

Auckland Regional Public Health Service

Rātonga Hauora ā Iwi o Tamaki Makaurau



Working with the people of Auckland, Counties Manukau and Waitemata

Pandemic Postings

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National

Exercise Cruickshank information. Further Exercise Cruickshank information has been released by the Ministry of Health:

- **Evaluation templates** [MoH, 04/07](#). Evaluation templates, including those for Exercise Players and appointed Evaluators, are now available on the MoH website.
- **Guidance on care - clinical pathway** [MoH, 10/06](#). The MoH's Oct 06 document "Guidance on care - clinical pathway" (now listed on the Exercise page) provides interim guidance on a clinical pathway for use in planning for and during the 'manage it' phase.
- **Presentations from March regional briefings** Copies of the following Powerpoint slides from the Ministry of Health's regional briefings are available online: the [Exercise Cruickshank background](#); [Exercise mapping day-to-day](#); [Health Sector Emergency Forms](#); [Exercise Control overview](#); [Facilitator orientation](#); and [Evaluator orientation](#).

International situation

Cambodia [WHO, 10/04/07](#). A fatal case of human infection with the H5N1 avian influenza virus has been reported in Cambodia. The case was a 13-year-old girl in Kampong Cham province in the east of Cambodia (see [map](#)) who developed symptoms on 2 April and died 5 April. Initial investigations indicate the presence of sick and dead poultry in the girl's village, and that the girl had consumed a sick chicken prior to onset of illness.

Egypt [WHO, 11/04/07](#); [WHO, 10/04/07](#). Two new cases of avian influenza A(H5N1) virus infection have been reported. The first case, a 2-year-old female from Menia Governorate, (see [map](#)). developed symptoms on 3 April, was admitted to hospital the following day, and is currently stable. Initial investigations indicate recent contact with backyard poultry.

The second case is a 15-year-old female from Cairo Governorate (see [map](#)). She developed symptoms on 30 March, was admitted to hospital on 5 April and died on 10 April. Of the 34 cases confirmed to date in Egypt, 14 have been fatal.

Poultry outbreak summary [OIE](#). Poultry outbreaks of H5N1 have been reported in Cambodia, Pakistan, and for the first time in Saudi Arabia: see next page for further details. The OIE has updated its records of poultry outbreaks with some previously unrecorded historical reports, and as such the cumulative table on the OIE website ([link](#)) cannot be simply compared with previous versions.

FAO reports lower avian influenza activity in birds this year [FAO, 02/04/07](#). The Food and Agriculture Organization of the UN (FAO) reports that there have been fewer avian influenza outbreaks in birds this year than at the same time last year, indicating a reduction in the overall viral load; and has also reported that there is better transparency, better surveillance and improved and more timely outbreak reporting. Thailand, Turkey and Vietnam have been generally successful in containing and controlling the virus, however containment has not occurred in Egypt, Indonesia and Nigeria, "effectively making them reservoirs of the virus for introduction to other countries." According to the FAO, only three of the 33 provinces in Indonesia remain free of avian influenza.

Current global avian influenza activity
Confirmed human cases of avian influenza A/(H5N1), 3 Apr - 11 Apr 2007,¹ and outbreaks of highly-pathogenic avian influenza H5N1 in poultry, 2 Apr - 12 Apr 2007,² by country. The complete list of human cases and poultry outbreaks to date can be found on the [ARPHS website](#).

	Human ¹		Poultry ²
	cases	deaths	outbreaks
Cambodia	1	1	1
Egypt	2	1	-
Pakistan	-	-	8
Saudi Arabia	-	-	1
TOTAL	3	2	10

Notes:

1 As reported by [World Health Organization](#)

2 As reported by the [World Organisation for Animal Health \(OIE\)](#).

Background

Review of H5N1 disease in humans [Peiris JSM et al, Clin Microbiol Rev 2007; 20: 243-67](#). This paper provides a review of the ecology and evolution of HPAI H5N1 viruses, assesses the pandemic risk, and addresses aspects of human H5N1 disease in relation to its epidemiology, clinical presentation, pathogenesis, diagnosis, and management.

Public health interventions and epidemic intensity during the 1918 influenza pandemic [Hatchett RJ et al. Proc Nat Acad Sci USA \[serial on the internet\] 2007; Apr 6 \[cited 16/04/07\]](#). This study looked at the effect of 19 types of non-pharmaceutical interventions (NPIs, ie social-distancing measures) used in 17 US cities during the autumn phase of the 1918 pandemic and found that school, church, and theatre closings, were more effective than other NPIs, and that cities imposing NPIs early had peak weekly death rates about 50% lower than those of cities that imposed NPIs later or not at all. The reduction in excess mortality in these cities cumulated over the entire pandemic period was smaller (~20%), suggesting that relaxation of NPIs was followed by renewed viral spread.

Effect of public health measures in the 1918 influenza pandemic [Bootsma MCJ, Ferguson NM. Proc Nat Acad Sci USA \[serial on the internet\] 2007; Apr 6 \[cited 16/04/07\]](#). This paper mathematically models data from 16 US cities where the start and end dates for NPIs are known. The researchers found the time-limited interventions used reduced total mortality only moderately (10-30%), and that impact was often limited because interventions were introduced too late and lifted too early. The most effective cities reduced transmission rates by up to 30-50%.

Trends in epidemic and pandemic influenza deaths in Italy 1969-2001 [Rizzo C et al. Emerg Infect Dis \[serial on the internet\] 2007; May \[cited 16/04/07\]](#). This paper analyses excess deaths in Italy from 1969 to 2001. Excess deaths were highest for elderly persons in all seasons except the influenza A (H3N2) pandemic season (1969-70), when rates were greater for younger persons, confirming a shift toward death of younger persons during pandemic seasons.

AJPH supplement on public health emergency preparedness [AJPH 'First Look', 05/04/07](#). An Am J Public Health online supplement contains papers on public health emergency preparedness, some which appear pertinent to pandemic planning, eg: [encouraging compliance with quarantine](#); [ethical guidance in pandemic preparedness plans](#); and [optimal shift duration](#) during emergency response.

Ministry of Health advice line: 0800 AVN FLU (286 358)

MAF Hotline (for suspect animal cases): 0800 809 966

Disclaimer: Background material is listed in Pandemic Postings to alert recipients to new publications on highly-pathogenic avian and pandemic influenza topics. While efforts are made to maintain quality by only including material from reputable sources, it is beyond the scope of this bulletin to independently establish the veracity of this material, or to place the material within the local pandemic planning context: such assessments are left to the judgement of the readership. Conclusions made by authors of material cited in this bulletin do not necessarily represent policy or opinions of Auckland Regional Public Health Service, of Waitemata, Auckland or Counties Manukau DHBs, or of the Ministry of Health.

Details of regions with recently-reported poultry outbreaks

Cambodia OIE, 12/04/07. One highly pathogenic H5N1 avian influenza outbreak of 302 birds reported amongst backyard poultry in a single village in Ponhea Kreak district. Number of susceptibles was 1,086 and 784 birds were destroyed.

Pakistan OIE, 11/04/07. Eight new H5N1 avian influenza outbreaks have been reported from North West Frontier (two outbreaks) and Sindh provinces (six outbreaks). All have been in farms with layer or broiler chickens, with numbers of susceptible birds ranging from 1,000 to 6,000. See [map](#) for province locations.

Saudi Arabia OIE, 31/03/07. The first H5N1 avian influenza outbreak to be reported in Saudi Arabia was in 105 backyard birds in a village in Al-Katief district. Susceptible population of 670.