

# AFRICAN SWINE FEVER



DO NOT IMPORT AFRICAN SWINE FEVER INTO SOLOMON ISLANDS

#### What is African swine fever ???

### Why is it important ????

Experience in other countries

What are we doing about it - preparedness

## What is African Swine Fever - ASF







### ASF - A highly contagious viral disease



 African swine fever (ASF) is a highly contagious disease of wild and domestic pigs with high rates of mortality (deaths).



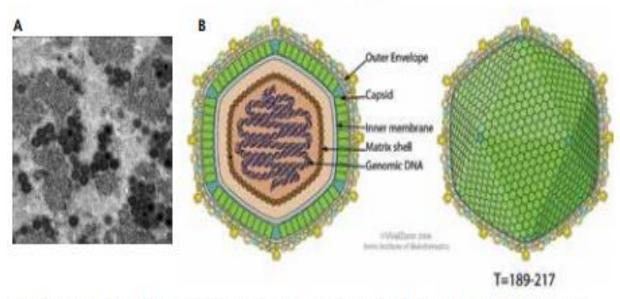
ASF causes up to 100% deaths in pig populations

#### What causes ASF

 The causative agent is a unique cytoplasmic double stranded DNA arbovirus.

 ASF has a complex pattern of infection – occurring in Africa, Europe, and Asia (Bali Indonesia, and Timor Leste)

#### FIGURE 3 The ASF virus close-up



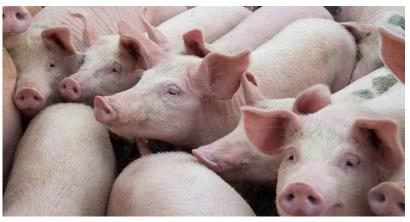
- A. Transmission electron micrograph of Vero cells infected with African swine fever virus. Mature virions, immature virions and membrane intermediates are visible. Mature virions approximately 200 nm in diameter. (Source: The Pirbright Institute, UK).
- B. Diagram of the Asfarviridae virion. (Source: Swiss Institute of Bioinformatics).

## Host – which animals are affected

 Pig> All types of Sus scrofa (domestic and will pigs) are susceptible to ASF virus and its pathogenic effects

 A tick: Ornithodoros only known arthropod natural host







#### **Transmission – how ???**

#### **Direct transmission –**

sick animals to healthy animals

#### **Indirect transmission**

- Swill feeding (from Hotels and restaurants)
- Uncooked pork products (ASF Virus can remain infectious for 3 -6 months
- Airline garbage (Inflight food residues)
- Biological vectors soft ticks
- Formites premises, vehicles, implements and clothes.

#### Source of virus

Blood, tissues, secretions and excretions of sick and dead animals

Animals which have recovered from either acute or chronic infections may become infected, acting as virus carriers; (especially in African wild swine, and in domestic pigs and wild boar in endemic areas)

**Soft ticks of the genus Ornithodoros** 

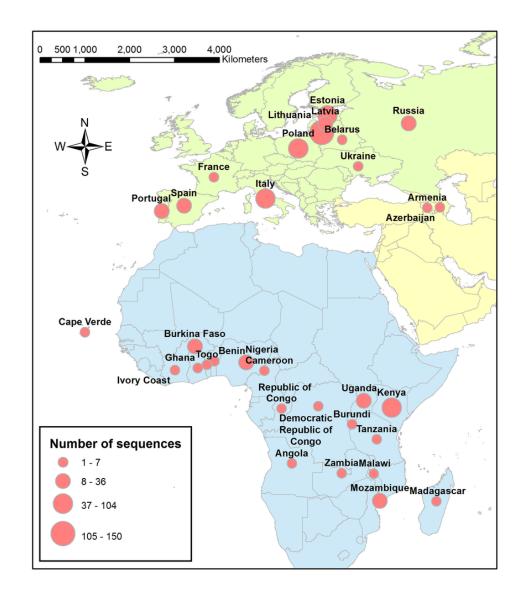






#### Occurrence -

• Africa, Europe and Asia



### **ASF in Europe**

- There were 1,135 confirmed cases in wild boar across 13 European countries in January,
- Poland (413), Hungary (365), Romania (142) and Bulgaria (71).
- Cases are rising in most countries where infection is present and the January figure compared with 724 cases in December.
- The number has been steadily rising since the 257 confirmed cases in wild boar in June 2019.



#### Occurrence in Asia – near to SI



 ASF is already confirmed in East Timor – 700 km from Australia

 Around less than 1000 km from West Papua and PNG

## Why is ASF important ?????





### Socio economic impact

- ASF has a severe impact and implications for nutrition and food security.
- The high impact is most apparent in countries with a significant commercial pig industry
- but this does not mean that smallholder pig farmers are in any way spared.

 greatest losses can usually be inflicted on the poorer pig producers who are less likely to implement effective prevention (i.e. biosecurity) and control strategies.

#### **ASF in small-holders**

 Pig production is an important source of high quality and cheap dietary protein in particularly for poor communities,

 Income generated is used to access a variety of dietary requirements.

 The farmers often lack financial resources to restart production following outbreaks in the absence of compensation schemes and recovery plans.

#### Losses due to ASF

- Loss of livilihoods and increased poverty
- Withdrawal of children from education
- Reduced availability of affordable high quality protein
- Closure in business of the value chain (agents, butchers, suppliers, retailers)
- Loss of docial status due to poverty
- Disruption of cultural prectices requiring pigs
- Financial insecurity and inability to meet emergency costs
- Women, children and elders become most vulnerable

## ASF – serious threat to global and internal pork production

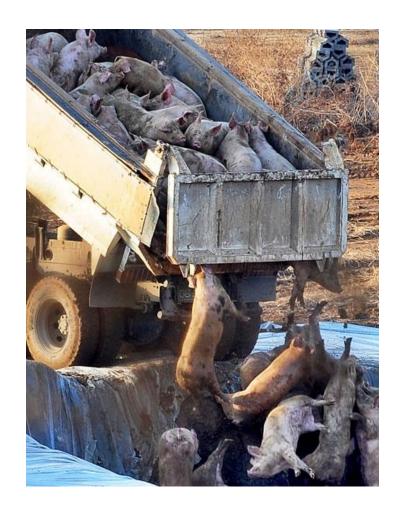
 ASF significant effect on the Chinese pig industry and the Chinese economy because pork meat most consumed meat in China

• In the year to August 2019, retail pork prices rose by 47%, contributing to a 10% increase in the food price index.



#### MASS GRAVES FOR ASF INFECTED PIGS





## ASF – threat to SI pig farming

 Almost 30% of Agriculture holding households (32,912) in SI raise pigs.

• More than 149,000 pigs are kept by these households.





## **ASF threat to SI pig** farming and livelihood

 Many families will lose their sure source of income, food security and important basis for livelihood if ASF entered SI.

 Increases in poverty, malnutrition may be expected amongst small-holder farming households





### What are we doing about it in SI

- Stakeholders meetings 2018. 2019
- Awareness to key stakeholders, farmers, importers, hotels
- Port of entry awareness and signs
- Ban of pork meat
- Strategic planning for response commenced in 2020

## AFRICAN SWINE FEVER IS AT OUR DOOR STEPS



**Bali and East Timor** 

• ASF IS EVERY BODIES BUSINESS





• LET US WORK TOGETHER TO PREVENT ASF ENTERING SOLOMON ISLANDS

## Thank you for listening

