Sáenz, B. et al, 2008

Sáenz, B. et al, 2008

Human and porcine neurocysticercosis: differences in the distribution and developmental stages of cysticerci.

Sáenz, B., J. Ramírez, A. Aluja, A. Escobar, G. Fragoso, J. Morales, R. Pérez-Tamayo, F. Rosetti, C. Larralde, et al. (2008)

Tropical Medicine & International Health 13(5): 697?702

Abstract

Objective To describe and compare the clinical impacts of neurocysticercosis (NC) caused by Taenia solium in humans and pigs.

Methods Comparative study of the brains of 16 asymptomatic pigs and 35 human NC cases (15 asymptomatic and 20 symptomatic).

Results In humans, cysticerci were more frequently located in the ventricles and subarachnoid space at the base of the brain (11.8%vs. 1.6%; P = 0.001 and 25.9%vs. 0%; P < 0.0001, respectively) while in pigs, cysticerci were more frequently found in the parenchyma (44.4%vs. 7.6%; P < 0.0001). In human brains, 75.9% of the cysticerci were calcified, while in pigs all cysticerci were in the vesicular stage.

Conclusion The duration of infection and the host?parasite relationship (such as immune reactivity and brain haemodynamics) differ between humans and pigs. This may account for the different distribution and stage of the cysticerci among humans and pigs.

Keywords:

pigs; taenia; health.

To cite this article

Sáenz, B., J. Ramírez, A. Aluja, A. Escobar, G. Fragoso, J. Morales, R. Pérez-Tamayo, F. Rosetti, C. Larralde, et al. (2008). ?Human and porcine neurocysticercosis: differences in the distribution and developmental stages of cysticerci.? Tropical Medicine & International Health 13(5): 697?702

Sí