

# Role of biosecurity in protecting farms against ASF

*Klaas Dietze and Klaus Depner*

*18 February 2019  
Belgrade*

## 1<sup>st</sup> step: collecting our thoughts

What do we think of, when we see the word

**BIOSECURITY?**



## Is Biosecurity important?

1  
(legislative act)

### REGULATIONS

REGULATION (EU) 2016/429 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL  
of 9 March 2016  
on transmissible animal diseases and amending and repealing certain acts in the area of animal health ('Animal Health Law')  
(Text with EEA relevance)

The word “VETERINARIAN” is mentioned **49 times**

The word “BIOSECURITY”:  
**70 times**

Let's take that as a proxy for “importance in disease prevention and control” 😊

## Biosecurity: EU Animal Health Law

‘Biosecurity’ means the

sum of **management** and **physical** measures

designed to reduce the risk of the introduction, development and spread of diseases to, from and within:

- (a) an animal population, or
- (b) an establishment, zone, compartment, means of transport or any other facilities, premises or location

## More on Biosecurity (EU AHL)

- Biosecurity is one of the **key prevention tools** (...) to prevent the introduction, development and spread of transmissible animal diseases to, from and within an animal population.
- The biosecurity measures adopted should be **sufficiently flexible**, suit the type of production and the species or categories of animals involved and take account of the **local circumstances** and technical developments.
- While biosecurity may require some upfront investment, the resulting reduction in animal disease **should be a positive incentive for operators.**

## More definitions

### *OIE, Terrestrial Animal Health Code - Glossary*

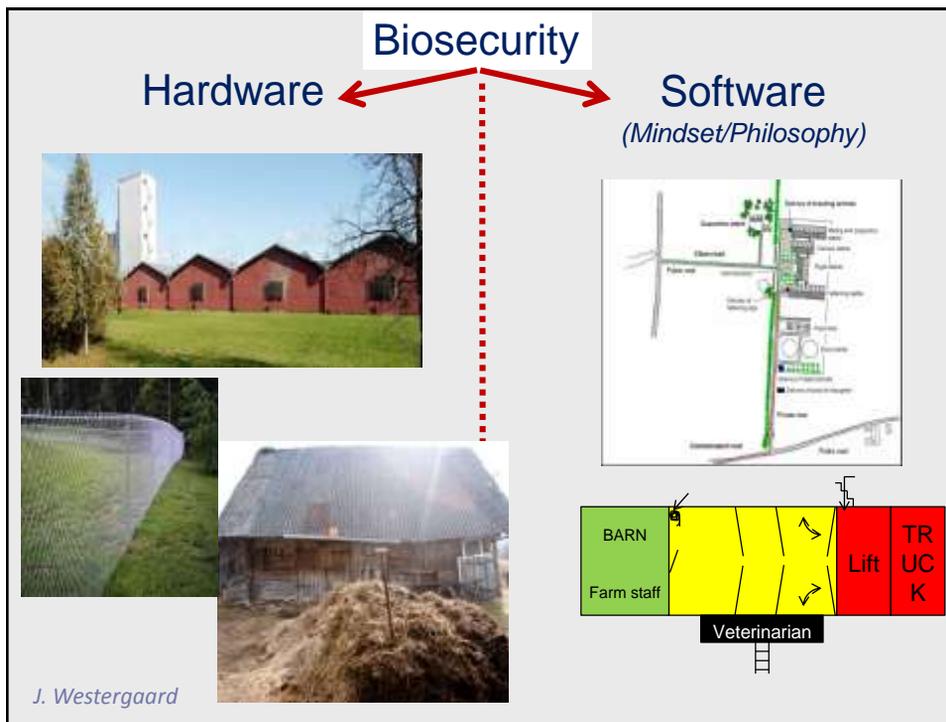
Biosecurity means a set of management and physical measures designed to reduce the risk of introduction, establishment and spread of animal diseases, infections or infestations to, from and within an animal population.

## More definitions

*“The implementation of measures that reduce the risk (1) of the introduction and (2) spread of disease agents;*

*it requires the adoption of a set of attitudes and behaviors by people to reduce risk in all activities involving domestic, captive/exotic and wild animals and their products”*

(FAO/OIE/World Bank, 2008 - Good Practices for Biosecurity in the Pig Sector)





## Production systems

There are a number of different animal production systems to take into account when biosecurity measures are reviewed. These include:

- Large size commercial farms where production is professionalized
- Family farms – backyard farms or hobby farms - having one or a few pigs and perhaps some other animals
- Organic farms with less intensive production systems and partly based on free range of animals

### Farmed pigs

- no swill feeding
- no outdoor keeping
- good veterinary service
- registered holdings
- movement control
- good bio-security
- controlled trade
- professional management

### Back yard pigs

- **swill feeding**
- outdoor keeping
- poor veterinary service
- inadequate registration
- home slaughtering
- inadequate movement control
- bad bio-security
- uncontrolled markets
- tradition, etc.

## Backyard farming: A biosecurity challenge

Backyard pig farming apart from tradition

- plays an integral role in recycling of food,
- plays an important role for meat supply in rural areas
- is a valuable cash income.



## What do we need to prevent ASF?



No contact with wild boar

No contact with pigs of other farms

No access to animals for visitors

No swill feeding

No roughage feed or bedding harvested in areas with infected wild boar

## Backyard farming

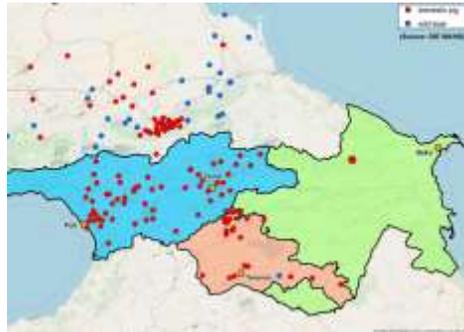


### Three basic biosecurity rules

1. No swill feeding
2. No contact between the pig(s) on the farm and susceptible animals
3. The owner/keeper change clothes on entering the stable and leaving the stable

## TRADITION

### Home slaughtering at Christmas



## Segregation



## This can be sufficient!



This can not be enough!



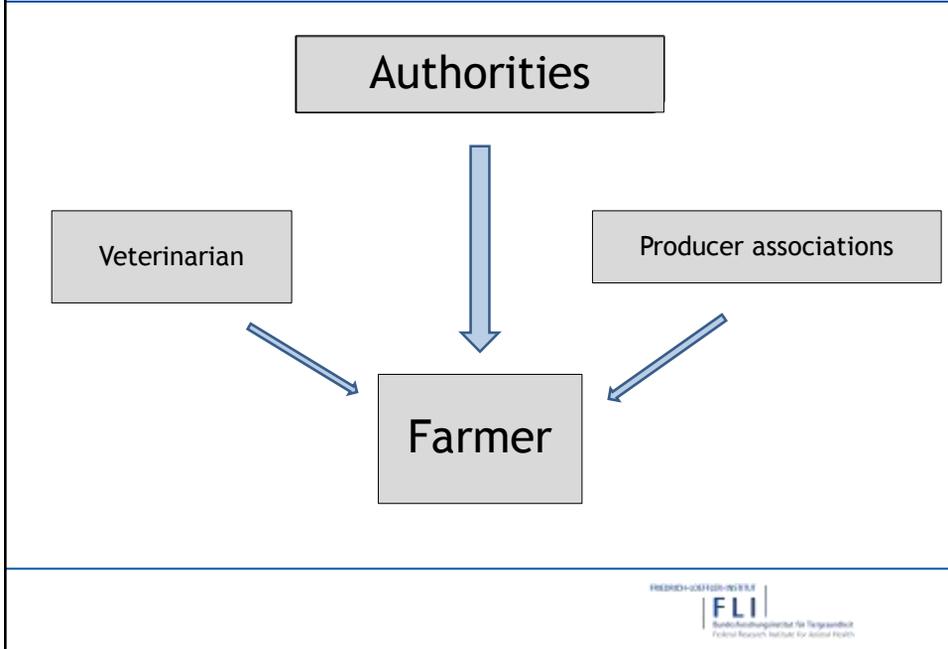
## Improving Biosecurity

What can we expect?

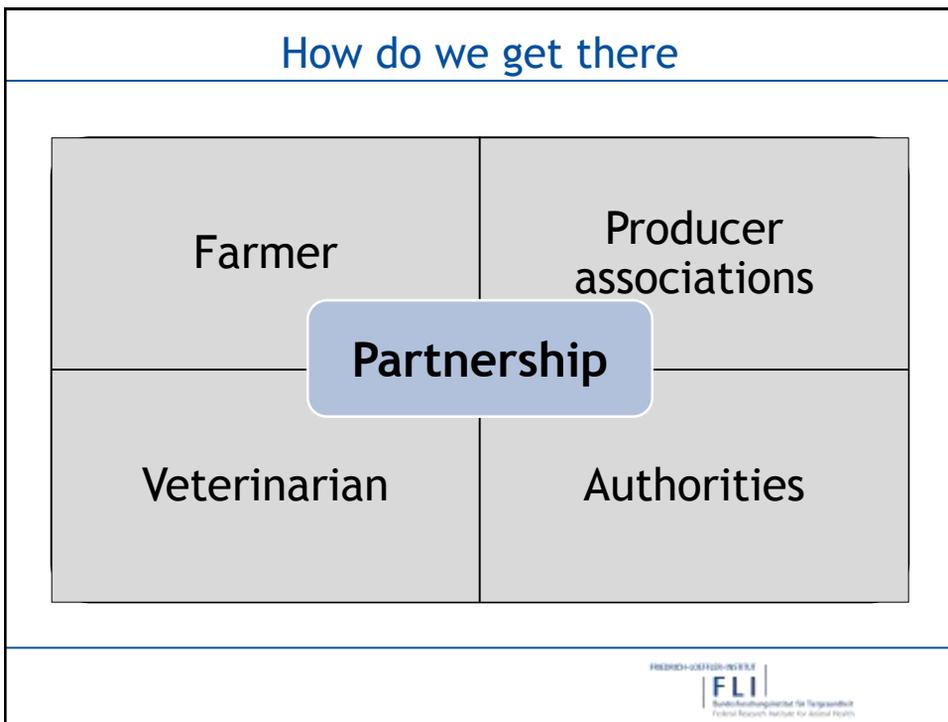
Are we realistic?



## How do we get there



## How do we get there

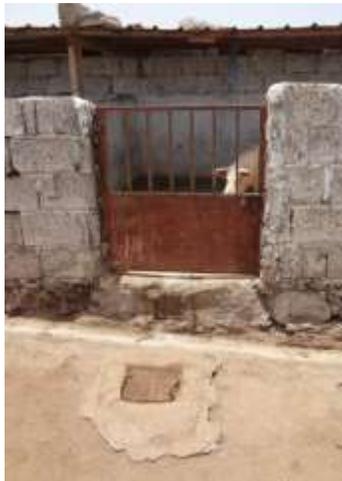


## More than anything

Biosecurity is a **"mindset" or "philosophy"** that must be developed by producers

- It requires the adoption of a **set of attitudes** and behaviors by people to reduce risk in all activities
- There is no **"one fits all"** solution - biosecurity should be adapted to present risks

## Put the producer in the center



Tell me, I will forget!

Show me, I may remember!

Involve me, I will understand!

Chinese proverb

## Biosecurity is Risk Management

Risk is never = 0

Perception of risk is “personalized”

- Do we always put the seatbelt on?
- Do we always respect the speed limit?
- Do we never touch the mobile while driving?
- Do we immediately change oil when reaching certain km?

## Biosecurity in a context

“Peace time” Biosecurity

- Routine work on farm
- No specific target

“Crisis-oriented” Biosecurity

- Goes beyond the normal routine
- Has a specific target
- Additional efforts - (ideally) with a time horizon

Both follow the same principles but have different main concerns and dimensions

## Biosecurity - Conclusions

- Good biosecurity is a vital part of keeping new diseases away from animals
- A good biosecurity is always essential- diseases may not always be apparent, especially in the early stages.
- A good biosecurity is based on a partnership involving livestock producers, veterinarians and official authorities.