

# ASF outbreaks in Poland (from the 1st to XIIIth outbreak)

## EPIDEMIOLOGICAL SURVEY

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# **ASF outbreaks in Poland**

**Ist – IIIrd outbreak in pigs**

**21.07.2014 – 31 01.2015**

**Up to 9 km from the Belarussian border**

**IVth – XIIIth outbreak in pigs**

**27.06.2016 – 17.08.2016**

**Up to 110 km from Belarussian border**

**107 confirmed cases in wild boars**

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# IVth ASF outbreak in Poland

Bielszczyzna town, Hajnowka county

27.06.2016

First deaths starting from the 22.06.2016

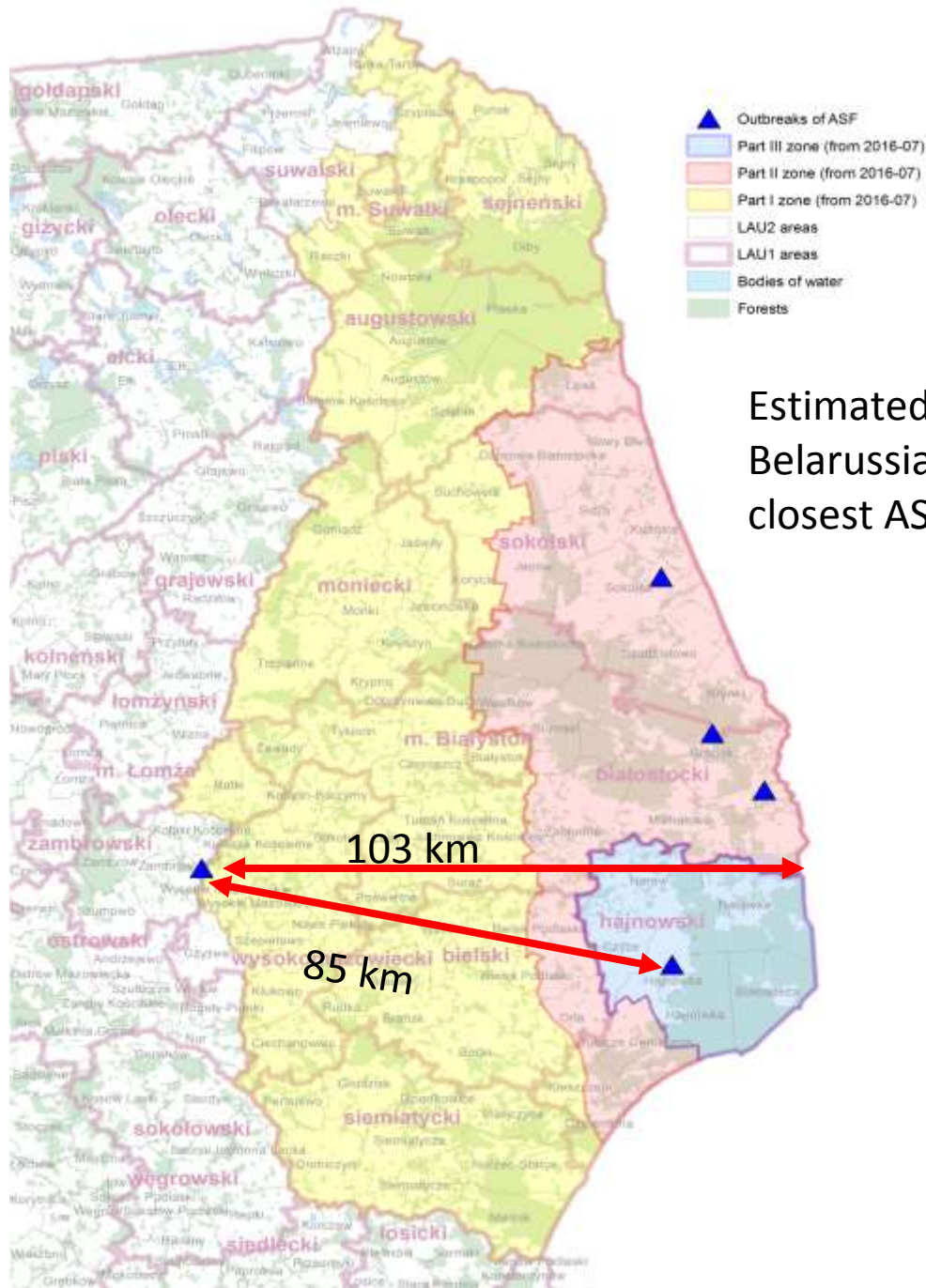
No implemented biosecurity measures!

In total 270 pigs (40 sows)

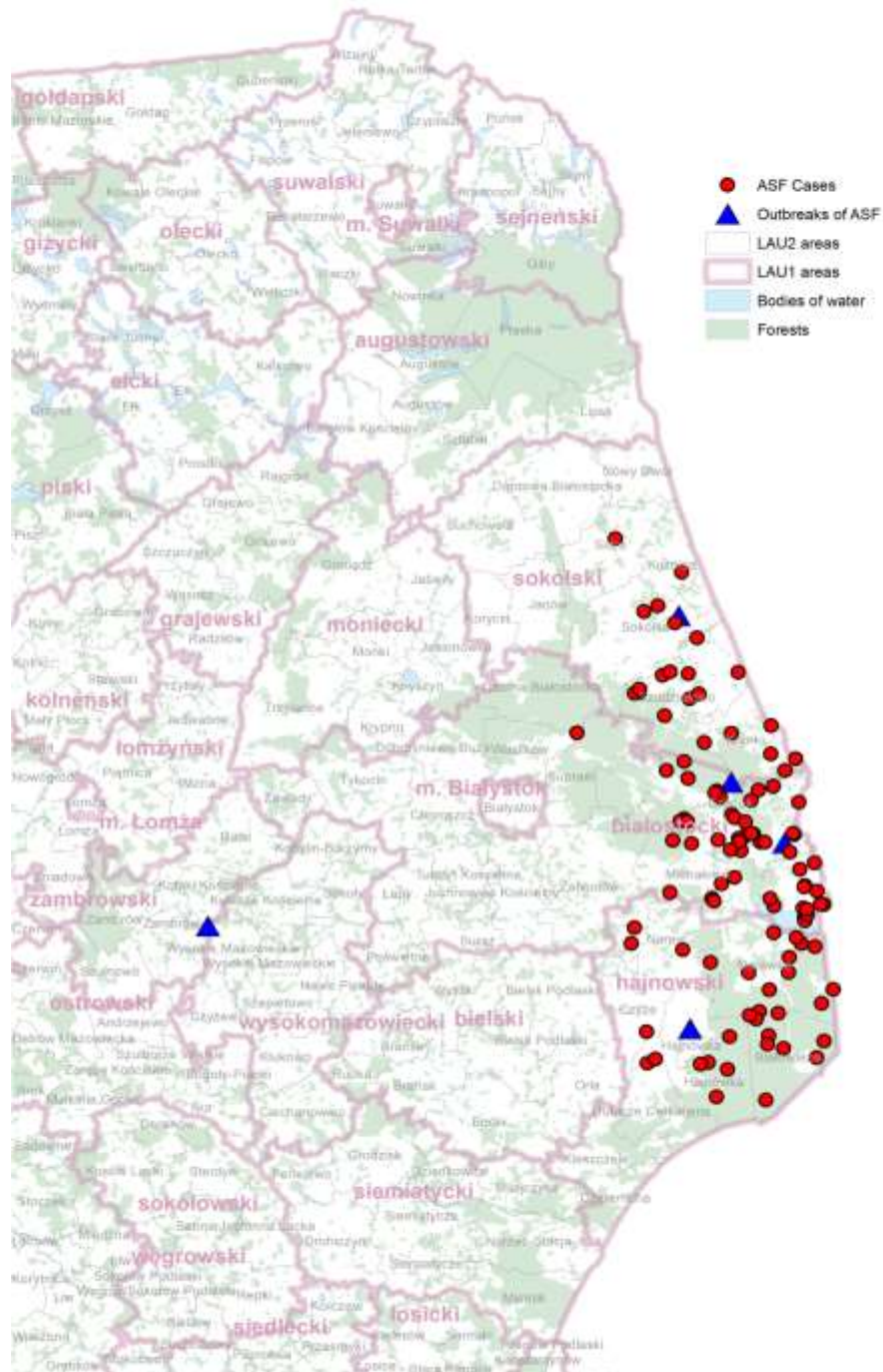
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**Vth ASF outbreak**  
**Rebiszewo-Studzianki**  
**Wysokie Mazowieckie county**  
**1.08.2016**



Estimated distance from Belarusian border and from the closest ASF outbreak (4th)



- To conclude the sequence of all events the herd was infected at least 12 days before the disease identification.
- Hypothesis
- The herd was „active” (might be a source of ASFV to other herds for 12 days).





12

OGNISKÓ  
WYTOP WODNIANÓ

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# Clinical signs

- **First signs** were identified in lactating sows
  - lack of appetite,
  - not considerable increase of body temperature
  - abortion
  - single deaths increasing during the following days of infection

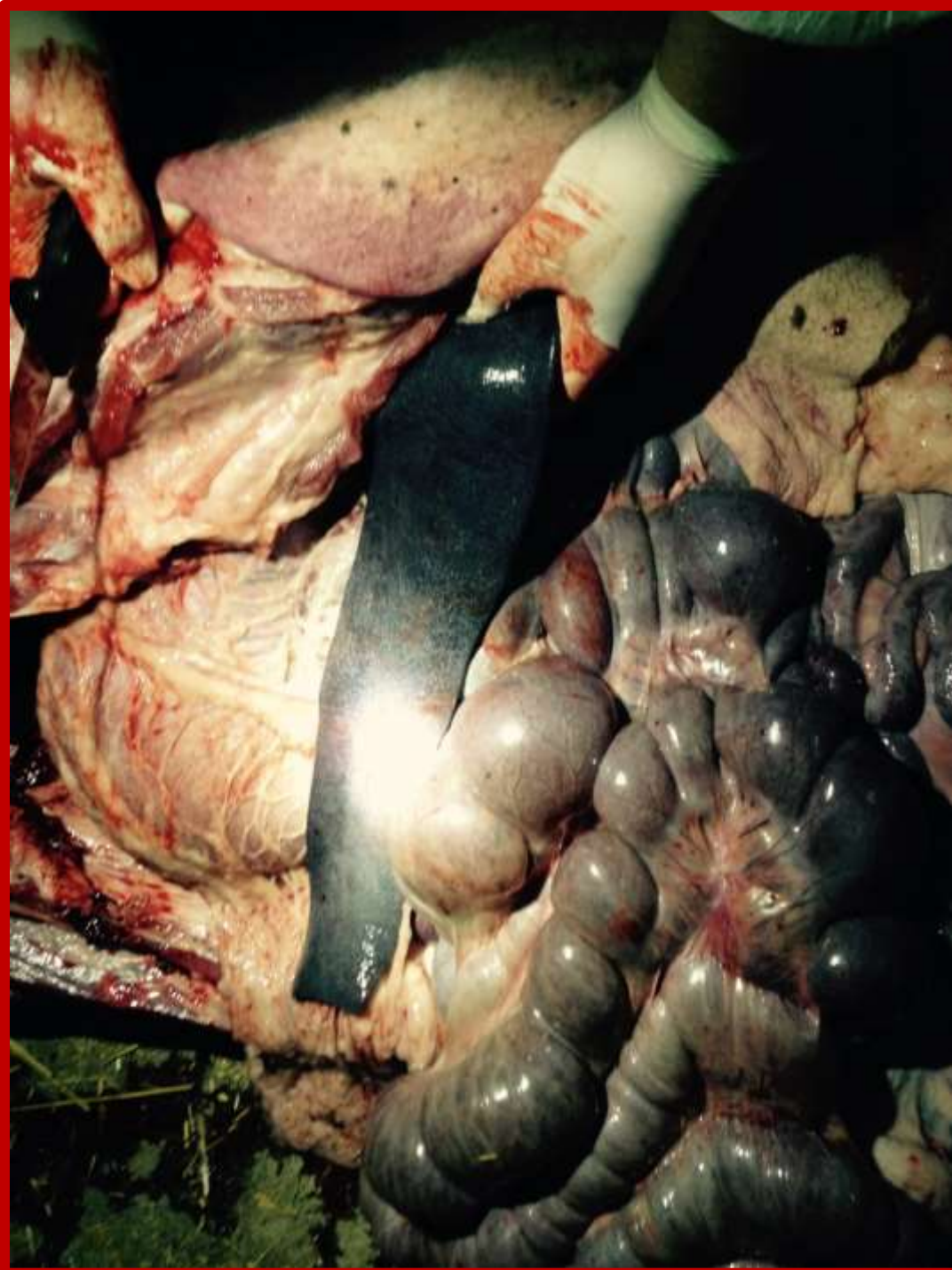
All killed animals were sampled.  
In total 32 samples were  
collected for laboratory  
examination. 13 of them were  
PCR positive. No ELISA, nor IPT  
positive samples.

Conclusion: Pigs died before the specific antibodies were  
produced.

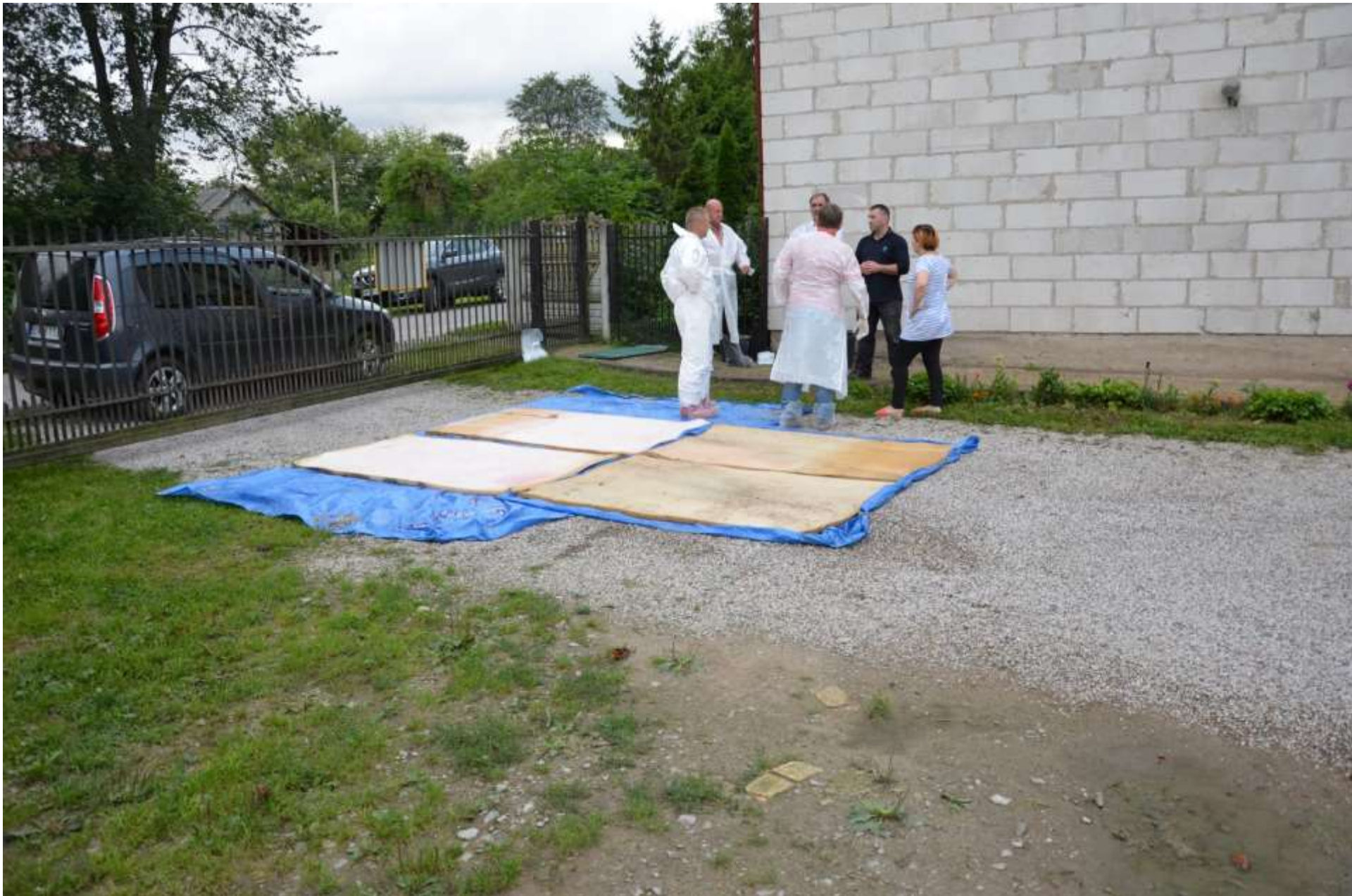
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# Lesions

Specific for ASF but mildly manifested



# Implemented measures



# Outbreak destruction

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# Vlth ASF outbreak

Niemirów, Mielnik commune

Siemiatycze county

5.08.2016

Closed-type production: 6 sows, 1 boar, 12 piglets, 50 weaners, 28 fatteners

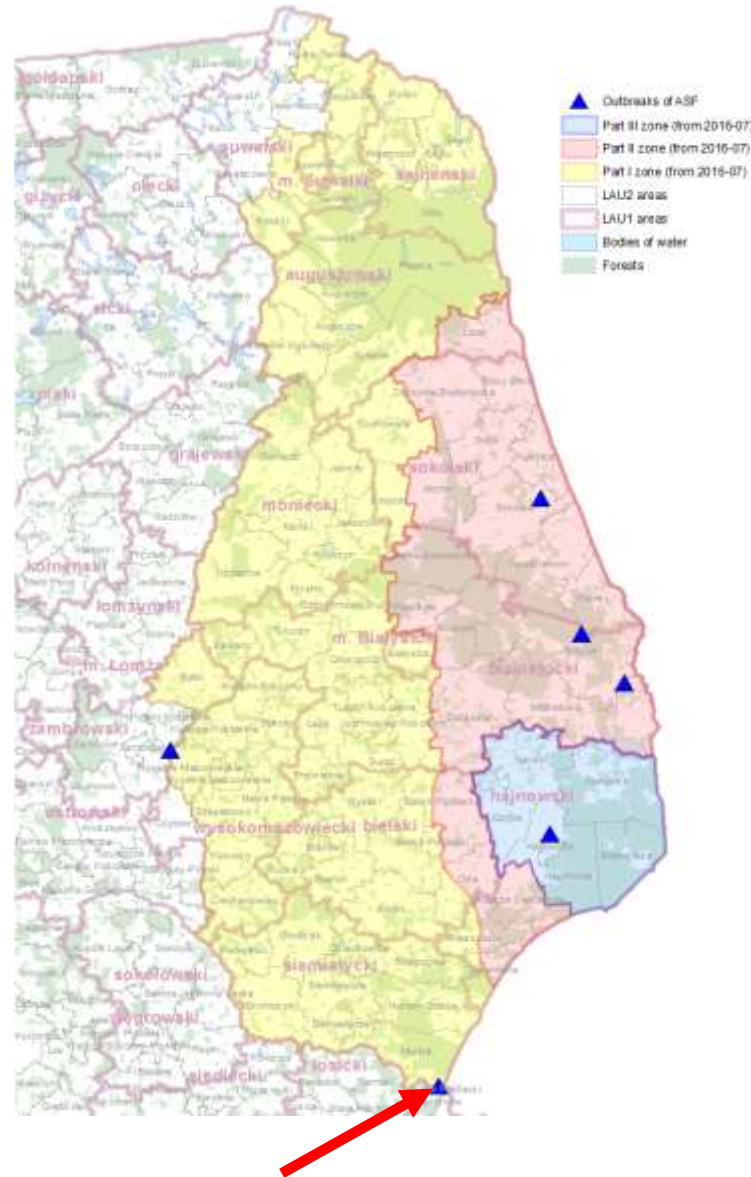
Location – 500 meters from the Belarussian border (close to Bug river)

31.07.2016 - first clinical signs of the disease in weaner's pen.

The farmer suspects „TV-famous pig disease”.

5.08.2016 The samples are collected for ASF examination at the NRL at the NVRI. PCR and ELISA ! positive results. On 6.08.2016 the holding was destroyed.

# Localisation of VIth ASF outbreak



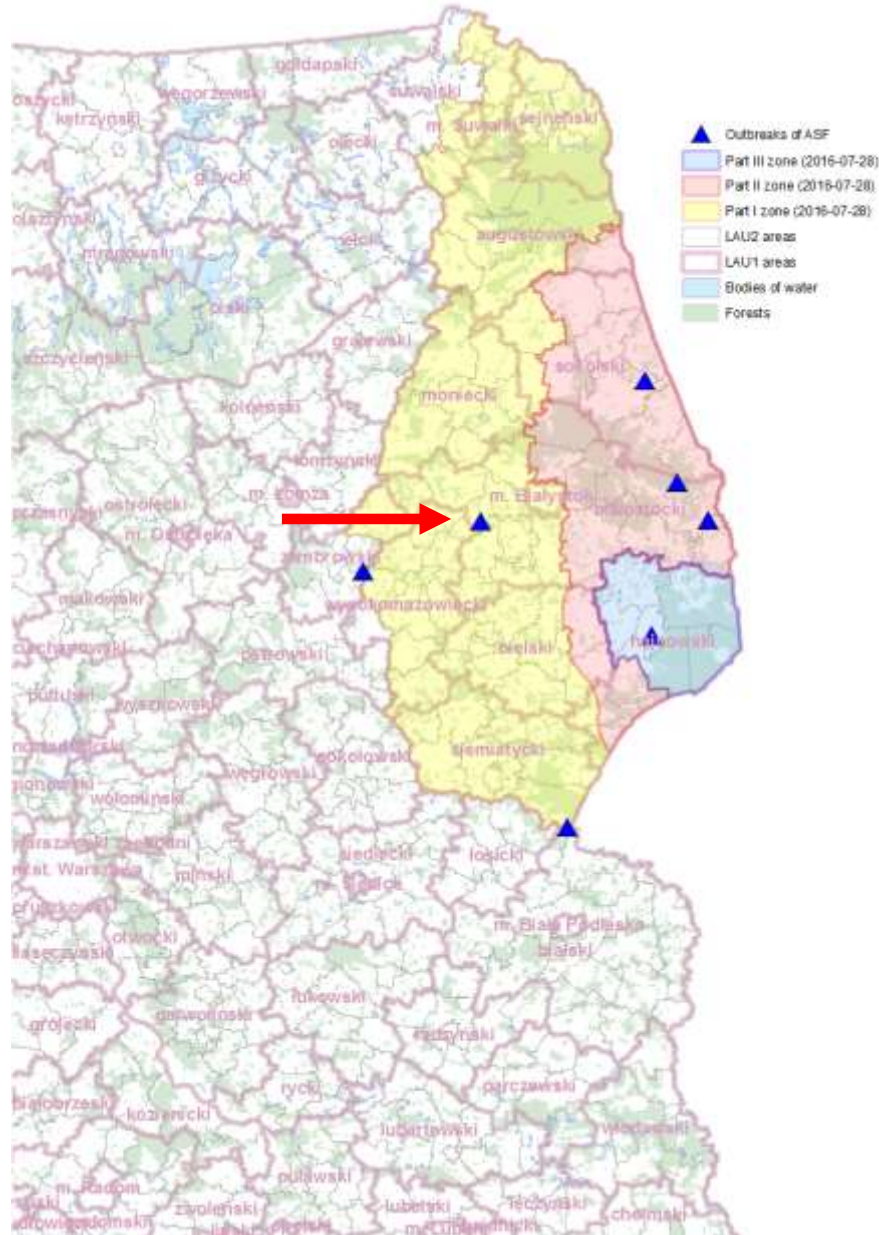
## VIIth ASF outbreak

Izbiszczce town, Choroszcz commune,  
Białystok county

8.08.2016

- 19.07. 2016. The owner bought 10 weaners at the market place
- Few days later from 3 to 4 piglets showed diarrhoea that was stopped after antibiotic administration
- 26.07.2016. The owner bought from the same trader 10 more weaners – which are only a part of the remaining animals in the truck

# Localisation of the VIIth ASF outbreak

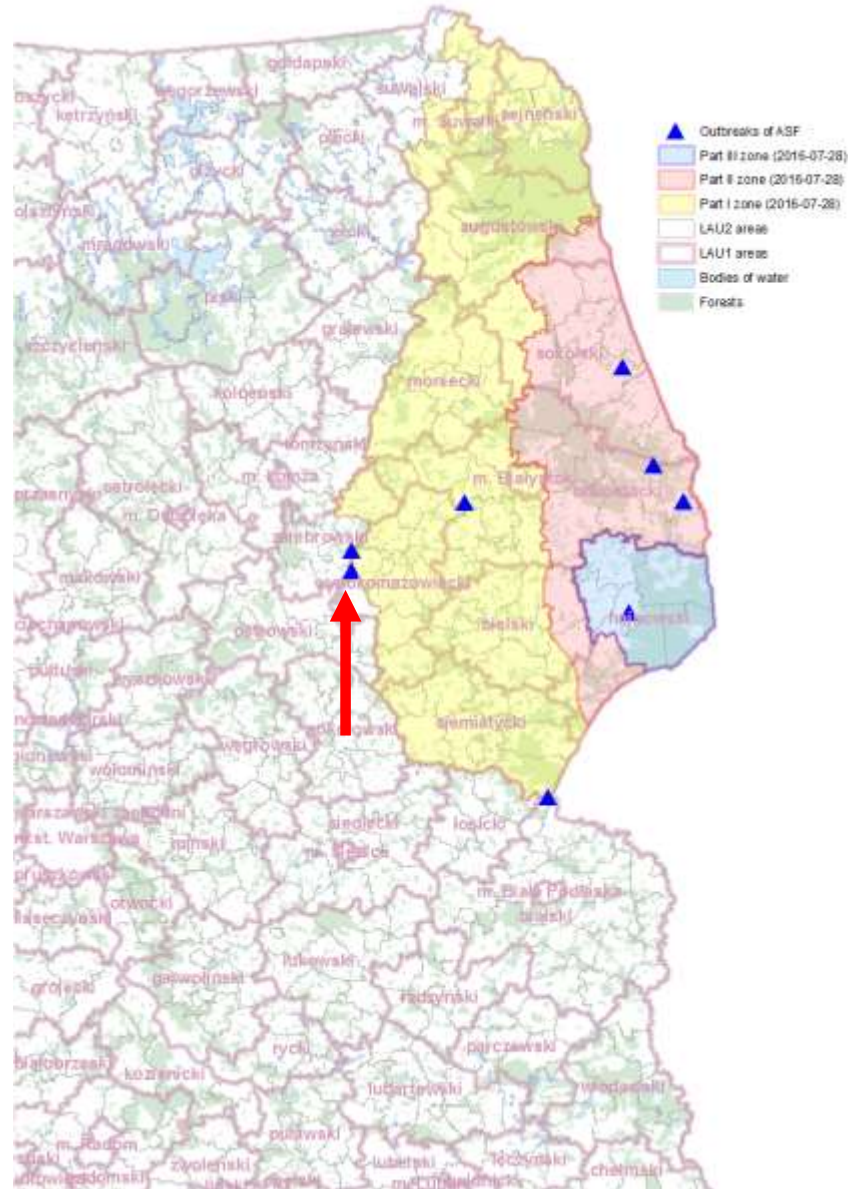


**VIIIth ASF outbreak**  
Miodusy-Stok  
Wysokie Mazowieckie county  
10.08.2016

Positive sample from pigs collected during the monitoring  
of herd counting 11 pigs

Source of pigs: a trader from Zambrow town who sold 4  
inexpensive weaners

# Localisation of the VIIIth ASF outbreak



# IXth ASF outbreak

Zbrzeznicze

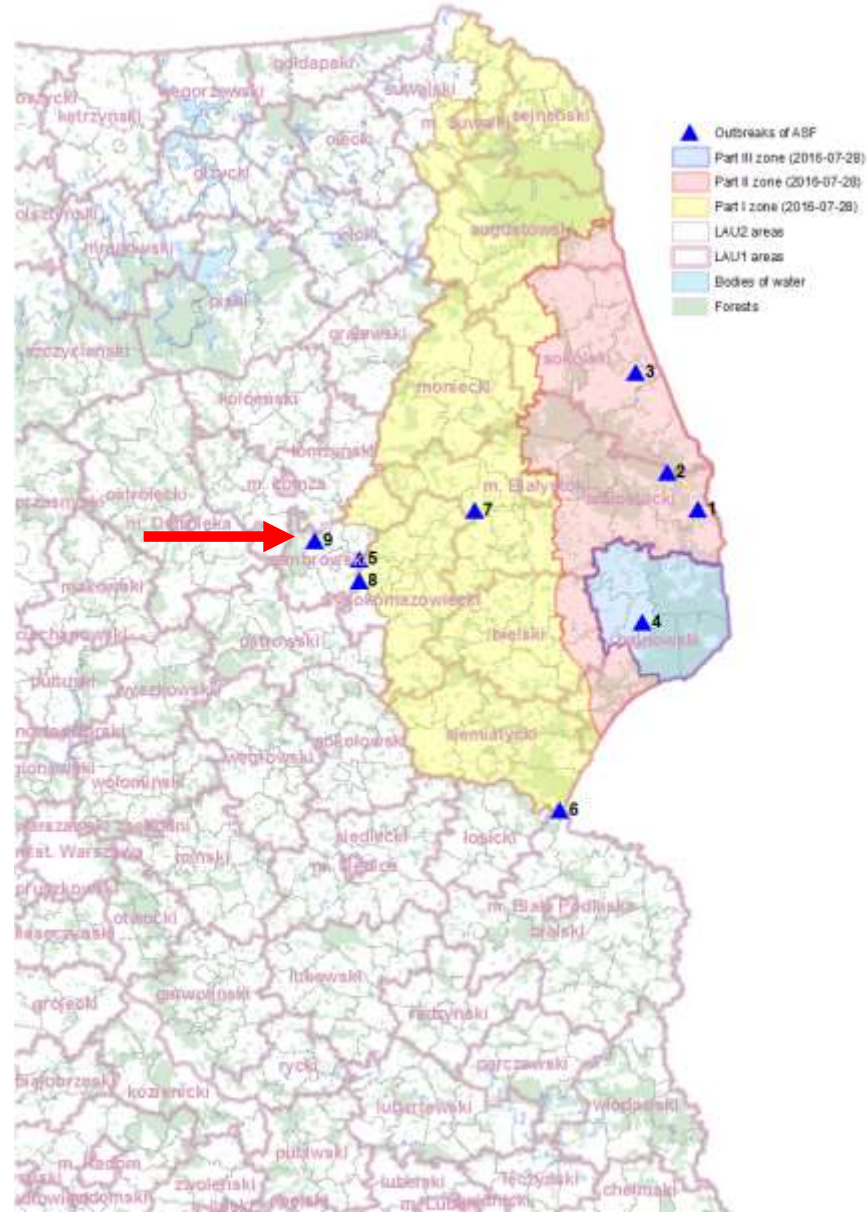
Zambrow county

10.08.2016

9.08.2016. Nothing suspicious. The county vet collects blood from 4 pigs and sends them to the NVRI for routine ASF examination.



# IXth ASF outbreak localisation



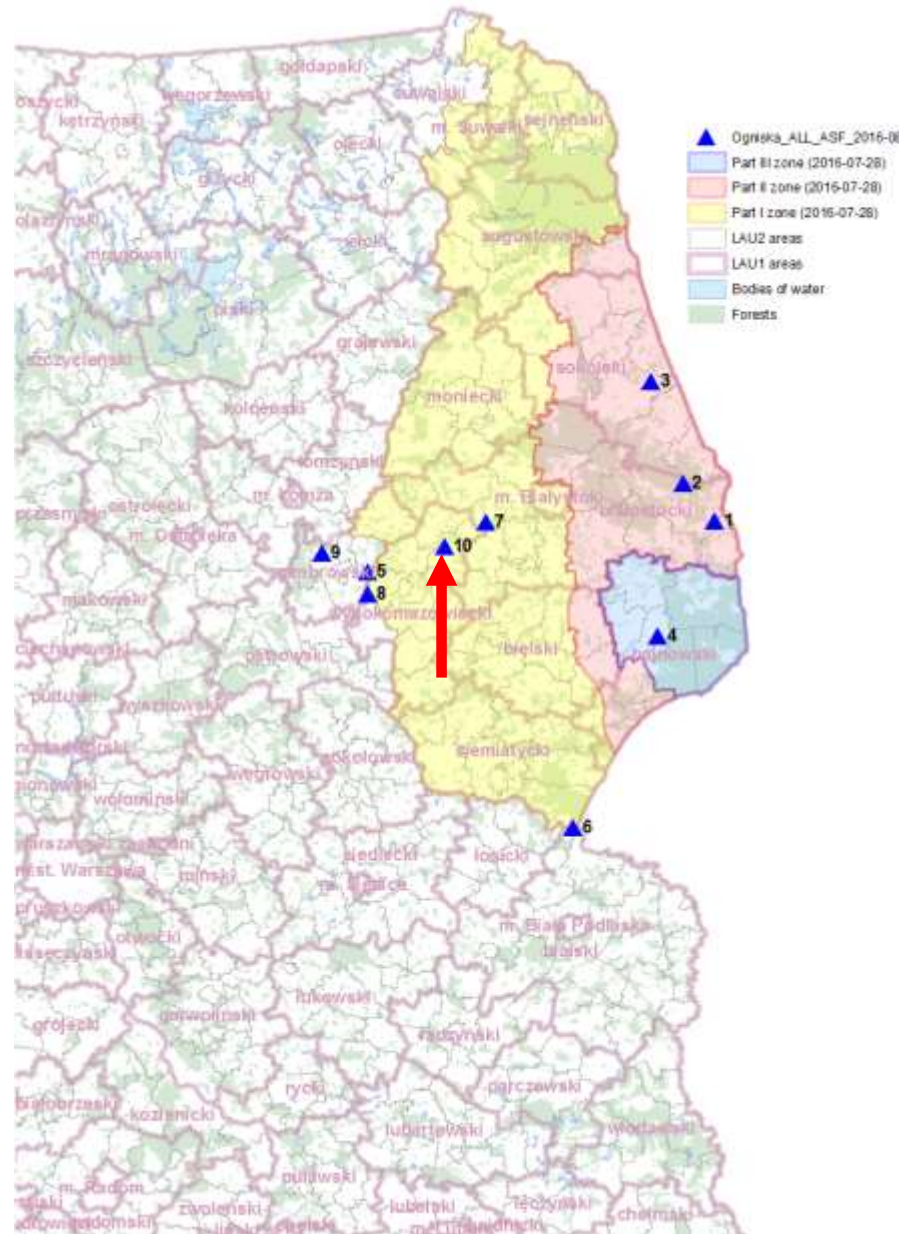
**Xth ASF outbreak in Poland**  
Truskolasy  
Wysokie Mazowieckie  
11.08.2016

110 weaners,

Owner of 105 well-growing weaners bought „cheaply”  
from unknown source, purchase date - 3.08.2016

Day after purchase one of the weaners died. Clinical signs  
and post mortem changes typical for ASF.

# Xth ASF outbreak localisation



# XIth ASF outbreak in Poland

Stare Buczyce; Janów Podlaski 11.08.2016, Lublin  
voivodeship

34 pigs

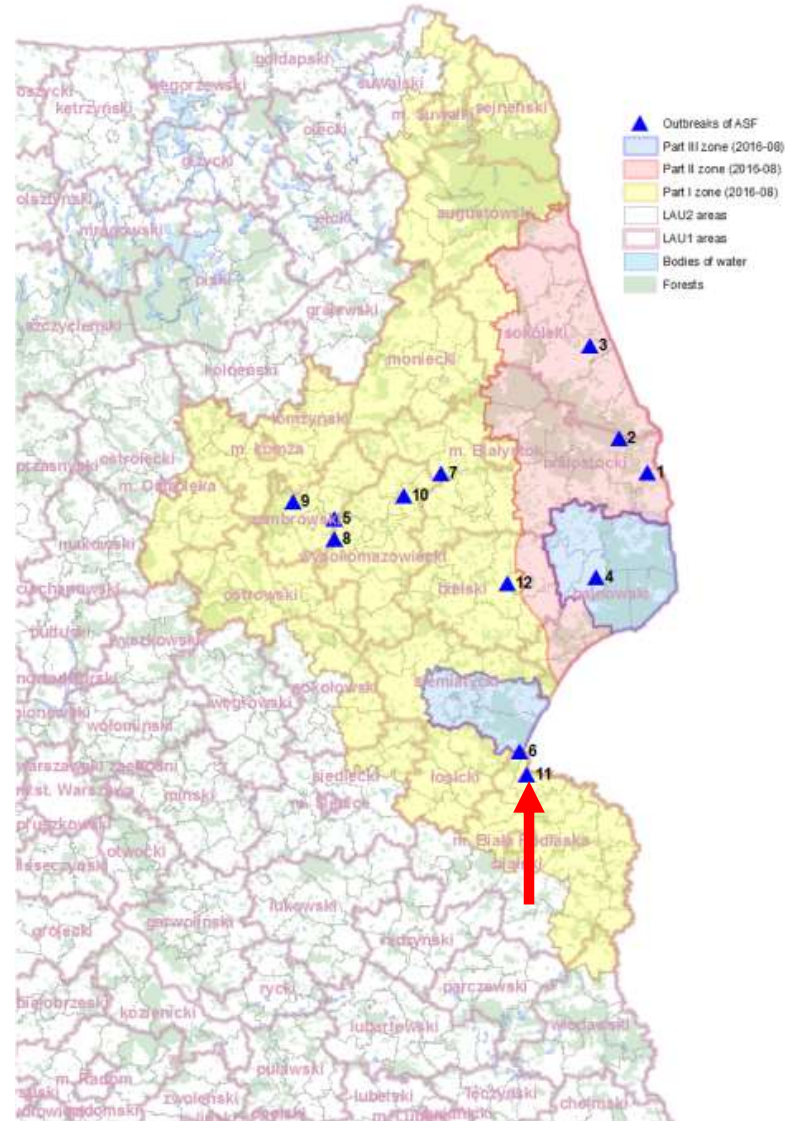
on 5.08 one sow was found dead, and further on 11.08 one  
boar with the signs and changes typical for ASF.

The owner produces sausages, has problems with pig  
registration, no exact data concerning pig movement,  
occasional pig purchase for production purposes.

Laboratory examination result 12.08.PCR +

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# XIth ASF outbreak localisation



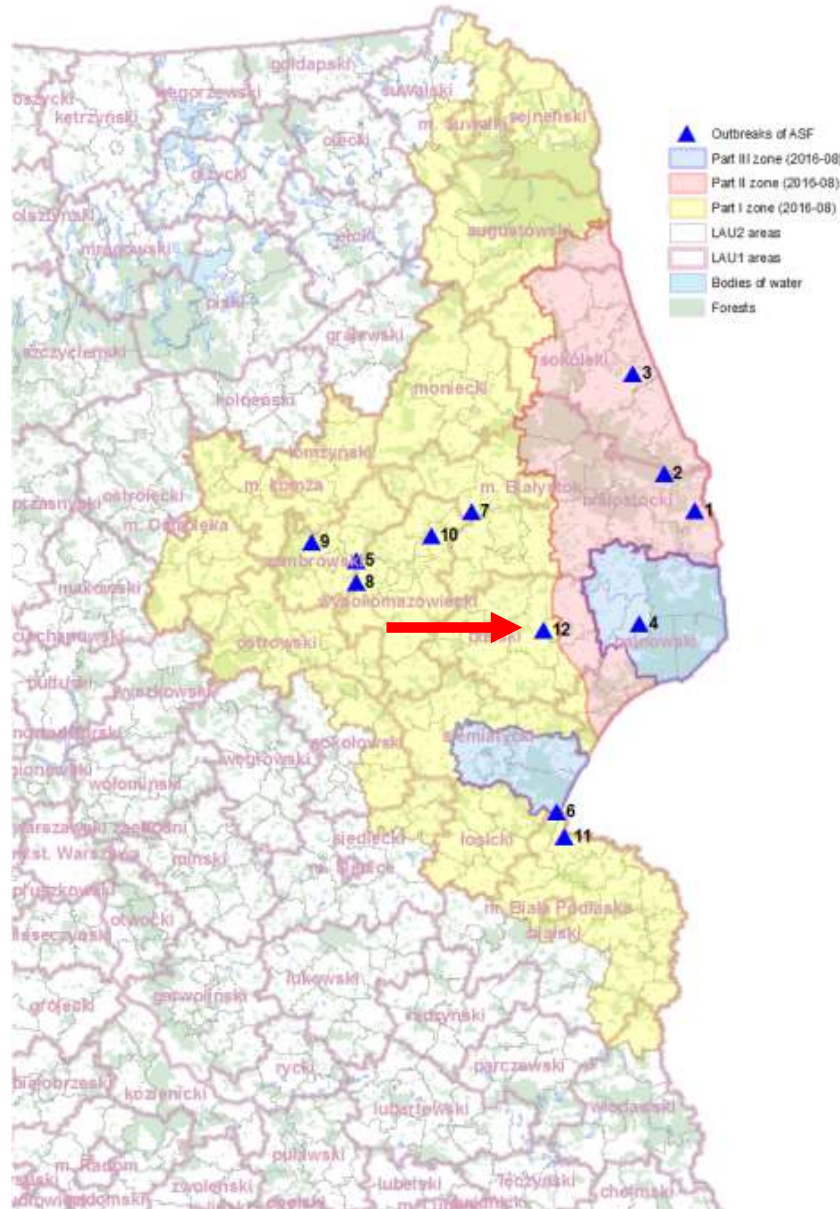
# **XIIth ASF outbreak in Poland**

## **Augustowo; Bielsk Podlaski**

A herd of 20 fatteners and 12 weaners bought from an unknown breeder on 21st of July 2016 in Ciechanowiec marketplace (Wysokie Mazowieckie county)

Laboratory examination result 12.08.2016. PCR +.

# XIth ASF outbreak localisation

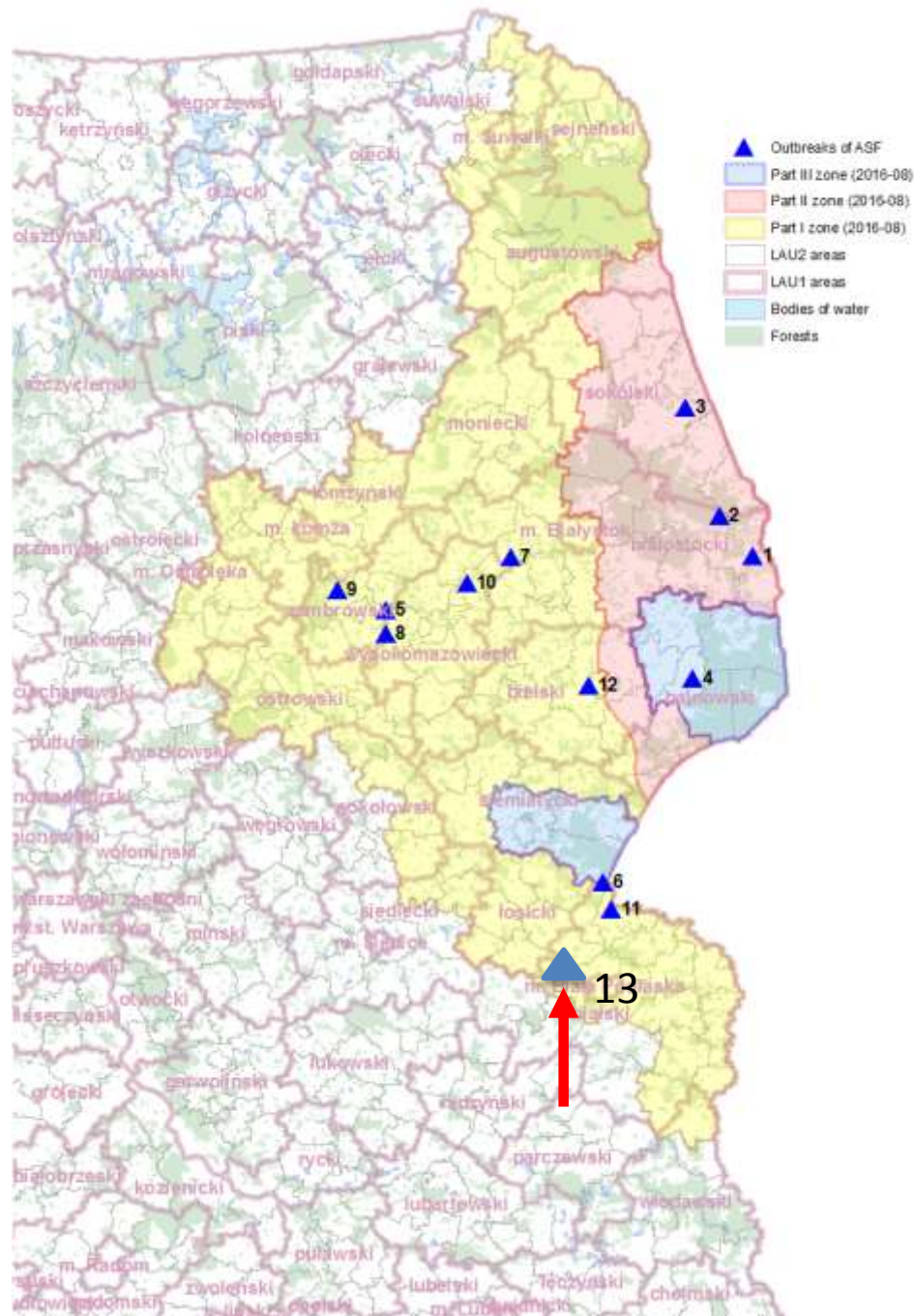


# XIIIth ASF outbreak

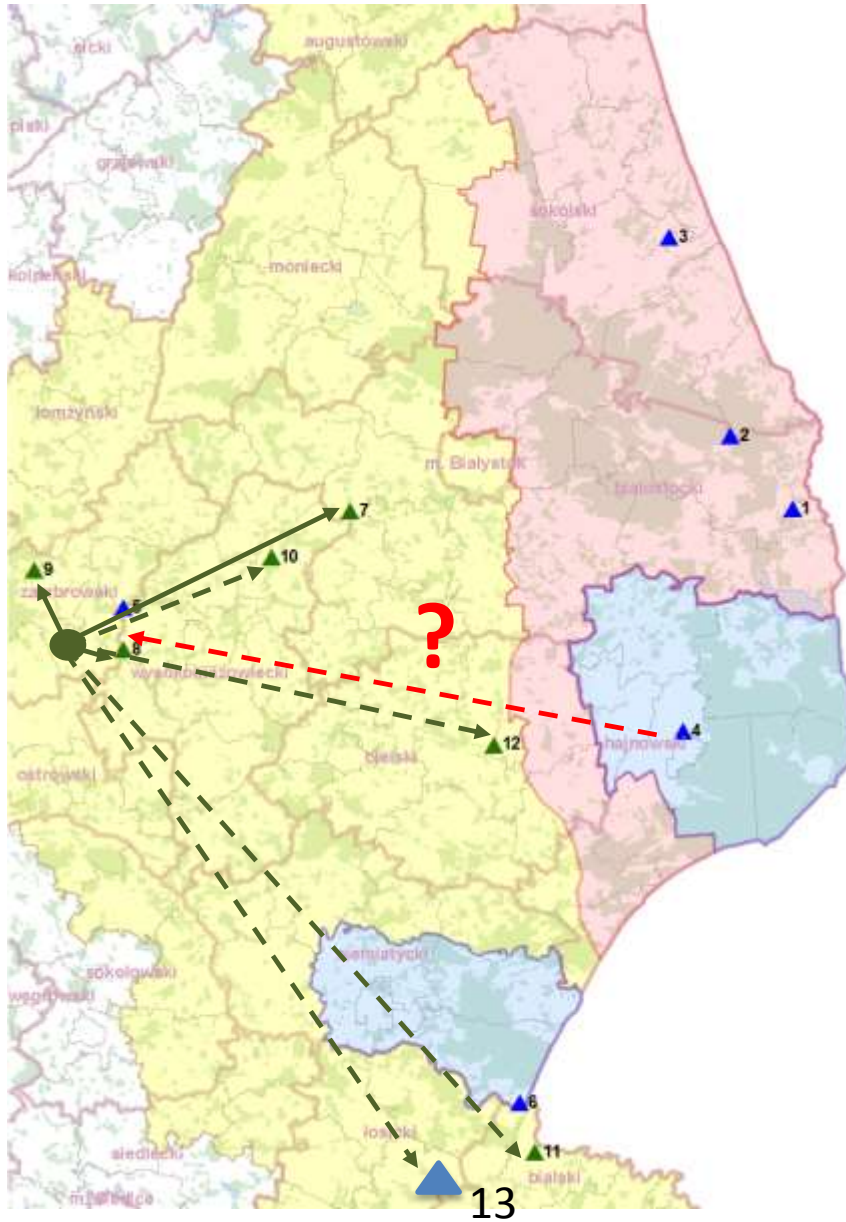
Droblin town, Lesna Podlaska commune, Biała  
Podlaska county  
17.08.2016 r.

25 pigs, (1 sow, 10 piglets, 11 weaners,  
3 fatteners). The farmer has probably  
purchased pigs from unknown trader in  
Zambrow town.





# Epizootic investigation



● Farmer-breeder from Zambrów responsible for spreading the ASF virus to at least 4 other holdings:

→ proven source (purchased pigs) (outbreaks 7-9) – tradesman from Zambrów

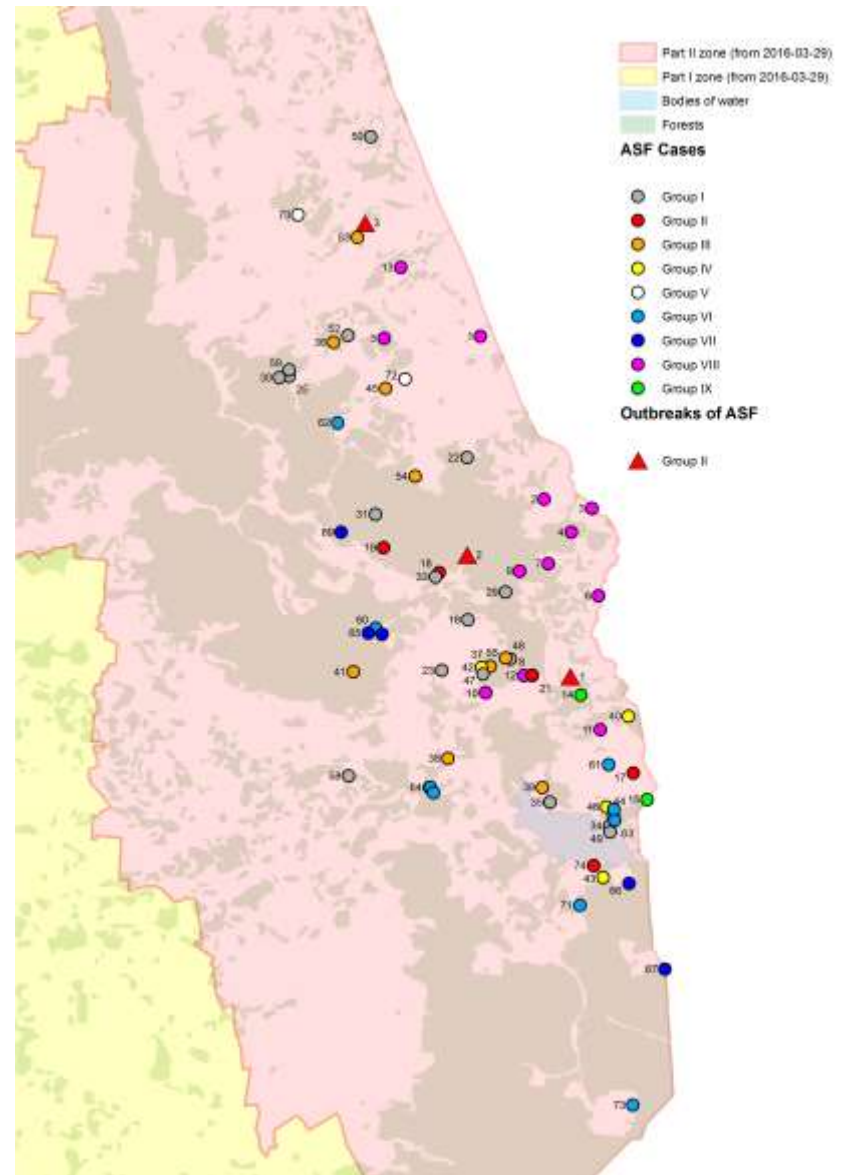
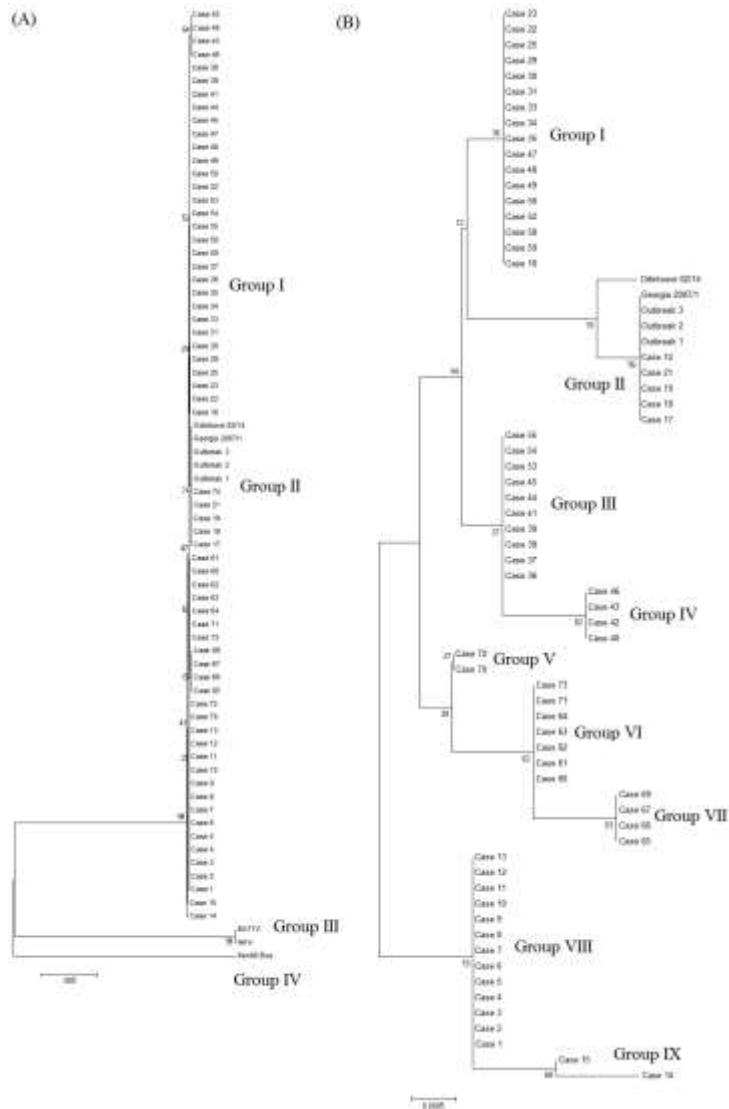
- - - → proven source (purchased pigs) (outbreaks 10-13) – hypothetical tradesman

✦ in case of outbreaks 10-13 a presumed influence of broker – who purchased pigs from a tradesman from Zambrów

✦ ASF seems now to be a man-made disease !



# Genetic analysis of ASFV isolates may aid in tracing of ASFV transmission (Frączyk, Woźniakowski et al. Vet Microbiol 2016)



# Conclusions

1. All outbreaks were probably caused by insufficient awareness of pig producers (insufficient biosecurity).
2. In fact all outbreaks were caused by a direct contact between healthy and infected pigs.
3. So far there was no case of ASF transmission by the vet supervising pig holding.

## Conclusions

4. All observed clinical signs of the disease were classical for ASF.
5. The most important is awareness of ASF among pig farmers and producers.



**ASF shows different faces,  
but... it seems the reason  
is the same...**

**Human activity**