

# ICAO and prevention of spread of disease

Dr Anthony Evans

International Civil Aviation Organization  
Montreal

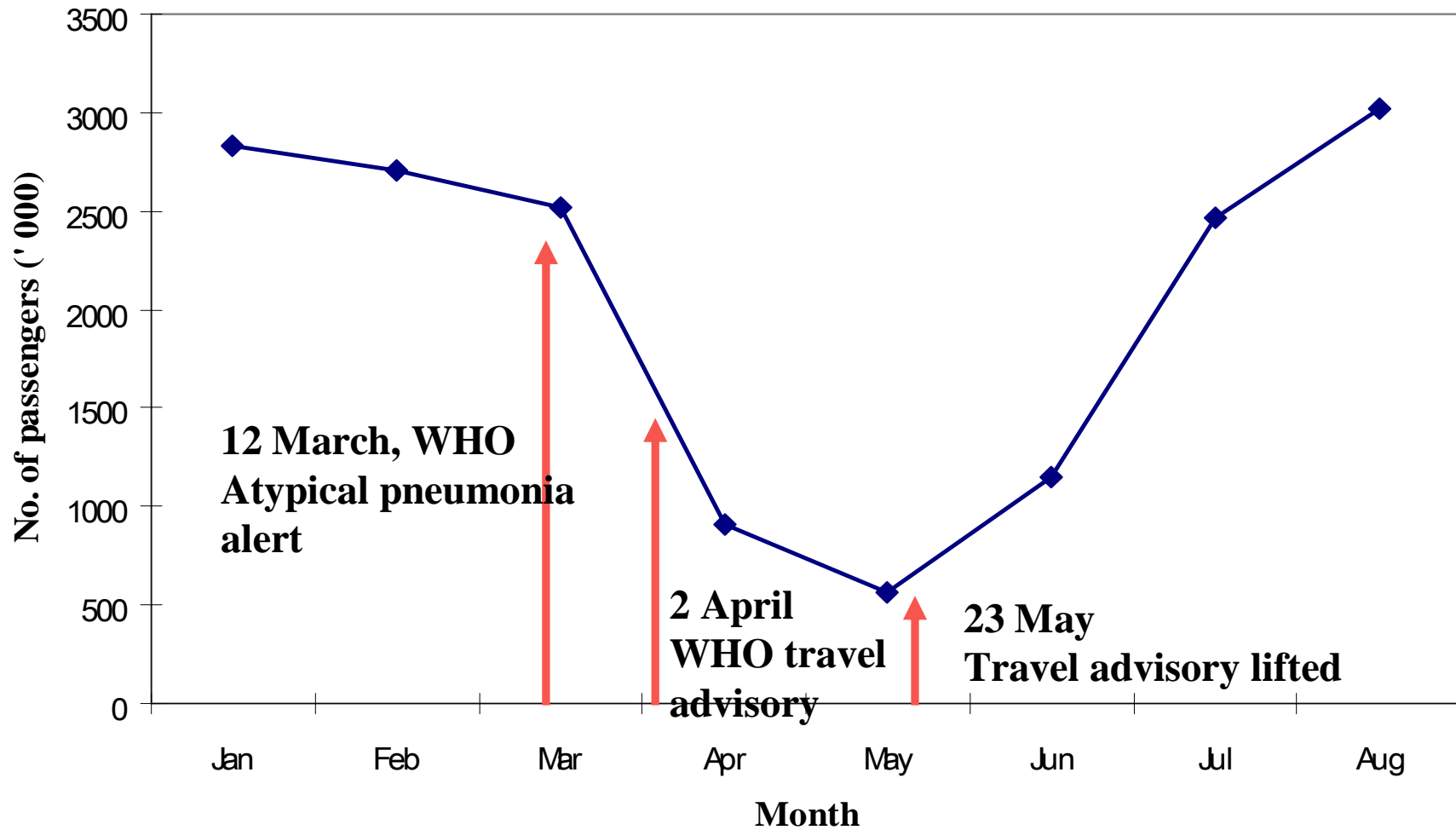
Lima, Peru, April 2009



# Plan

- Prevention of Spread of disease
  - ICAO actions
  - International Health Regulations
- Transmission of disease on-board aircraft
- First Aid and Medical Kits, Universal Precaution Kit
- Aircraft Disinfection and Disinsection
- Summary

## Passengers of Hong Kong International Airport, January to August 2003



Courtesy: Dr Henry Kong, Chief Port Officer, Hong Kong

WHO/CDS/CSR/GIP/2005.5

EPIDEMIC  
ALERT &  
RESPONSE

# WHO global influenza preparedness plan

The role of WHO and recommendations for  
national measures before and during pandemics

# Questions – local outbreak

- 35% reduction of staff for 8 weeks
- Aircraft diversions
- Advice to passengers regarding risk
- Advice to workers regarding risk
  - PPE, training
- Source of advice
- Traveller screening
- Traveller follow-up
- Tamiflu/vaccinations
- Sudden demand to leave area
- Recommendation to reduce aircraft operations
  - WHO containment strategy

# Questions – inbound suspected case

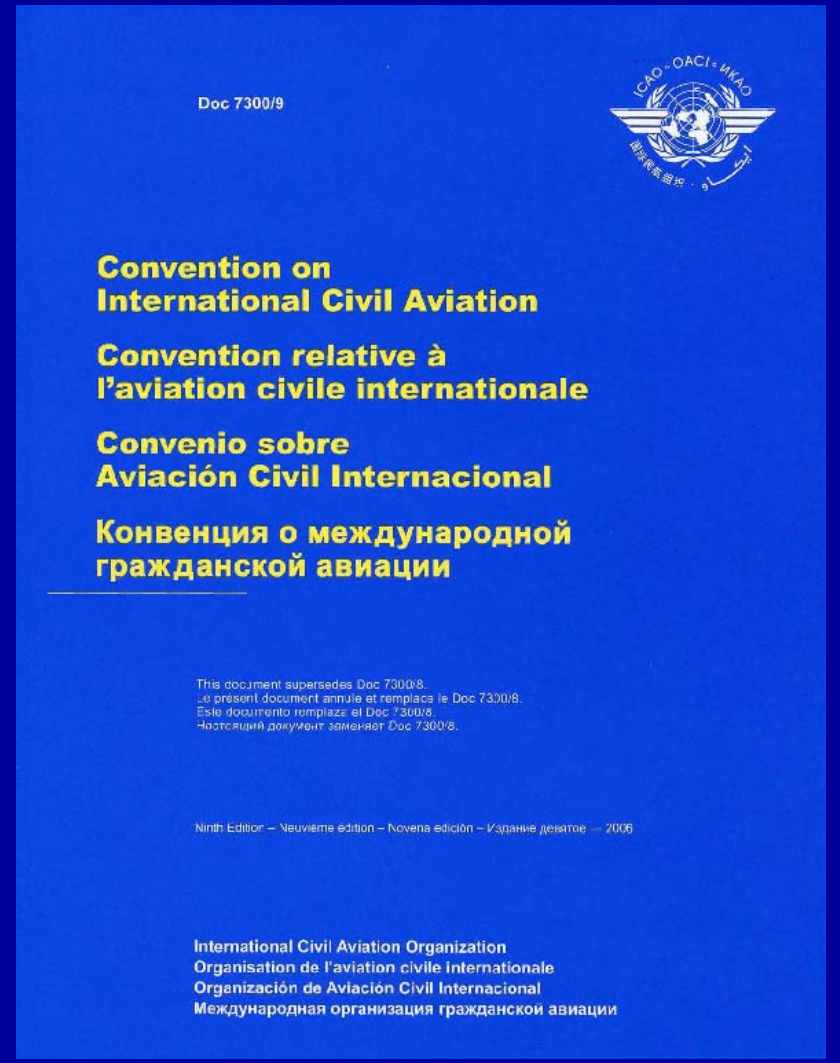
- Notification of PHA
- Parking area
- Advice to travellers
- Holding area for travellers
- Laboratory diagnostic facilities
- Transport to hospital
- PPE and training for staff
- Follow-up of passengers
- Cleaning/Disinfection of aircraft

ICAO Council determined  
action was needed

# Basis for Action

Article 14, International Convention on Civil Aviation:

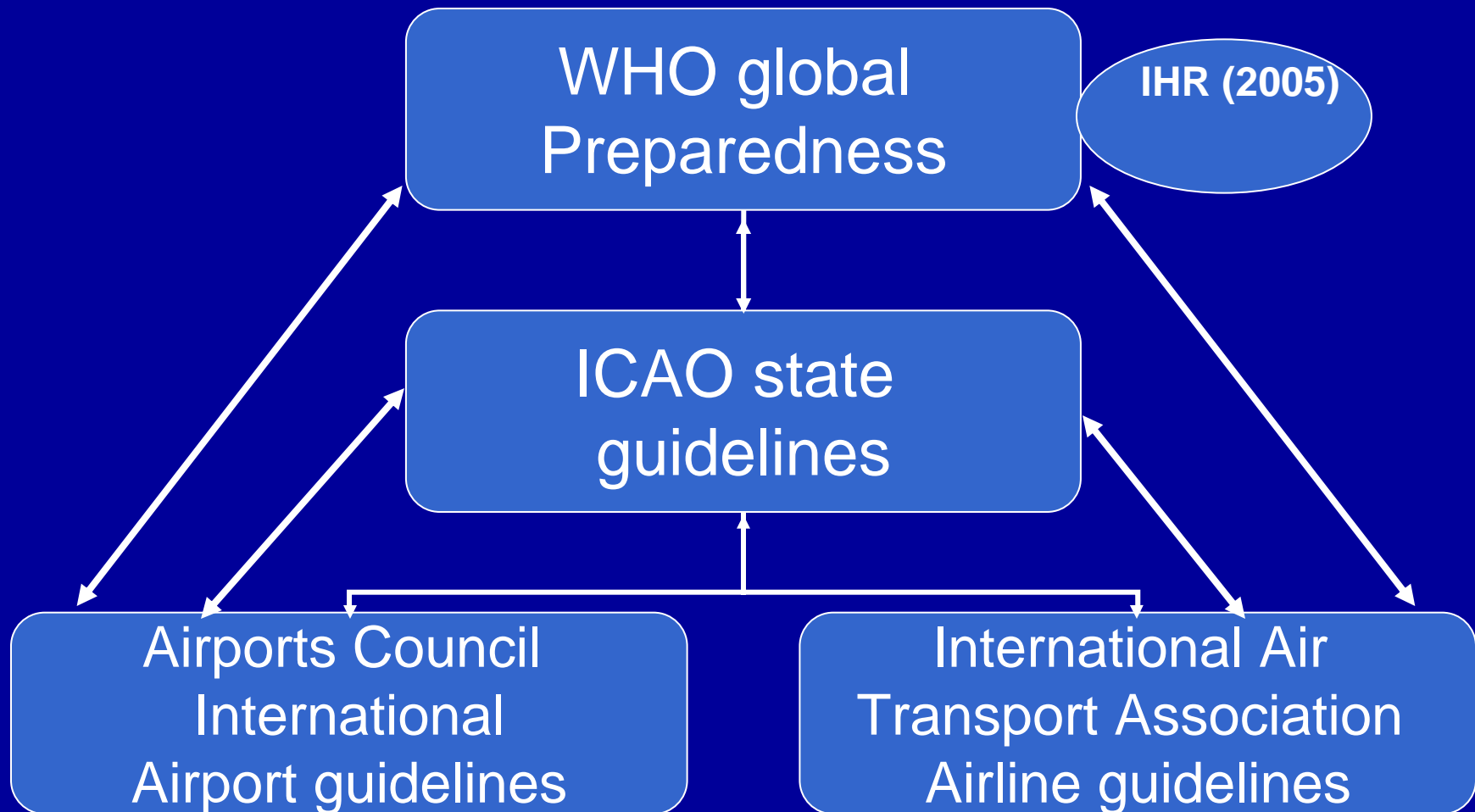
**‘Each contracting State agrees to take effective measures to prevent the spread by means of air navigation of cholera, typhus (epidemic), smallpox, yellow fever, plague, and such other communicable diseases as the contracting States shall from time to time decide to designate....’**





# Web-based guidance

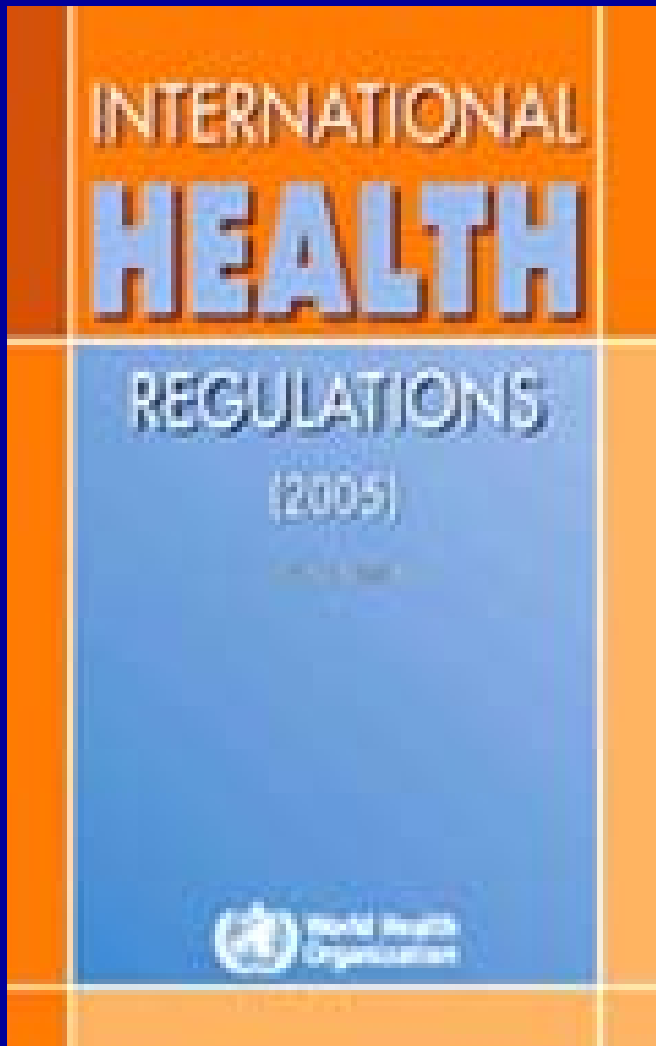
[http://www.icao.int/icao/en/med/medFAQ\\_en.html#health](http://www.icao.int/icao/en/med/medFAQ_en.html#health)



# Cooperative Arrangement for Prevention of Spread of Communicable disease by Air travel - CAPSCA

- Three main aims
  1. Populations
    - Mitigate the risk from pandemic
  2. Travellers (passengers and crew)
    - Reduce risk of spread on board aircraft
  3. Commerce
    - Mitigate the financial impact from an outbreak or pandemic
- Training & Airport Evaluations

# IHR (2005)



- Entered into force June 2007
- Points of Entry
- Routine and contingency measures

# ICAO SARPs Annex 9 – *Facilitation* (Applicable July '07)

- ***‘8.16. A Contracting State shall establish a national aviation plan in preparation for an outbreak of a communicable disease posing a public health risk or public health emergency of international concern’***

# Annex 9 - Facilitation

- Revision of health part of aircraft general declaration

APPENDIX 1. GENERAL DECLARATION

**GENERAL DECLARATION**  
(Outward/Inward)

Operator .....

Marks of Nationality and Registration ..... Flight No. .... Date .....

Departure from ..... (Place) ..... Arrival at ..... (Place)

**FLIGHT ROUTING**  
(“Place” Column always to list origin, every en-route stop and destination)

PLACE	NAMES OF CREW**	NUMBER OF PASSENGERS ON THIS STAGE**

Departure Place:  
Embarking .....  
Through on same flight .....

Arrival Place:  
Disembarking .....  
Through on same flight .....

**Declaration of Health**  
Name and seat number or function of persons on board with illnesses other than sickness or the effects of accidents, who may be suffering from a communicable disease (a fever — temperature 38°C/100°F or greater — associated with one or more of the following signs or symptoms, e.g. appearing obviously unwell; persistent coughing; impaired breathing; persistent diarrhoea; persistent vomiting; skin rash; bruising or bleeding without previous injury; or confusion of recent onset, increases the likelihood that the person is suffering a communicable disease) as well as such cases of illness disembarked during a previous stop

For official use only

Details of each disinfecting or sanitary treatment (place, date, time, method) during the flight. If no disinfecting has been carried out during the flight, give details of most recent disinfecting .....

Signed, if required, with time and date ..... Crew member concerned

I declare that all statements and particulars contained in this General Declaration, and in any supplementary forms required to be presented with this General Declaration, are complete, exact and true to the best of my knowledge and that all through passengers will continue/ have continued on the flight.

SIGNATURE .....  
Authorized Agent or Pilot-in-command

297 mm (or 11.74 inches)

Fever (38°C/100°F or greater) plus one or more of the following signs or symptoms:

- Appearing obviously unwell
- Persistent coughing
- Impaired breathing
- Persistent diarrhoea
- Persistent vomiting
- Skin rash
- Bruising or bleeding without previous injury
- Confusion of recent onset

# Annex 9 - Facilitation

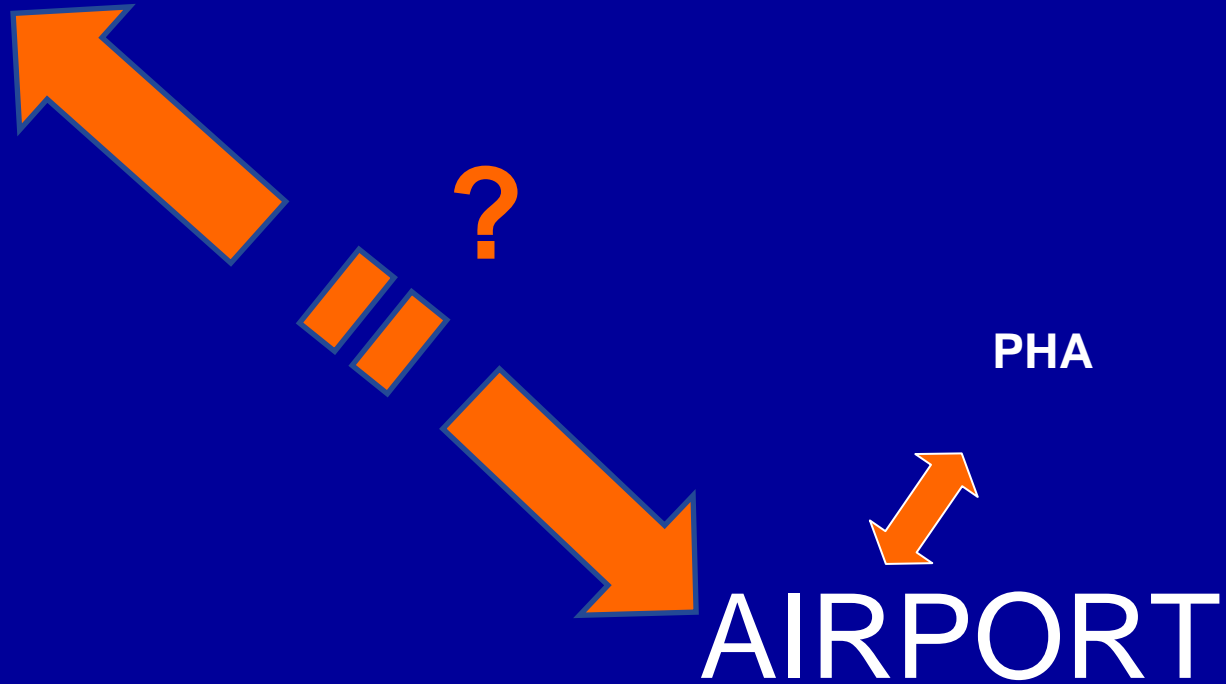
- Public Health Passenger Locator Card

PUBLIC HEALTH PASSENGER LOCATOR CARD			
<small>Public Health Passenger Locator Card to be completed when recommended by the World Health Organization or when public health authorities suspect the presence of a communicable disease. The information you provide will assist the public health authorities to manage the public health event by enabling them to trace passengers who may have been exposed to communicable diseases. The information collected will be held by the public health authorities in accordance with applicable law and will be used only for public health purposes.</small>			
<b>Flight Information</b>			
1. Airline and Flight Number		2. Date of arrival	3. Seat Number where you actually sat on the aircraft
Airline	Flight Number	DD MM YYYY	
<b>Personal Information</b>			
4. Name			
Family Name		Given Name(s)	
Your Current Home Address (including country)			
Street Name and Number		City	State/Province
Country		Z/P/Postal Code	
Your Contact Phone Number (Residential or Business or Mobile)			
Country code	Area Code	Phone Number	E-mail address
Passport or Travel Document Number		Issuing Country/Organization	
<b>Contact Information</b>			
5. Address and phone number where you can be contacted during your stay or, if visiting many places, your cell phone and initial address			
Street Name and Number		City	State/Province
Country		Z/P/Postal Code	Telephone Number (including country code) or mobile phone number
6. Contact information for the person who will best know where you are for the next 21 days, in case of emergency or to provide critical health information to you. Please provide the name of a close personal contact or a work contact. This must NOT be you.			
a. Name			
Family Name		Given Name(s)	
b. Telephone Number			
Country code	Area Code	Phone Number	E-mail address
c. Address			
Street Name and Number		City	State/Province
Country		Z/P/Postal Code	
7. Are you traveling with anyone else? YES/NO Circle appropriate response. If so, who? (name of individual(s) or group)			

## Annex 9 - *Facilitation*

- Pilot-in-command to notify ATC as soon as he is aware of a suspected case of communicable disease on board.

# CURRENT SITUATION: AIRLINE NOTIFICATION OF EVENT



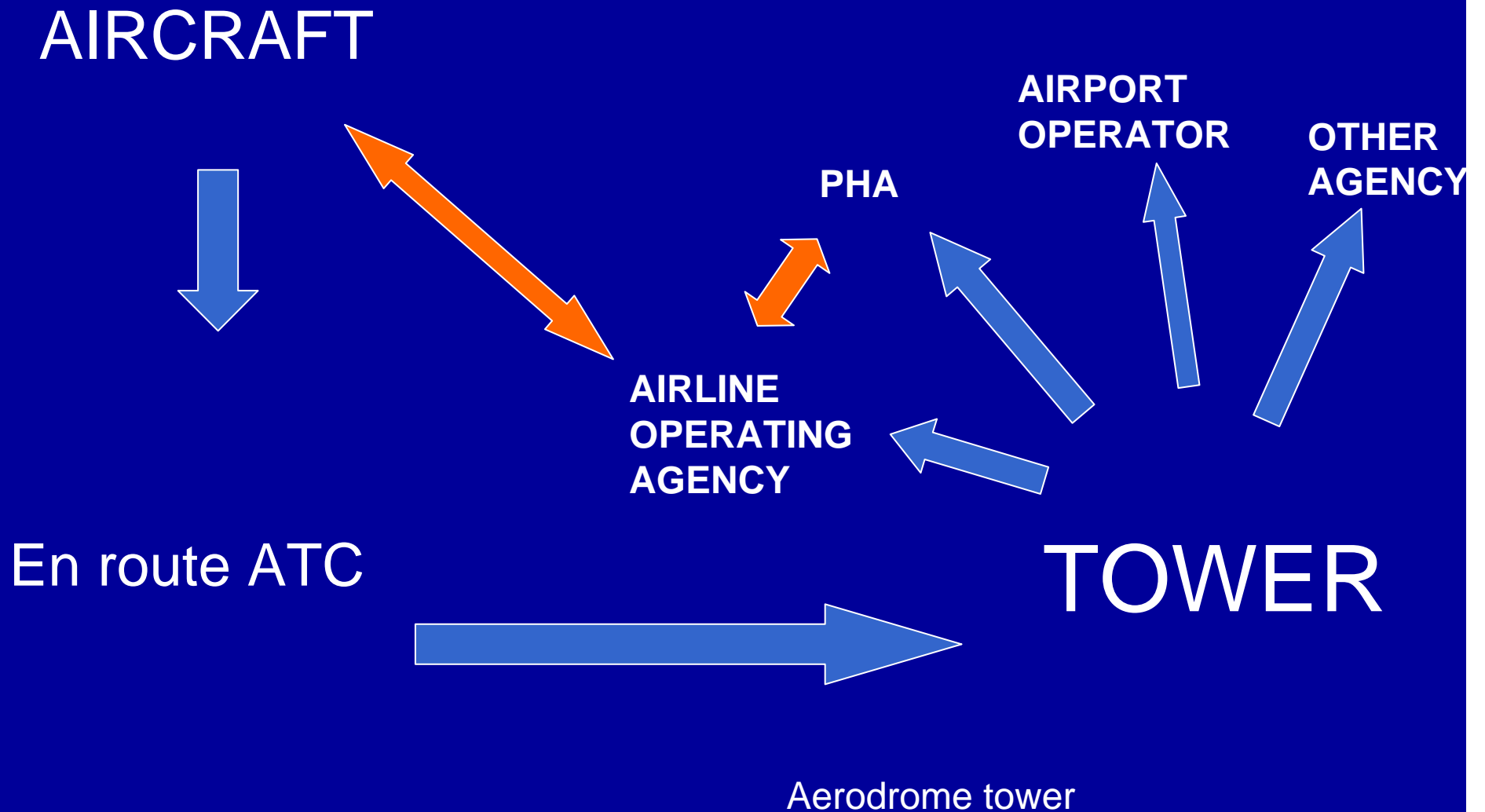
AIRLINE  
OPERATING  
AGENCY

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AIRPORT



# ATC NOTIFICATION OF EVENT



# Annex 11 – *Air Traffic Services*

## Annex 14 - *Aerodromes*

- ‘Public Health Emergencies’ to be included in Contingency/Emergency Plans
  - Applicability date 19 November 2009

# Other work: (1) On-board Medical Supplies

*Annex 6 – Operations. Applicability, 19 November 2009*

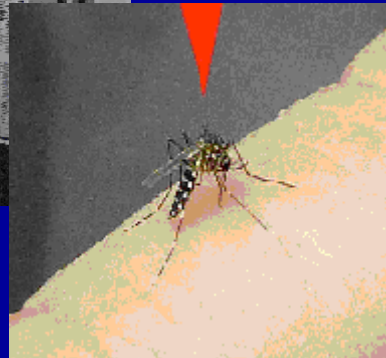
- Updated:
  - First Aid Kits
  - Medical Kits
- New
  - ‘Universal Precaution Kit’ (one or two to be carried per aircraft)
  - Protection for cabin crew
  - Equipment to mop up spills
  - Germicidal wipes

# Other work: (2)

## Aircraft disinsection, with WHO



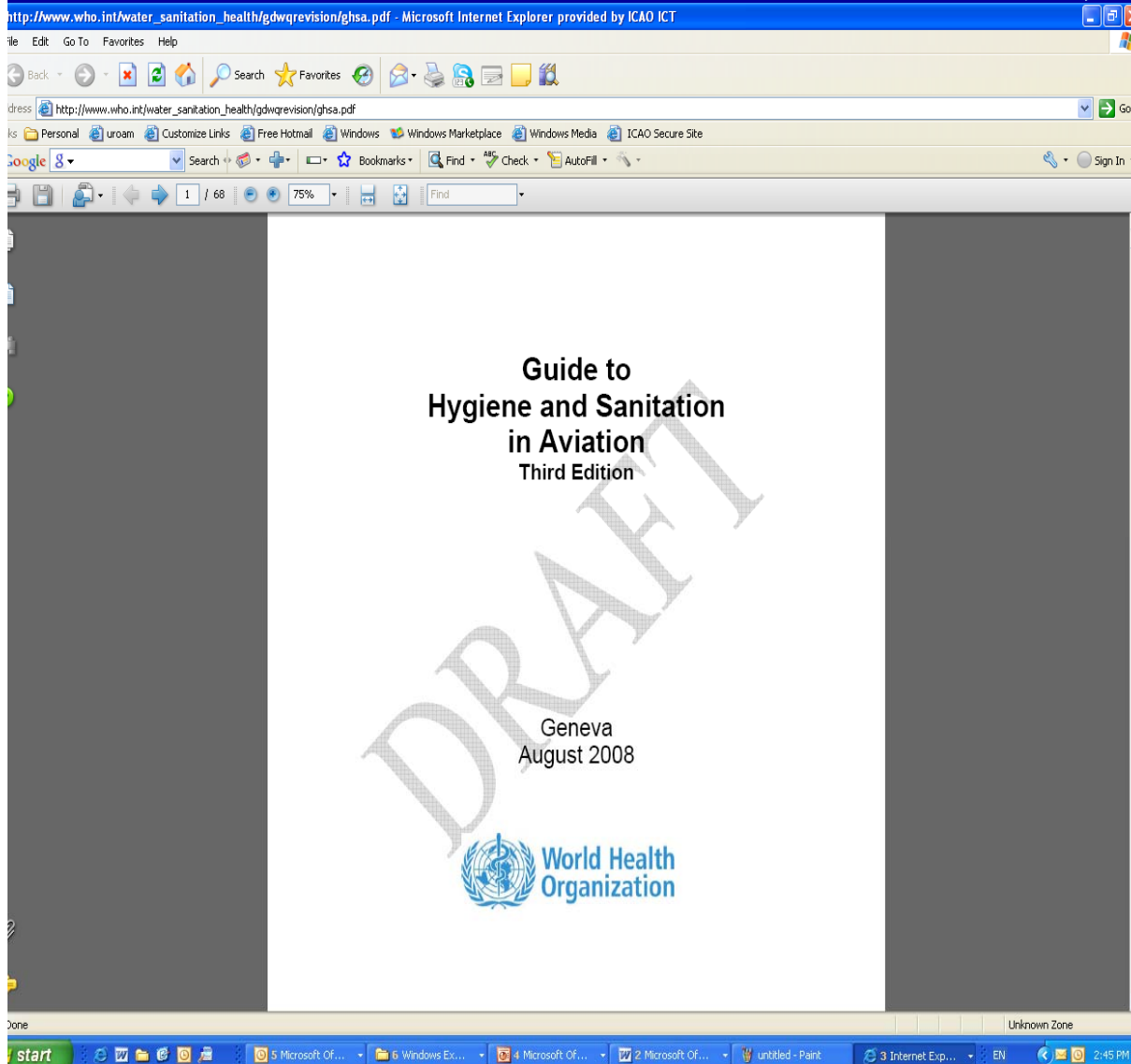
- Review of methods
- Non-chemical



Photographs courtesy of WHO

# Other work: (3)

## Aircraft disinfection, with WHO



- Revision of:
  - WHO Guide to Hygiene and Sanitation in Aviation

# Summary

- ICAO's role
  - Convention on International Civil Aviation
- Web-based guidance
- CAPSCA project
- ICAO Standards
- Other work
  - On-board medical supplies; disinsection; disinfection

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An Indian health worker wrings the neck of a chicken during a culling operation at Potiram village in West Bengal district yesterday after a fresh outbreak of bird flu was confirmed.

DIPTENDU DUTTA, AGENCE FRANCE-PRESSE/GETTY IMAGES

# Don't forget bird flu

## New outbreaks raise pandemic fears again

LOS ANGELES TIMES

LOS ANGELES - The deadly H5N1 virus, bird flu, has resurfaced in poultry in Hong Kong for the first time in six years, reinforcing warnings that the threat of a

new outbreaks. In that same period, four new human cases in Egypt, Cambodia and Indonesia were reported to the World Health Organization. A 16-year-old girl in Egypt and a 2-year-old girl in Indonesia have died.

Spanish flu of 1918, which killed an estimated 40 million people worldwide.

In Hong Kong in 1997, the H5N1 virus was first seen to jump from chickens to humans,

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The decision to charge an Afghan man in Helmand province with the first such case for the U.S. military forces in Afghanistan has triggered several legal actions in the past year involving the deaths and coalition

In one incident, Polish soldiers were accused of unlawfully shooting and killing several Afghans in August 2001. The village was mortared and machine-gunned, apparently in retaliation for a Taliban attack.

Six Afghan civilians, including women and children, were killed in the attack. The U.S. military has not under any circumstances opened fire.

And in September, a U.S. special forces soldier, Joseph Newell, was charged with the murder of a body.

The case revolves around an incident in March 2002. U.S. military control stopped two Afghan men, women and children. After seeing the men and children with weapons, the U.S. soldiers asked if any of them had cellphones. One man handed forward a mobile phone.

After finding a mobile phone of a man, U.S. soldiers accused of working with insurgents, the charge he denied.

A U.S. soldier testified that he then saw Newell take the man to the desert, shoot him

Montreal  
Gazette:  
January 2009

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International Civil Aviation Organization  
Montreal

Lima, Peru, April 2009





***Research on the Transmission of Disease in  
Airports and on Aircraft: A Symposium***

Transportation Research Board  
of The National Academies

**17-18 September 2009, Washington**

- **Understanding How Disease Is Transmitted via Air Travel**
- **Respiratory Diseases** (SARS, TB case studies, airflow modelling)
- **Blood Borne Diseases** (Universal precautions)
- **Gastrointestinal Diseases** (Norovirus investigation, infection control techniques)
- **Vector Borne Diseases** (airport malaria)
- **Discussion of Future Research Needs**