

## SUPPLEMENTARY MATERIAL

**Supplementary Figure 1. H5 neutralizing activity is associated with the plasma IgG fraction.** The plasma IgG fraction from 3 donors (B, D and N) was isolated using protein G beads. Purified IgG and depleted plasma (FT) were tested in a pseudotyped neutralization assay against the H5 A/VN/1194/04 isolate.

**Supplementary Table 1. Frequency of vaccine-binding and H5-pseudovirus neutralizing B cells in three donors immunized with seasonal influenza vaccine.**

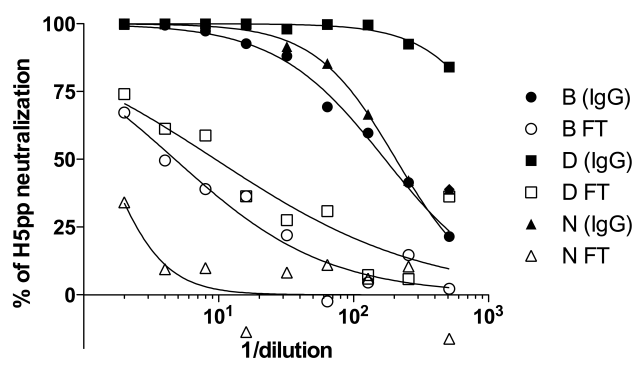
Donor code	IgG specific memory B cells (x 10 <sup>6</sup> cells)			
	Vaccine specific (ELISA)		H5-pp neutralization	
	Pre	Post	Pre	Post
B	3000	60000	-	1480
C	3000	420000	-	16680
M	15000	72000	-	320

PBMC collected before and two weeks after vaccination were polyclonally stimulated with R848 and IL-2 and the 14 day culture supernatants were tested for their capacity to bind the vaccine (ELISA) or to neutralize H5 pseudotypes. Shown is the frequency of antigen-specific B cells producing vaccine-binding and H5-neutralizing antibodies. -, not detectable

**Supplementary Table 2. Hemagglutination inhibition (HAI) titers of human mAbs.**

Virus	MAbs				
	FE17.23	FE43.4	FB110.1	FC41.25	Ctr mAb
A/VietNam/1203/2004 (H5N1)	≥1280*	5 <sup>†</sup>	80	5	5
A/swine/Iowa/31 (H1N1)	≥ 1280	20	160	10	5
A/PR/8/34 (H1N1)	≥ 1280	5	320	5	5
A/New Jersey/76 (H1N1)	5	5	160	5	5
A/California/07/2009 (H1N1)	5	5	320	20	5

MAbs were tested in a HAI assay against a panel of H1N1 and H5N1 viruses. HAI titers are presented as the reciprocal of the highest dilution of antibody at which inhibition of hemagglutination was observed. Undiluted antibody concentration was 1 mg/ml. All mAbs tested are of the IgG1 isotype, except FB110 which is IgG3. \*Highest dilution tested = 1280. <sup>†</sup>An undetectable titer was assigned a value of 5.



Suppl. Figure 1