



PANDEMIC INFLUENZA U • P • D • A • T • E



Public Health Prepares

November 9, 2005

Fast Facts

In the last 300 years, the world has experienced 10 influenza pandemics, three in the last century.

An influenza virus can cause a pandemic if it mutates and is novel (most people have no immunity to it), virulent (causes serious illness and death), and easily transmitted from person-to-person.

If a 1918-like influenza virus struck today, without intervention, an estimated 1.9 million Americans would die and almost 10 million would be hospitalized.

The W.H.O. defines six pandemic alert phases—we are currently at Phase 3.

If You are Asked . . .

"Will bird flu hit the U.S. this winter?"

Answer: It would be helpful if scientists could say either "yes or no," but they can't. Influenza viruses can change. The change can make the virus more or less of a threat to people. Scientists can't predict when a change will happen. Right now, avian influenza A, H5N1, (which is the scientific name for the virus referred to as "bird flu") is killing some birds overseas. It also has killed some people who came in contact with the sick birds. However, at this time, there is no known H5N1 virus in birds or humans in North America.

If the virus changes so that it can easily spread from sick people to otherwise healthy people, then it becomes a serious public health threat. With this in mind, doctors and scientists are on high alert. They will know if the H5N1 virus changes in a way that is more harmful to people. If that happens, you will hear about it in the news. The seasonal flu you may be currently hearing about in your community is not bird flu, but it can still be a threat to some people. It's a good idea for these people to get a seasonal flu shot every year, especially those who are most susceptible such as those over age 65, children, and people with asthma or diabetes.

Public Health Prepares . . .

Based on the World Health Organization's definition, the world is currently at Pandemic Alert Phase 3 because there have been "human infections with a new subtype [H5N1] but no human-to-human spread or at most rare instances of spread to a close contact." (There are six pandemic alert phases.) Sustained human-to-human transmission anywhere in the world will be the triggering event to initiate a pandemic response by the United States.

Although the timing, nature and severity of the next pandemic cannot be predicted with any certainty, an influenza pandemic has the potential to cause more death and illness than any other public health threat. To lessen the impact of a pandemic, CDC and federal, state, and local partners are preparing, as are many nations across the globe. An informed and responsive public is essential to minimizing the health effects of a pandemic and the resulting consequences to society. This twice monthly newsletter will share facts about ongoing CDC and partner preparedness and protection activities and provide updates regarding H5N1.

For more information now please link to: www.pandemicflu.gov.

Update on H5N1: Global Activity Humans and Birds

Humans: During outbreaks since 2004, 124 confirmed cases in humans and 63 deaths occurred in the following nations: Vietnam 91 cases and 41 deaths; Thailand 20 cases and 13 deaths; Indonesia 9 cases and 5 deaths; and Cambodia 4 cases and 4 deaths.

Birds: From January 2004 through October 14, 2005, active outbreaks among birds have been confirmed in Vietnam, Thailand, Indonesia, China, Cambodia, Russia, Kazakhstan, Mongolia, Turkey, Romania, and Croatia. South Korea and Japan have had no active outbreaks since March 2004.

For the most recent reports, please go to the following link:

www.who.int/csr/outbreaknetwork/en/

CDC Recommends . . .

Enhanced U.S. Surveillance and Diagnostic Evaluation: Avian Influenza A (H5N1)

CDC recommends maintaining enhanced surveillance efforts by state and local health departments, hospitals, and clinicians to identify patients at increased risk for avian influenza A (H5N1). Guidelines for enhanced surveillance include the following:

Testing for avian influenza A (H5N1) is indicated for hospitalized patients with

- radiographically confirmed pneumonia, acute respiratory distress syndrome (ARDS), or other severe respiratory illness for which an alternate diagnosis has not been established, AND
- history of travel within 10 days of symptom onset to a country with documented H5N1 avian influenza in poultry and/or humans (for a regularly updated listing of H5N1-affected countries, see <http://www.who.int/en/> or http://www.oie.int/eng/en_index.htm).

Testing for avian influenza A (H5N1) should be considered on a case-by-case basis in consultation

with state and local health departments for hospitalized or ambulatory patients with:

- documented temperature of >38°C (>100.4°F), AND
- one or more of the following: cough, sore throat, shortness of breath, AND
- history of contact with poultry (e.g., visited a poultry farm, a household raising poultry, or a bird market) or a known or suspected human case of influenza A (H5N1) in an H5N1-affected country within 10 days of symptom onset. www.cdc.gov/flu/avian/professional/han020405.htm.

Pass this on . . .

FluAid Provides Estimate of Potential Local Impact of Pandemic Influenza

FluAid is a test version of software created by programmers at the Centers for Disease Control and Prevention (CDC). It is designed to assist state and local level planners in preparing for the next influenza pandemic by providing estimates of potential impact specific to their locality. FluAid provides only a range of estimates of impact in terms of deaths, hospitalizations, and outpatient visits due to pandemic influenza. The software cannot describe when or how people will become ill, nor how a pandemic may spread through a society over time.

Part of the national influenza pandemic plan calls for each state to develop its own state-specific plan to deal with an influenza pandemic. To develop such plans, state and local level public health planners need to have estimates of the potential impact of a pandemic in their state or locality. FluAid users are encouraged to download the FluAid 2.0 User's Manual to obtain additional information regarding the use and interpretation of results, as well as comments on the general modeling philosophy used in designing FluAid. In addition to the resources listed in the References section, two scientific papers that address the economic impact of an influenza pandemic can be found at the CDC's Web site below:

PANDEMIC INFLUENZA UPDATE

1. Meltzer MI, Cox NJ, Fukuda K. The economic impact of pandemic influenza in the United States: Implications for setting priorities for interventions. *Emerg Infect Dis* 1999;5(5): 659-671.

www.cdc.gov/ncidod/EID/vol5no5/meltzer.htm

2. Meltzer MI, Cox NJ, Fukuda K. Modeling the economic impact of pandemic influenza in the United States: Implications for setting priorities for intervention. Background paper.

www.cdc.gov/ncidod/EID/vol5no5/melt_back.htm

For more information on FluAid and its utility in pandemic influenza planning, please click on the following link:

www2.cdc.gov/od/fluaid/default.htm#Sectiona.

Where to Find Out More . . .

The national website for information and updates about pandemic influenza is:

www.pandemicflu.gov.

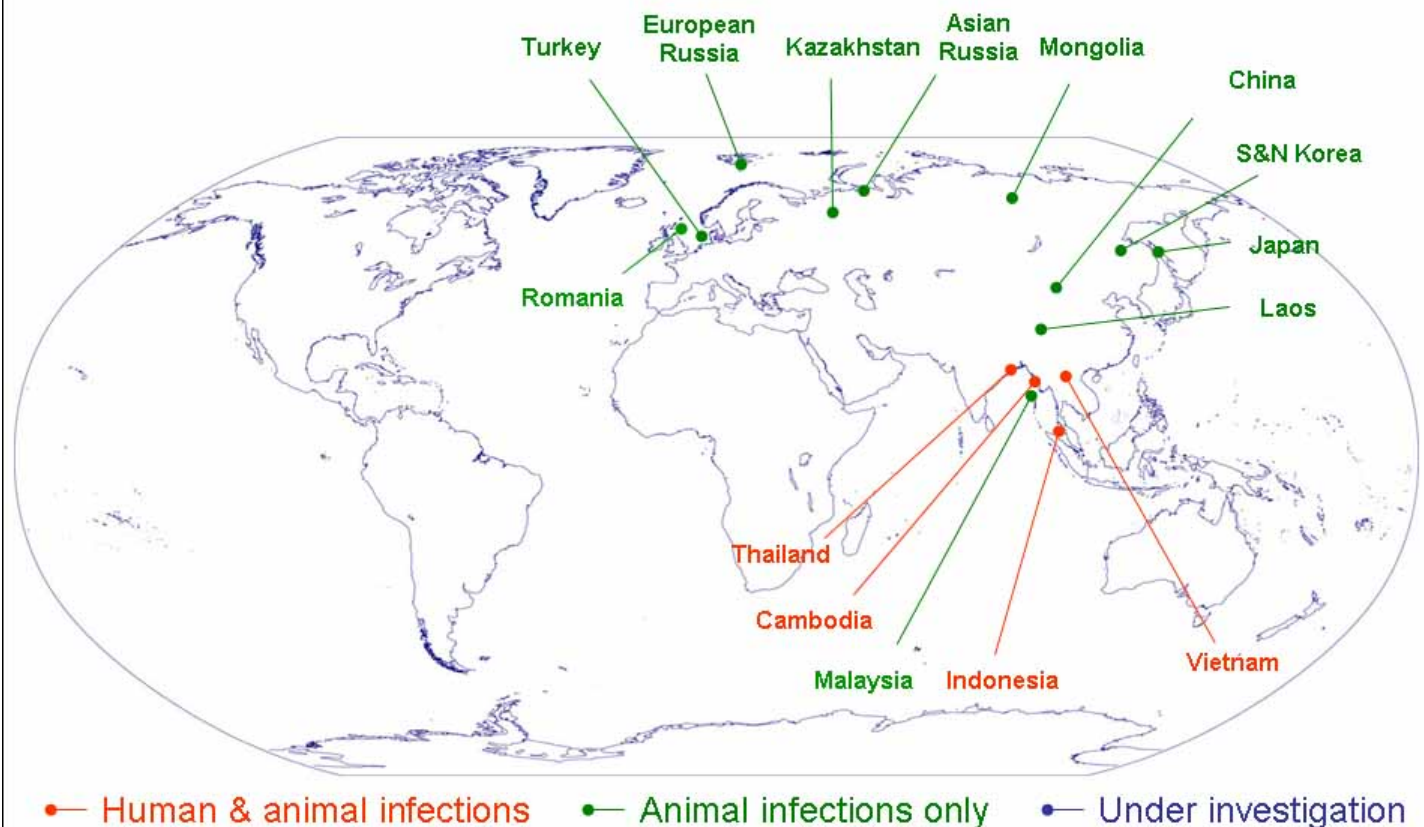
More Fast Facts (Week of Oct. 24)

- CDC website influenza pages activity: 1,030,000 (270,000, week before)
- CDC Public inquiries (toll-free information line): 200 (39, week before)

Pandemic Influenza Update: Reader's Feedback

The twice-monthly Pandemic Influenza Update is prepared by CDC's Priority Communication System. Information in this newsletter is time sensitive and evolving. Readers are welcome to comment by email to: PANUPDATE@CDC.GOV.

Countries reporting confirmed animal and/or human A/H5N1 infections in Dec 2003 – Oct 2005*



*WHO & FAO as of 10/15/2005