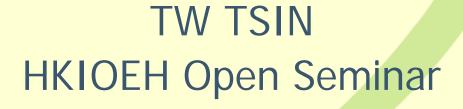
# Prevention of Human Swine Influenza – International perspectives



9<sup>th</sup> July 2009

#### A Pandemic Is Declared

- On June 11, 2009, the <u>World Health</u> <u>Organization</u> (WHO) raised the worldwide pandemic <u>alert level</u> to <u>Phase 6</u> in response to the ongoing global spread of the novel influenza A (H1N1) virus.
- Indicating a pandemic is underway globally
- Overall severity of the influenza pandemic to be moderate.

More than 70 countries are now reporting cases of human infection with **novel H1N1 flu**.

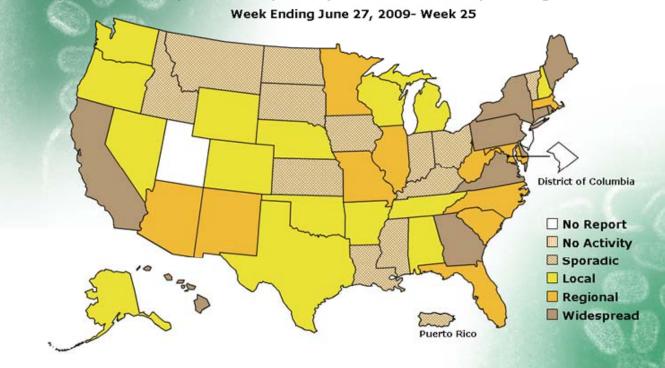
- 89921 global cumulative total on 3.7.2009
- 12720 new cases in the last week
- 953 cumulative total in Hong Kong upto 5.7.2009
- 26 new cases on 4.7.2009
- First report by USA on 23.4.2009

#### Situation in America: 6185 new cases & 33902 cumulative cases





A Weekly Influenza Surveillance Report Prepared by the Influenza Division Weekly Influenza Activity Estimates Reported by State and Territorial Epidemiologists\*



\*This map indicates geographic spread and does not measure the severity of influenza activity.

#### Awareness in Public



#### The development

• News on 23 April 2009

 Human cases of swine influenza A (H1N1) virus infection have been identified in San Diego County and Imperial County, California as well as in San Antonio, Texas.

#### Initial report from 26 April 2009

### The statistics

- USA 20 cases
- Mexico 18 cases

# As at 3 June 2009

- 10053 total cases in USA
- 1078 new cases in the last week
- 1530 total cases in Canada
- 194 new cases in the last week
- 19273 total case globally
- 1863 new cases in the last week



Influenza A (H1N1). Region of the Americas. 6 July 2009 (23 h GMT; 18 h EST)

# Confimed cases by first sub-national level 0 1-9 10 - 49 50 - 99 100 - 999 1000 - 6976 Communicable Diseases & Health Information and Analysis Pan American Health Organization (PAHO) on Lambert Azimuthal Enual Area

### **Current situation**

USA: 6185 new cases & 33902 cumulative cases;

Canada: 0 new cases & 7983 cumulative cases;

Mexico: 1582 new cases; 10262 cumulative cases

http://gamapserver.who.int/h1n1/atlas.html

## The strategy in America

- Observation as at 3 June:
  - 0.1% to 0.8% fatality comparable to usual viral infection.
- General practice:
  - cover the mouth and nose when coughing or sneezing
  - good hand hygiene practice recommended
  - Precautions on 1 to 2 meters rule for droplet transmission
  - take rest when caught the flu
  - have PPE get ready and stock pile sufficient for the winter

# Special precautions

- Emergency response procedure for pandemic
  - Work plan for critical actions
  - large organizations and healthcare sectors should make drills for the incident
  - Off site/ satellite offices to maintain normal work

#### General comment

- Most people recover from infection without the need for hospitalization or medical care.
- Overall, national levels of severe illness from influenza A(H1N1) appear similar to levels seen during local seasonal influenza periods, although high levels of disease have occurred in some local areas and institutions.
- Overall, hospitals and health care systems in most countries have been able to cope with the numbers of people seeking care, although some facilities and systems have been stressed in some localities.

#### Hong Kong situation <u>Highlights 重點</u>

- The WHO Director-General has raised the level of influenza pandemic alert from phase 5 to phase 6 on 11 June.
  世衛組織總幹事已於 6 月 11 日將流感大流行級別從第 5 級提高到第 6 級。
- The Emergency Response Level under the Government's Preparedness Plan for Influenza Pandemic is activated.
  政府「流感大流行應變計劃」下的緊急應變級別現正啓動。
- 3. There have been 953 confirmed cases of human swine influenza (Influenza A/H1N1) in Hong Kong since the first case was diagnosed on 1 May 2009. For Mainland China<sup>&</sup>, Taiwan<sup>\*</sup> and Macao SAR<sup>##</sup>, there have been a total of 1002, 72 and 54 confirmed human swine influenza cases respectively.

自從五月一日香港確診第一宗人類豬型流感個案,本港共有 953 宗人類豬型流感(甲型流感 H1N1)確診個案。中國大陸<sup>4</sup>累計共有 1002 宗個案,中國台灣<sup>#</sup>有 72 宗人類豬型流感(甲型 流感H1N1)個案,澳門特別行政區<sup>##</sup>有 54 宗人類豬型流感(甲型流感H1N1)個案。

 According to WHO, 125 countries/territories/areas have officially reported 89,921 cases of influenza A/H1N1 (last updated on 3 July). 根據世衛組織, 125個國家/領域/地區正式報告了89,921宗甲型H1N1流感感染病例 (截至7月3 日的更新)。

#### The scenarios

- First press release on 26.4.2009
  - From alert level to serious level
- Second upgrading of alarm level
  - From serious to emergency response level on 11.6.2009 after WHO
- 953 cumulative total in Hong Kong up to 5.7.2009
- Control strategy

At source, transmission and individual

- Problems
  - Densely populated, limited resources (e.g. healthcare service)....

#### What shall we do in the next step?

- The <u>new strain of type A H1N1?</u>
- Preventive measures in facility
- Preventive measures in organisations
- Preventive measures in person
- Control measures in healthcare facility

# Personal issues

- avoid touching your mouth and nose;
- clean hands thoroughly with soap and water, or cleanse them with an alcohol-based hand rub on a regular basis (especially if touching the mouth and nose, or surfaces that are potentially contaminated);
- avoid close contact with people who might be ill;
- reduce the time spent in crowded settings if possible;
- improve airflow in your living space by opening windows;
- practise good health habits including adequate sleep, eating nutritious food, and keeping physically active.

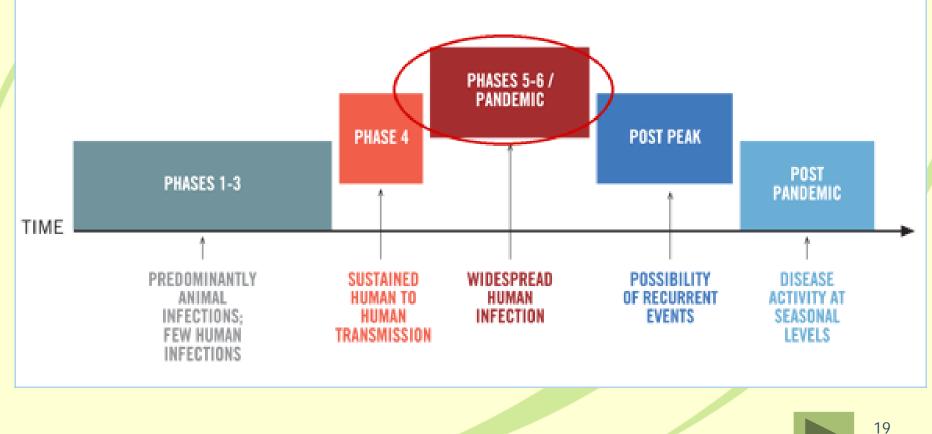
### Work place issues

- Warning: have influenza A(H1N1) or a seasonal influenza, you should stay home and away from work through the duration of your symptoms; practicable ?
- Precautionary measures cleansing programme, protective equipment ?
- Satellite offices ?
- Drills ?

# The end???

### Phases of pandemic alert

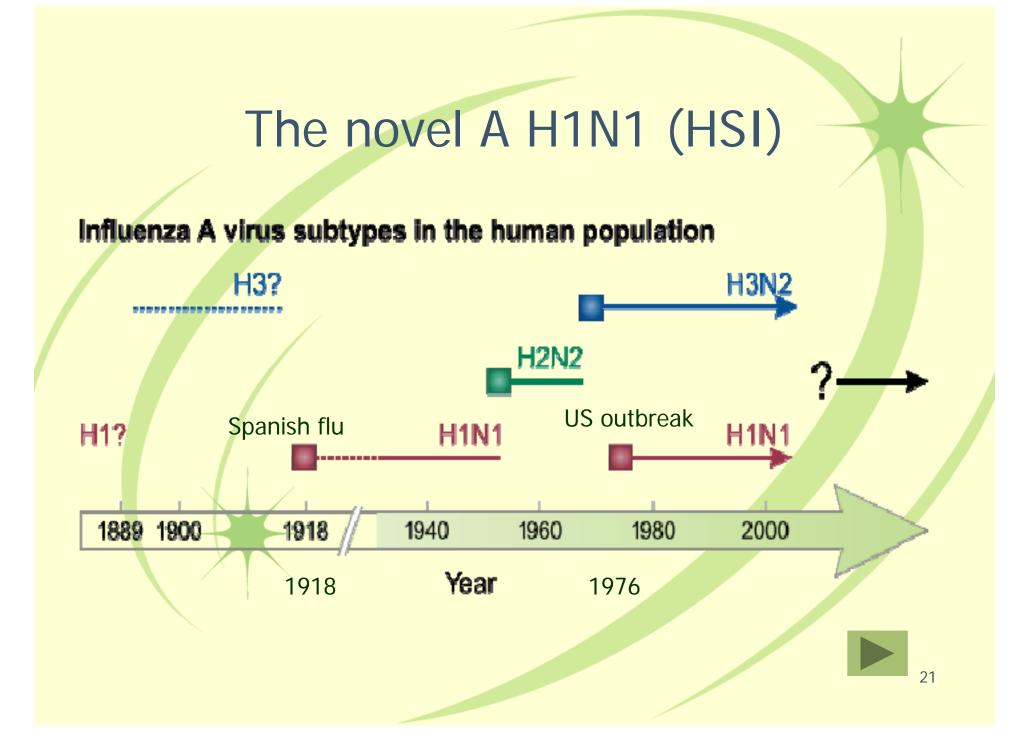
PANDEMIC INFLUENZA PHASES



#### WHO PANDEMIC PHASE DESCRIPTIONS AND MAIN ACTIONS BY PHASE

PHASE	DESCRIPTION	MAIN ACTIONS				
		PLANNING AND COORDINATION	SITUATION MONITORING AND ASSESMENT	COMMUNICATIONS	REDUCING THE SPREAD OF DISEASE	CONTINUITY OF HEALTH CARE PROVISION
PHASE 1	No animal influenza virus circulating among animals have been reported to cause infection in humans.					
PHASE 2	An animal influenza virus circulating in domesticated or wild animals is known to have caused infection in humans and is therefore considered a specific potential pandemic threat.	Develop, exercise, and periodically revise national influenza pandemic preparedness and response plans.	Develop robust national surveillance systems in collaboration with national animal health authorities, and other relevant sectors.	Complete communications planning and initiate communications activities to communicate real and potential risks.	Promote beneficial behaviours in individuals for self protection. Plan for use of pharmaceuticals and vaccines.	Prepare the health system to scale up.
PHASE 3	An animal or human-animal influenza reassortant virus has caused sporadic cases or small clusters of disease in people, but has not resulted in human-to-human transmission sufficient to sustain community-level outbreaks.					
PHASE 4	Human to human transmission of an animal or human-animal influenza reassortant virus able to sustain community-level outbreaks has been verified.	Direct and coordinate rapid pandemic <b>containment</b> activities in collaboration with WHO to limit or delay the spread of infection.	Increase surveillance. Monitor containment operations. Share findings with WHO and the international community.	Promote and communicate recommended interventions to prevent and reduce population and individual risk,	Implement rapid pandemic containment operations and other activities; collaborate with WHO and the international community as necessary.	Activate contingency plans.
PHASE 5	The same identified virus has caused sustained community level outbreaks in two or more countries in one WHO region.	Provide leadership and coordination to multisectoral resources to mitigate the societal and economic impacts,	Actively monitor and assess the evolving pandemic and its impacts and mitigation measures.	Continue providing updates to general public and all stakeholders on the state of pandemic and measures to mitigate risk.	<b>Implement</b> individual, societal, and pharmaceutical measures.	Implement contingency plans for health systems at all levels.
PHASE 6	In addition to the criteria defined in Phase 5, the same virus has caused sustained community level outbreaks in at least one other country in another WHO region.					
POST PEAK PERIOD	Levels of pandemic influenza in most countries with adequate surveillance have dropped below peak levels.	Plan and coordinate for additional resources and capacities during possible future waves.	Continue surveillance to detect subsequent waves.	Regularly update the public and other stakeholders on any changes to the status of the pandemic.	Evaluate the effectiveness of the measures used to update guidelines, protocols, and algorithms.	Rest, restock resources, revise plans, and rebuild essential services.
POST PANDEMIC PERIOD	Levels of influenza activity have returned to the levels seen for seasonal influenza in most countries with adequate surveillance.	Review lessons learned and share experiences with the international community. Replenish resources.	Evaluate the pandemic characteristics and situation monitoring and assessment tools for the next pandemic and other public health emergencies.	Publicly acknowledge contributions of all communities and sectors and communicate the lessons learned; incorporate lessons learned into communications activities and planning for the next major public health crisis.	Conduct a <b>thorough</b> evaluation of all interventions implemented.	Evaluate the response of the health system to the pandemic and share the lessons learned.





The genetic change that enables a flu strain to jump from one animal species to another, including humans, is called "ANTIGENIC SHIFT." Antigenic shift can happen in three ways:

## Worry on reassortment

- A matter of when?
- The scale?
- The strategy?

