

# Ten Things You Need To Know About Pandemic Influenza

## 1. Pandemic influenza is different from avian influenza.

Avian influenza refers to a large group of different influenza viruses that usually only affects birds. On rare occasions, these bird viruses can infect other species, including pigs and humans. Most avian influenza viruses do not infect humans.

For this reason, avian H5N1 is a virus with pandemic potential, since it might change into a virus that can infect and spread among humans worldwide. Once this change happens, it will no longer be a bird virus--it will be a human influenza virus. Influenza pandemics are caused by new influenza viruses that have adapted to humans.

## 2. Influenza pandemics are recurring events.

An influenza pandemic is a rare but repeated event. Three pandemics occurred in the previous century: "Spanish influenza" in 1918, "Asian influenza" in 1957, and "Hong Kong influenza" in 1968. The 1918 pandemic killed an estimated 40–50 million people worldwide. That pandemic, which was exceptional, is considered one of the deadliest disease events in human history. Other pandemics were not as deadly, with an estimated 2 million deaths in 1957 and 1 million deaths in 1968.

## 3. The world may be on the brink of another pandemic.

Health experts have been monitoring a new and extremely severe influenza virus – the H5N1 strain – for almost eight years. The H5N1 strain first infected humans in Hong Kong in 1997, causing 18 cases, including six deaths. Since mid-2003, this virus has caused the largest and most severe outbreaks in poultry on record. In December 2003, infections in people exposed to sick birds were identified.



As of March 2007, over 280 human cases have been laboratory confirmed in twelve overseas countries (Azerbaijan, Cambodia, China, Djibouti, Egypt, Indonesia, Iraq, Lao People's Democratic Republic, Nigeria, Thailand, Turkey and Viet Nam), and more than half of these people have died. Most cases have occurred in healthy children and young adults.

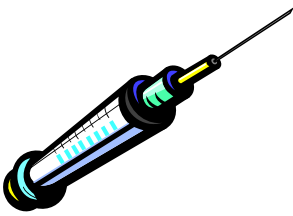
## 4. All countries will be affected.

Once a fully contagious virus emerges, its global spread is considered inevitable. Countries might, through measures such as border closures and travel restrictions, delay arrival of the virus, but cannot stop it. The pandemics of the previous century spread through the world in 6 to 9 months, even when most international travel was by ship. Given the speed and volume of international air travel today, the virus could spread more rapidly, possibly reaching all continents in less than 3 months.

## 5. Widespread illness will occur.

Because most people will have no immunity to the pandemic virus, infection and illness rates are expected to be higher than during seasonal epidemics of normal influenza. Current estimates for the next pandemic are that a substantial percentage of the world's population will require some form of medical care. Few countries have the staff, facilities, equipment, and hospital beds needed to cope with large numbers of people who suddenly fall ill.

## 6. Medical supplies will be inadequate.



Supplies of vaccines and antiviral drugs – the two most important medical interventions for reducing illness and deaths during a pandemic – will be in short supply in all countries at the start of a pandemic and for many months thereafter. Inadequate supplies of vaccines are of particular concern, as vaccines are considered the first line of defense for protecting populations. Many developing countries will have no access to vaccines throughout the duration of a pandemic.

## 7. Large numbers of deaths will occur.

Historically, the number of deaths during a pandemic has varied greatly. Death rates are largely determined by four factors: the number of people who become infected, the infectiousness of the virus, the vulnerability of affected populations, and the effectiveness of preventive measures. Accurate predictions of mortality cannot be made before the pandemic virus emerges and begins to spread. All estimates of the number of deaths are purely speculative.

The World Health Organization (WHO) has used a relatively conservative estimate – from 2 million to 7.4 million deaths – because it provides a useful and plausible planning target. This estimate is based on the comparatively mild 1957 pandemic. Estimates based on a more virulent virus, closer to the one seen in 1918, have been made and are much higher. However, the 1918 pandemic was considered exceptional.

## 8. Economic and social disruption will be great.

High rates of illness and worker absenteeism are expected, and these will contribute to social and economic disruption. Past pandemics have resurfaced for a second or even third episode 3-12 months after the initial event. Not all parts of the world or of a single country are expected to be severely affected at the same time. Social and economic disruptions could be temporary, but may be amplified in today's closely interrelated and interdependent systems of trade and commerce. Social disruption may be greatest when rates of absenteeism impair essential services, such as power, transportation, and communications.

## 9. Every country must be prepared.

The World Health Organization (WHO) has issued a series of recommended actions for responding to the influenza pandemic threat. The actions are designed to provide different layers of defense that reflect the complexity of the situation. Recommended actions are different for the present phase of pandemic alert, the emergence of a pandemic virus, and the declaration of a pandemic and its subsequent international spread.

## 10. WHO will alert the world when the pandemic threat increases.

WHO works closely with ministries of health and various public health organizations to support countries' surveillance of circulating influenza viruses. A sensitive surveillance system that can detect emerging influenza strains is essential for the rapid detection of a pandemic virus.



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