

Preliminary Outbreak Assessment

Outbreaks of H7N8 avian influenza in poultry in the USA

19th January 2016

Ref: VITT/1200 HPAI in USA

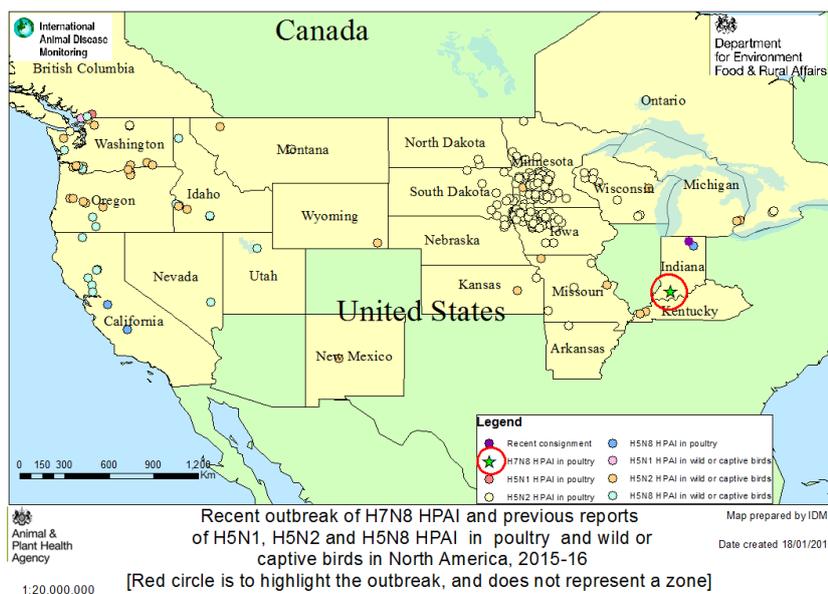
Disease Report

The USA has reported an outbreak of H7N8 HPAI (OIE, 2016; see map) while eight further outbreaks and one suspect case of H7N8 LPAI in turkeys in Indiana have also been reported on the Indiana State Board of Animal Health website, but the locations have not been given and therefore have not been mapped, however they have all been detected as

a result of surveillance around the HPAI outbreak and are all in the county of Dubois (BOAH, 2016).

In the HPAI outbreak, a commercial turkey flock of 43,500 birds with a mortality rate of just over 2%, tested positive on the 15th January. Disease control measures were invoked and the flock has now been humanely culled.

Of the LPAI infected premises all are either in the process of, or have been, depopulated. No reported clinical signs were observed in any of these outbreaks. Partial genetic sequences of the haemagglutinin (HA) and neuraminidase genes (both important for classification) for the LPAI and HPAI viruses were essentially identical except for an HA gene insertion for high pathogenicity. The HPAI and LPAI strains are of North American lineage (OIE, 2016; Promed, 2016).



Situation Assessment

In 2015 the USA reported 221 outbreaks of HPAI from commercial poultry resulting in the culling of nearly 50 million birds; the last outbreak was reported in June 2015. Three strains were identified, H5N1, H5N2 and H5N8. Initial index cases were infected as a result of contact (direct or indirect) with wild birds, either by contaminated footwear/clothing

on poultry workers or contaminated equipment and bedding. However, subsequent spread between farms and holdings occurred through other dispersal pathways and were probably exacerbated by a lack of awareness of biosecurity in the sector. Since this time, the USDA has worked closely with Industry, Local, Federal and State partners to improve their disease outbreak response (USDA, 2016). Although clearly the current outbreak is associated with a different virus serotype (H7N8) it is stated the virus is of North American origin but the precise relationships in all of the viral genes with other avian influenza viruses (including those present in Indiana and the wider region last year) will be valuable to provide insights as to how these viruses derived.

According to the EU trade notification system, one consignment of day old duck chicks were imported from the State of Indiana in January 2016. This will be investigated further, but EU rules (Regulation 798/2008/EC) requires such consignments to be kept at their establishment of destination for a period of at least 3 weeks and then undergo a clinical examination and testing if appropriate prior to being released.

Conclusion

We will continue to monitor the situation and work with our partners to ensure we continue to trade safely. We would like to remind all poultry keepers and attending veterinarians to maintain high standards of biosecurity, remain vigilant and report any suspect clinical signs promptly.

Authors

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References

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USDA (2016) USDA confirms Highly Pathogenic H7N8 Avian Influenza in a Commercial Turkey Flock in Dubois County, Indiana. [USDA APHIS website](#) Accessed 19/01/2016



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