

HPAI outbreaks in Italy

Directorate General for Animal Health and veterinary medicinal products



HPAI H5N1 in Italy

- ✓ 27 HPAI outbreaks in poultry (06/12/2022)
 - **17** Veneto
 - 6 Lombardia

- + 2
- 3 Emilia Romagna
- 1 Friuli Venezia-Giulia
- √ 38 HPAI outbreaks in wild birds (06/12/2022)
 - 16 Veneto
 - 14 Emilia Romagna
 - **5** Lombardia

+ 10

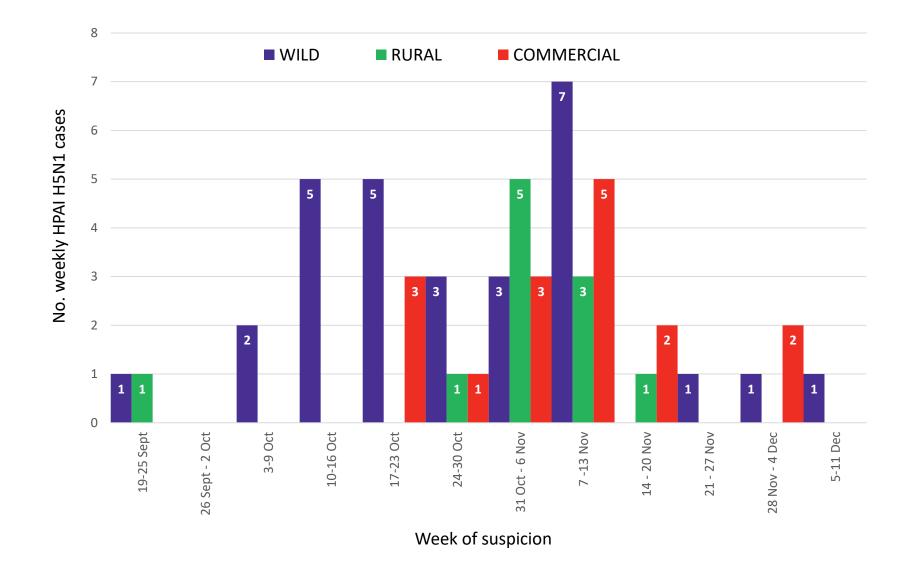
- 2 Sardegna
- 1 Umbria



Number of weekly HPAI H5N1 cases

Since mid November, epidemiological situation relatively stable, with sporadic outbreaks confirmed in commercial farms

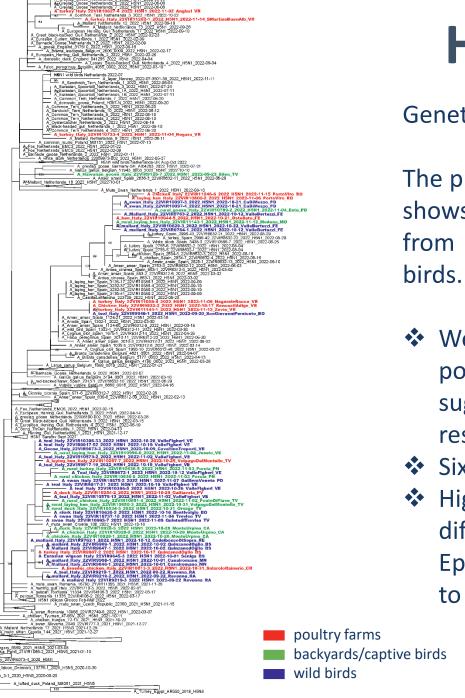
Virus is circulating on the Italian territory but, compared to the last epidemic season, the poultry sector is less affected



HPAI H5N1 in domestic poultry: distribution and type of affected farms

	Province	Breeders	Broiler	Backyard/Multispecies	Laying hen	Meat turkey	Total
EMILIA- ROMAGNA	Ferrara			1	1		3
	Modena			1			
FRIULI VENEZIA-GIULIA	Pordenone			1			1
LOMBARDIA	Brescia					1	7
	Cremona	2			2		
	Mantova					(1)	
	Pavia			1			
VENETO	Padova			1			18
	Rovigo		1	1	1		
	Treviso			5	1		
	Venezia			1			
	Verona	(1)	1			5	
Total		3	2	12	5	7	29

HA



HA phylogenetic tree

Genetic diversity of the HPAI H5N1 viruses circulating in Italy

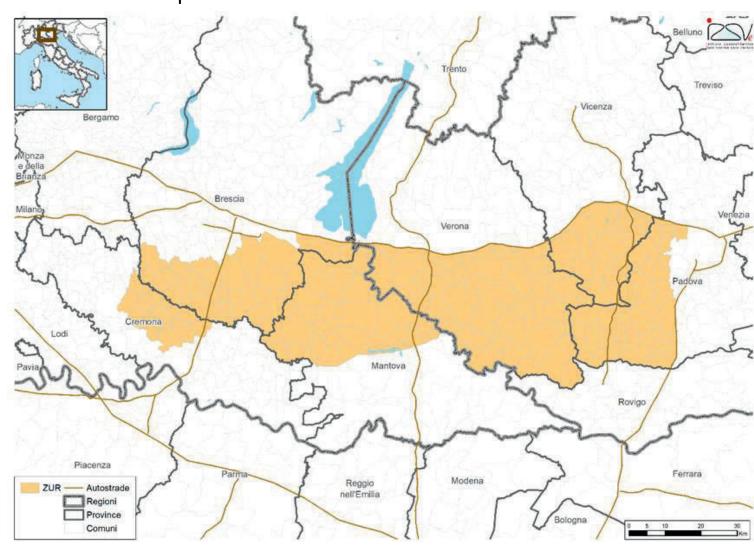
The phylogenetic tree of the hemagglutinin (HA) gene segment shows in red the cases from poultry farms, in green the cases from backyards and captive birds, in blue the cases from wild birds.

- ❖ We observed a high correlation among cases identified in poultry/domestic birds and cases identified in wild birds, suggesting that in most cases wild birds are primarily responsible for viral transmission to poultry species
- ❖ Six different genetic groups → <u>Multiple viral introductions</u>
- High genetic relationship between viruses collected from different poultry farms were observed only in few cases. Epidemiological investigations on these cases are ongoing to evaluate any possible secondary spread.

Further Restriction Zone

A FRZ has been established by the Competent Authority of Veneto and Lombardia regions to prevent the further spread of the infection

- FRZ is in place until end of January
 2023
- Restocking of fattening turkeys is forbidden within the FRZ, with possible derogations given:
 - compliance with biosecurity standards
 - distance parameters from other poultry holdings defined by NRL
 - favorable epidemiological situation
- Subject to revision based on the evolution of the epidemiological situation





Thanks for your kind attention