

**SECRETARY OF STATE'S HIGH-LEVEL SCIENTIFIC COLLOQUIUM
ON PANDEMIC INFLUENZA**
Wednesday 25th April

SUMMARY OF MAIN POINTS

Agenda

Introduction by Patricia Hewitt, Secretary of State for Health

Main discussion

- I. risk of pandemic being caused by H5N1
- II. vaccines
- III. antivirals
- IV. facemasks
- V. antibiotics

Round up with conclusions and identified actions

1. Introduction

The Secretary of State for Health, the Rt Hon Patricia Hewitt, welcomed everyone to the meeting. She explained that this colloquium was part of a process of ensuring that the UK's pandemic preparedness planning was based on the most up to date and comprehensive scientific advice.

Professor Lindsey Davies, National Director of Pandemic Influenza Preparedness, gave a short presentation on how scientific advice feeds into policy development.

2. Discussion

Professor Sally Davies chaired the discussion session. She explained that for each of the five science papers tabled she would be asking a key question:

- Does the paper reflect a comprehensive and accurate view of the state of the science?

She encouraged participants to express any doubts about any aspects of the papers.

2.1 Risk of pandemic being caused by H5N1

Main points made:

- We need to prepare for a pandemic regardless of whether it is caused by H5N1 or another virus.
- H5N1 is not necessarily the most likely virus to lead to a pandemic, but we need to be concerned because of its potential severity.
- We need to prepare for an H5N1-related pandemic, but we need to consider other viruses in our plans as well.
- Transmission is a separate issue from virulence.

- More research is needed on virus transmission. This probably requires increased category 4 facilities (currently there are only two available in the UK).
- It was agreed the paper reflected a comprehensive and accurate view of the state of the science.

2.2 Vaccines

Main points made:

- Increased cross-reactivity and production capacities over the last year or so have now made pre-pandemic vaccine a realistic option.
- We should stockpile H5 pre-pandemic vaccine.
- There was no great support from this group for pre-immunisation when a pandemic is not imminent, nor for trying to change seasonal flu vaccines.
- A lot of the vaccination expertise lies in the private sector. Government should tap into that source.
- Antigens and adjuvants are developed together, you cannot mix and match them.
- Standardisation of assays to measure immunological response is essential.
- More research is needed on transmissibility of flu viruses.
- Research needs to be done on disruptive technologies, particularly by public private partnerships (and funded by the government).
- It was agreed the paper reflected a comprehensive and accurate view of the state of the science.

2.3 Antivirals

Main points

- The role of antivirals in stopping the immunopathogenicity cascade needs to be investigated.
- Prophylaxis could be of two types – post-exposure household prophylaxis and pre-exposure healthcare workers prophylaxis. Post-exposure prophylaxis can lead to seroconversion and thus future protection, whereas with pre-exposure prophylaxis the person remains susceptible to infection when prophylaxis stops.
- Depending on the characteristics of the emergent pandemic virus, seasonal flu is not necessarily a good model from which to deduce dosage and when it is still effective to dose antiviral against pandemic influenza.
- There was consensus that we should stay with oseltamivir as a treatment option, but that if the stockpile was enlarged, zanamivir should also be included.
- We should also research M2-blockers and decide if they would be a useful addition, if the stockpile were to be increased even further.
- In a pandemic it may be necessary to over-ride NICE guidelines which relate to antiviral use in seasonal flu.

- It was agreed the paper reflected a comprehensive and accurate view of the state of the science.

2.4 Facemasks

Main points

- This is a data-poor area.
- Permissiveness aspect of the paper is an important point.
- Public health measures need further research, including handwashing, gloves, and gels as well as masks.
- Behavioural issues before and during a pandemic need to be better researched. This should include
 - whether masks induce a false sense of security and thus stimulate dangerous behaviour
 - the no-touch-face benefits
 - the reactions of others, family, colleagues, general public to seeing masks worn.
- Discussions with ESRC are in progress about this area.
- Wearing of masks by healthcare workers hampers good communication and elongates normal tasks.
- Expectations raised by mask use, or lack thereof, in other countries should be taken into account.
- It was agreed the paper reflected a comprehensive and accurate view of the state of the science.

2.5 Antibiotics

Main points

- General support for the recommendations of this paper.
- Early guidance for clinicians will be important.
- JCVI advice about the use of pneumococcal vaccine as a pandemic influenza countermeasure is desirable.
- The question was raised whether it would be helpful for near patient pneumococcal testing to be considered.
- The link between viral infections predisposing to bacterial infections needs to be better understood.
- It was agreed the paper reflected a comprehensive and accurate view of the state of the science.

3. Round up with conclusions and identified actions

Main points

- Gaps in research need to be prioritised and addressed.
- Logistical issues need to be thought through.
- Funding needs to be made available.
- International research roadmap work needs to be played in to UK decisions.
- Need to be aware of international issues.

- Advisory processes need to be improved to ensure there is a single consistent voice during a pandemic.
- Advice should also be sought from the private sector, esp. on vaccines and antivirals.
- We should investigate designing a real-time project to monitor the pandemic so we have a wealth of data for the future.

Secretary of State, Rt Hon Patricia Hewitt thanked all participants for an informed, rational discussion.