HIV/AIDS, Reproductive and Sexual Health, and the Law

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The law is a frequently overlooked tool for addressing the complex practical and ethical issues that arise from the HIV/AIDS pandemic. The law intersects with reproductive and sexual health issues and HIV/AIDS in many ways. Well-written and rigorously applied laws could benefit persons living with (or at risk of contracting) HIV/AIDS, particularly concerning their reproductive and sexual health.

Access to reproductive health services should be a legal right, and discrimination based on HIV status, which undermines access, should be prohibited. Laws against sexual violence and exploitation, which perpetuate the spread of HIV and its negative effects, should be enforced. Finally, a human rights framework should inform the drafting of laws to more effectively protect health. (*Am J Public Health.* 2008;98:1779–1786. doi: 10.2105/AJPH.2008.138669)

AFTER MORE THAN 25 YEARS of the HIV/AIDS pandemic, the need for new strategies to combat HIV remains urgent. Approximately 33.2 million people throughout the world are living with HIV,[1] and an estimated 25 million have died from the virus.[2] The demographics of HIV incidence and prevalence have changed over time. Women suffer an increasing number of these infections and deaths, accounting for nearly half of HIV infections worldwide.[3] In sub-Saharan Africa, where infection rates are highest, nearly 61% of the adult infections strike women.[4] Globally, the pandemic has infiltrated all areas of life and has particularly affected reproductive and sexual health.

Some of the most contentious and challenging public health issues arising from the HIV/AIDS pandemic involve reproductive and sexual health.[5] The most common route of HIV transmission in most parts of the world is through sexual intercourse, which fuels much of the unique and powerful stigma associated with the infection. Sexual activity is integral to human existence, and the social perceptions of the association between HIV/AIDS and sexual activity complicate HIV prevention and treatment strategies. Potentially effective prevention strategies, including innovative reproductive health strategies, become embroiled in debate and then are ignored or dismissed because of political sensitivities. As a result, communities are denied the most effective strategies to prevent HIV, which most greatly affects the health and safety of women and children.

Societal pressures and antiquated laws place women at a significant disadvantage to men in accessing health care services.[6] Reproductive health services such as contraception, family planning counseling, and prenatal care are out of reach for many women.[7] Women are biologically more susceptible than are men to HIV infection through heterosexual intercourse, a reality that is often exacerbated by systemic gender inequality and poverty.[8] They are also less likely than are men to have the resources to access HIV prevention and treatment services.[9] Not surprisingly, women and girls have higher infection rates than do men and boys in many of the most affected countries.[10]

The law plays a critical role in promoting reproductive and sexual health. Legislation and litigation are frequently overlooked tools for addressing the complex practical and ethical issues that arise from the pandemic. Our global comparative analysis of the law, sponsored and published by the World Bank,[11] found that the law intersects with reproductive and sexual health issues and HIV/AIDS in numerous ways. Moreover, well-designed legislation and regulation could help create systemic changes to support prevention and treatment of HIV/AIDS, promote reproductive and sexual health, and help correct societal conditions that contribute to the propagation of the pandemic. We analyzed the laws and policies of many countries that affect the HIV/AIDS pandemic and sexual and reproductive health.

Here we focus on the relationship between law and reproductive and sexual health in two critical areas: (1) access to reproductive health services by women and men living with HIV/AIDS or at risk of contracting HIV and (2) constraints on sexual violence and exploitation, which perpetuate the spread of HIV and its negative effects. We formulate several recommendations for how the law can more effectively promote reproductive and sexual health in the face of the HIV/AIDS pandemic. Figure 1 illustrates how different areas of law affect efforts to address reproductive and sexual health issues relating to HIV/AIDS.

ACCESS TO REPRODUCTIVE SERVICES

Protection of reproductive and sexual health for persons living with HIV/AIDS and those at risk of contracting the virus is predicated on the recognition of individual reproductive and sexual rights and other human rights under the law. Pursuant to these rights, women must (1) be able to make reproductive health decisions without coercion; (2) receive necessary prenatal, delivery, and postpartum health care and treatment; and (3) have the means and information to prevent perinatal transmission. All persons should be given access to necessary sexual health

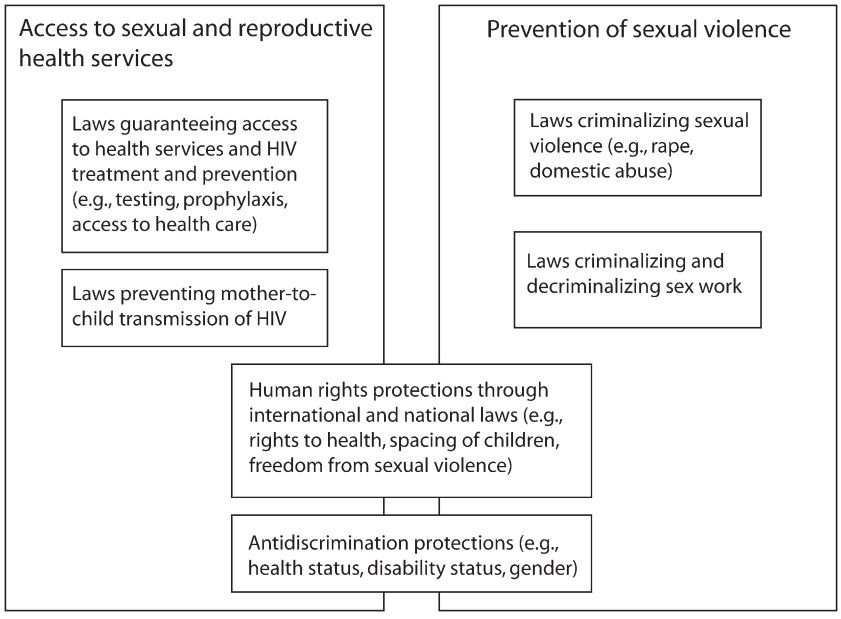

FIGURE 1—Application of law to reproductive and sexual health in the context of HIV/AIDS.

information, including information about sexuality and HIV transmission, and tools to reduce transmission of HIV, such as male[12] and female condoms.[13]

Reproductive Rights

Reproductive and sexual rights are protected human rights, guaranteed under international conventions. These include the right to health,[14] to determine the number and spacing of children,[15] and to be protected from sexual violence,[16] among others.[17] Countries that fail to protect human rights often undercut the ability of individuals to procure necessary health services.

National laws vary considerably in their recognition of reproductive rights in the context of HIV/AIDS. The South African constitution, for example, establishes the right of individuals "to make decisions concerning reproduction," which encompasses decisions on prenatal, delivery, and postnatal care; family planning; prevention and treatment of reproductive tract and sexually transmitted infections; and abortion.[18] Several countries in Asia and elsewhere have implemented national policies, but not laws, that support reproductive rights and integrate HIV services and family planning and reproductive health services.[19] However, many countries in Africa, the Middle East, and Latin America continue to significantly restrict reproductive rights. Laws limiting access to abortion, contraception, and sexual education, for example, negatively affect women living with HIV. They may suffer the sequelae of unsafe, illegal abortions or face the difficult choice between abstinence and the risk of transmitting HIV to a sexual partner.[20]

Discrimination

Discrimination that interferes with access to HIV-related health services is a major barrier to good reproductive health for persons living with HIV/AIDS. The Joint United Nations Programme on HIV/AIDS (UNAIDS) has defined HIV discrimination as "[a]ny measure entailing an arbitrary distinction among persons depending on their confirmed or suspected HIV serostatus or state of health."[21] Widespread discrimination against HIV-positive patients in health care settings through direct denials of care or health insurance has been observed in North America,[22] Europe,[23] Africa,[24] Asia,[25] and Latin America and the Caribbean.[26] Such discrimination also undermines HIV prevention and treatment efforts. Individuals may forgo testing, fail to seek information about how to protect themselves from HIV infection, or shun the health care system altogether to avoid the potential personal, social, and economic consequences of an HIV or AIDS diagnosis.[27] Women living with HIV may face general and gender-specific discrimination and stigma that limit their access to reproductive and sexual health services.[28]

International human rights law, many national constitutions, and other laws prohibit discrimination based on HIV status.[29] A 2006 UNAIDS report found that 61% of countries reported having laws that protected persons living with HIV from discrimination.[30] Some countries (e.g., the Philippines,[31] Cambodia,[32] and South Africa[33]) have explicitly banned HIV discrimination through legislation. The Philippines has adopted a targeted approach, proscribing "discrimination, in all its forms and subtleties, against individuals with HIV or persons perceived or suspected of having HIV" and specifically banning discrimination in hospitals and health institutions.[34] More often, HIV and AIDS are not mentioned specifically in antidiscrimination provisions, such as the US Americans with Disabilities Act.[35] Rather, these laws forbid discrimination based on "other status," "health status," or "disability," which have been further interpreted to include HIV status, AIDS, and related health conditions by international declarations,[36] legislative explanations,[37] and court decisions.[38]

Reproductive and Sexual Health Care and Services

Basic health care and a range of services are fundamental to reproductive and sexual health. For example, availability of methods of prevention such as male and female condoms is critical to a comprehensive, effective, and sustainable approach to HIV prevention and to maintaining sexual health during the pandemic. High-quality, low-cost condoms can greatly reduce the risk of HIV transmission with proper and consistent use.[39]

Approaches to condom access differ around the world. Some countries have enacted laws and policies that support accessibility and availability of condoms.[40] Others perpetuate inaccessibility by failing to allocate resources for condoms, restricting advertising and education campaigns, or criminalizing their possession. The United States has been strongly criticized for limiting access to condoms by requiring 33% of prevention funding under its President's Emergency Plan for AIDS Relief program to be used for abstinence-only education.[41] Some religious hierarchies have constrained efforts to expand access to condoms and sexual education, particularly the Catholic Church, which objects to condom use.[42]

Criminalization of condoms deters sex workers and others from using them and consequently increases the incidence of unprotected sex and the risk of infection. In 1999, under China's State Advertisement Law, the government banned all advertisements promoting condom use. China has since changed its approach and now strongly promotes condom use, education, and access.[43] A few countries have followed the lead of Thailand and enacted laws that require sex workers to use condoms during sexual intercourse.[44]

Prevention of Mother-to-Child Transmission of HIV

Pregnant women need access to a panoply of specific reproductive health services to ensure the well-being of mother and fetus. According to the United Nations Population Fund and the World Health Organization, a pregnant woman should have access to family planning services, abortion services, prenatal counseling and care, professional delivery care, and postpartum HIV counseling and treatment for herself and her child. Although some laws in some countries guarantee access to these services generally, few laws and policies specify access to each of these important services. As a result, these services are not universally available.[45]

Without intervention, the risk that a pregnant woman with HIV will transmit the virus to her fetus in the womb or during childbirth ranges from 15% to 30%. The risk of transmission rises to 20% to 45% if the mother breastfeeds her infant.[46] Peripartum administration of antiretroviral drugs to the mother, the infant, or both is a cost-effective strategy that can reduce the risk of transmission to less than 2%.[47] The efficacy of this treatment regimen in containing HIV infection and limiting mother-to-child transmission has led many lawmakers and health policy experts to recommend widespread testing of pregnant women for HIV.[48]

At least four models of HIV screening have been used with pregnant women: mandatory testing, opt-out screening, opt-in screening, and voluntary screening. Although some countries have imposed mandatory testing, this approach has been widely condemned for its interference with pregnant women's autonomy. UNAIDS, the World Health Organization, and the US Centers for Disease Control and Prevention support routinely offering HIV testing to all pregnant women as a part of antenatal care (opt-out screening).[49] Under this policy, physicians initiate HIV testing as part of the routine panel of prenatal tests unless a woman declines the test. Voluntary, informed consent must be obtained. Pregnant women should receive oral or written information on the clinical and prevention benefits of testing, the right to refuse, follow-up services (posttest counseling, medical care, and psychosocial support), and the importance of partner notification in the event of a positive test outcome. Several countries, including Botswana, have adopted the opt-out approach through legislation.[50]

An alternative approach, opt-in HIV testing for pregnant women, guarantees counseling as part of the prenatal care program and ensures that a patient "will not be denied prenatal care by the health care provider or at the health care facility because [she] refuses to have a test performed."[51] Some jurisdictions use another voluntary screening model, in which a pregnant woman must affirmatively request an HIV test via specific informed consent.[52]

A major question is whether pregnant women who test positive will have full access to treatment before, during, and after childbirth. Access to antiretroviral drugs for the prevention of mother-to-child transmission is limited in many countries. However, South African women denied access to treatment to prevent mother-to-child transmission succeeded in securing that treatment through litigation.[53]

SEXUAL VIOLENCE AND EXPLOITATION

Sexual violence, harassment, and exploitation affecting women, children, and other vulnerable persons are major factors in the spread of HIV/AIDS globally. Gender violence and sexual harassment against women heighten their risk of contracting HIV in several ways: (1) coercive sex often causes injuries that increase the risk of infection; (2) social barriers deter women from resisting unwanted, unprotected sexual encounters; (3) psychological fears prevent women from seeking protection or treatment; and (4) economic realities limit women's ability to seek treatment or avoid risky sexual behaviors.

International human rights law requires nations to ensure that women are not subjected to gender violence.[54] Laws in most countries protect women from sexual violence by criminalizing prostitution, rape, domestic abuse, and sexual harassment.[55] However, meaningful legal protections

may still fail to address various facets of gender violence. Structural barriers embedded in gender bias, social stigma, and cultural norms may discourage women from reporting acts of sexual violence, especially instances of marital rape.[56] Some countries criminalize marital rape—examples are Mexico,[57] Nepal,[58] and Zimbabwe[59]—but others do not. In India, a husband who engages in nonconsensual sex with his wife is not guilty of rape if she is older than 15 years.[60] Even when sexual violence is reported and prosecuted, the punishment may be perfunctory.[61]

Individuals in many societies who have HIV/AIDS or who have lost spouses or parents to the disease are vulnerable to sexual and economic exploitation. In a struggle to survive or by physical coercion, tens of millions of persons have become commercial sex workers,[62] substantially increasing their exposure to sexual abuse, discrimination, and HIV infection. The effect on children is especially profound. UNICEF estimates that 1.2 million children are trafficked each year for prostitution or bonded labor.[63] Multiple international laws and agreements prohibit the use of children in prostitution, other sexual activity, and pornography, regardless of consent.[64] Many countries' laws reflect these international principles by criminalizing child trafficking, harmful child labor practices,[65] and other exploitive activities. Nigeria's National Policy on HIV/AIDS, for example, requires the government to protect vulnerable children from "all forms of abuse including violence, exploitation, discrimination, trafficking, and loss of inheritance."[66]

National or regional laws addressing commercial sex work among women, children, and others who may solicit work informally or through organized prostitution reflect varying cultural norms. Laws addressing commercial sex work vary widely:Some countries—for example, Azerbaijan, Bulgaria, Poland, and Slovenia—fail to legislatively address the practice altogether. In these places, sex work is not explicitly prohibited, but workers may still be selectively targeted, harassed, and abused via prosecution for various infractions, such as loitering, vagrancy, breach of public order, or lack of appropriate documentation (e.g., passports, residency permits).[67]Some countries—for example, Australia, Latvia, Brazil, Greece, Kenya, and Bangladesh—permit informal sex work but seek to regulate its practice through worker licensure, mandatory health screenings, and safe sex requirements.[68]Other countries—examples include many countries of the developing world and the Middle East, as well as most jurisdictions in the United States—prohibit sex work by criminalizing related activities, such as solicitation, exchange of sex for money, management of sex workers, and procurement.[69]

Laws criminalizing sex work, by providing a legislative deterrent, are thought to reduce the incidence of sex work. These laws are meant to reduce the transmission of HIV and other sexually transmitted diseases among sex workers, whose rates of HIV infection typically are significantly higher than those of the general population.[70] However, criminalizing sex work, although it may reflect social norms in many countries, can actually derail efforts to reach sex workers through public health interventions.[71]

Fear of prosecution, stigmatization, and discrimination keep sex workers from accessing appropriate public health services or availing themselves of legal protections against rape and sexual violence. Their claims of sexual violence are often disregarded or dismissed because of discrimination. In effect, criminalization drives commercial sex work underground. With limited treatment options, scant information on the risks of HIV infection, and their own inability to negotiate safer sex, millions of commercial sex workers are highly at risk of contracting (and exposing others to) HIV.

For these reasons, UNAIDS[72] and other international organizations have supported the decriminalization of commercial sex work that does not involve victimizing individuals. In 2003, New Zealand decriminalized prostitution (for persons older than 18 years) but required that all reasonable steps be taken to limit transmission of infections.[73] Additional protective measures to promote the public's health while allowing commercial sex work include (1) creating tolerance zones, or local areas where sex work is permissible; (2) periodically testing for sexually transmitted infections and registering commercial sex workers who fulfill testing requirements; (3) requiring safe sex through the provision of condoms by establishments, as initially mandated in Thailand[74] and now in other countries (e.g., Cambodia, Dominican Republic, Vietnam, China, Myanmar, and the Philippines)[75]; (4) ensuring proper storage and handling of condoms, sex toys, and other equipment; (5) training commercial sex workers in the effective use of personal protection equipment, conflict management, and substance abuse awareness; and (6) granting traditional employment rights (e.g., occupational protections, workers' compensation, sick leave) to commercial sex workers in organized systems to further their health and safety.

Protecting commercial sex workers also entails decriminalizing victims of international and domestic trafficking. Historically, victims of trafficking were seen as criminals subject to prosecution for prostitution, illegal entry, and falsification of documents and were sometimes forced to testify against traffickers. In recognition of serious human rights abuses underlying these practices, the United Nations,[76] Council of Europe,[77] United States,[78] and other international organizations and states have since 2000 increasingly characterized trafficked persons as victims rather than criminals. This enables them to seek legal redress, medical aid, legal assistance, and temporary or permanent residence in some countries, such as the United States, Belgium, Italy, and the Netherlands.[79]

DISCUSSION

Our assessment of law, reproductive and sexual health, and

HIV/AIDS identifies opportunities for and barriers to prevention and treatment. We support several broad initiatives to foster the role of law in checking the trajectory of the HIV/AIDS pandemic among women and children: widespread assessment of HIV laws and policies, expansion of legally protected access to HIV/AIDS-related health services, and universal implementation of human rights and antidiscrimination laws.

International organizations and states should undertake a detailed review of their legal frameworks related to HIV/AIDS and reproductive and sexual health, applying the review framework suggested by UNAIDS and the Office of the High Commissioner for Human Rights.[80] In most of the countries we reviewed, the laws addressing reproductive and sexual health and HIV/AIDS were vague, insufficient, or in violation of international human rights standards. Even countries that have a fairly well-defined legal structure would benefit from a careful review. Systematic review at the national level would help to identify areas of law and policy that need strengthening or revision. Further, such assessments would inform future research into the effectiveness of legal and policy approaches to stemming HIV/AIDS.

Access to Services

Access to reproductive and sexual health services for persons living with HIV/AIDS should be an explicit legal right. This is not yet the case in most countries. Legislation and regulations can require or encourage the government and the private sector to (1) expand access to protective technologies, such as male and female condoms, and continue to develop new technologies, such as effective microbicides[81]; (2) disseminate information about reproductive and sexual health; (3) develop family planning and prenatal care services that integrate HIV testing and treatment; and (4) fund additional reproductive health services to improve access.

Laws that limit access to condoms, criminalize their possession, or restrict information about their effective use in preventing HIV transmission should be amended because they undermine public health objectives and infringe individual rights. Interventions to prevent mother-to-child transmission should focus on the health of both mother and fetus.[82] Mandatory screening of pregnant women is counterproductive, but routine screening is acceptable provided it encompasses explicit provisions to obtain informed consent before testing, to allow a woman to opt out of the test, and to protect her privacy. Privacy protections help ensure that test results are not disclosed without patient consent and cannot be used to deny health care, health insurance, or child custody.[83]

Human Rights Protections

Legislation should be grounded in human rights and explicitly provide safeguards against discrimination based on HIV status, gender, or reproductive status. The international community and many countries recognize the positive correlation between respecting human rights and preventing HIV/AIDS,[84] as illustrated in the 2001 Declaration of Commitment on HIV/AIDS.[85] Unfortunately, adherence to this commitment is far from universal. In many countries, the human rights of persons at risk of contracting, or already living with HIV/AIDS, continue to be infringed or ignored.

In many countries, HIV-infected women are subject to laws and informal practices that restrict their reproductive freedom. The law should recognize that all people are entitled to the highest attainable standard of reproductive and sexual health; the ability to determine the number, timing, and spacing of their children; and access to sufficient information to make informed decisions on these issues.

National governments should affirm their commitment to these rights by ratifying and implementing the provisions of the Convention on the Elimination of All Forms of Discrimination Against Women.[86] The United States has signed but not ratified this convention. Comprehensive legal strategies are needed to empower women to access reproductive health services. Economic and educational opportunities for women and girls are also required to eliminate the economic dependency that contributes to gender violence and exploitation, creates barriers to accessing reproductive health care, and fuels the spread of HIV infection.

Antidiscrimination and Protective Provisions

Laws should expressly protect against discrimination based on HIV status. HIV-infected persons should be guaranteed equal access to health care generally and to reproductive and sexual health services specifically. Antidiscrimination protections should prohibit rationing of health care services on the basis of HIV status or gender, marital, or pregnancy status. Similarly, laws should specifically prohibit gender violence and sexual exploitation of women and children. Recognizing that vulnerable persons are victims, rather than perpetrators, of violence and exploitation is consistent with good public health practice and human rights.

The HIV/AIDS pandemic has imposed substantial burdens on sexual and reproductive health. The establishment and enforcement of clear legal provisions could alleviate some of this burden provided that laws promote human rights, proscribe discrimination against women and against people living with HIV/AIDS, guarantee access to reproductive and sexual health services, and protect against sexual violence and exploitation. ■

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Human Participant Protection

No protocol approval was required for this study because it did not involve human participants.

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Medical Accuracy in Sexuality Education: Ideology and the Scientific Process

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Recently, many states have implemented requirements for scientific or medical accuracy in sexuality education and HIV prevention programs. Although seemingly uncontroversial, these requirements respond to the increasing injection of ideology into sexuality education, as represented by abstinence-only programs.

I describe the process by which health professionals and government advisory groups within the United States reach scientific consensus and review the legal requirements and definitions for medical accuracy. Key elements of this scientific process include the weight of scientific evidence, the importance of scientific theory, peer review, and recognition by mainstream scientific and health organizations. I propose a concise definition of medical accuracy that may be useful to policymakers, health educators, and other health practitioners. (*Am J Public Health.* 2008;98:1786–1792. doi:10.2105/AJPH.2007.119602)

If medicine is to fulfill her great task, then she must enter the political and social life.

—Rudolf Virchow, founder of modern pathology

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for medicine and public health, is increasingly being manipulated or ignored in the debates surrounding public policy. In areas as diverse as stem cell research, new vaccines for the human papillomavirus, and Food and Drug Administration (FDA) approval of emergency contraception, politics have intruded into scientific policymaking that is normally based on scientific considerations. This interference has also reached into public schools regarding the teaching of evolution and abstinence education.[1–4] Tampering with scientific decisionmaking has included the suppression of data collection and analysis, the muzzling of federal scientists, the packing of scientific advisory committees with members based on political or ideological considerations, the equating of fringe science with mainstream science, and the manipulation of scientific uncertainty.[1,2,5] Although political interference in public health is not new, many have suggested that the George W. Bush administration has politicized science to an unprecedented degree.[5–7]

In this essay, I explore the collision of science and ideology in recent federal policy designed to promote abstinence to improve adolescent reproductive health, and the recent introduction of federal and state legal requirements for medical accuracy as a legislative solution to these ideological debates. Clearly, distinctions can be made between medical and scientific accuracy; however, for the sake of simplicity, in this essay I consider medical accuracy to be the application of scientific accuracy to health matters.

Since enacting "welfare reform" in 1996, the federal government has spent more than $1 billion on assistance to states and to community-based and religion-based organizations for abstinence-only educational programs.[8,9] These programs are not allowed to provide information about condoms and contraception other than their failure rates.[10] A variety of critiques, based on scientific and ethical considerations, have been directed toward US government policies that promote abstinence exclusively.[7,11–20] These critiques, from leading health professional and human rights organizations, have addressed multiple issues, including scientific accuracy, withholding of life-saving information about HIV, failure to delay initiation of sexual intercourse, promotion of gender stereotypes, insensitivity and unresponsiveness to sexually active youths and nonheterosexual youths, harm to comprehensive sexuality education and other domestic public health programs, damage to US foreign aid programs, and inconsistency with ethical imperatives of medicine and public health.[7–9,11–17,19–21] The underlying ideological assumptions of abstinence-only programs appear to be based on the moral and religious