

Need more information?

Reference Experts:

Dr J.M. Sánchez-Vizcaíno
Ministerio de Educación
y Ciencia, Facultad
de Veterinaria, Universidad
Complutense de Madrid
Avda. Puerta de Hierro s/n
28040 Madrid
SPAIN
Tel: (34.91) 394.40.82
Fax: (34.91) 394.39.08
Email: jmvizcaíno@vet.ucm.es

Dr Chris Oura
Institute for Animal Health,
Pirbright Laboratory
Ash Road, Pirbright, Woking,
Surrey GU24 0NF
UNITED KINGDOM
Tel: (44.1483) 23.24.41
Fax: (44.1483) 23.24.48
Email: chris.oura@bbsrc.ac.uk

Ms Alison Lubisi
Onderstepoort Veterinary
Institute, Exotic Diseases
Division
Private Bag X5, Onderstepoort
0110
SOUTH AFRICA
Tel: (27.12) 529.95.60
Fax: (27.12) 529.95.95
Email: Lubisia@arc.agric.za

References:

1. Merck Veterinary Manual
<http://www.merckvetmanual.com/mvm/index.jsp?cfile=html/bc/54100.htm>
2. African Swine Fever, Chapter 2.8.1 *Manual of Diagnostic Tests and Vaccines for Terrestrial Animals*, 2011, http://www.oie.int/fileadmin/Home/eng/Health_standards/tahm/2.08.01_ASF.pdf
3. African Swine Fever, Chapter 15.1, *Terrestrial Animal Health Code* – 2011 http://www.oie.int/index.php?id=169&L=0&htmlfile=chapitre_1.15.1.htm
4. African Swine Fever, OIE Technical Disease Card http://www.oie.int/fileadmin/Home/eng/Animal_Health_in_the_World/docs/pdf/AFRICAN_SWINE_FEVER_FINAL.pdf

Key Facts

- Outbreaks of ASF in 2007 in Georgia were the first reported occurrences of the disease in this part of Europe.
- Severe epidemics occurred in Brazil (1978-1981) and Haiti (1978-1984).
- African swine fever appeared in 1960 in Spain, Portugal and Sardinia. The disease was eradicated from Portugal in 1993 and Spain in 1995, but remains enzootic in Sardinia.
- Limited outbreaks occurred in Belgium (1985) and the Netherlands (1986) and were successfully eradicated.

• 12, rue de prony • 75017 Paris france
• tel. 33 (0)1 44 15 18 88 - fax 33 (0)1 42 67 09 87
• www.oie.int • oie@oie.int

Cover photo : © C.Maitre INRA.
Inside photos : © N.Denormandie OIE, © F.Diaz OIE,
© C.Maitre INRA, © J.Weber.

African Swine Fever

What is African Swine Fever?

African swine fever (ASF) is a highly contagious hemorrhagic disease of pigs, warthogs, European wild boar and American wild pigs. All age groups are equally susceptible.

With high virulence forms of the virus, ASF is characterized by high fever, loss of appetite, haemorrhages in the skin and internal organs, and death in 2-10 days on average. Mortality rates may be as high as 100%.

The organism which causes ASF is a DNA virus of the *Asfarviridae* family.

ASF is a disease listed in the World Organisation for Animal Health (OIE) *Terrestrial Animal Health Code*, 2011, (Article 1.2.3) and must be reported to the OIE (Article 1.1.3 – Notification of Diseases and Epidemiological Information).





African Swine Fever



Where is the disease found?

ASF is generally prevalent and endemic in countries of sub-Saharan Africa. In Europe ASF remains endemic only in Sardinia (Italy). Outbreaks have occurred outside of Africa including the outbreaks in Georgia in 2007, the first ever report of ASF in that part of Europe, and in some Caribbean countries.

How is ASF transmitted and spread?

The warthog can serve as a natural reservoir of the virus without sign of disease. Spread from this reservoir is via the soft tick *Ornithodoros moubata*. The tick will ingest the virus when taking a blood meal and then pass it on when feeding on susceptible animals.

The virus is found in all body fluids and tissues of infected domestic pigs. Pigs usually become infected by direct contact with infected pigs or by ingestion of garbage containing unprocessed infected pig meat or pig meat products. All processing procedures do not inactivate the African swine fever virus. Biting flies and ticks, contaminated premises, vehicles, equipment or clothing can also spread the virus to susceptible animals.

What is the public health risk associated with this disease?

ASF is not a human health threat.

What are the clinical signs of ASF?

The severity and distribution of the lesions also vary according to virulence of the virus. Severe cases of the disease are characterized by high fever and death in 2-10 days on average. The mortality rate can be as high as 100%. Other clinical signs may include loss of appetite, depression, redness of the skin of the ears, abdomen, and legs, respiratory distress, vomiting, bleeding from the nose or rectum and sometimes diarrhoea. Abortion may be the first event seen in an outbreak.

Moderately virulent forms of the virus produce less intense symptoms though mortality can still range from 30-70%. Chronic disease symptoms include loss of weight, intermittent fever, respiratory signs, chronic skin ulcers and arthritis.

More information on the disease can be found in the OIE Technical Disease Card.

http://www.oie.int/fileadmin/Home/eng/Animal_Health_in_the_World/docs/pdf/AFRICAN_SWINE_FEVER_FINAL.pdf

How is the disease diagnosed?

ASF may be suspected based on clinical signs and confirmation must be made through prescribed laboratory tests, particularly to differentiate this disease from Classical Swine Fever (CSF). (Prescribed and Alternative Diagnostic Tests for OIE Listed Diseases, Chapter 1.3, *Terrestrial Animal Health Code*, 2011; African Swine Fever, Chapter 2.8.1, *Manual of Diagnostic Tests & Vaccines for Terrestrial Animals* 2011).

What is being done to prevent or control this disease?

Prevention and control measures

There is no published treatment or vaccine for ASF. Prevention in countries free of the disease depends on stringent import policies, ensuring that neither infected live pigs nor pork products are introduced into areas free of ASF. This includes ensuring proper disposal of waste food from aircraft, ships or vehicles coming from infected countries.

In endemic areas, it is difficult to eliminate the natural reservoir in warthogs; however, control of the soft tick vectors is important in preventing the disease. It is also important to ensure that meat from warthogs or infected animals is not fed to susceptible pigs.

All successful eradication programs have involved the rapid diagnosis, slaughter and disposal of all animals on infected premises, thorough cleaning and disinfection, disinsectisation, movement controls and surveillance.

