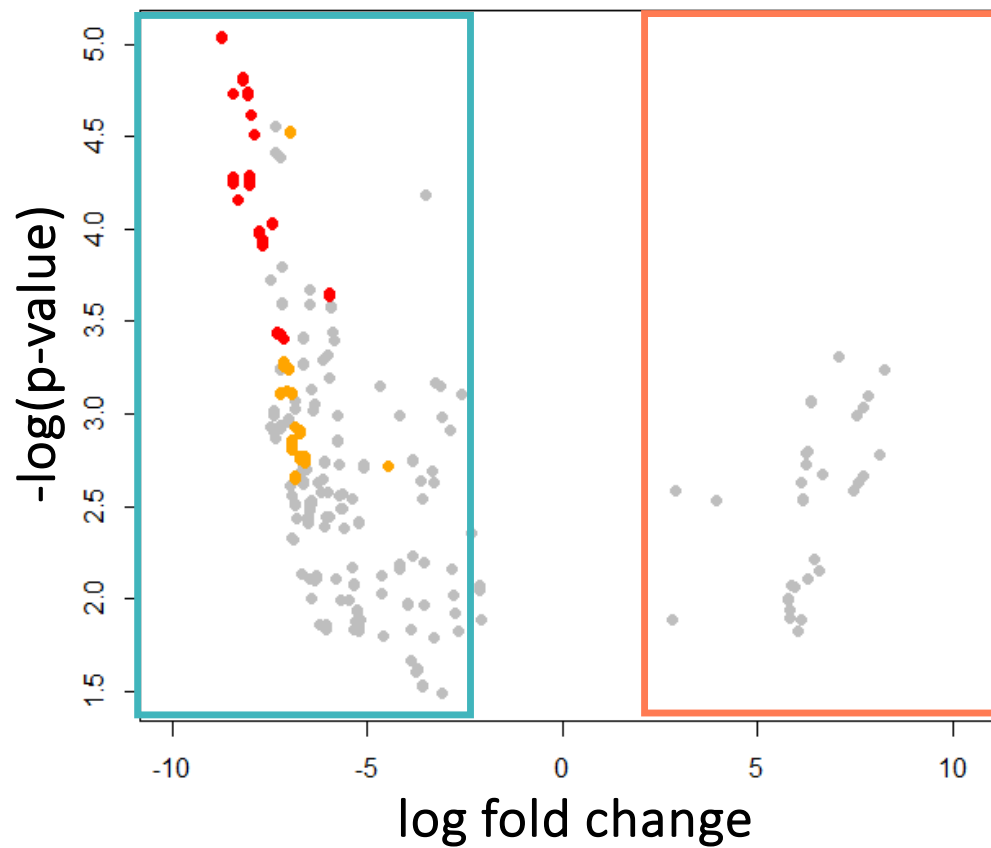




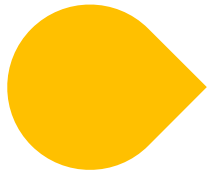
Hundar vs. vargar:

Hypermetylering

Hypometylering

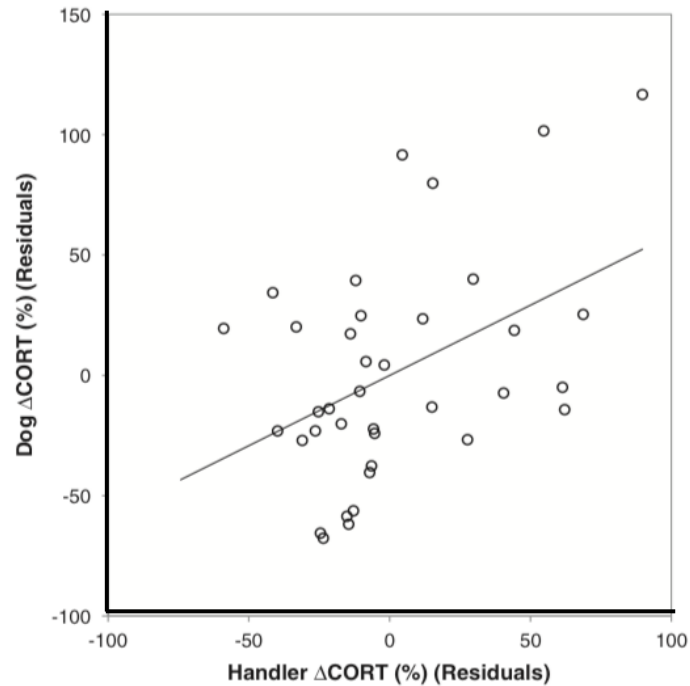


$P < 0.05$



Påverkas vi av varandra?

Kortisolförändring
vid agilitytävling

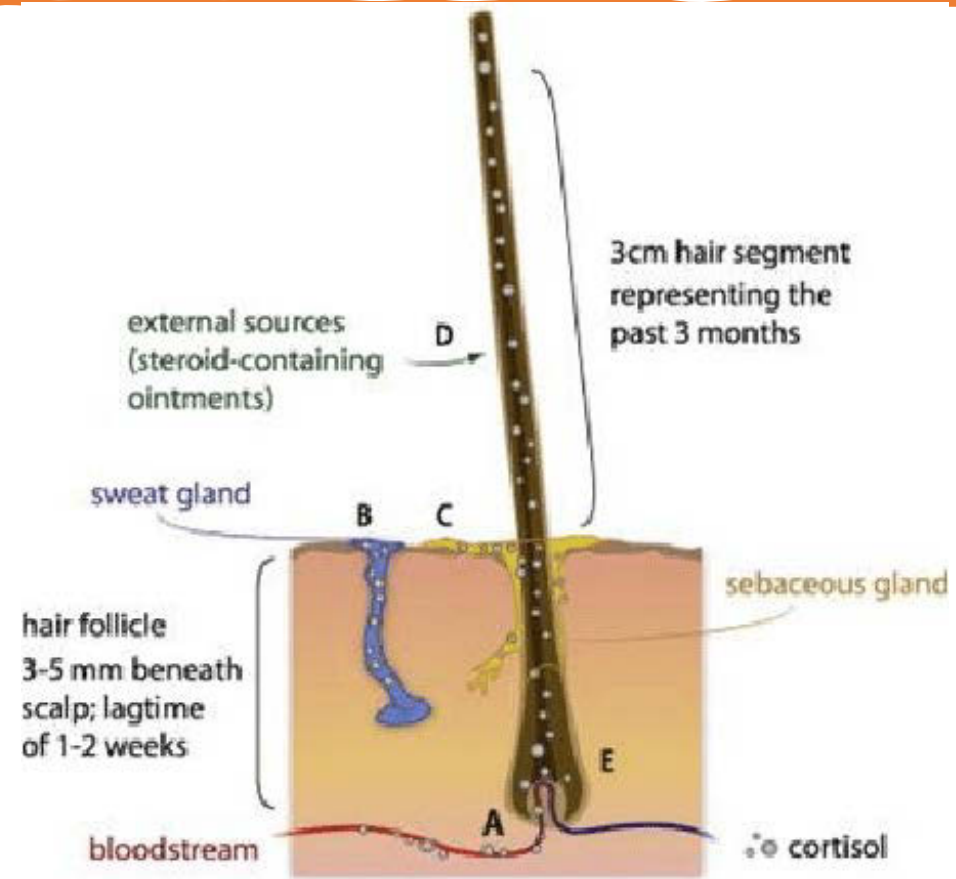


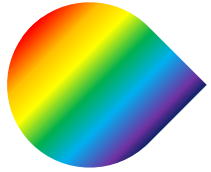
(Buttner et al. 2015)

Beteendesynkronisering

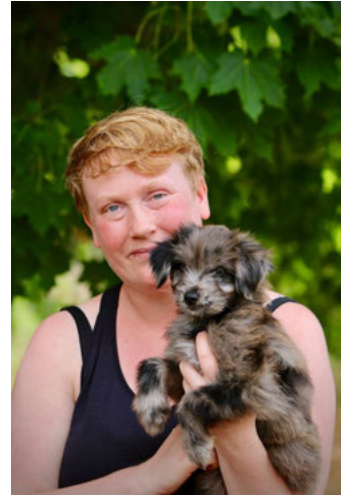
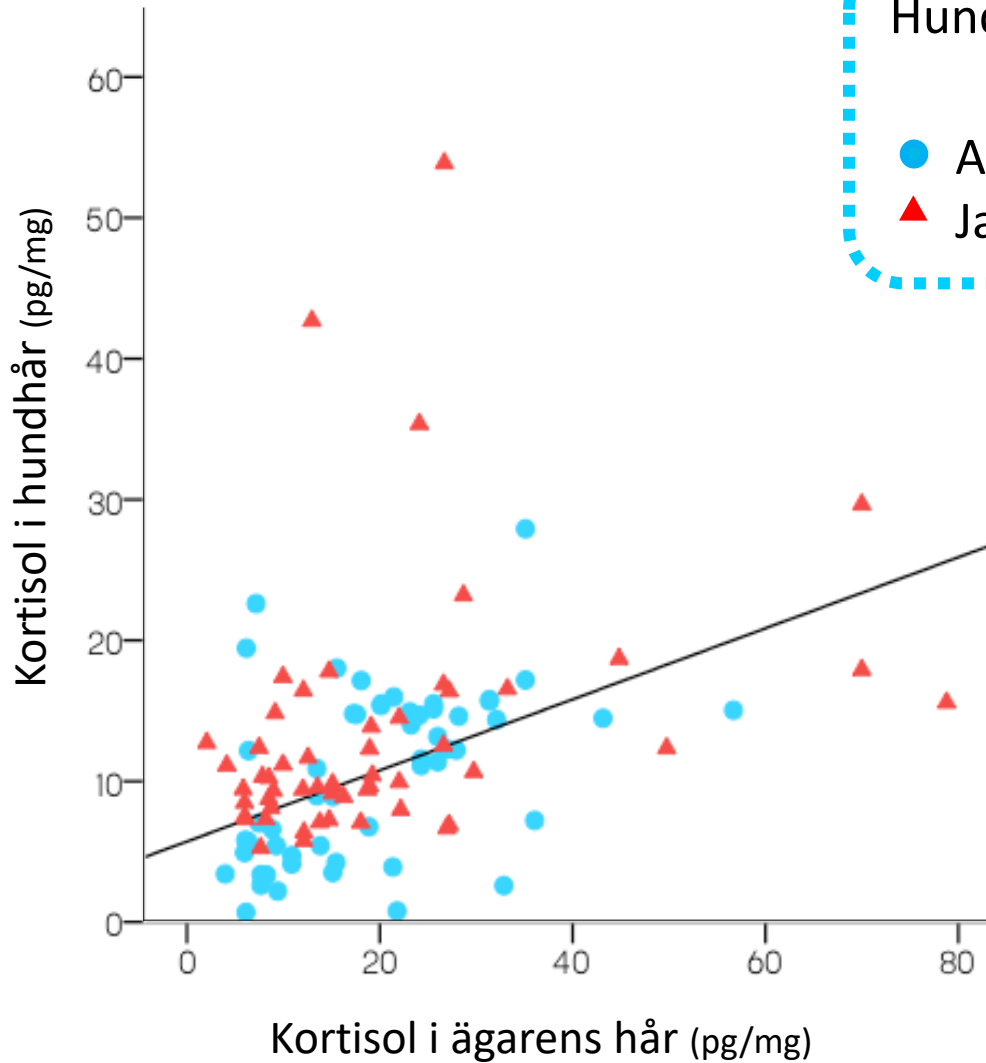


(Duranton et al. 2017)

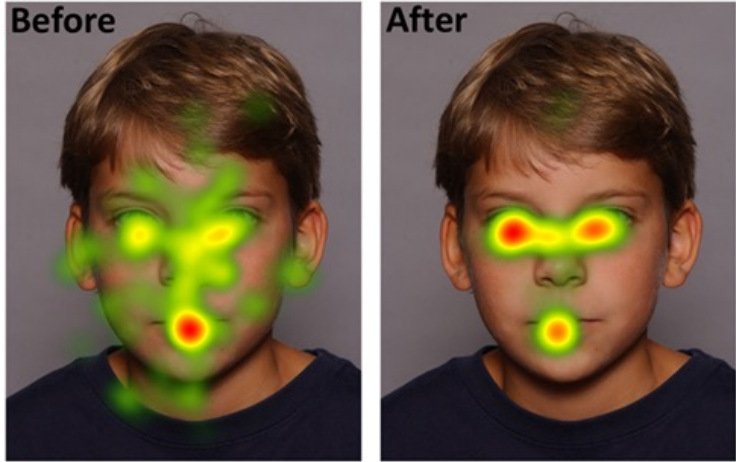




Sådan matte sådan hund!



Inga positiva korrelationer med fysisk aktivitet!



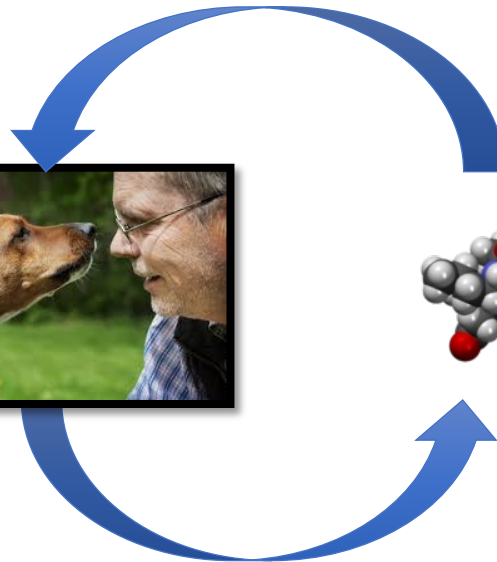
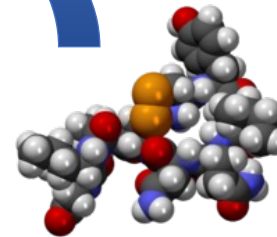
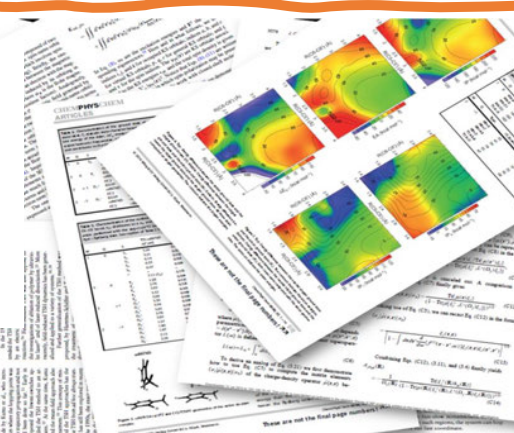
Guastella et al 2008. Biol.Psychiatry

SOCIAL EVOLUTION

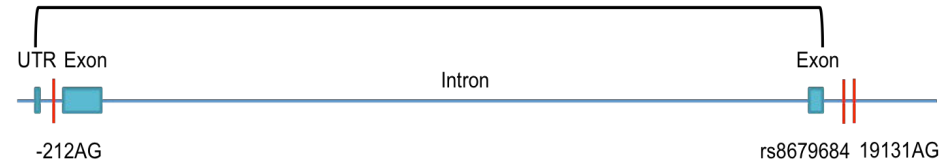
Oxytocin-gaze positive loop and the coevolution of human-dog bonds

Miho Nagasawa,^{1,2} Shouhei Mitsui,¹ Shiori En,¹ Nobuyo Ohtani,¹ Mitsuaki Ohta,¹
Yasuo Sakuma,³ Tatsushi Onaka,² Kazutaka Mogi,¹ Takefumi Kikusui^{1*}

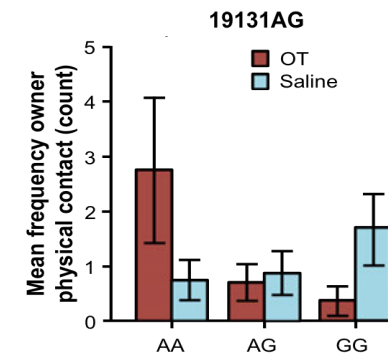
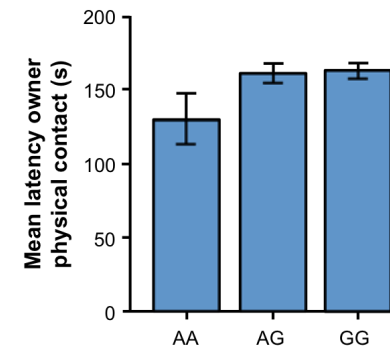
SCIENCE sciencemag 17 APRIL 2015 • VOL 348 ISSUE 6232



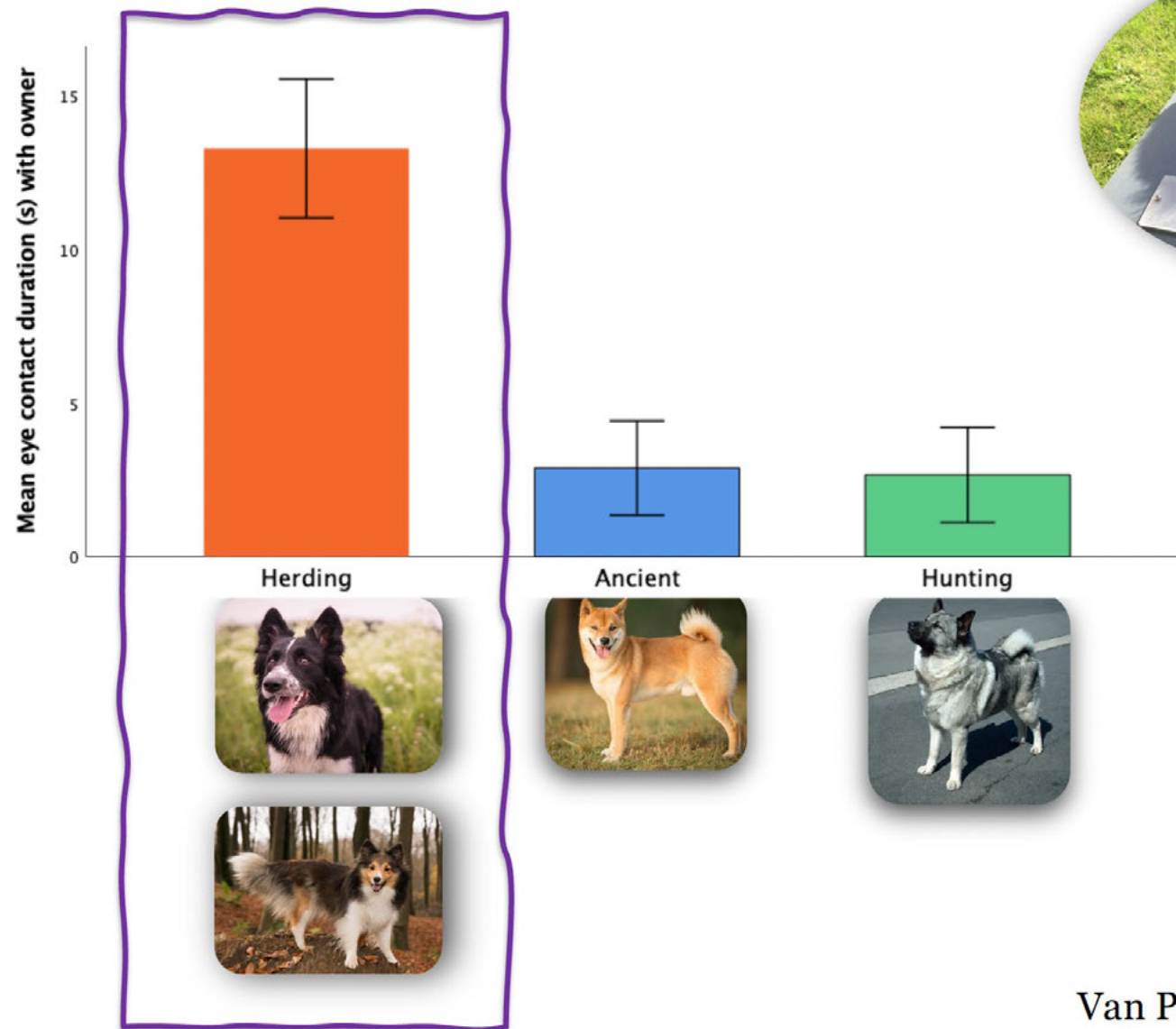
OXTR



Genotype effects on owner physical contact





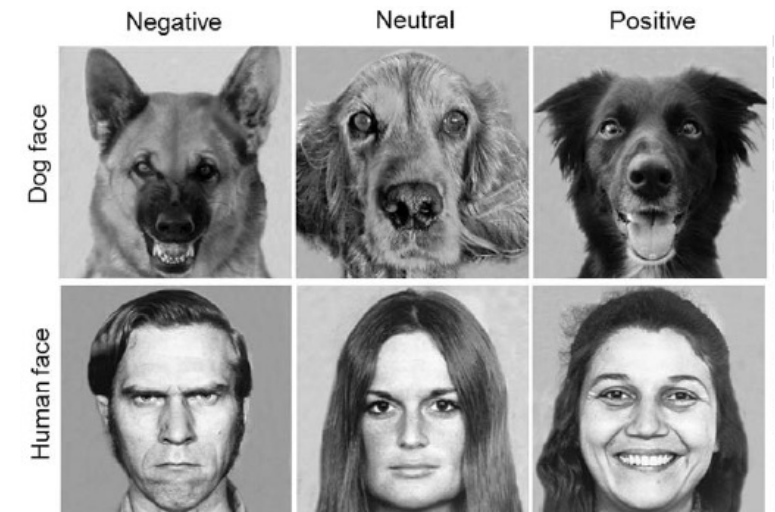


Van Poucke, et al. 2021

- Hundar har selekterats för att förstå och kommunicera med människor



Fig. 1 The emotional expressions shown by the experimenter: a "Happy" when finding a piece of sausage inside the box; b "Disgusted" when finding garlic inside the box; and c "Neutral" when finding bedding material inside the box. All expressions are pictured as seen by the subjects





Contents lists available at ScienceDirect

Behavioural Processes

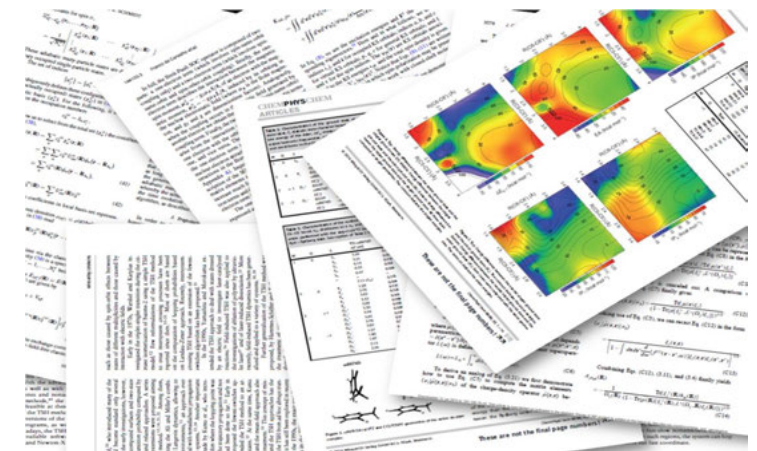
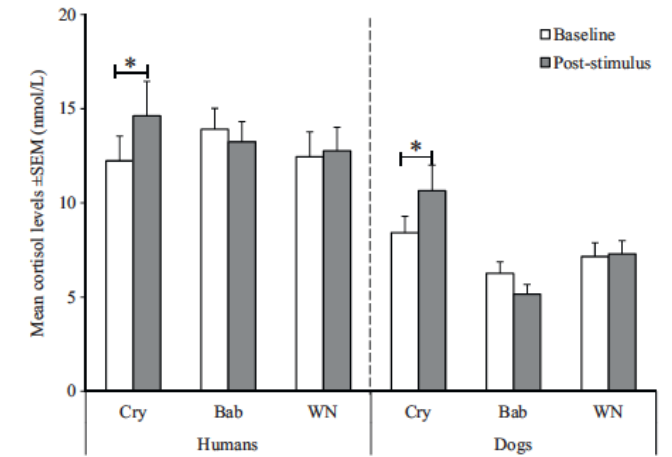
journal homepage: www.elsevier.com/locate/behavproc



Emotional contagion: Dogs and humans show a similar physiological response to human infant crying

Min Hooi Yong*, Ted Ruffman

Department of Psychology, University of Otago, Box 56, Dunedin 9054, New Zealand



DO IT!



★ DO AS I DO ★

SOCIAL LEARNING TRAINING

Förmänskliga rätt

- Känner som vi
- Saknar våra avsikter
- Har annan moral





Britta Blomqvist och Atlas



Sveriges första epilepsihund

HUNDENS HEMLIGHETER

Om vanliga men
oförklarliga beteenden

Per Jensen



NATUR &
KULTUR



- www.perjensen.se :
 - Vetenskapsblogg
 - Podradio: Etologinytt
 - Nu också på Spotify
- Facebook: Etologinytt