



Global HPAI situation

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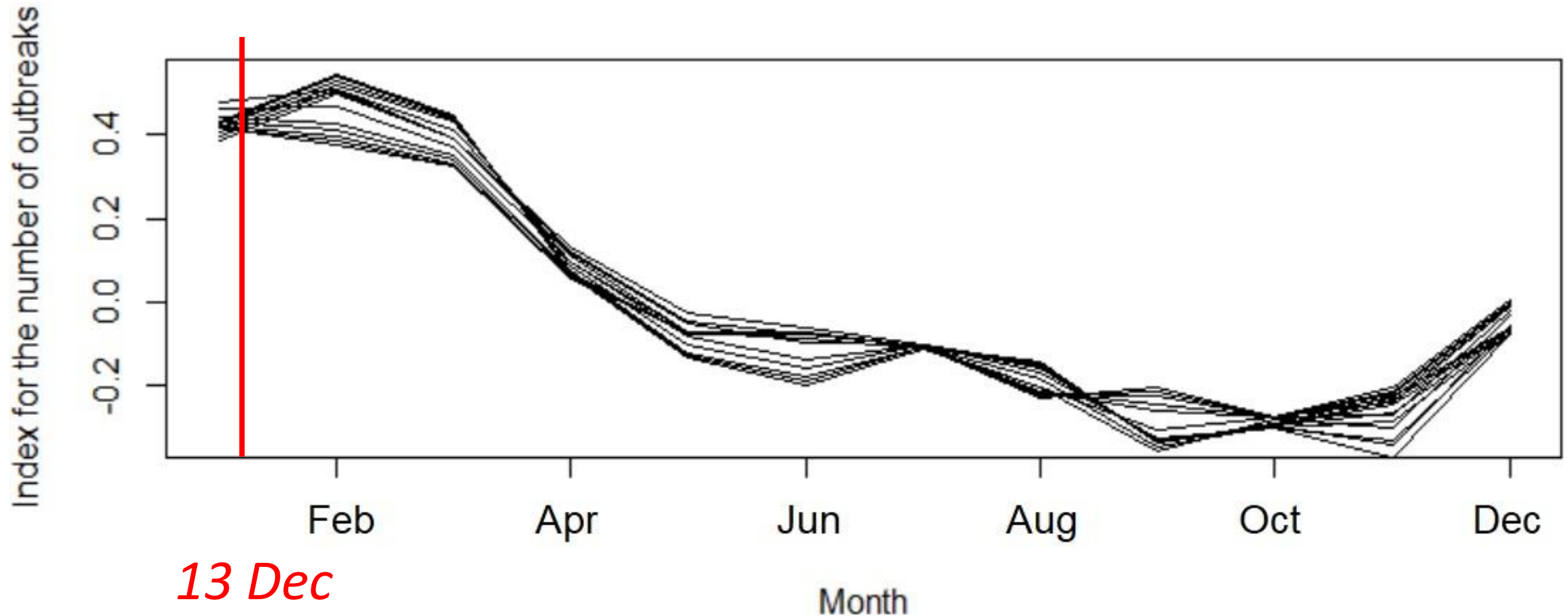
Head of the World Animal
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World Organisation
for Animal Health
Founded as OIE



HPAI global seasonality

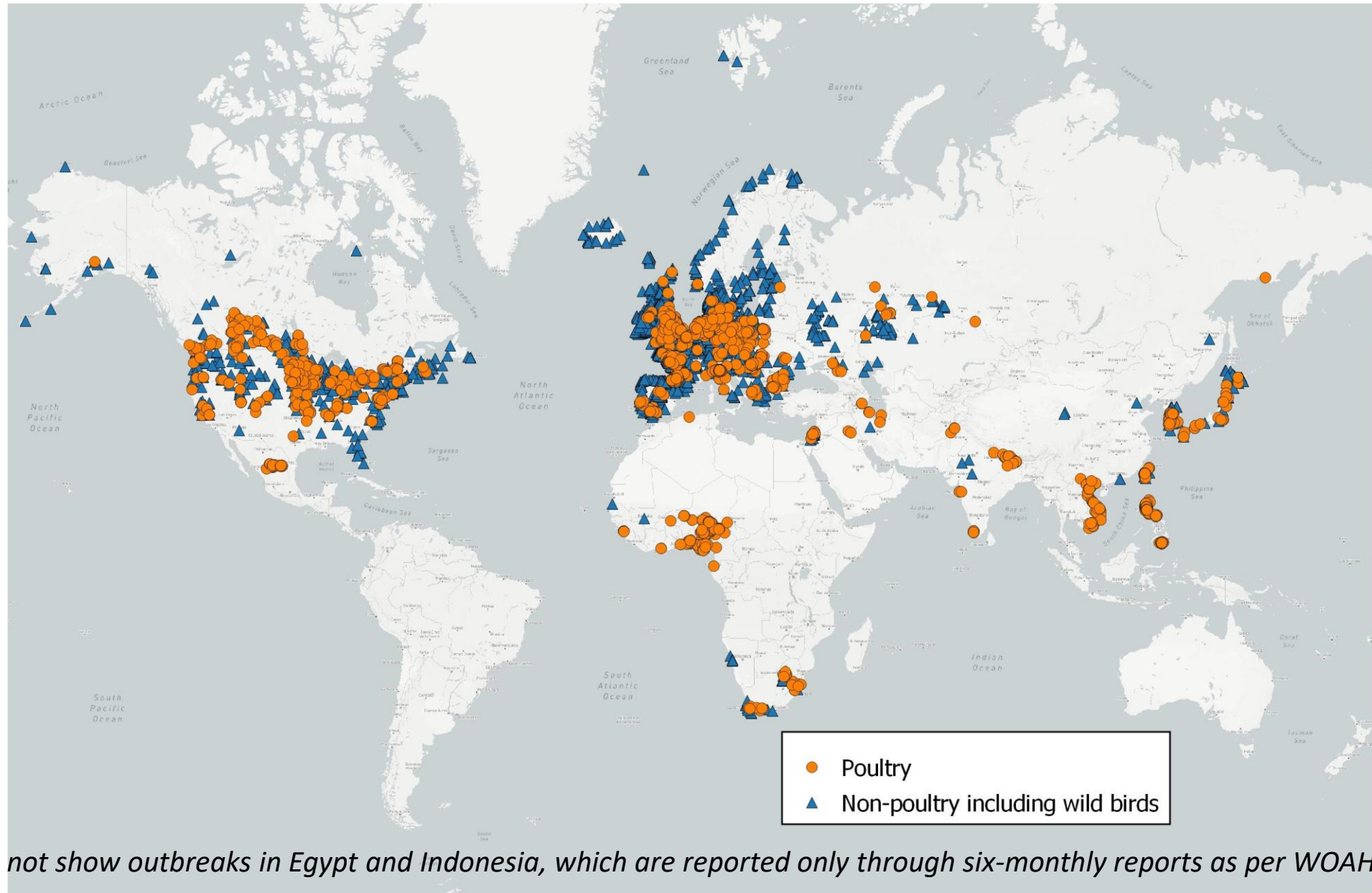


13 Dec

**Based on Seasonal and Trend decomposition using Loess (STL) analysis performed on data reported between 2005 and 2019 by 76 affected countries and territories for 18,620 outbreaks in poultry (detailed methodology presented in Awada et al., 2018).*



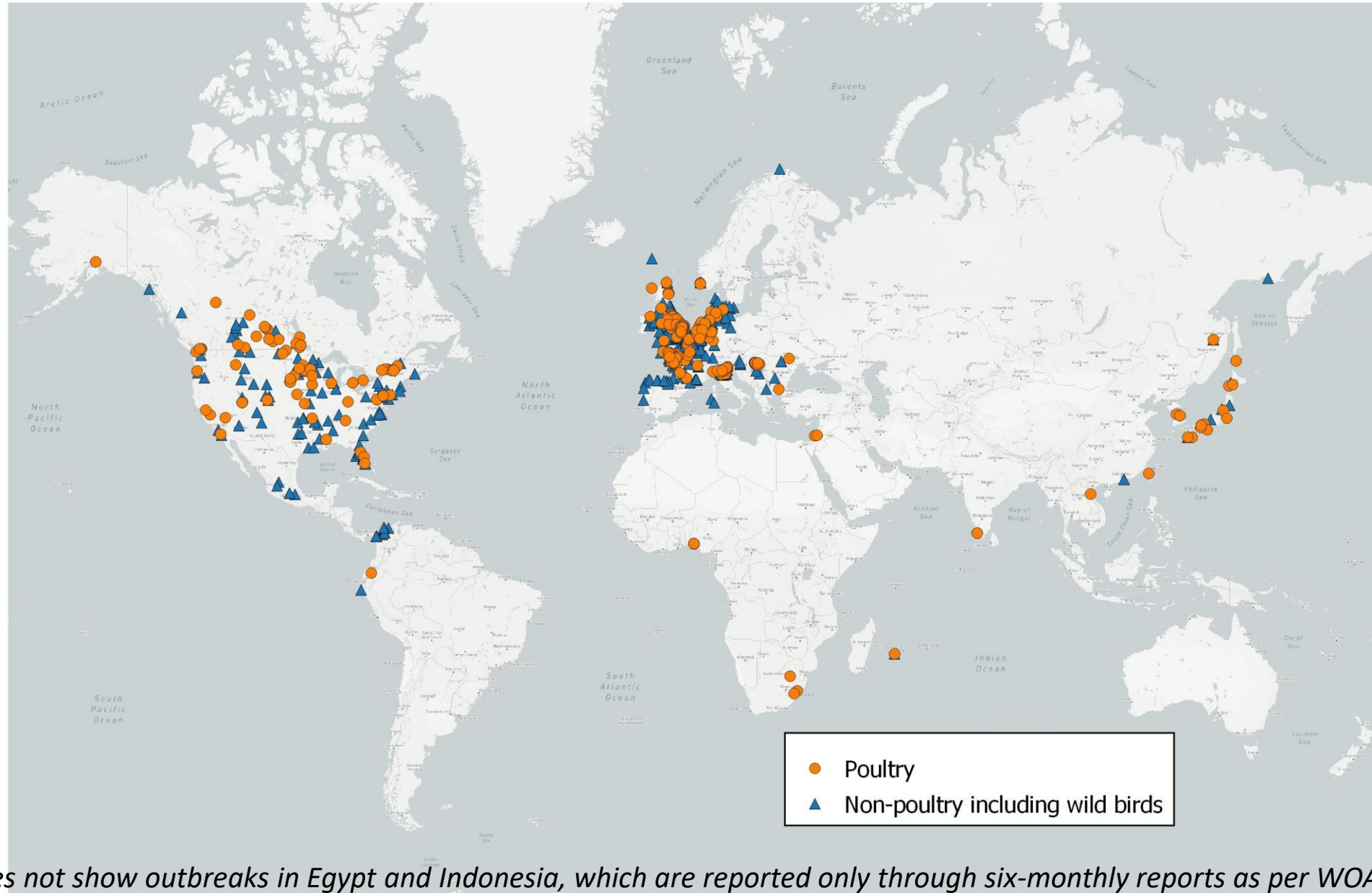
Global HPAI SITUATION (October 2021 – Sept 2022)



**This map does not show outbreaks in Egypt and Indonesia, which are reported only through six-monthly reports as per WOA standards*



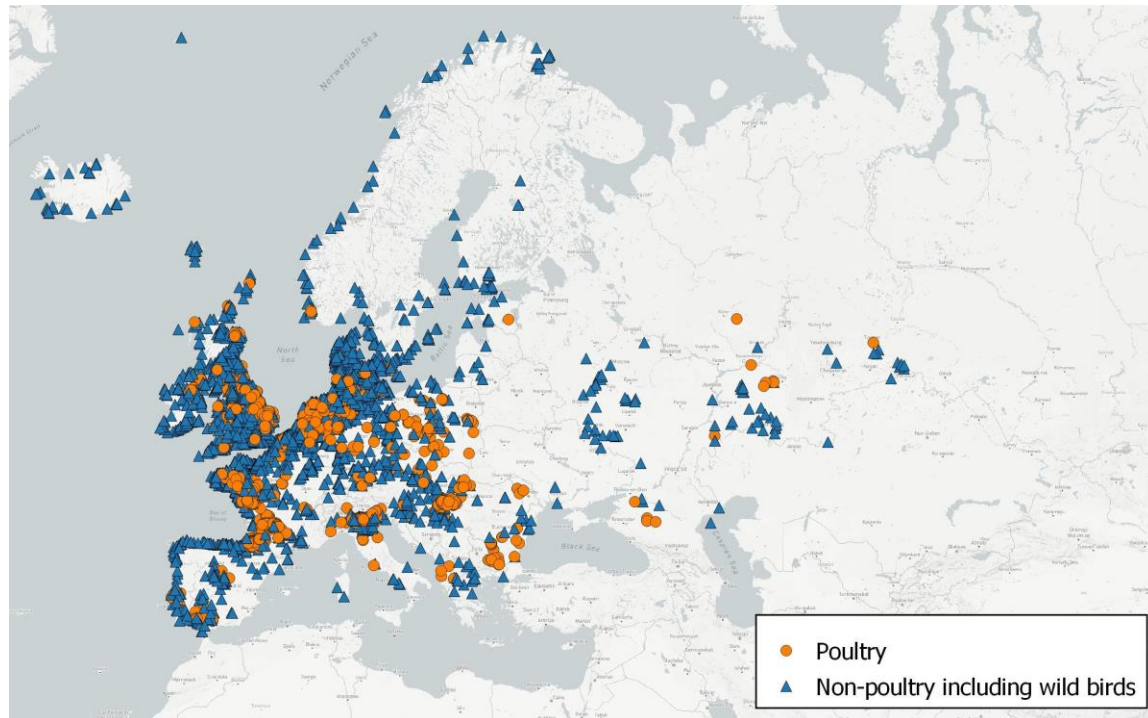
HPAI SITUATION (1 October 2022 – 2 December 2022)



**This map does not show outbreaks in Egypt and Indonesia, which are reported only through six-monthly reports as per WOA standards*

HPAI – Europe

1 Oct 2021 – 2 Dec 2022



1. The 2021–2022 epidemic was larger than the 2020–2021 epidemic and was the **largest so far in Europe**.
2. 38 countries and territories reported HPAI events.
3. During this period, 5439 outbreaks were reported: 2792 in poultry and 3745 in non-poultry including wild birds. **57 million birds culled** in the affected establishments.
4. Most outbreaks in poultry were reported by France (1446), Italy (343), Hungary (332), UK (214). Most detections in non-poultry were reported by Germany (955), UK (633), Netherlands (516).
5. The predominant subtype A(H5N8) in the 2020–2021 epidemic season was replaced by subtype A(**H5N1**) in the 2021–2022 epidemic.
6. Genetic analysis of H5N1 viruses currently circulating in Europe belong to clade 2.3.4.4b.



H5N1 expanding
geographical spread
and host range

11 July 2022



OPEN

Transatlantic spread of highly pathogenic avian influenza H5N1 by wild birds from Europe to North America in 2021

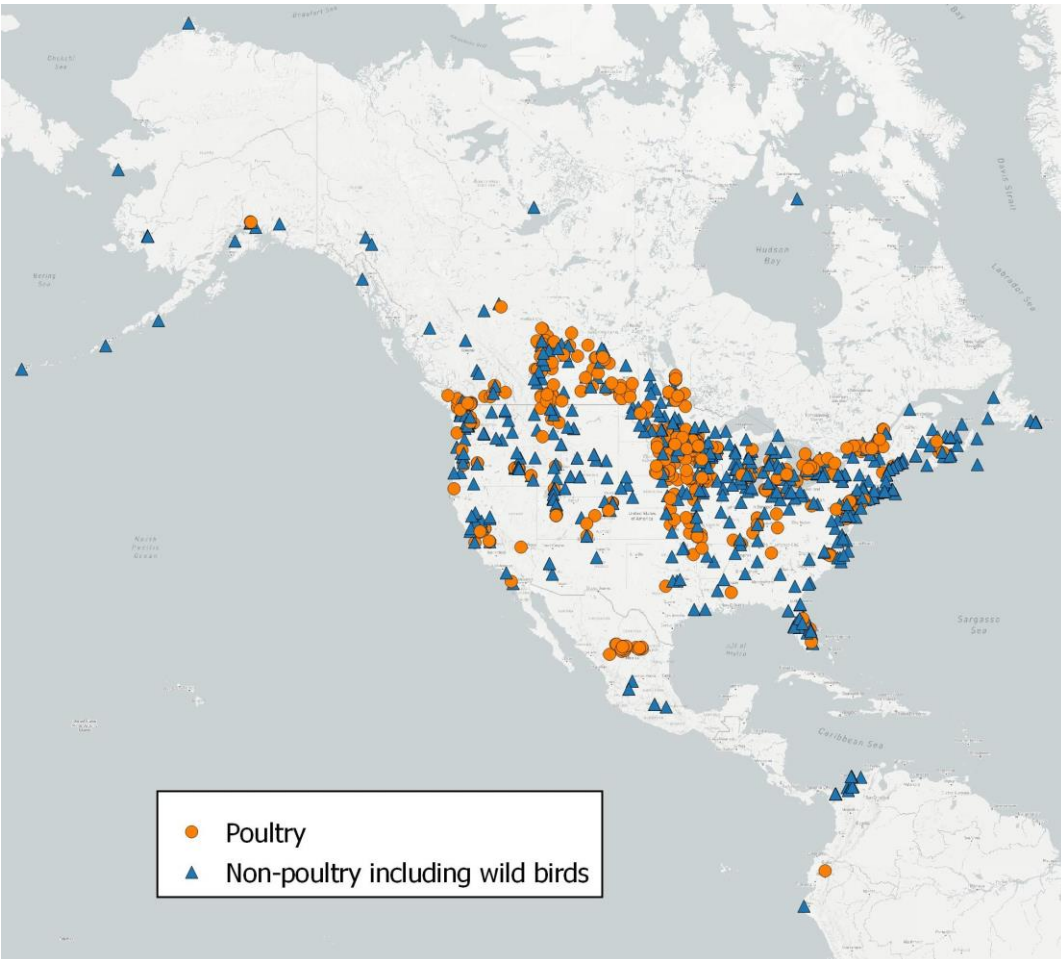
V. Caliendo^{1,16}, N. S. Lewis^{2,4,16}, A. Pohlmann^{3,16}, S. R. Baillie^{11,15}, A. C. Banyard⁴, M. Beer³, I. H. Brown⁴, R. A. M. Fouchier¹, R. D. E. Hansen⁴, T. K. Lameris¹⁴, A. S. Lang⁶, S. Laurendeau⁷, O. Lung⁷, G. Robertson⁸, H. van der Jeugd⁵, T. N. Alkie⁷, K. Thorup^{12,13}, M. L. van Toor⁹, J. Waldenström⁹, C. Yason¹⁰, T. Kuiken^{1,17}✉ & Y. Berhane^{7,17}

Highly pathogenic avian influenza (HPAI) viruses of the A/Goose/Guangdong/1/1996 lineage (GsGd), which threaten the health of poultry, wildlife and humans, are spreading across Asia, Europe, Africa and North America but are currently absent from South America and Oceania. In December 2021, H5N1 HPAI viruses were detected in poultry and a free-living gull in St. John's, Newfoundland and Labrador, Canada. Our phylogenetic analysis showed that these viruses were most closely related to HPAI GsGd viruses circulating in northwestern Europe in spring 2021. Our analysis of wild bird migration suggested that these viruses may have been carried across the Atlantic via Iceland, Greenland/Arctic or pelagic routes. The here documented incursion of HPAI GsGd viruses into North America raises concern for further virus spread across the Americas by wild bird migration.



HPAI - Americas

1 Oct 2021 – 2 Dec 2022

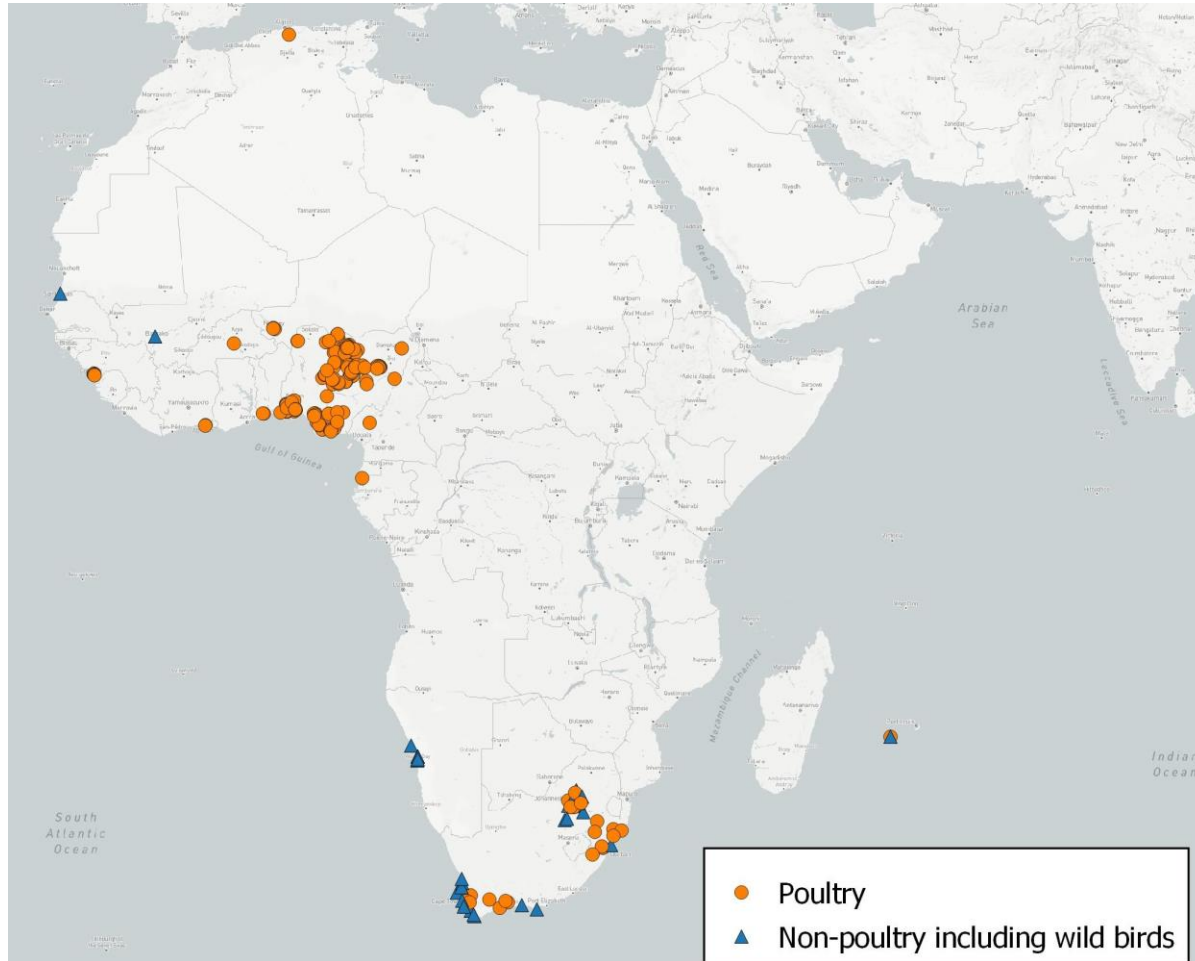


1. 6 countries reported HPAI events (Canada, Colombia, Ecuador, Mexico, Peru, USA)
2. North America was impacted by the **worst** avian influenza epidemic wave ever registered **since 2005**
3. During this period, 1173 outbreaks were reported: 545 in poultry and 628 in non-poultry. **H5N1** was the subtypes reported in the vast majority of the outbreaks, and only one outbreak was reported for H5N4 and 30 for H7N3
4. First occurrence in 3 countries of South America (Colombia, Ecuador, Peru)
5. Genetic analysis of H5N1 viruses currently circulating in Americas belong to clade 2.3.4.4b. and closely related to Eurasian lineage. Suggesting the viruses have been introduced by wild bird migration into the American continent.



HPAI – Africa

1 Oct 2021 – 2 Dec 2022



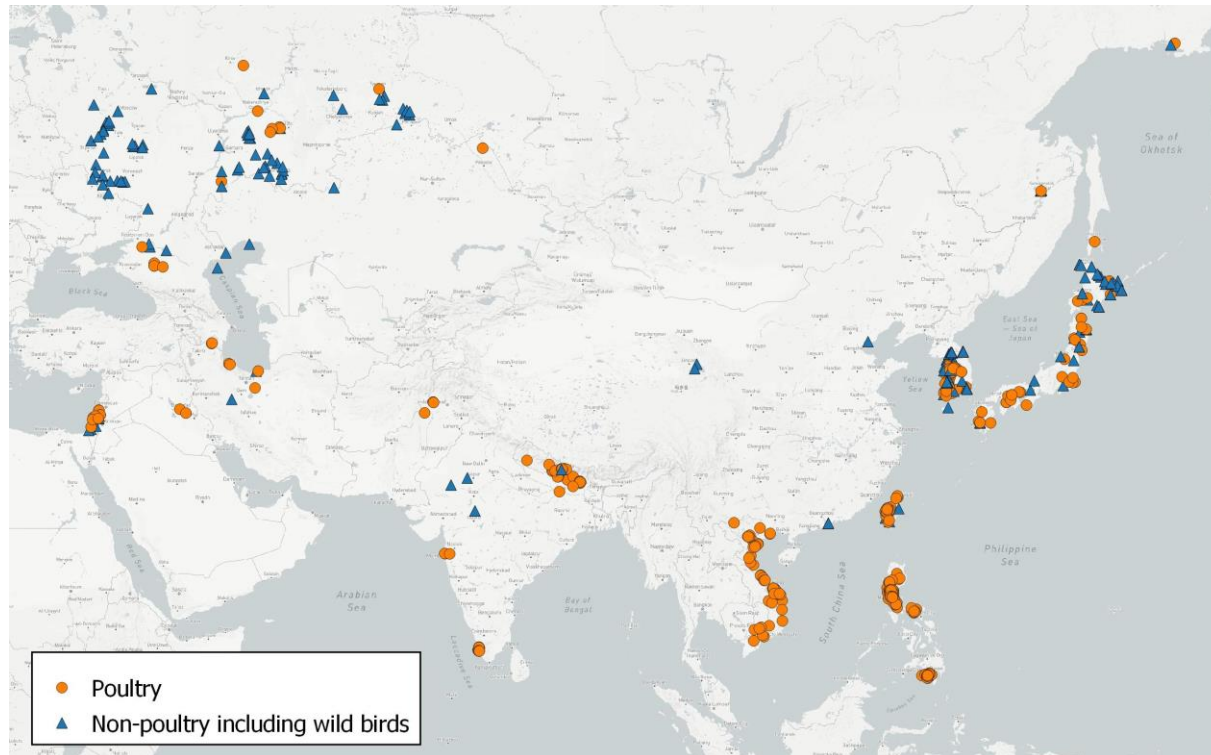
**This map does not show outbreaks in Egypt, which are reported only through six-monthly reports as per WOAHA standards*

1. 15 countries and territories reported HPAI events
2. Subtypes – H5N1 & H5N2
3. 287 outbreaks were reported: 248 in poultry and 39 in non-poultry.
4. Most outbreaks in poultry were reported by Nigeria (198) and South Africa (31). And most detections in non-poultry were reported by South Africa (29) and Namibia (7).
5. Nigeria is a regional hotspot of HPAI since 2006 and remained the most affected country in sub-Saharan Africa
6. There is persistent circulation of the virus in West Africa and Southern Africa



HPAI – Asia

1 Oct 2021 – 2 Dec 2022



1. 14 countries and territories reported HPAI events
2. Subtypes – H5N1, H5N2, H5N5, H5N8
3. 771 outbreaks were reported: 534 in poultry and 237 in non-poultry birds.
4. Most outbreaks in poultry were reported by Philippines (201) and Israel (79). And most detections in non-poultry were reported by Japan (132) and Korea (Rep. of) (68).

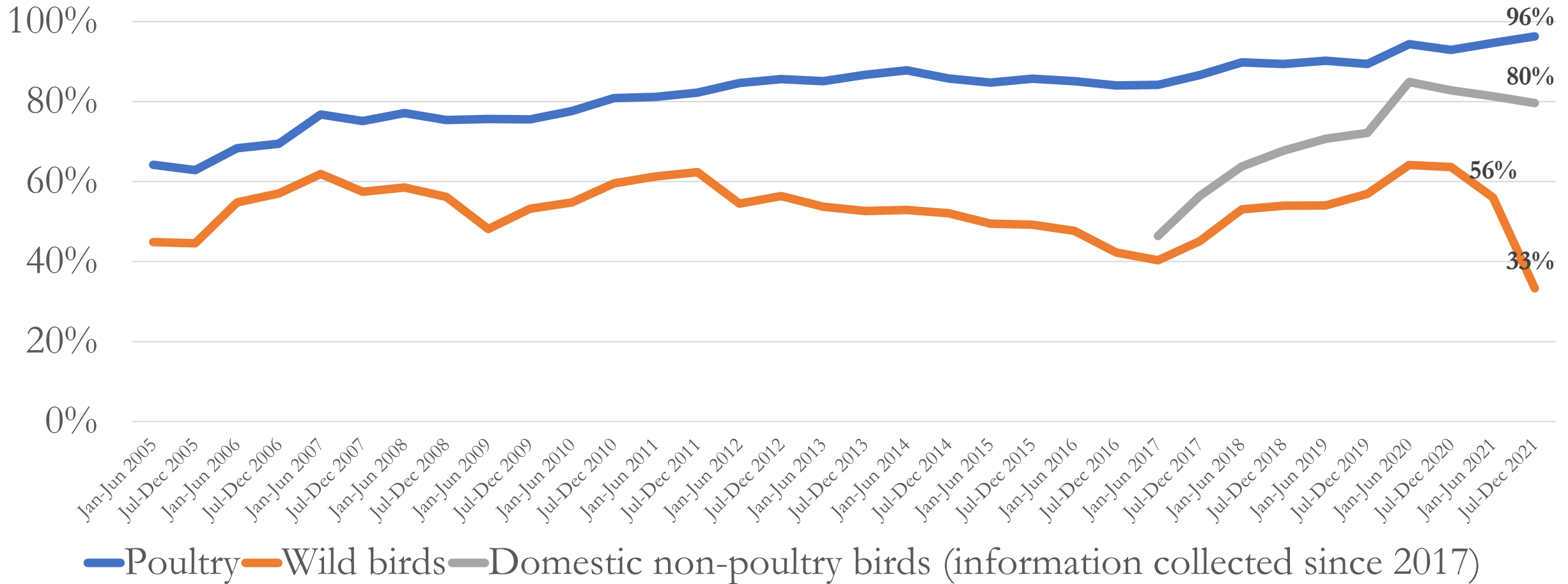
**This map does not show outbreaks in Indonesia, which are reported only through six-monthly reports as per WOAH standards*

Impact of the disease (1 October 2021 – 2 Dec 2022)

	Poultry		Non-poultry including wild birds	
	cases	Dead or killed and disposed of	cases	Dead or killed and disposed of
Oct 2021-Sep2022	32 522 107	138 057 837	401 352	473 901
1 Oct 2022-2 Dec 2022	1 527 167	16 099 234	5 692	21 229



% of countries and territories reporting surveillance activities ¹¹



**Based on six-monthly reports received and validated by WOAHA as of 08 December 2022. The data for 2021 are still partial and should be treated with caution.*

Unusual host species avian influenza 1 Oct 2021 – 2 Dec 2022

Reported in 15 unusual species

Halichoerus grypus (2 countries)



Phoca vitulina
(4 countries)



Vulpes vulpes
(6 countries)



Mephitis mephitis
(2 countries)