



AUJESZKY'S DISEASE or PSEUDORABIES

ANIMAL GROUP AFFECTED	TRANSMISSION	CLINICAL SIGNS	FATAL DISEASE?	TREATMENT	PREVENTION & CONTROL
Natural host: suidae Accidental victim: most mammals	Naso-oral; Genital tract	Central nervous system dysfunction, pruritus, respiratory symptoms, abortion and mummification	Yes for carnivores, ruminants and young suidae	None	<i>In houses</i> Vaccination, never feed raw pork <i>in zoos</i> avoid contact with suidae

Fact sheet compiled by F. Vercammen, Royal Zoological Society of Antwerp, Belgium	Last update December 2008
Fact sheet reviewed by R. De Deken, Animal Health, Institute of Tropical Medicine, Antwerp, Belgium J. Mortelmans, Animal Health, Institute of Tropical Medicine, Antwerp, Belgium	
Susceptible animal groups Virtually all mammals, except humans and the tailless apes, can get infected.	
Causative organism The etiological agent of pseudorabies is suid herpesvirus 1, which belongs to the subfamily Alphaherpesvirus of Herpesviridae. Aujeszky virus is enveloped and contains double-stranded DNA. Although only one serotype is known, strain differences exist.	
Zoonotic potential So far, suspected human infections have not been confirmed by isolation of the virus.	
Distribution World-wide.	
Transmission Transmission is primarily via direct contact (the nose and mouth in domestic swine; the genital tract in feral swine). Air-borne transmission is also possible (aerosols). Contaminated drinking water and feed can spread the virus.	
Incubation period Experimental infection in mink has an incubation period of 3-4 days. In young seronegative piglets incubation period is 2 days. Many animal species die within 1-2 days after onset of clinical signs.	
Clinical symptoms In young piglets and other susceptible mammals all the signs relate to central nervous disturbances. Depression and pruritus are characteristic in these animals. In older pigs respiratory symptoms can prevail. Sometimes abortion or mummification of the foetus is observed.	
Post mortem findings Macroscopic lesions are minimal: cutaneous lesions due to pruritus (especially in brown bears and white-tailed deer), hemorrhages in different organs. Microscopy can demonstrate a nonsuppurative meningoencephalitis with intranuclear inclusions	
Diagnosis 1. Virus isolation in cell cultures: cytopathic effect after 2-5 days 2. Virus antigen detection: a) Fluorescent antibody test b) Enzyme immune assays c) Polymerase Chain Reaction (PCR) 3. Serology Different types of serological tests for the detection of antibodies are used. Virus neutralisation, latex agglutination and enzyme-linked immunosorbent assay (ELISA) are the most known techniques.	
Material required for laboratory analysis For virus detection: tonsil, brainstem, brain, spleen, lung. Also swabs from nose or genital tract. Serum for serology.	
OIE Reference Laboratories • Dr S.L. Swenson	



National Veterinary Services Laboratories
P.O. Box 844, Ames, IA 50010
UNITED STATES OF AMERICA
Tel: (1.515) 663.75.51 Fax: (1.515) 663.73.48
Email: sabrina.l.swenson@aphis.usda.gov

- **Dr P. Vannier**

AFSSA Ploufragan, Laboratoire d'études et de recherches avicoles et porcines, UR Station de pathologie porcine
Zoopôle Beaucemaine-Les Croix, BP 53, 22440 Ploufragan
FRANCE
Tel: (33 (0)2) 96.01.62.22 Fax: (33 (0)2) 96.01.62.23
Email: p.vannier@afssa.fr

- **Dr A.T.J. Bianchi**

Central Veterinary Institute of Wageningen UR
P.O. Box 2004, 8203 AA Lelystad
THE NETHERLANDS
Tel: (31.320) 23.88.00 Fax: (31.320) 23.86.68
Email: andre.bianchi@wur.nl

Treatment

No treatment exists.

Prevention and control in zoos

Avoid contact between suidae and susceptible animals and do not feed raw pork meat. Vaccination with an inactivated or live sub-unit marker vaccine is possible in companion animals (cats and dogs) and pigs, but so far, this immunization has not been documented in zoo-and wild animals.

Suggested disinfectant for housing facilities

The virus is lipophilic and sensitive to many commonly used disinfectants.

Notification**Guarantees required under EU Legislation****Guarantees required by EAZA Zoos****Measures required under the Animal Disease Surveillance Plan****Measures required for introducing animals from non-approved sources****Measures to be taken in case of disease outbreak or positive laboratory findings****Conditions for restoring disease-free status after an outbreak****Contacts for further information****References**

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