

Boosting access to disease data

A new agreement by stakeholders to improve the sharing of flu data should eventually stimulate research on many infectious diseases. Now to make it work.

The pledge by leaders of the rich G8 countries at their summit in Russia in July to boost the meagre quality of international surveillance of infectious diseases correctly identifies many key needs: "better coordination between the animal and human health communities, building laboratory capacities, and full transparency by all nations in sharing, on a timely basis, virus samples."

A scheme to end secrecy in the sharing of avian-flu samples and data, announced online last week in *Nature* (see page 981), addresses one aspect of the challenge. The Global Initiative on Sharing Avian Influenza Data (GISAID) is modelled on guidelines for sharing data in large-scale biological research (see www.wellcome.ac.uk/doc_wtd003208.html). It is encouraging that so many leading flu researchers have signed up to its principles, under which countries and scientists would immediately share pre-publication samples and data, provided that all those who seek access abide by rules on intellectual property and the attribution of credit. All data would be released in GenBank and other public databases no later than six months after submission. If it works, it would provide a model for the rapid dissemination of data from outbreaks of future emerging diseases.

GISAID tackles several problems. Countries are often reluctant to share outbreak materials and data, as it could compromise their trade or other national interests. Scientists in affected countries can be loathe to cooperate, as they often see little in return by way of scientific cooperation in building surveillance programmes or fighting the disease. Some researchers hoard data, often for years, for competitive reasons (see *Nature* 441, 1028 & 440, 255–256; 2006).

A consensus is emerging, however, that full and rapid sharing is ultimately in the best collective interest of research, surveillance and control. In April, OFFLU, the network on avian influenza of the World Organisation for Animal Health (OIE) and the United Nations' Food and Agriculture Organization (FAO), committed itself to making public material on outbreaks in animals. But it has had mixed success, as it relies on the cooperation of affected countries.

Regarding human cases, the World Health Organization (WHO),

while supportive of wider sharing, has been criticized for timidity in pressing countries to release material. But the WHO, like the FAO and OIE, ultimately answers to its member states. Moreover, its priority is not research but the prompt assessment and control of human cases. It has been understandably reluctant to tamper with its existing system, in which countries make samples and data available to a small group of WHO-affiliated labs on a password-protected database. Although imperfect, at least this approach gives it access to much of the genetic, epidemiological and clinical data it needs.

But the system's limits are alarming. For example, when a cluster of human H5N1 cases occurred in Indonesia in May, the WHO had almost no recent animal sequence data available to help it understand the virus's evolution. Rapid sharing of samples and data with scientists across many disciplines is also key to quickly getting a deeper understanding of the virus, and improved drugs and vaccines.

GISAID's broad endorsement of the goal of prompt sharing from multiple stakeholders, often with conflicting interests, is in itself progress and a tribute to the diplomacy of those involved. Tangible evidence of change has also come from the Indonesian government and the US Centers for Disease Control and Prevention, which both announced in August that they would share all flu genomic data; they should be congratulated on having the courage to change policy.

Agreement on the principles of GISAID is only a beginning, however. Prompt progress in establishing the ground rules for sharing will be essential to build confidence and momentum. Governments need to support laboratory capacities in those countries that need it most, where surveillance is weak. And unless donor countries also provide more funds and technical support to fight the disease in animals, which is the reservoir of human cases, we are likely to have more data to share on avian flu than we would like. ■

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Rude palaeoanthropology

Controversies over *Homo floresiensis* reflect a flourishing science.

Debate is something on which science thrives. Active disputes are signs of a discipline in rude health, in which discovery piles on discovery, each new fragment of knowledge questioning the one before, until sufficient findings accumulate to decide the matter one way or the other. Or sometimes, a consensus is reached that none of the original protagonists had thought of. This consensus

is always provisional. In contrast, a field in which everyone blandly agrees with everything is a field in stagnation.

That is why the publication of a paper in the *Proceedings of the National Academy of Sciences (PNAS)*, robustly countering the identification of *Homo floresiensis* as anything other than a malformed human pygmy (T. Jacob *et al. Proc. Natl Acad. Sci. USA* doi:10.1073/pnas.0605563103; 2006), is to be warmly welcomed. The original discovery of a population of bizarre hominids that lived on the island of Flores in Indonesia until relatively recent times (P. Brown *et al. Nature* 431, 1055–1061; 2004) understandably caused a sensation. The idea of an extinct species of 'little people' that coexisted with modern humans gripped the public imagination, and journalists