

# Unmet Needs in Public Health

**B**y the middle of the past century, health professionals predicted that we would conquer infectious disease. Now the current epidemics of human immunodeficiency virus (HIV), tuberculosis, malaria, and antibiotic-resistant infections, among many other threats, show how naïve that view was. Even though we understand what causes most of the world's plagues and have already devised medical tools and sanitation strategies to fight them, infectious diseases still claim millions of lives each year (see <http://www.who.int/whosis/> for detailed statistics). These diseases remain major killers, largely because the tools and strategies do not reach the people who need them most: the poor of the poorest developing countries. This special section includes case studies on some of the key public health problems assailing the world.

Even though the statistics are dismal, Jha *et al.* (p. 2036) point out that it is feasible to improve public health at the global level. Recent history in some poorer countries provides a basis for optimism. For example, Cambodia and Uganda have made remarkable progress in curbing HIV. Social and political action are crucial. One vital need is to improve the social status and educational level of young women so that they can make autonomous decisions about matters affecting their health.

The importance of the political dimension of public health is well illustrated by multidrug-resistant tuberculosis (MDR TB). One of the consequences of poor governance in the former Soviet Union was a lack of surveillance and a misuse of antibiotics for TB control, leading to hot spots of MDR TB in the Baltic states and fears of a MDR TB pandemic. Dye and colleagues (p. 2042) describe how the directly observed treatment strategy for TB control can limit even MDR TB. Furthermore, Floyd *et al.* (p. 2040) calculate that the annual cost of TB control measures in the world's 22 most afflicted countries is a mere U.S. \$1 billion a year.

To achieve the public health improvements demanded by the United Nations Millennium Development Goals ([www.undp.org/mdg/](http://www.undp.org/mdg/)) will require money and political will in rich and poor countries alike. The Bill and Melinda Gates Foundation is rising to the challenge and devoting hundreds of millions of dollars to fight HIV and tropical diseases in poor countries (see News Focus). Despite its wealth, the United States still has problems at home and is grappling with a shortage of key vaccines (see News Focus). Even the highly developed countries of the European Union lack an effective surveillance system for communicable diseases (MacLehose *et al.*, p. 2047). Although the United States, via the Centers for Disease Control and Prevention, has the capacity to monitor and apply control measures for dangerous diseases that threaten its boundaries, the use made domestically of such federal services is patchy ([www.phppo.cdc.gov/documents/KoplanASTHO.pdf](http://www.phppo.cdc.gov/documents/KoplanASTHO.pdf)). However, the threat from bioterrorism has contributed to the reinvigoration of public health initiatives, not least to research by U.S. and Russian scientists on smallpox drugs and vaccines (see News Focus).

We have the demonstrated ability and the money to bring good health to all, but we are still a long way from parity. Harvard economist Jeffrey Sachs has asserted that if every high-income citizen of the world denied themselves the equivalent of a bag of popcorn and a movie per year, the Global Fund to fight AIDS, TB, and malaria could be supported at recommended levels. So, although feasible in principle, the key hurdle to overcome in alleviating poverty and global disease is public recognition that the present inequities are intolerable.

—CAROLINE ASH AND BARBARA JASNY



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