

Animal and Plant Health (ALPHA)

Network on Animal Health and Welfare

Minutes of the 8th meeting

Held on 03-04 June 2015, Parma

(Agreed on 31 August 2015)

Participants

• **Network Representatives of Member States (including EFTA Countries):**

Country	Name (03 June)	Name (04 June)
Austria	Michael Duenser	Michael Duenser
Belgium	Ester Peeters	Kristine Ceulemans
Bulgaria	Teodora Sarakostova	Teodora Sarakostova
Croatia	Tomislav Mikus	Drazen Knezevic
Cyprus	Christodoulos Pipis	Christodoulos Pipis
Denmark	Peter Lind	Peter Lind
Estonia	Margus Proses	Helen Prommik
Finland	Taina Mikkonen	Sirpa Kiviruusu
France	Charlotte Dunoyer	Charlotte Dunoyer
Germany	Michael Marahrens	Franz Conraths
Hungary	Anna Zsofia Oszoli	Melinda Kocsis
Ireland	Niall O'Nuallain	Niall O'Nuallain
Italy	Leonardo James Vinco	Paolo Calistri
Latvia	Rudite Varna	Edvins Olsevskis
Luxembourg	Carlo Georges	Carlo Georges
Netherlands	Trix Rietveld-Piepers	Olaf Stenvers
Poland	Przemyslaw Cwynar	Przemyslaw Cwynar
Portugal	Maria Jorge Correia	Maria Jorge Correia
Slovakia	Anna Ondrejкова	Anna Ondrejкова
Spain	Ana Catalan Alcala	Luis Romero Gonzales
Sweden	Lotta Nordensten	Cecilia Hulten
United Kingdom	Rebeca Garcia	Helen Roberts
Norway	Angelika Agdestein	Angelika Agdestein
Switzerland	Liv Sigg	Lukas Perler

• **Hearing Experts**

None

• **European Commission:**

None

- **EFSA:**

AHAW Unit: Franck Berthe, Alessandro Broglia, Denise Candiani, Marianne Carson, Sofie Dhollander, Chiara Fabris, Andrea Gervelmeyer (chair), Andrey Gogin, Per Have, Eliana Lima, Renata Leuschner, Francesca Porta, Frank Verdonck, Matthew Watts

- **Others**

None

1. Welcome and apologies for absence

The Chair welcomed the participants.

Apologies were received from Iceland, Czech Republic, Greece, Lithuania, Malta, Romania and Slovenia.

2. Adoption of agenda

The agenda was adopted without changes.

3. Agreement of the minutes of the 7th meeting of the Network on Animal Health and Welfare held on 12-13 November 2014, Parma

The minutes were agreed by written procedure on 01 December 2014 and published on the EFSA website 01 December 2014.

4. Topics for discussion

4.1 Outdoor access for farm animals: Biological needs, outdoors access provided by different production systems

Lotta Nordensten presented that in Sweden outdoor access is mandatory for all cattle as well as grazing for dairy cattle for a minimum period of 2-4 months per year, depending on where in Sweden the farm is located (climate depending). Currently, there is a debate to have this period shortened or even completely removed because of economical reasons (despite the lack of proof that grazing would reduce profit). Other livestock species' needs (e.g. pigs, poultry) are less regulated in Sweden and these species rarely have outdoor access unless being kept in organic farms. Council Directive 98/58/EC of 20 July 1998 concerning the protection of animals kept for farming purposes states in Art. 4 that "Member States shall ensure that the conditions under which animals...are bred and kept, having regard to their species and to their degree of development, adaption and domestication, and to their physiological and ethological needs in accordance with established experience and scientific knowledge, comply with the provisions set out in the Annex." The annex states that "No animal shall be kept for farming purposes unless it can reasonably be expected, on the basis of its genotype or phenotype, that it can be kept without detrimental effect on its health or welfare". She pointed out that in current farming systems several factors, such as management, the concentration of livestock keeping in fewer and bigger farms, a lack of outdoor space and biosecurity needs, often impede outdoor access. Some species, such as fur animals, are kept outside, yet without real outdoor access.

Finland requires that dairy cows have outdoor access for at least 60 days in summer time. No provisions exist for other species.

In Germany, laying hens kept in free range systems should have at least 10 m² per animal in order to qualify for the free-range label. However the animals often use only 2-3 m² each, depending on the configuration of the outdoor area, particularly depending on the provision of shadowed areas and protections from predators. Studies have been carried out on the welfare of laying hens in outdoor systems that investigate feather pecking and other behavioural indicators. For pigs, some husbandry systems with outdoor access exist. However, outdoor access poses biosecurity problems, hence in the case of infectious disease outbreaks, e.g. avian influenza or African swine fever, outdoor access is prohibited. In Germany, less than 35% of bovines have outdoor access during the day, these are mainly dairy cattle.

In The Netherlands laying hens are increasingly kept in outdoor systems, in which more space is provided than in Germany. The outdoor areas also provide bushes for hiding. The laying hens are often kept together with dairy cows. Over night the hens are kept inside, where most eggs are laid, and then move outside in the morning. The hens form small groups in the outdoor space. No feather pecking problems have been observed. 70 % of the Dutch dairy and beef cattle (including calves) are kept outside. Many quality schemes are giving incentives to farmers for keeping animals outdoor.

In The Netherlands laying hens are increasingly (16%) kept in outdoor systems. No research has been carried out, but some observations are: outdoor areas sometimes provide bushes for hiding and laying hens are sometimes kept together with dairy cows. Over night, the hens are kept inside, where most eggs are laid, and then moved outside in the morning. The hens form small groups in the outdoor space. 70 % of the Dutch dairy population are kept outside for at least 8 hours per day. Many quality schemes are providing incentives to farmers for keeping animals outdoor.

In Norway dairy cows are kept for 6 weeks outdoors in the summer time. Information on other animal species was not available.

France highlighted that outdoor access of swine and poultry is considered an asset by the consumer, in terms of perceived quality products from outdoor systems and willingness to pay higher price for these.

In Ireland dairy cows are kept outdoors as long as possible. Zero-grazing farms do not exist for beef and dairy cattle. Pigs are kept indoors.

In Austria cattle, sheep and goats are kept outdoors from June to September, when the animals go to the mountain pastures for the production of cheese and milk. There are biosecurity issues to take into account, as animals from different farms mix on the mountain pastures. The animals are tested on their return from the pastures to detect possible infections that have occurred during the summer time. Problems with tuberculosis have been experienced. Through contacts between red deer infected with *Mycobacterium bovis* subsp. *caprae* and cattle during summer pasture the disease has spread to cattle. This is aggravated by the large red deer population. Efforts to reduce the infection risk for cattle through tuberculinisation of cattle and reduction of the red deer population through hunting are under way.

The UK noted that when looking into this it is area the focus should not only be on legal requirements but also consider private assurance schemes which generally have welfare space/outdoor requirements above those prescribed by the law.

Similarly to Austria, in Spain animals are brought to the mountain pastures in summer time. In addition, a specific traditional practice is the transhumance of cattle and sheep between regions of Spain.

In Croatia a high number of dairy sheep, especially in the islands, are shepherded, usually for the production of traditional premium products. Several controls are put in place in order to check the health of these animals. Pigs are also involved in traditional shepherding.

The shepherding practice exists for sheep and goats also in Cyprus.

In Bulgaria shepherding is practiced in small villages where one shepherd takes care of the sheep from different households which normally have 1-2 animals each.

In Germany shepherding exists for the production of specific food products. There is also the practice of mobile stables of laying hens moving through the pasture. Shepherding of sheep is carried out in some areas mainly for touristic reasons, in mountains areas dairy sheep are kept for commercial purposes; however an increase of losses due to attacks by wolves has been observed.

Shepherding is very frequent in France in summer on mountain pastures, where animals of different owners are herded together. The system is very well organised and has an important economic value; however problems of disease spread between animals of different herds and wildlife exist (e.g. brucella in ibex). ANSES has started to work on a mandate on brucellosis in ibex and cattle.

4.2 Animal transport: Data assessments and analysis for risk assessment in different MS

Germany gave a presentation on the data that are currently collected during animal transport and their potential use in risk assessment. The two principal data sources are: a) data from the journey logs (recorded before and during the journey; b) data from the navigation system recorded during the transport. The legal bases for the recording of these data are Art. 2, 6, 15, 16, and Annex 1 of Reg. (1/2005). Poultry transport is not covered by these requirements. Germany highlighted that the journal logs could be used as a tool for managing and planning the transports. The recent EU project on control posts for the development of transport certification systems and renovation of control posts was presented. At a recent round table in Copenhagen the harmonisation of the data collected during the journey was discussed. The aim is an agreement on the data format, the time interval for storing and transmitting the data and the data flow between different systems. It is foreseen that data will be provided in XML format and shared in Google maps. Currently, there is no real time data transmission. Data should be reported within 30 days after the end of journey to the Competent Authorities (CA) electronically. However, for on-spot checks by the CA, data should be available within 30 minutes. The reachability of the control posts should be taken into account, and they should be able to have the capacity for hosting the animals that are planned to be passing through the post. The project did not cover any further requirements, which will be the matter for a new EU research project.

The different activities in the MS for dealing with this issue were discussed. In Denmark the authority should receive the first part of the journal log electronically, however, for biosecurity issues each cargo with live animals should be checked by the CA on the spot, and the data should be immediately available.

In The Netherlands the CA have analysed the electronic transport data in a risk-based way, focussing on transport with a duration of more than 24 h. Up to 45% of transports have been found to be not compliant with transport requirements; their journey logs have been checked further for completeness. Sometimes data is not transmitted due to a lack of cooperation from transporters. The lack of a common data interface and a need for harmonised data transfer and analysis has been noted. A recent project on risk assessment on the whole chain covering farm, transport, and slaughter identified a lack of information on animal based measures (ABM) of welfare.

In Spain data is recorded by the operators in different data formats, sometimes even manually. The presence of several separate systems makes it difficult for the local animal health units to collect the information systematically.

Portugal noted that the temperature recording during transport is still a problem, as not all have temperature sensors linked to their GPS system. Furthermore the issue of data provision to CA still needs to be addressed. In principle, data should be accessible by the CA at any stage of transport, which is currently hampered by a lack of harmonisation of the recording and reporting systems; in addition, language problems further aggravate the difficulties of transport checks.

Sweden has carried out a project assessing how transport can be organised by effective road planning to avoid that animals spend a night at lairage before slaughter (see Wennergren_final_report_transport_SE,

<https://dms.efsa.europa.eu/otcs/cs.exe/properties/14295359>.

Germany reported that some animal welfare assessment schemes require the use of ABM, therefore, videos and electronic devices for recording and collecting them are necessary. Farmers are paid differently if animals are checked using ABM.

The UK noted that risk based inspections require checking data and collecting animal based measures, which requires a multi-agency collaboration network. The FVO 1099/2009 audits looked at this and it would be helpful to learn further about best practice in this area.

With regard to the clear need of harmonisation of data collection and reporting, it could be useful to use a risk-based enforcement of the legislation and to develop a tool for risk-based planning, organisation and management of transports. This information should be collated centrally at EU level. Ideally, the data should be included in the TRACES system.

Luxemburg pointed out that there are no tools for supervising the journeys after animals have passed the borders of the country in which the journey started. The evaluation of compliance with legal requirements is very difficult without input from the arrival site. Also this aspects needs to be covered by a harmonised EU system.

Italy has, in collaboration with FVO, developed guidelines for the control of poultry transports. It comprises the legal basis for the checks and specific requirements, focussing mainly on short journeys inside a country. The finalised document should be published soon.

Poland gave a presentation regarding animal transport data assessments and analysis for risk assessment. In Poland road controllers assess the welfare of animals during transport, if they have been trained for this and hold a specific certification of competence for this kind of controls. They work in teams with other officers. The question if different species have different needs during transport was raised as this would probably require different risk assessments to be performed. Further the issue of how to estimate the welfare risk of a group of animals based on an individual animal sample was highlighted.

4.3 Animal killing: welfare impact of the different killing or culling (“stamping out”) methods used for disease control (at individual and farm level) in the EU

Germany presented the topic. The relevant legislative requirements are listed in Reg. (EC) 1099/2009; the list of methods that can be used for killing animals for disease controls in Annex 1 of the Regulation is based on a scientific opinion of EFSA of 2004, in which the advantages and disadvantages of the methods are also described. Germany highlighted that no EU guidance for risk assessment of animal welfare during killing for disease control exists. In 2003 an outbreak of Highly Pathogenic Avian Influenza (HPAI) in the NL and the consequent killing of thousands of animals raised several questions, e.g. the fact that 50% of workers were found to have seroconverted. Further, the contribution of the disease control

methods to further spreading of the pathogen has been calculated as 5% of the outbreaks. It was stated that a practical guidance on how to carry out the killing, but also for assessing the welfare of the animals during these procedures, is needed. Another suggestion made regarded the creation of a Network of the National contact points (NCP) as defined by Article 20 of Regulation (EC) 1099/2009. In this context, it was highlighted by Croatia that a National Contact Point (NCP) meeting for Article 20 of Regulation 1099/2009 would take place in Zagreb on 15 July 2015.

Luxemburg asked which kind of methods might be recommend for killing purposes, considering the species and production systems.

Fire fighting foam, an expansive foam agent, whose bubbles contain air, is used in depopulation procedures in the United States. It blocks the airways inside the animal leading to death by anoxia. Highly expansive foam with air bubbles of up to 1 cm of diameter filled with 98% of nitrogen has been researched in Germany, in a project for euthanising piglets on-farm, in the Netherlands this foam has been examined for poultry. It has been used for depopulation purposes in Singapore and Taiwan. The UK Government funded several projects on killing/culling looking at different methods such as containerised gassing units, captive bolt in sheep and a project on gas filled foam carried out by Mohan Raj at the University of Bristol. This project concluded that this is a humane method, unlike the fire fighting foam which causes asphyxiation. A joint follow up project between UK and NL validated the use of high expansion foam filled with inert gases for culling of poultry in practice. The Farm Animal Welfare Committee in the UK has also produced opinions on red and white meat covering emergency killing and another on contingency planning for farm animal welfare in disasters and emergencies.

It was highlighted that, in addition to contingency plans, risk assessments should be carried out regarding the methods that could best be used for different scenarios and species. Best practices should be developed and exchanged between MS.

Belgium pointed out that in an internal discussion held 2 years ago, it was clearly agreed that in killing for disease control purposes stopping the disease spread is the most important objective, and that animal welfare is guaranteed by the government. Companies have been requested to report how the depopulations are carried out. The analyses showed that some factors, such as time between loading animals layer by layer in bags is sufficient, yet no control of success is carried out. The animal welfare effects of the depopulation measures have not been assessed.

Italy expressed the view that the current EU legislation (Reg. (EC) 1099/2009) does not specify the gas methods and, consequently, also low pressure gas stunning methods can be considered to be covered by the Regulation. With this interpretation of the law, no further approval would be necessary for low pressure gas stunning methods.

Croatia agreed on the need of having guidelines for the killing of animals for disease control, and for emergency killing, including an assessment of the methods.

UK suggested to refer to “killing methods to be used on farm”, covering methods for any situation, including, e.g., natural disasters, and pointed out that Regulation (EC) 1099/2009 lacks methods for this purpose.

Several countries agreed that a critical review of depopulation methods regarding both animal welfare risks and disease spread risks is needed. Germany announced that it organises a workshop on this topic in September 2015.

4.4 Animal based measures for turkeys: review of the current state of scientific knowledge, current turkey welfare assessment protocols, current data collection

In addition to directive (EC) 98/58, which regulates the welfare of poultry, Norway has also a national legislation on poultry animal welfare. Currently a risk assessment on turkey welfare is on-going in Norway, the scientific opinion of the Norwegian Animal Health and Welfare Panel is to be published by November 2015. The terms of reference also foresee the identification and assessment of ABM suitable for assessing the welfare of individuals and of flocks, at farm and at slaughterhouses. Specifically, it should be assessed which ABM may be suitable for a systematic data collection. The risk assessment will take the AWIN project into account. Norway inquired about similar tasks in other MS.

Italy mentioned an ongoing 3 year-project on foot pad lesion scoring in turkeys and management factors to reduce them. The project is in its second year, preliminary results indicate an association with feed and electrolyte balance.

France has carried out a study at slaughterhouse level to see if it is feasible to monitor turkey welfare by collecting ABM at the slaughterhouse. The project findings will be published at the beginning of 2016.

Germany presented a new German initiative on ABM for turkeys. While there is no specific national legislation, a voluntary agreement between risk managers, risk assessors, producers, quality assurance companies and non-governmental organisations (NGO) has been reached, under which certain requirements have to be met, including turkey health and welfare. The programme, which is funded by the association of turkey producers, has been established in 2015, therefore no data is available at the moment. The results of the program will be probably published in scientific papers. It includes video scan systems at slaughterhouses for assessing foot-pad dermatitis, using a scoring system based on Hocking et al., 2008. It was pointed out that producers need to have guidelines and a common framework for turkey welfare.

4.5 Welfare of dogs and cats involved in commercial practices

Spain gave a presentation on the situation of dogs and cats involved in commercial practices in Spain. Currently an action plan for this sector is being prepared, therefore suggestions of relevant scientific references and other documents, as well as experience in other MS in this area and risk assessments done would be welcome.

In Switzerland professional pet breeders need to undergo an education program. This education programme for professional breeders can be shared with the AHAW Network.

In Sweden dogs and cats cannot be sold in pet stores. For having more than 6 dogs or cats in a private accommodation, the owner needs a permit from the CA, which enables the CA to keep track of the concentration of animals. The earliest age at which cats can be sold in Sweden is 12 weeks, for dogs it is 9 weeks. A lack of scientific references for identifying the optimal weaning or selling age was mentioned. It is required to euthanize companion animals at the border if they are illegally imported or found to be not compliant with vaccination and health certification rules. Further, it was highlighted that rescuing stray dogs outside Sweden and importing them to be sold to welfare-oriented citizens has turned into a profitable business in recent years and into a big problem for the competent authorities.

In Belgium a longitudinal study (3 years), comparing the socialisation, behaviour and health of dogs from small and large breeders and breeders abroad, is ongoing.

In Finland a permit is needed for selling dogs and other pets and for breeding with more than 6 females. Dogs before 8 weeks of age cannot be sold.

In the UK dog breeding received some attention in recent years and many activities have been carried out in this area. A Dog Advisory Council under the leadership of Prof. Sheila Crispin was established, following recommendations of an Independent Inquiry into Dog Breeding by Prof. Patrick Bateson. Model conditions for breeding have been developed under the Breeding of Dogs Act legislation and the pet sales guidance has been updated. Private schemes are also in place, such as the Kennel Club assured breeder scheme. Work to make microchipping compulsory in GB as of April 2016 is ongoing.

In the Netherlands one of main pet dog issues is aggressive behaviour; such dogs are taken into custody. To address this issue, a study on the impact of cage enrichment on aggressiveness and stress has been prepared (the report is available on EFSA's DMS at <https://dms.efsa.europa.eu/otcs/cs.exe/properties/14295359>). Also in the Netherlands increasing numbers of stray dogs imported from abroad are sold.

Croatia is one of the Balkan countries from which organisations collect stray dogs to sell them in other countries. This transport of stray dogs to other areas has the potential for causing severe public health problems. Hence, a joint project with the Istituto Sperimentale Zooprofilattico of Teramo on the movement of pet animals and its impact on public health and welfare is being carried out. A national regulation for breeding and transport of pet animals exists.

It was mentioned that the Federation of Veterinarians in Europe (FVE) has organised a congress about stray dogs in Romania and may have data on numbers of stray dogs by country. In addition, there is a twinning project with Balkan Countries on stray animals, which might be a source of data and information on the issue.

Ireland observes an increase of people moving to puppy farming, which might be motivated by the fact that this is still an area not regulated too strictly. A dog breeding establishment bill exists, but is currently not much enforced.

In France, a national regulation for commercial pet activities exists. Guides of good practice for the different sectors are needed, therefore guidelines for the guide preparation have been prepared by ANSES.

4.6 Light access / access to daylight for farm animals: What are the needs / importance of light and daylight for a positive impact of the welfare of the different species of farm animals, and how is this satisfied in current production systems

Sweden gave a presentation on the question of light needs of farm animals. Factors affecting this need include, among others, the species, the duration of being indoors, e.g. always, partially, and the wavelength of the light used. The legislative framework foresees a minimum of 40 lux on-farm, which should be guaranteed for each animal, also for those animals staying at the centre of the house or flock.

It was noted by the Netherlands that quality schemes value natural light higher than artificial light for any species. A study on the use of a milking robot for dairy cows has been carried out, in which red light was evaluated. The report is available at <https://dms.efsa.europa.eu/otcs/cs.exe/properties/14295359>.

The UK emphasised that an intrinsic value of light exists, hence, the recently adopted OIE chapters on animal welfare requirements of dairy cows and broilers include light conditions as important requirements to comply with. Scientific references for negative impacts of limited light access can be found in these chapters, however they are not very recent. Dark or blue light is recommended for broilers. Absence of light has been shown to cause problems in animal development.

Germany mentioned practical problems with measuring light, e.g. identifying the correct direction the lux meter must be pointed in, the usefulness of meters which are focussed on the spectrum visible for humans, considering that different species vary in their sensitivity for different wavelengths.

Finland reported that a national regulation for pig production requires access to natural light in all housing compartments. Further, light is measured with the meter pointed upwards. It was highlighted that it is not possible to implement a minimum of 20 lux in broiler farms, as farmers tend to decrease the light in order to reduce cannibalism. The use of red light makes bloody spots less visible and is therefore a better option in situations where cannibalism is a problem. Italy added that in other countries the association between light intensity and cannibalism has been observed in laying hens. Potential explanations might be the stocking density, the age, the breeds used, or the type of the lighting systems. Germany stated that the same problem has been experienced in turkey flocks, where it is considered to be a multifactorial issue, involving a genetic influence.

4.7 Welfare of farmed fish related to density, water quality, accumulation on sediments and ice

Norway presented a recent mandate that has been issued by the Norwegian government to assess welfare of the typical commercial Norwegian fish species. Important gaps of data on fish welfare have been identified, hence, advice on relevant scientific documents and risk assessments was sought from the Network.

In the Netherlands research has been carried out on fish species like common carp, tilapia, zebra fish. The focus was mainly on behaviour, with regard to developing a model for acute and chronic discomfort. Pain in fish was studied in a few species and a fish welfare model in zebra fish has been developed. The list of publications can be made available to the AHAW Network.

In Sweden studies on the welfare of farmed fish at slaughter revealed that CO₂ is not ideal to stun fish. The study (H. Setha et al., 2013. Physiological responses and welfare implications of rapid hypothermia and immobilisation with high levels of CO₂ at two temperatures in Arctic

char (*Salvelinus alpinus*), Aquaculture, Vol 402–403, pp 146–151) is available at <http://www.sciencedirect.com/science/article/pii/S0044848613001695>.

The UK pointed out that the Farm Animal Welfare Council (FAWC) has produced an assessment of fish welfare on-farm and at slaughter. An equivalent of Annex 1 of Reg. (EC) 1099/2009 has been prepared for fish.

France is expecting to receive a mandate from the Ministry of Agriculture on the slaughter of fish. An assessment of the welfare of farmed fish has not yet been carried out.

4.8 Welfare in small scale farming of dairy cows

EFSA (Denise Candiani) presented the Scientific Opinion on the welfare in small scale farming of dairy cows that has been adopted by the AHAW Panel in May 2015.

Austria reported that the national number of dairy cows has remained more or less stable in the last decades, with a decrease of the number of small farms. Denmark, Sweden and France confirmed this trend for their countries.

It was discussed that the end of the milk quota could lead to increasing herd sizes without changing management style. An example for this development is a project in the North of France where a farm with 1000 cows is being established.

4.9 Avian influenza H5 and H7: exchange on the risk of avian influenza outbreaks of subtypes H5 and H7, on LPAI H7, including the potential role of wild birds

Germany presented the current situation regarding avian influenza. Five wild birds with H5N8 have been detected in Germany. This is considered to be the ‘tip of the iceberg’ since the virus behaves in wild birds similar to LPAI viruses without causing major clinical disease or deaths; hence, only active surveillance would identify positive wild birds. Also in ducks, clinical symptoms after H5N8 infection have been shown to be low to moderate. Six H5N8 outbreaks occurred in Germany, three in indoor poultry farms, and three in outdoor facilities, i.e. one in a zoo and two in backyard farms. Anecdotal evidence exists of wild birds having been spotted near one of the affected farms in Germany just before the outbreak. A German risk assessment based on scoring of risks and uncertainties by experts indicated a high risk of direct or indirect contact to wild birds as having caused the outbreaks. Direct contacts probably played a role for the outbreak in the zoo and the backyard holdings, indirect contacts, such as vehicles and boots, probably played a role for the outbreak in the commercial operations. However, a high degree of uncertainty remains regarding the introduction of the virus into the holdings. Gaps in the biosecurity systems of the German indoor poultry farms affected by the outbreaks are likely. Germany reported that a review of biosecurity documents at farms identified discrepancies between plans and practice.

It is considered probable that small amounts of virus have been introduced into the farms, followed by a limited transmission within the farms. Also in other EU countries hardly any secondary H5N8 outbreaks in Europe occurred following the initial introduction. Five outbreaks of H5N8 occurred in the Netherlands, two of them were related. In the Netherlands, three wild birds were found to be positive for H5N8 (all migrating wigeons). There also seems to be a sequence link with strains circulating in Asia.

The monitoring of wild birds has been decreased over the last years in the EU. Five sentinel duck farms were monitored in Germany during the H5N1 outbreaks, currently only one sentinel flock exists at the Friedrich Loeffler Institut (FLI) (and is negative for H5N8). The question if other MS still do sentinel surveillance was raised. The UK carries out targeted wild bird screening in congregation places with a high presence of wild water birds, with a focus on dead bird sampling.

Epidemiological investigations comparing infected and non-infected farms would be very useful to identify risk factors and sources of virus introduction. However, at least in Germany, there are no legal options to visit non-infected farms during an outbreak. Only very limited epidemiological information is available on the current outbreaks in the USA.

EFSA (Franck Verdonck) presented the recent mandate on avian influenza and inquired about ongoing or planned activities of MS in this area. Germany will update its risk assessment based on the situation in the USA, the UK just updated its risk assessment (<https://www.gov.uk/government/publications/qualitative-risk-assessment-highly-pathogenic-avian-influenza-from-the-usa>), Belgium is working on a scientific advice that will be available by the end 2015. Sweden's National Veterinary Institute does rapid qualitative risk assessments in response to outbreaks of HPAI and other diseases in Europe.

4.10 Harmonisation of epidemiological outbreak investigations: comparison of the procedures and protocols in MS for epidemiological investigations in the case of animal disease outbreaks

Germany reflected on the different ways for disease investigations in different countries and stressed the need for harmonisation of disease investigation procedures, especially for transboundary diseases. It was inquired which different procedures are implemented in case of disease outbreaks and how they could be standardised. The potential need for a European working group, guided by EFSA, to establish harmonised guidelines for outbreak investigations, was raised. Such European guidelines would also be useful in view of business continuity, e.g. in case of staff changes.

In Italy a standard questionnaire has been prepared for a spectrum of diseases in case of disease outbreaks. It was suggested that guidelines should not be too prescriptive, but not too general either. In this context it was highlighted that different countries have different priorities regarding diseases.

In France a platform exists to exchange surveillance information for investigating different disease patterns (e.g. Schmallenberg). It was suggested by The Netherlands and Luxemburg that lessons should be drawn from the harmonised data collection during the Schmallenberg epidemic. In a similar way, the EFSA data collection framework could also be used for harmonised collection of data from outbreak investigations.

Before starting data collection, comparability of data collected has to be assured. The data has to be generated in a similar manner in different countries. It was suggested to start with a selection of notifiable diseases. All resources and tools already available at MS level should be considered, the grass-root level experience is needed to develop something realistic that can be used in the field.

In addition, before developing new databases it should be explored if existing databases, e.g. the Animal Disease Notification system (ADNS) can be modified to accommodate also details from epidemiological outbreak investigations.

Sweden has developed a tool for network analysis in outbreak investigations, which is available in an R-code (Nöremark M & Widgren S, 2014. EpiContactTrace: an R-package for contact tracing during livestock disease outbreaks and for risk-based surveillance. BMC Vet Res 10: 71; <http://www.biomedcentral.com/1746-6148/10/71>).

4.11 African swine fever in the EU

A short update on the ASF situation in **Latvia** was presented since the first cases in wild boar were detected in June 2014. Most of the backyard farms are in the east of Latvia, whereas the higher density of domestic pigs is in the west of Latvia. The surveillance in place is based on passive surveillance in domestic pigs. In 2015 checks on the biosecurity

levels on farm are carried out twice per year. For wild boar, also passive surveillance is carried out in the whole territory, but sampling of wild boar is done mainly in the affected areas. The seroprevalence in hunted animals has increased from 0.3 to 0.8 %.

The situation of ASF in **Poland** was presented since the first introduction in 2014. Up to June 2015 only 3 outbreaks in domestic pigs were confirmed in backyard farms, which were stamped out. The rest were ASF cases in wild boar, all in the area near the border. One of the most important prevention of introduction was the check of hand luggage (> 3 tons of confiscated material), and training for private practitioners and the general public (e.g. tourists). The buffer zone that was established in 2014 included the entire infected area of 2014, showing that the preparedness in Poland was high. However, the problem continues, due to the spread of the disease in wild boar. According to Directive 2002/60, free range-holding of pigs is forbidden, and thus contact between domestic pigs and wild boar should not occur.

The ASF situation in **Estonia** was presented since the first case in Sep 2014, when a dead wild boar was found near the Latvian border. Up to now, only 7 cases in wild boar were reported and no outbreaks in domestic pigs. The carcass disposal is carried out by burying at the finding place or removal in containers. Feed import bans are implemented and personal luggage is checked at the borders. It is forbidden to keep domestic pigs outdoors and to carry out battue hunting.

In the following discussion it was mentioned that one of the major reasons for poaching and smuggling meat and meat products from EU neighbouring affected areas is the higher price that can be achieved in the EU countries neighbouring Belarus.

Germany presented the Classical Swine fever (CSF)/ASF database housed by the EURL for CSF. The application for ASF time series analyses and automatic alerts is still under development. MS were invited to test the tool and provide feedback.

Italy presented an update on the ASF situation in Sardinia. Most cases are reported in the Northern area of the island, whereas in the South more sporadic cases are observed. In recent years, a re-occurrence of the disease has been observed, which could be due to the strengthening of surveillance efforts. The major risk factors in Sardinia are the free ranging pigs and the interaction with the wild boars.

EFSA (Sofie Dhollander) presented the terms of reference, the methodology and the data used of the on-going EFSA mandate on African swine fever. The opinion will be presented for adoption at the May plenary meeting of the EFSA AHAW Panel.

4.12 Bluetongue (BT) in the EU

Italy presented the situation of bluetongue in the EU. The BTV4 epidemic started in the Eastern part of continental Greece, and spread very quickly in the Balkan countries. Some countries have started to vaccinate against BTV (e.g. Croatia). Currently there are no EU programmes of surveillance or interventions (e.g. vaccination campaigns). In Italy, already in 2013 outbreaks of BTV1 were reported. Different control strategies were applied in the different regions. In the past, the BT outbreaks were mainly linked to the presence of *C. imicola*, but now outbreaks also occurred in areas where *C. obsoletus* is the main vector. Previously, BTV 4 outbreaks were limited to the South of Italy. It was highlighted that BTV changes its features and behaviour, yet always follows one fixed rule: outbreaks start at the place where the epidemic ended the previous year if no vaccination is carried out. It also has been shown that uncoordinated local activities are not successful; at least regional strategies are needed to control the disease. In Bulgaria a vaccination campaign that was approved by the EC is implemented. An update of the situation in Croatia was provided since the first outbreak in Oct. 2014. Vaccination started since February 2015 with Bluevac4. In the UK a risk assessment was carried out to evaluate the risk for the UK, resulting in 4 different risk

scenarios (<https://www.gov.uk/government/publications/qualitative-risk-assessment-risk-of-entry-of-bluetongue-virus-btv-4-to-the-uk>).

In the following discussion it was stated that a more flexible strategy to enable quick responses to vaccination needs would be needed. It was also suggested that vaccination should be made compulsory in affected Mediterranean areas, as voluntary vaccination has been shown to be insufficient to reach the vaccination coverage of 80% needed to control disease spread and impact. It was pointed out that the vaccine is rather expensive and that reimbursements are often paid only 1 year later. The responsibility of the affected Southern countries to prevent the spread of BTV to the rest of the EU was acknowledged, but the need for financial support from Northern countries was highlighted.

4.13 Bovine Tuberculosis

Sweden and Norway gave presentations on bovine Tuberculosis (bTB) in camelids. Camelids can be imported from non-bTB-free MS. These animals show only clinical signs in very advanced stages of disease. The low sensitivity of skin test in camelids poses a risk of introduction of bTB to free countries (e.g. Norway and Sweden). Sweden requests serological testing (using one of three commercially available antibody tests) for EU-trade and import. The country started a TB surveillance programme for camelids in 2015. Culling might be a consequence in specific situations. An increased import of camelids has been reported also from other countries, e.g. Austria and Switzerland. Registers for camelids exist in some countries, like Switzerland and Norway, but not in others, like Sweden and UK.

4.14 EFSA's projects on *Echinococcus multilocularis* and collaboration with MS in this context

EFSA (Frank Verdonck) presented the mandate for a scientific opinion on *Echinococcus multilocularis* infection in animals and the annual assessment of MS's surveillance of *Echinococcus multilocularis* to demonstrate absence of infection. He stated that questions on this subject would be sent to the AHAW network after the meeting.

4.15 EFSA's bee projects and collaboration with MS in this context

EFSA (Frank Verdonck) presented EFSA's various projects on bees and highlighted the need for data from MS. Specifically data on trade in live bees and number of apiaries at NUTS2 level are required.

4.16 Uncontrolled / illegal movements of animals: Follow up of the AHAW Network meeting Nov 2014

EFSA (Alessandro Broglia) presented a proposal for collecting and storing information about uncontrolled movements of animal and products of animal origin in a repository on EFSA's Data Management System (DMS). The objective of the repository is to collect information on who collects data on these movements, how many checks are carried out, what is brought into countries.

The Netherlands asked about the level of accessibility of the information stored in the DMS folder and about the possibility to share information under confidentiality only with EFSA.

The UK pointed out that it would be more appropriate not to use the term "illegal movements" since legal aspects are not the focus of the repository, but rather the lack of traceability. Hence, it was proposed to use the term "uncontrolled movements".

The proposal was welcomed by the Network, a reminder for updates will be sent periodically by EFSA.

4.17 Modelling economic impact of different control strategies on FMD spread

Denmark gave a brief presentation on a model that has been developed in Denmark to estimate the economic impact of different Foot and Mouth Disease (FMD) control strategies.