

PLANNING FOR AN

INFLUENZA PANDEMIC

SOCIAL JUSTICE AND DISADVANTAGED GROUPS

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Because an influenza pandemic would create the most serious hardships for those who already face most serious hardships, countries should take special measures to mitigate the effect of a pandemic on existing social inequalities. Unfortunately, there is little evidence that anybody is thinking about that.

The international community recognizes that an influenza pandemic could have devastating global effects. And as recent disasters like Hurricane Katrina and the Indian Ocean tsunami have shown, people who are already economically and socially disadvantaged will probably suffer the pandemic's greatest burdens.¹ They will be among those least likely to receive effective medical countermeasures or to benefit from nonmedical public health interventions, and they will be among those

most likely to die as a result of infection. A recent paper by C.J. Murray and colleagues predicts that if a pandemic similar to that of 1918-1919 emerged today, 96 percent of the deaths would occur in the developing world.² Disparities between the disadvantaged and those who are better off can also be expected within countries. There is evidence from 1918 that in both wealthy and developing countries, lower social classes and oppressed groups had substantially higher mortality rates than the dominant or ruling population.³

In addition to immediate morbidity and mortality, an influenza pandemic would also bring about severe social and economic disruption. And here, too, the burdens would likely not be distributed evenly.

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There are already reports that efforts to contain the spread of highly pathogenic avian influenza through forced culling and restrictions on backyard poultry farming are creating serious hardships for disadvantaged groups. Poor women and children whose chickens are their only source of independent income and small-scale farmers who are struggling to overcome severe poverty and achieve stable livelihoods are particularly vulnerable.⁴ The potential for a pandemic to exacerbate existing social and economic inequalities underscores the importance of considering a pandemic not only as a pressing public health issue, but also as an urgent matter of social justice.

Social Justice and Pandemic Influenza

Social justice is concerned with how features of the social structure result in systematic inequalities and disadvantages in well-being.⁵ In the context of planning for and responding to a pandemic, social justice demands that attention be given to groups characterized by severe poverty or by features that contribute to subordinate social status and power, such as gender, race, ethnicity, and religion.⁶ Although the World Health Organization holds that pandemic influenza plans should include consideration of “ethical issues,” its *Checklist for Influenza Pandemic Preparedness Planning* does not specifically address the needs of socially and economically disadvantaged groups.⁷ Similarly, although a number of articles and reports have addressed important ethical considerations raised by the threat of a pandemic⁸—including four working papers prepared as part of the WHO’s initiative on ethical issues in influenza pandemic planning⁹—only one published paper explicitly frames a pandemic as an important social justice issue.¹⁰

To address this gap, an international panel of experts in public health, animal health, virology, medicine, public policy, economics,

Figure 1 The Bellagio Group’s Checklist for Pandemic Influenza Preparedness and Response Plans

In the development, refinement, and testing of regional, national, and local pandemic influenza preparedness and response plans, governments and relevant institutions should:

1. Identify and enumerate both those groups who are traditionally disadvantaged and those who are likely to be disproportionately affected by preparations for an influenza pandemic, responses to a pandemic, and by a pandemic itself.
2. Engage disadvantaged groups and/or their representatives in the planning process.
3. Identify and address the special needs of disadvantaged groups in the context of recommendations and policies to prepare for and respond to an influenza pandemic.

bioethics, law, and human rights met in Bellagio, Italy, in July 2006.¹¹ The panel, which came to be called “the Bellagio Group,” was comprised of twenty-four individuals from eleven countries and convened by two of the authors with support from the Rockefeller Foundation. Their charge was to identify current and potential responses to pandemic influenza that are likely to have profound effects on the world’s disadvantaged, and to recommend concrete steps to prevent—or at least mitigate—those outcomes that are the most unjust. The group summarized its conclusions in a “Statement of Principles” that encourages policy-makers to take the interests of the disadvantaged into account as an essential component of avian and pandemic influenza preparedness planning and response.¹² Accompanying the statement is a series of concrete “checklists” intended to provide specific guidance to planners and those working in the field (epidemiologists and animal health workers, for example).

One of these checklists addresses the development of pandemic preparedness and response plans (Figure 1).¹³ It proposes three principal criteria. Planners should: (1) explicitly identify disadvantaged groups within

society; (2) engage these groups in the planning process, either directly or through their representatives; and (3) identify and address the special needs of disadvantaged groups in the context of a pandemic.

This paper explores the extent to which existing national pandemic plans meet the criteria set forth in the Bellagio Group’s checklist. Although several reviews of national pandemic plans have appeared in the literature, each focusing on particular aspects of those plans,¹⁴ this paper is the first, to our knowledge, to address social justice considerations from the standpoint of the needs and interests of socially and economically disadvantaged groups.

National Pandemic Preparedness Plans

We collected plans from Web sites that compile planning documents, such as the World Health Organization and the United Nations. In addition, we used the Google search engine to locate documents on the Web sites of national ministries of health. Finally, we contacted each of the WHO National Influenza Centers, representing eighty-three countries, and requested access

to official plans. The search and retrieval process occurred between April 6, 2006, and July 1, 2006. We distinguished between plans that address responses to a *human* influenza pandemic and those that focus on influenza as an *avian* disease (that is, an epi- or panzootic), including all plans that addressed the issue of human pandemic influenza, whether available in draft or final form, published or unpublished.¹⁵ We did not review documents that pertained solely to avian influenza preparedness or those that were not available in English.

Using the Bellagio Group's *Checklist for Pandemic Influenza Preparedness and Response Plans* as a guide, we reviewed each of the plans and identified passages that (1) identified socially or economically disadvantaged groups; (2) described the engagement of disadvantaged groups (or their representatives) in the planning process; (3) discussed the special needs of disadvantaged groups or described ways to address these needs. Each plan was read by one of three researchers. (To ensure that all three would produce sufficiently similar results, they were trained by completing an in-depth review of one plan.)

Countries were classified by region and level of development (low, middle, and high income) as determined by the World Bank, which classifies countries based on per capita income.¹⁶ We also noted the date of each plan (when it was published or distributed) to determine if more recent plans differed from older plans in how they attended to social justice issues.

We reviewed a total of thirty-seven plans. Of these, fifteen were from high-income countries, eighteen from middle-income countries, and four from low-income countries. Sixteen plans were from Europe; fourteen from Asia and the Pacific; four from the Middle East and Africa; and three from the Americas (see Figure 2 and Table 1). The date of plan release/publication ranged from August 2001 to January 2006. Not all

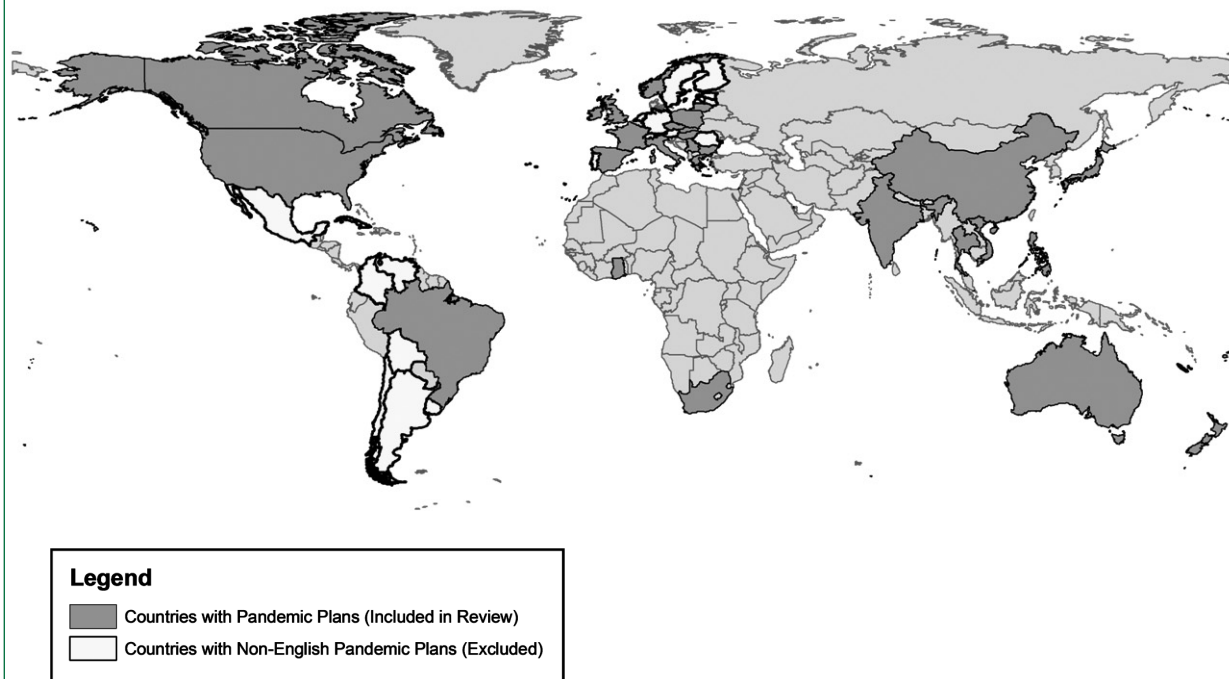
Table 1
National Pandemic Preparedness Plans
Included in Review

<i>Region and country</i>	<i>Date of publication*</i>	<i>Income level†</i>
Europe		
Bulgaria	2000	Middle
Czech Republic	April 2004	Middle
France	January 2006	High
Greece	October 2005	High
Hungary	September 2003	Middle
Ireland	2002	High
Italy	2005*	High
Lithuania	September 2005	Middle
Montenegro	October 2005	Middle
Norway	July 2003	High
Poland	2005*	Middle
Serbia	October 2005	Middle
Slovak Republic	August 2001	Middle
Spain	May 2005	High
United Kingdom	October 2005	High
Asia and Pacific		
Australia	June 2005	High
China	2006	Middle
East Timor	November 2005	Low
Fiji	November 2005	Middle
Hong Kong	February 2005	High
India	December 2005	Low
Japan	November 2005	High
Nauru	August 2005	Middle
New Zealand	November 2005	High
Palau	October 2005	Middle
Philippines	October 2005	Middle
Singapore	December 2005	High
Thailand	May 2005	Middle
Tonga	2006	Middle
Vietnam	September 2005	Low
Middle East and Africa		
Bahrain	November 2005	High
West Bank/Gaza	2005*	Middle
Ghana	December 2005	Low
South Africa	2002	Middle
Americas		
Brazil	September 2005	Middle
Canada	September 2004	High
United States	November 2005	High

* For purpose of this analysis, plans that use a six-phase pandemic response framework are assumed to have been published after March 2005, as the WHO did not formally adopt this scheme until late 2005.

† Level of development, as categorized by the World Bank ("Data and Statistics: Country Classification by Income Level," 2007; <http://www.worldbank.org>).

Figure 2
National Pandemic Plans Included in Review



plans indicated the exact date of publication, but we were able to estimate dates based on whether the plan used the six-phase model for pandemic preparedness adopted by the WHO in 2005.¹⁷ (See Table 1 for descriptive information about all thirty-seven plans.)

Because our search strategy relied primarily on the Internet, our sample may not be fully representative of all written plans, especially those of low-income countries. These countries may lack the resources to disseminate pandemic plans in this way or to provide English translations of their plans; however, they are also less likely (due to resource constraints) to develop written plans in the first place. Low-income countries were underrepresented in the sample for these reasons. Although we believe that our exhaustive search strategy captured the universe of plans that were published at the time we were collecting our data, our findings are not generalizable to plans that have not been published because of technical chal-

lenges or concerns over the sensitivity of information. Because the goal of our review was to explore how countries *typically* have (or have not) considered disadvantaged populations in the context of pandemic preparedness (rather than to assess individual countries' plans), we describe our findings in the aggregate.

Identification of Economically and Socially Disadvantaged Groups

The first item in the Bellagio Group's checklist calls for plans to explicitly identify disadvantaged groups, including those such as the poor and political minorities who, because they were already disadvantaged, are likely to benefit less from pandemic responses and suffer more from a pandemic than the rest of the population, as well as those such as poultry farmers who are likely to be disproportionately burdened by attempts to prevent or contain a pandemic. Unfortunately, no plans ex-

PLICITLY indicated either that they had systematically identified these groups or that they were committed to identifying them. Plans in twenty countries discussed "vulnerable" individuals or groups. However, in all instances, the reference was to individuals or groups at *increased biological or medical risk* of succumbing to or transmitting pandemic influenza. For example, eight plans identified pregnant women as a priority for antiviral medications and vaccines, presumably based on the understanding that pregnancy increases the risk of serious medical complications.¹⁸ There was no suggestion that women might be of special concern because they are politically or socially disadvantaged. Indeed, in the countries that identified pregnant women as vulnerable (four high-income and four middle-income countries), the civil rights and social standing of women are relatively well protected.

Some plans referred to the special needs of particular economically or socially disadvantaged groups. Two

high-income countries and one low-income country mentioned those who are “poor,” “uninsured,” or “low-income,” or who live in “extreme poverty.”¹⁹ Another plan noted the potential economic disadvantage facing poultry farmers if concerns about avian influenza depressed market demand for poultry. Ten plans, all from high-income countries, identified groups who might be *socially* disadvantaged or have special needs in the context of a pandemic. These groups included racial and ethnic minorities (five countries), indigenous or native populations (four), religious groups (three), groups with greatest exposure to the virus (three), and immigrants (two). Socially disadvantaged groups were mentioned only in the plans of high-income countries—a disturbing discovery, as these countries are more likely than low- and middle-income countries to have and to enforce human rights protections.

Most of the plans that mentioned socially disadvantaged groups also included some discussion of *why* those groups merited special consideration. For example, plans that discussed racial or ethnic minorities or indigenous populations frequently noted that preexisting health disparities between these groups and the majority population could persist or worsen in a pandemic. Two of the three plans that mentioned religious groups identified their needs for particular consideration in the context of burial customs and other religious rites surrounding death. Three plans suggested that groups in contact with infected animals (such as farmers and veterinary workers) or with patients (such as health care workers) may be stigmatized prior to or during a pandemic, and hence require support. These plans specifically noted the possibility of *social* disadvantage (in the form of stigma) as separate from the *biological* disadvantage posed by increased risk of infection that these groups would certainly also experience.

Inclusion of Disadvantaged Groups in the Planning Process

While the systematic identification of disadvantaged groups is an important step, protecting their rights and interests is difficult unless these groups also participate in the planning process. One of the unjust features of systematic disadvantage is political powerlessness and isolation from civic life. Respecting the rights of disadvantaged peoples entails involving them in communal decisions, especially with respect to policies of great consequence for the well-being of everyone in society. Disadvantaged groups also know best how their own interests are likely to be affected by responses to a pandemic and by a pandemic itself. They are best positioned to identify the range of barriers and burdens they will face in implementing public health recommendations or in accessing medical countermeasures, and they are also best positioned to develop creative responses and remedies. Engaging disadvantaged groups in pandemic planning is in everyone else’s best interests, too; an effective response to a pandemic will require widespread cooperation throughout society with a range of government recommendations. Disadvantaged groups often have sound, historically rooted reasons for distrusting their governments. Involving them in pandemic planning ideally would engender trust in at least this one area of public policy, thereby promoting their cooperation should a pandemic occur.

Unfortunately, there was little evidence in the plans we reviewed that governments had involved disadvantaged groups in pandemic planning. Seven plans (from three high-income and four middle- and low-income countries) explained that, in the process of developing their pandemic plans, countries convened stakeholder committees or meetings that allowed public participation. However, whether disadvantaged groups were represented in this process was unclear. Only three plans specifically

discussed policies to engage socially or economically disadvantaged groups in the planning process; two plans focused on indigenous populations, and one on farmers who might be disproportionately affected by avian influenza containment measures. All three countries identified these groups as being disadvantaged or potentially disadvantaged, as described above. On the other hand, so far as we could discern, most of the countries that identified socially or economically disadvantaged groups did not take the further step of involving these groups in the planning process.

Admittedly, one cannot easily draw conclusions about the role of disadvantaged groups in the planning process simply by reviewing plans. Most documents were silent on the process of plan development; in reading the documents we could make only limited judgments about whether or to what extent the public as a whole had been engaged, let alone about the specific role of particular disadvantaged groups. We recognize the challenges countries face in this endeavor. In a context where governments are struggling for effective mechanisms simply to engage the “general public,” focusing on ways to engage subgroups of the population may appear particularly daunting. Determining who legitimately speaks for a disadvantaged group is also difficult, particularly when such groups are already distrustful of government officials.

The difficulty of this task, however, does not diminish its importance. Unless pandemic planning engages disadvantaged groups in the process, commitments to social justice and the protection of public health will be profoundly undermined.

Policies to Address the Needs of Disadvantaged Groups

A number of plans included policies to address the special needs of particular disadvantaged groups with respect to public health communications and, in a few instances, so-

cial services. The plans of six high-income countries and one low-income country called for culturally appropriate communications in a variety of formats, including the translation of messages into multiple languages; three plans also discussed the need to use communication interventions to counteract the possible stigmatization of groups such as farmers and health care workers. The plans of two high-income and one middle-income country discussed the need to provide economically and socially disadvantaged groups with social services; including counseling (one plan), temporary housing (one), and the delivery of food and medications to the homebound (two). One plan called upon voluntary organizations, and another plan encouraged the development of “community solidarity” to assist with the provision of social support services.

Notably absent were policies to address the special needs of socially or economically disadvantaged groups with respect to medical and public health interventions. Only two plans paid specific attention to the barriers that the poor and other disadvantaged people are likely to face in securing access to vaccines and antivirals. One high-income country’s plan called for the participation of human services providers to make vaccine and antiviral drugs available to residents of homeless youth shelters. One low-income country’s plan committed to providing access to care for those who are unable to pay for medical interventions.

Moreover, the plans rarely addressed the special needs of economically and socially disadvantaged groups in relation to policies about broader public health interventions such as travel restrictions, school closings, and social distancing. For example, there was no mention in the plans we reviewed of the need to ensure food and water security, which is critical to the ability of poor people in many settings to avoid public places and remain in their homes. Nor did the plans address how income loss

and economic disruption associated with a pandemic might disproportionately affect those who are *already* economically and socially disadvantaged. Experts predict economic consequences of a pandemic will be severe, but they describe the effect of a pandemic in terms of macroeconomic consequences, such as declines in gross domestic products, rather than the costs to poor individuals and families.²⁰ A number of plans, however, consider those who would be *newly* disadvantaged, including those who are disabled as a result of response activities (two plans), those whose prop-

erty is confiscated (one), those who lose wages (one), and recently orphaned children (one). Eleven plans (from two high-income, five middle-income, and four low-income countries) discussed compensation to farmers for losses sustained through culling of poultry.

Interestingly, such compensation programs are one instance where developing countries seem to have adopted the most proactive strategies (all of the low-income countries’ plans in our sample discussed compensation, as did nearly one-third of middle-income countries). This may reflect both the significance of avian influenza outbreaks in developing countries and differences in the structure of the agricultural sector in different countries. In developing countries, smallholder poultry farming is commonplace, and effective disease control relies on providing incentives to individual farmers to report sick animals. In more developed countries, most poultry production is carried out on an industrial scale, and

producers either absorb the costs of disease control on their own or rely on private insurance mechanisms to contain losses.

It is noteworthy that countries were more likely to develop policies to protect or compensate those who may *become* disadvantaged by a pandemic (or the threat of a pandemic) than those who are likely to suffer disproportionately because they are already disadvantaged. While reacting to minimize the overall impact of disasters is certainly important, recent examples such as Hurricane Katrina provide concrete evidence of the in-

Countries have been quicker to develop policies for protecting or compensating those who may become disadvantaged by a pandemic than they have been to address the needs of those who are already disadvantaged.

justices that result when emergency planning and response fails to take account of existing inequalities.

Lessons

Several limitations to this research warrant attention. First, it must be noted that the pandemic influenza plans we reviewed are dynamic documents in various stages of development, and any review of such documents will require periodic updating. We are optimistic that in the future, social justice issues are likely to achieve greater prominence in these plans as countries incorporate new WHO guidance that highlights the importance of equity, public consultation, and the fair distribution of benefits and burdens in preparing for and responding to a pandemic.²¹

Second, it is unclear how well any country’s written plan captures the full extent of planning activities in that country, including the extent to which planners incorporate ethical and social justice considerations. In

many countries, for example, the formal pandemic preparedness plan is supplemented by additional guidance (which may or may not be publicly available), and such guidance was not included in this review. Our research was limited to the text of the plans at the time they were written, and some countries may well be taking account of the interests of disadvantaged groups in ways that are not reflected in their national plans. For example, in some countries, much of the responsibility for implementation is transferred to local governments, and perhaps the critical questions about social justice issues are being addressed at this level. Based on the plans alone, however, there is little evidence that national planning efforts are addressing the rights and interests of disadvantaged groups, despite the likelihood that these groups will be disproportionately affected should a pandemic occur.

Our analysis focused on national plans and thus addressed questions of social justice only *within* countries. Larger questions of global justice that arise *between* countries are not addressed here, although they are likely to prove the most pressing if we hope to avert the most serious injustices that could result from a pandemic.²² Murray's prediction that 96 percent of the deaths caused by a pandemic similar to the one of 1918 would occur in the developing world certainly bears this out. Even in the 1918 pandemic, before the development of effective medical countermeasures, the mortality rates in parts of the developing world were nearly tenfold those seen in developed countries. Interestingly, the plans of two middle-income countries and one low-income country mentioned their nations' relative poverty and lack of vaccine manufacturing capacity as relevant to pandemic planning. Although all countries must attend to the urgent concerns that affect their own citizens, none of us is exempt from moral obligations toward the world's poor and disadvantaged.²³

Nearly all of the plans from middle-income countries and one of the four plans from low-income countries prioritized the distribution of medical countermeasures. However, if a pandemic were to occur soon, most of these countries would likely not have medical countermeasures available for widespread distribution. Thus, at least with respect to access to interventions like vaccines, economically and socially disadvantaged groups in the world's middle- and low-income countries may *not* necessarily be worse off than the rest of the population in those countries. However, the fact that countries experienced disparities in mortality rates between disadvantaged groups and more privileged groups during the 1918 pandemic shows that even in the absence of vaccines and antiviral medications, a pandemic has the potential to produce profound inequalities in burdens, both within and across countries.

The pandemic planning checklist proposed by the Bellagio Group is, in some respects, deceptively simple. The first item on the checklist calls on planning authorities to identify disadvantaged groups. Not surprisingly, none of the plans suggested any systematic attempt to identify such groups, and less than a quarter of the plans made even passing reference to one or more economically or socially disadvantaged groups. Identifying economically disadvantaged groups, particularly those living in severe poverty, is relatively straightforward. Identifying socially disadvantaged groups, on the other hand, is more complex and context-specific. Complex or not, if national planning efforts fail to recognize that the effects of a pandemic are unlikely to be felt equally by all in society, and if they also fail to specify which disadvantaged groups in their national contexts are likely to be hardest hit, there is little hope of mitigating some of the most egregious injustices that might accompany a pandemic. All countries should identify which of their disadvantaged groups are likely to suffer

most, include them in the planning process, and take steps to create and implement policies on their behalf. If countries do not incorporate the needs and rights of disadvantaged groups in planning, the effects of a pandemic may not only be catastrophic, but also catastrophically unjust.

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