

CHAPTER

2

Emerging Threats to the Survival of Public Health

The survival of public health as a societal institution is threatened by emerging changes in the health care delivery system, the economy, the political climate, the public sentiment regarding public health and government in general, and the public health community itself. First, a misunderstanding of the relative importance of individual medical treatment compared with population-based prevention programs has led to a health system in which individual treatment rather than societal prevention is the dominant focus. This misunderstanding has fostered the illusion that health care reform is the solution to the nation's public health crises and that integration of public health into managed care represents an important area of focus for public health. As a consequence, public health practitioners have been sidetracked from their mission as agents for social change. Also, political and economic forces directly threaten funding for public health departments and their policies and programs. These factors include budget cuts, a misplaced emphasis on bioterrorism preparedness, the increasing influence of special interest groups, and the increasing antiregulatory sentiment in the nation. The greatest threat to the survival of the public's health, however, comes from within the public health movement itself. The public health community has lost a unified vision of its fundamental role and mission. To overcome these threats, the public health movement must rediscover a strong, unifying model with a common vision, mission, and values to which the public and policymakers can relate. It is not enough to promote the health of its constituents: The public health movement must now promote its own survival.

Unfortunately, the attention of the public health practitioner cannot be focused entirely on improving the health of the public, because the public's health is only one thing the public health practitioner must save. Emerging changes in the health care delivery system, the economy, the political climate, public sentiment regarding government, and changes

in the public health community itself now threaten the very survival of public health as a societal institution. In addition to promoting the health of constituents, public health must now find a way to promote its own survival.

The survival of public health as a societal institution is threatened because of the adverse consequences of three major factors: (1) the persistent emphasis on individual rather than societal health and on treatment rather than prevention, (2) economic and political factors that directly threaten public health funding, and (3) the loss, among public health practitioners, of a unified vision of the role and mission of public health.

■ MISUNDERSTANDING OF THE IMPORTANCE OF MEDICAL TREATMENT COMPARED WITH POPULATION-BASED PREVENTION

Despite the widely held perception that recent advances in medical treatment have resulted in a dramatic decline in mortality, there is substantial evidence that the observed decline in mortality in the developed world during the 18th to 20th centuries was attributable largely to public health and not medical interventions (Evans, Barer, & Marmor, 1994; Lee & Estes, 1997; Levine, Feldman, & Elison, 1983; Turnock, 1997). The most extensive research into this hypothesis was conducted by Thomas McKeown, a physician and historical demographer who, over the course of more than 20 years, developed a convincing analysis of the reasons for mortality declines observed in England and Wales during the past three centuries (McKeown, 1971, 1976, 1978; McKeown, Record, & Turner, 1975).

McKeown concluded that declines in mortality observed during the 18th century were due to environmental changes, such as purification of water, efficient sewage disposal, and improved food, hygiene, and nutrition (McKeown, 1978). During the 19th century, McKeown argued, the declines in mortality were due only to a reduction in infectious diseases; chronic disease rates remained stable (McKeown et al., 1975). According to McKeown and colleagues, the three major factors that contributed to the decline were (1) rising standards of living, (2) improved hygiene, and (3) improved nutrition (McKeown et al., 1975). Although the smallpox vaccination campaign was effective, McKeown attributed only 5% of the decline in mortality in the latter half of the 19th century to immunization. McKeown argued that declines in infectious disease rates account for about 75% of the mortality reductions observed during the 20th century (through 1971; McKeown et al., 1975). Although immunization played a limited role, the dominant factors in the control of infectious disease were improved nutrition and hygiene (McKeown et al., 1975).

In research on the reasons for the dramatic decline in mortality in the United States during the 20th century, John and Sonja McKinlay

(1977, 1994) found that no more than 4% of the observed decline was due to medical treatment for infectious diseases. This conclusion is supported by the work of Rene Dubos (1959) and others (Cassel, 1976; Kass, 1971; Leavitt & Numbers, 1994; Lee & Estes, 1997; Magill, 1955; Powles, 1973; Weinstein, 1974). The U.S. Public Health Service (1995) estimated that of the 30 years added to life expectancy since 1900, only 5 years are due to improvements in clinical medicine, whereas 25 years are attributable to population-based, public health programs. McKinlay and McKinlay (1994) also demonstrated that the steep decline in mortality between 1900 and 1950 slowed during the 1950s and leveled off during the 1960s. This was the precise period in which medical care expenditures skyrocketed. Increased spending for medical care does not necessarily translate into reduced mortality (Hingson et al., 1981; Kim & Moody, 1992).

The work of McKeown, McKinlay and McKinlay, and others helped to reveal a shift in the 20th century in the type of diseases most responsible for mortality. The shift—known as the epidemiologic transition—was from infectious diseases to chronic diseases as the dominant cause of death in developed countries (Omran, 1971). Whereas infectious diseases accounted for 40% of total mortality in the United States in 1900, they accounted for only 6% of mortality in 1973 (McKinlay & McKinlay, 1994). The proportion of total mortality attributable to chronic diseases (including injuries) increased from 20% to 67% during the same period.

The U.S. Department of Health and Human Services (USDHHS) estimated that approximately 75% of all premature deaths in the nation are preventable (Centers for Disease Control and Prevention [CDC], 1995; USDHHS, 1995). Of these, about 63% could have been avoided by changes in individual behavior and another 23% by changes in social and environmental conditions. Only 15% of these deaths were deemed preventable through improved access to medical care.

As McKinlay and McKinlay (1994) pointed out, the policy implications of the hypothesis that public health measures, not medical treatment, are the dominant reason for improvements in the health of the population are profound. If this perspective is accurate, then the critical strategy to achieve meaningful health reform is not the better provision of more organized, higher quality, lower cost medical services but the societal commitment to social change. Preventing disease and illness requires changing the conditions in which people live, improving the quality of the environment, and reforming public policy. As Tesh argued, “it appears that social and political events that affect the standard of living, rather than microorganisms, are the salient determinants of health and disease” (1994, p. 520). Nevertheless, the current view of disease prevention continues to rely on germ theory and lifestyle theory as the explanation for illness. The most prominent public health programs aim to control infectious disease and change individual behavior. “Changing

the physical environment is, from this perspective, a third choice, and to attack poverty as a way to reduce disease becomes a last resort” (Tesh, 1994, p. 521).

The observed shift in causes of mortality from infectious to chronic diseases has similar implications for the improvement of the public’s health. Because chronic disease is largely related to individual and societal behavior, social conditions, and social policy, public health must inherently be committed to social change. Medical care is certainly important, and recent evidence (Ford et al., 2007) suggests that some of the modern medical interventions for atherosclerotic heart disease may explain declines in heart disease mortality during the past five decades. However, the most substantial gains in human health will be achieved only through public health—that is, the societal institution whose mission is the promotion of social change.

Even if the ultimate aim of prevention programs is to change individual behavior, the physical, social, and political environment in which people live must be the primary level of intervention. Because behavior is a product of the social conditions and social norms of the community in which a person lives (Tesh, 1994), discussing lifestyle changes without discussing the social conditions that give rise to them is misleading (Berliner, 1977). Public health practitioners cannot ignore the decades of research demonstrating that lower social class, social deprivation, and lack of social support are among the most important determinants of health (Conrad, 1987; Morris, 1982; Syme & Berkman, 1976). Substantial and sustained improvement in public health will require, first and foremost, social change.

The challenge to public health is presented clearly in a 1994 article by David Mechanic, who wrote, “The determinants of health risks are far too complex and forceful to succumb to ordinary efforts to inform the public and change its practices. Effective health promotion requires a deeper scrutiny of the structure of communities and the routine activities of everyday life, as well as stronger interventions than those characteristic of much that goes on. Current efforts still function largely at the margins” (Mechanic, 1994, p. 569).

An additional reason that prevention rather than treatment of illness must form the core of a national public health strategy is that advances in medical treatment tend to disproportionately benefit the socioeconomically advantaged and, consequently, increase the disparity in health status between rich and poor Americans. Dutton (1994) argued that the gap between health status of higher and lower socioeconomic classes is only partly due to differences in access to medical care:

But much of the gap undoubtedly stems from a variety of nonmedical factors, including a hazardous environment, unsafe

and unrewarding work, poor nutrition, lack of social support, and, perhaps most important of all, the psychological and emotional stress of being poor and feeling powerless to do anything about it. . . . To be efficient as well as effective, health care must remedy not only the consequences of poverty, but must aid in efforts to change the underlying circumstances that perpetuate it. This is the most fundamental form of disease prevention, and perhaps ultimately the only truly effective one. (p. 479)

Foege, Amler, and White (1985) also emphasized the importance of disease prevention in closing the gap in health disparity between rich and poor.

The government's spending priorities, however, do not reflect the importance of preventive public health measures compared with the limited effect of medical treatment on the health status of the population (CDC, 1997; Eilbert et al., 1996; Eilbert et al., 1997; McGinnis, 1997; Public Health Foundation, 1994). In 2008, national health care expenditures totaled \$2.24 trillion, or approximately \$7,700 per person (National Center for Health Statistics [NCHS], 2011). In the same year, total public health expenditures were estimated to be \$69.4 billion, only 3% of all national health care expenditures (NCHS, 2011). This means the nation spends about \$32 for medical treatment for each \$1 spent on the primary prevention of disease. And these figures include individual medical services provided by public health agencies; the actual investment in preventive, population-based public health programs is substantially lower.

Although health care spending continues to skyrocket, funding for preventive public health measures is barely keeping pace with inflation. The U.S. Public Health Service (1995) estimated that although total U.S. health expenditures increased by more than 210% between 1981 and 1993, the proportion of these expenditures used for population-based public health measures declined by 25%. Between 1999 and 2002, the proportion of total national health expenditures devoted to public health programs declined from 3.6% to 3.0% (NCHS, 2011).

The societal focus on individual-level treatment rather than population-based prevention interventions is reflected not only by the nation's spending priorities but by the issues that dominate the national health agenda. Perhaps the two best examples of this are the inappropriate attention given to health care reform and to integration of public health into managed care as potential solutions to the nation's public health crisis. It is a widespread fallacy that health care reform can solve many of the nation's public health problems. An equal inaccuracy holds that managed care organizations present a great opportunity for public health advancement. Each of these fallacies represents a direct threat to public

health practice in this country because they are sidetracking the public, policymakers, and, most importantly, public health practitioners from the vital need to focus on social change as the vehicle to achieve societal improvement in health.

■ ILLUSION OF HEALTH CARE REFORM AS A SOLUTION TO THE PUBLIC HEALTH CRISIS

The health care reform debate in the United States is dominated by arguments over health care delivery and reimbursement methods for medical care, not by arguments about how to deliver adequate, population-based prevention programs and policies to the American people. Therefore, the debate is hardly pertinent when determining how to improve the public's health. "In spite of the evidence pointing to deficiencies in health-supporting milieus, resulting in damage that had to be remedied by health care, by the 1990s the health policy debate—in the United States and other countries—had moved to an almost exclusively economic argument about health care services, as though these considerations alone were pertinent to better health" (Milio, 1995, p. 98). Addressing the implications of the health care reform discussion, Miller (1995) suggested the following: "The most disturbing conclusion is that current proposals are about financing, not about health care. . . . Consequently, health 'reform' is mainly about money and somewhat less about the organization of health services, and is not about broad, preventive measures that would reduce illness and injury and improve health functioning" (p. 356).

This country's failure to consider the real health care crisis and its inappropriate focus on one small aspect of the problem as the solution to the whole problem could spell doom for public health. If public and legislative debate continues to dwell on reforming the method of reimbursing physicians and hospitals, rather than on the method for ensuring the societal conditions in which people can be healthy, then the field of public health will be lost amid the complexities and conflicts of public debate.

■ ILLUSION OF MANAGED CARE AS AN OPPORTUNITY FOR PUBLIC HEALTH

Since the emergence of managed care, the field of public health has become preoccupied with it and its implications for the public's health. Managed care has dominated the agendas of major public health conferences, scientific journals, and policy debates. The emphasis on managed care's implications for the public's health is appropriate, given the research indicating the adverse consequences of managed care on medical services and outcomes, especially for the poor, the disadvantaged, the elderly,

and the chronically ill (Anders, 1996; Bickman, 1996; Brown et al., 1993; Clement et al., 1994; Experton et al., 1997; Miller & Luft, 1994; Retchin & Brown, 1991; Retchin et al., 1997; Retchin & Preston, 1991; Shaughnessy, Schlenker, & Hittle, 1994; Ware et al., 1996; Webster & Feinglass, 1997; Wickizer, Lessler, & Travis, 1996).

However, some public health practitioners have suggested that managed care presents tremendous opportunities for the advancement of public health goals. Although efforts to integrate some aspects of public health into managed care systems certainly are important, they cannot and should not substitute for the basic effort to strengthen and preserve public health's independent role and independent infrastructure. The practitioner should not mistakenly believe managed care can be changed in a way that will allow public health to be practiced correctly. Why? Because public health and managed care are fundamentally different in their overall mission, their underlying values, and their primary goals and incentives.

Overall Mission

Managed care is simply a system of sick care delivery. But the delivery of sick care is only a small subset of public health practice. As the Institute of Medicine (1988) defined it, the mission of public health is to fulfill "society's interest in assuring conditions in which people can be healthy" (p. 7). Access to quality health care certainly is necessary to ensure conditions in which people can be healthy, but it takes more than medical care to ensure that people are truly healthy.

Creating conditions in which people can be healthy requires social change: improving the communities' infrastructure, restructuring the physical and social environments to promote healthy behaviors, and establishing social norms that support, rather than undermine, healthy behaviors. Ensuring that people are truly healthy requires the elimination of social, economic, and political barriers to an individual's ability to achieve fulfillment in his or her personal development, education, occupation, and family well-being. None of these requirements can be achieved solely through a health care system, even under ideal conditions. The best managed care could ensure only the public's access to quality health care, not the quality of the public's health.

As Keck (1992) explained, there is a basic philosophical difference in the fundamental questions that managed care and public health seek to answer. Although managed care asks "how do we pay for services?", public health asks "how do we maintain and restore health?" (p. 1208).

Underlying Values

The underlying values of managed care are inconsistent with those of public health. Public health is based on the principle of social justice: the

assertion that society has an inherent interest in ensuring a basic level of well-being for all people, regardless of their age, race, income, social status, or health status. Managed care, especially when practiced in a for-profit environment, tends toward social injustice. Although the system works well for people who are healthy, it is relatively unfair to the sickest and poorest individuals, who are generally those who need the most intensive intervention. The system of market justice, on which managed care is based, tends to produce inequalities in social, economic, and health status.

Managed care plans step back from the individual patient and allocate resources among their patient pools. The role of public health, however, is to step back even farther and allocate public health resources among the entire population. Because of the disparities in health status, risk factors, and social and environmental conditions between different population subgroups, this means spending large amounts of money for people who are living in poverty, in the inner city, and in disadvantaged communities. This public health reality is incompatible with the mission of managed care: to reduce and control health care costs. Under managed care, people living in poverty cannot possibly receive the intensive intervention that is required.

The USDHHS (2010), in its *Healthy People 2020* goals for the nation, called for public health efforts to eliminate health disparities between advantaged and disadvantaged population groups. However, the managed care system tends to increase the disparity in health status between low- and high-income groups. Because managed care was developed to reduce health care spending and the groups that require the most expensive health care are the poor, the elderly, the disabled, and the chronically, terminally, and mentally ill, it is these groups that tend to face a disproportionate burden of the reduction in health care spending.

Primary Goals and Incentives

The bottom line for managed care organizations is controlling medical costs for their overall patient pool, not providing the services that are in the best interests of individual patients. This is a basic, practical dilemma that cannot be overcome in a for-profit, managed care environment. Dr. Jerome Kassirer (1995b), former editor of the *New England Journal of Medicine*, noted in a 1995 editorial that “although many see this as an abstract dilemma, I believe that increasingly the struggle will be more concrete and stark: physicians will be forced to choose between the best interests of their patients and their own economic survival” (p. 50). The best interests of the public’s health cannot be served under a system in which quarterly earnings and shareholder value are critical concerns.

The conflict between the need to control costs and maintain corporate profit and the goal of improving the public’s health is illustrated by the way in which health maintenance organizations (HMOs) use the cost

savings generated by their practices. In 1994, publicly traded HMOs spent only about 75% of their patients' premiums on direct patient care (Anders, 1996). The remainder was used for executive salaries, marketing, administrative costs, retained earnings, stockholder payouts, and acquisition of other HMOs. In for-profit HMOs, the health of the public is not, and will not ever be, the chief concern. Government and nonprofit health agencies and organizations are unique in having improvement of public health as their primary charge.

Managed care and public health also conflict in terms of their inherent incentives to offer expensive prevention initiatives. Attempts to encourage HMOs to enhance and expand prevention programs have generally been unsuccessful; HMOs do not appear to be interested in long-term benefits to their patients because those patients remain in a specific health plan for only a few years. Denying treatment (i.e., not expanding prevention programs) is the most effective way to increase short-term profits (Mallozzi, 1996). In contrast, prevention initiatives offer public health agencies and organizations the most effective strategies to achieve their goals of improving the societal conditions that affect health.

As long as HMOs are accountable primarily to their shareholders rather than to their patients, their providers, and their communities as a whole, the best interests of the public's health cannot be served. Investors generally want to see a return on their investments in a relatively short time period. For this reason, for-profit HMOs will always weigh short-term gains more heavily than intensive and costly preventive interventions whose payoff is in the distant future. For example, paying for intensive psychotherapy for youths with severe emotional problems might destroy an HMO's profit margin in the short term; the fact that this early intervention may prevent severe psychopathology many years in the future is of little interest to most investors. These types of interventions, however, are essential to promote public health effectively.

The public health view is long term; social change takes many years, sometimes even decades. Programs must be administered repeatedly, consistently, and over a long period of time before the necessary changes in social conditions, norms, behavior, and policy can take place. The quarterly report framework that managed care uses for program evaluation and decision making is inappropriate for practicing public health.

Why an Emphasis on Managed Care Is Dangerous for Public Health

Because public health and managed care differ fundamentally in almost every basic premise, it is unrealistic to believe that major public health achievements can be attained through the managed care system. Managed care is simply a method for the delivery and reimbursement of sick care; it cannot ever be a societal effort to create and facilitate social change. Managed care represents a threat to the survival of public health precisely because practitioners believe they can integrate public health initiatives

into the managed care system. The institution that is charged with marketing social change—public health—must remain independent of managed care and must retain its focus on its fundamental mission.

Although there is pressure for public health agencies to become involved in efforts to add a more preventive focus to managed care, public health practitioners must not become so sidetracked by managed care that they lose sight of the real area in which the health of the population depends: stimulating social change for the population, not simply improving health care for the individual. To survive, public health must find, claim, and maintain its place as a societal institution outside the managed care system. Only external to this system of health care delivery can the mission of public health be accomplished. And by sidetracking public health practitioners from the real issue at hand—the need to create and facilitate social change—the present preoccupation with finding ways to realize some marginal benefits from convincing managed care corporations to incorporate some public health programs is threatening to erode the practice of public health.

■ POLITICAL AND ECONOMIC FACTORS THAT DIRECTLY THREATEN PUBLIC HEALTH FUNDING

Budget Crises

Although funding cuts for public health programs have plagued government agencies for at least two decades, unprecedented measures to reduce or eliminate many of the critical public health functions of government have emerged due to federal and state budget crises during recent years. Funding for statewide tobacco control programs provides an excellent illustration of this dangerous trend. Despite tremendous success in reducing cigarette smoking as well as public exposure to secondhand smoke (Siegel, 2002), funding for a state tobacco prevention program in Massachusetts was cut by 95%, from a high of approximately \$54 million per year to just \$2.5 million in fiscal year 2004 (Campaign for Tobacco-Free Kids, 2005b). In spite of unprecedented declines in youth smoking attributable to an aggressive antismoking media campaign in Florida (Bauer et al., 2000; Siegel, 2002), the Florida legislature and governor cut funding for the program in every year since 1998 (the program's inception) and essentially eliminated the program in 2003 (Campaign for Tobacco-Free Kids, 2005b). In Minnesota, a successful youth-directed smoking prevention marketing campaign was eliminated completely in 2003, accompanied by an 81% cut in overall state tobacco control program funding (Campaign for Tobacco-Free Kids, 2005b). The elimination of the Target Market program in Minnesota was demonstrated to have resulted in a significant increase in youth susceptibility to cigarette smoking (CDC, 2004).

In November 1998, the signing of a multistate settlement between Attorneys General in 46 states and the major tobacco companies resulted in the availability of \$246 billion to these states over 25 years, sufficient to fund smoking prevention programs in every state. However, largely due to state budget crises, as of fiscal year 2006, only four states were using this money to fund tobacco prevention programs at the minimum level recommended by the CDC (Campaign for Tobacco-Free Kids, 2005a). Overall, states were allocating only 2.6% of their tobacco revenue in fiscal year 2006 to tobacco prevention and cessation programs (Campaign for Tobacco-Free Kids, 2005a).

Overall, state spending for public health has been an equally dismal failure, especially in light of the infusion of \$1.8 billion of federal money into state public health preparedness after the bioterrorism fears instilled by the September 11, 2001, tragedy and subsequent anthrax attacks (Trust for America's Health, 2003). Despite this infusion of federal funding, nearly two-thirds of states cut funds to public health programs from fiscal year 2002 to 2003 (Trust for America's Health, 2003). During 2003, states reportedly faced a collective budget deficit of \$66.6 billion; this may help explain why only 18 states were able to maintain their funding of public health services from 2002 to 2003 (Trust for America's Health, 2003).

These decreases in public health funding call into question both the ability of states to fight the chronic disease epidemic and their ability to prepare for bioterrorism, emerging infectious diseases, or other public health emergencies. A review of the preparedness of state health departments after the receipt of \$1.8 billion of federal funds (Trust for America's Health, 2003) revealed that states were not only ill-prepared for a public health emergency but for routine disease prevention activities as well:

Many state health departments are losing resources, and, therefore, capacity. Yet health departments are being called upon to expand their traditional scope to include preventing and preparing for bioterrorism, as well as responding to emerging infectious diseases, such as West Nile virus. The technical capabilities of many state and local health departments are being stretched to the point that emergency response and disease prevention services are in jeopardy. Although the states have received \$1.8 billion in federal preparedness funds, many have cut their own spending on public health services. Consequently, there is evidence that the impact of the federal funds to help states has been diluted. (p. 13)

It is clear that a substantial number of states have used the availability of increased federal funding for public health as an excuse to cut their own funding for public health and divert that money to meet other budget needs, resulting in a net decrease, not increase, in overall public health funding. To make matters worse, much of the existing funding

has been earmarked for the newly needed programs in bioterrorism and emergency preparedness, meaning that basic chronic disease prevention programs are being sacrificed.

New and Perceived Public Health Threats: Bioterrorism and Emerging Infectious Diseases

The threat of bioterrorism and emerging infectious diseases has certainly increased attention to public health preparedness. However, there has also been a negative impact of this shift in focus: namely, some degree of decreased attention to existing chronic disease threats. As discussed above, despite the federal infusion of \$1.8 billion into state public health funding in fiscal years 2002 and 2003 in response to bioterrorism threats, nearly two-thirds of states cut overall funding for public health programs. With much of the money earmarked for bioterrorism and other aspects of public health preparedness, funding for existing public health threats—largely, chronic diseases—has actually declined.

According to the Trust for America's Health (2003), the focus on bioterrorism, especially on a possible smallpox terrorist threat, diverted resources away from other critical public health services:

Achieving a battle-ready public health defense at the federal, state and local levels will take many years of sustained commitment, funding and oversight, especially because over the past two decades, the nation's public health infrastructure has greatly deteriorated. Initially, Congress, HHS and CDC narrowly focused the federal preparedness investment on bioterrorism concerns. Last year's controversial smallpox vaccination initiative, which pulled valuable time, resources and staffing away from other critical public health functions, illustrates the pitfalls of over-emphasizing a single threat (p. 27).

A number of researchers have written that bioterrorism preparedness itself has wasted public health resources without benefit and has diverted funding from essential public health needs (Cohen, Gould, & Sidel, 2004; Dowling & Lipton, 2005; Sidel, Cohen, & Gould, 2005). Although many predicted that bioterrorism funding would strengthen public health infrastructure by bringing funding not only for bioterrorism but also for other functions of public health, this has not come to fruition. Instead, bioterrorism preparedness has shifted priorities and weakened the public health infrastructure and its ability to deal with real and existing threats (Cohen et al., 2004). In fact, Cohen et al. (2004) go so far as to suggest that bioterrorism preparedness has been a disaster for public health, squandering public health resources and diverting them away from real public health needs.

Cohen et al. (2004) concluded that "Massive campaigns focusing on 'bioterrorism preparedness' have had adverse health consequences and have resulted in the diversion of essential public health personnel,

facilities, and other resources from urgent, real public health needs” (p. 1667). “In short, bioterrorism preparedness programs have been a disaster for public health. Instead of leading to more resources for dealing with natural disease as had been promised, there are now fewer such resources. Worse, in response to bioterrorism preparedness, public health institutions and procedures are being reorganized along a military or police model that subverts the relationships between public health providers and the communities they serve” (p. 1669). Thus, not only has the perceived need for bioterrorism preparedness diverted public health resources, it has also adversely affected the organization of the public health infrastructure and the relationship between public health institutions and the communities they are supposed to serve.

Cohen et al. (2004) concluded with a clear message on the dangers of the current focus on bioterrorism preparedness for public health: “In light of the daily toll of thousands of deaths from illnesses and accidents that could be prevented with even modest increases in public health resources here and around the world, we believe that the huge spending on bioterrorism preparedness programs constitutes a reversal of any reasonable sense of priorities. . . . These programs represent a catastrophe for American public health, and we hope it is not too late to change this dangerous direction” (p. 1670).

Even with the infusion of funding for bioterrorism and other public health emergency preparedness, a review found that states are woefully unprepared for a public health emergency, especially a potential pandemic flu outbreak (Trust for America’s Health, 2003). The overwhelming majority of states, as of 2003, did not have a plan for confronting a pandemic flu outbreak, were not prepared to communicate with health care practitioners and the public about any emerging health threats, and did not have sufficient laboratory facilities.

Decreased spending on state public health programs translates into reduced funding for local programs as well. Local public health programs are already funded at very low levels. Using data derived from a survey of more than 2,000 local health departments throughout the country, CDC estimated that the median per capita expenditure by local health departments in 1995 was just \$20, and the mean per capita expenditure was \$26 (Gordon et al., 1997). This amounts to just under a dime per day. The Trust for America’s Health (2003) report revealed that most of the funding to state health departments for better public health emergency preparedness was not filtering down to the local level. Only 17 states, as of 2003, had allocated at least 50% of their received federal public health capacity-building funds directly to local health departments. Not surprisingly, “a recent U.S. Conference of Mayors report found that in almost half of the states, major cities feel shut out of the state planning process for public health preparedness and claim state priorities do not reflect local concerns” (Trust for America’s Health, 2003, p. 11).

Influence of Special Interest Groups

The continued influence of powerful special interest groups, especially at the federal level, threatens many public health programs. An excellent case in point is federal funding for research on firearms-related injuries. In 1995, the National Rifle Association (NRA) lobbied Congress to eliminate all funding for the National Center for Injury Prevention and Control (NCIPC), a \$46 million center that serves as the nation's leading agency dedicated to the prevention and control of intentional and unintentional injuries ("Gun Violence Remains," 1996; "House Cuts \$2.6m," 1996; Kassirer, 1995a; Kent, 1996). Because gun-related deaths are a significant part of injury mortality, research on firearms control is a central part of the center's mission. The NRA was successful in getting Congress to consider a bill that would have eliminated the NCIPC completely. The bill failed, but 1 year later, the NRA returned with a less ambitious objective: to eliminate funding for the firearms injury research at the center, which amounted to \$2.6 million in 1995. In 1996, both the House of Representatives and the Senate approved a \$2.6 million cut in the NCIPC budget to eliminate firearms injury research at CDC (HR3755: Health and Human Services FY97 Appropriations Bill). Ultimately, a congressional compromise worked out in the last days of the legislative session restored the \$2.6 million to the NCIPC budget but diverted most of it to study traumatic brain injury (Kong, 1997). In addition, a clause in the appropriations bill prohibited any of the NCIPC funds from being used to advocate or promote gun control ("Gun Violence Remains," 1996; Kong, 1997).

Since fiscal year 1997, Congress has included in its appropriations to the CDC language indicating that "none of the funds made available for injury prevention and control at the Centers for Disease Control and Prevention may be used to advocate or promote gun control" (U.S. Senate, 2003, p. 1171). In addition, language added in the fiscal year 2003 appropriations legislation included a detailed and burdensome requirement to ensure that the CDC was not using any funds in any way that could be construed as trying to influence the development of responsible gun control policy (NCIPC, 2005).

These severe and purely politically motivated restrictions on the practice of public health are present in large part thanks to the efforts of the NRA, which is spending approximately \$8 million each year to influence legislators to vote against any proposals that would restrict the production, sale, or use of firearms (Burchfield, 2000). Of note, 75% of the 263 House members who voted to cut the NCIPC's funding accepted contributions from the NRA during the prior 3 years and only six recipients of NRA funding voted against the funding cut (Montgomery & Infield, 1996). The NRA's influence was also instrumental in the 1995 House passage of a bill to repeal the ban on assault weapons (HR125: Gun Ban Repeal Act of 1995), which passed 239 to 173 but was not approved

by the Senate. The NRA's influence on both bills is highlighted by the fact that 366 of the 421 members who voted on the NCIPC funding cut voted in a consistent manner on the repeal of the assault weapons ban ("How Members of Congress Voted," 1997). Ultimately, the 1994 federal assault weapons ban was allowed to expire in 2004, allowing 19 types of military-style assault weapons back into the hands of civilians. Failure of the effort to renew the assault weapons ban was attributed to a lobbying campaign by the NRA (Associated Press, 2004).

The magnitude of the extent to which special interest lobbying attempts to influence federal policymaking is demonstrated by an examination of the nature and amount of the top federal lobbying spenders. Between 1998 and 2004, Altria Group Inc., parent to Philip Morris—the nation's largest cigarette manufacturer—spent \$101.2 million on federal lobbying, making it the second highest spender (Center for Public Integrity, 2005). Eleven of the remaining top 20 lobbying spenders representing manufacturing, defense, electrical, oil, telecommunications, or pharmaceutical interests combined to spend nearly \$750 million on federal lobbying during this 7-year period.

Increasing Antiregulatory Sentiment

The practice of public health relies on a sense of public trust in government's ability to protect societal interests and a shared sense that the government has the responsibility to fund and conduct programs to accomplish this. However, recent public opinion polls have documented low levels of public trust in government and public acknowledgment of a central role and responsibility in protecting societal interests.

A 2008 poll by the Pew Research Center for the People & the Press (2008) found that favorable ratings of the federal government dropped to just 37%, having reached a high of 82% in 2001. These ratings are not much better than a decade earlier, when a 1994 poll found that 70% of Americans were dissatisfied with the overall performance of the federal government, 70% believed that government programs were inefficient and wasteful, and 69% believed that the federal government created more problems than it solved (Weisberg, 1996).

Perhaps more threatening than the public's lack of trust in government is the public's disinterest in the responsibility of government to promote the common good. The progressive movement, which launched large-scale government programs to address public health issues and social problems, was based on the assertion "that social evils will not remedy themselves, and that it is wrong to sit by passively and wait for time to take care of them . . . that the people of the country should be stimulated to work energetically to bring about social progress, that the positive powers of government must be used to achieve this end" (Weisberg, 1996, p. 157).

As Weisberg argued in his 1996 book, *In Defense of Government*, the values that underlie government's charge to promote social justice

have not disappeared, but they need to be restored to prominence in the public, political, and media agendas: “Building a workable public activism is not a matter of starting from scratch but rather of recovering and renewing lost principles” (p. 158). What needs to be restored, according to Weisberg (1996), is the assertion of “the national government’s responsibility for the welfare of the entire polity” (p. 159).

In a 1997 *American Journal of Public Health* editorial, Dr. Fitzhugh Mullan of the journal *Health Affairs* emphasized the same point, but referred specifically to the restoration of the public health movement:

An acute hazard for the reinvention workers of our movement is that the pendulum of national life is swinging so far in the direction of proprietary and individual interests . . . a tougher and ultimately more central job is to retain public and communitarian principles, no small task when the rhetoric of this ‘post-health-care-reform’ era, both inside and outside the government, is so strongly oriented to the private sector. Yet it will be the response to this challenge—the stewardship of the public trust despite the siren calls of devolution and privatization—that will render the ultimate commentary on the leadership of federal public health. . . . (p. 24)

■ LOST VISION OF PUBLIC HEALTH

In recent years, the public health community has lost a unified vision of its role and mission (Brown, 1997). The vision of public health as a form of social justice and of the mission of the public health practitioner as advocating for social justice and social change no longer guides the public health movement.

Public health has deep historical roots in what Beauchamp (1976) termed the “egalitarian tradition.” Beauchamp proclaimed that “public health should be a way of doing justice, a way of asserting the value and priority of all human life” (p. 8). Turnock (1997) also explained that the underlying philosophy of public health is social justice: “In the case of public health, the goal of extending the potential benefits of the physical and behavioral sciences to all groups in the society, especially when the burden of disease and ill health within that is unequally distributed, is largely based on principles of social justice” (pp. 15–16).

Public health was founded on three basic principles: (1) the principles of social justice, (2) the notion of an inherent public responsibility for social health and welfare, and (3) the responsibility of the public health practitioner to advocate for social justice and collective, societal action.

The first principle—social justice—is based on the view that health is not an individual privilege but a social good that should be equally available to all individuals: “While many forces influenced the development

of public health, the historic dream of public health that preventable death and disability ought to be minimized is a dream of social justice” (Beauchamp, 1976, p. 6).

The second principle—public responsibility for social health and welfare—is based on the assertion that government is responsible for achieving and preserving social justice. There is a collective, societal burden to ensure equal health protection and basic standards of living for all people: “Another principle of the public health ethic is that the control of hazards cannot be achieved through voluntary mechanisms but must be undertaken by governmental or non-governmental agencies through planned, organized and collective action that is obligatory or nonvoluntary in nature” (Beauchamp, 1976, p. 8). Burriss (1997) explained: “While much of the most important public health work is done in the private sector and the work of the state must take a wide variety of forms beyond direct regulation, ‘public health’ without the dynamic leadership of government in deploying the nation’s wealth against the ills arising from individual choices in the market is a contradiction in terms” (p. 1608).

The third principle—advocacy—is based on the view that the public health practitioner is, first and foremost, an advocate for social change: “Doing public health involves more than merely elaborating a new social ethic, doing public health involves the political process and the challenging of some very important and powerful interests in society. . . . While professional prestige is an important attribute in the modern day public policy process, public health is ultimately better understood as a broad social movement. . . . The political potential of public health goes beyond professionalism; at its very heart is advocacy of an explosive and radical ethic” (Beauchamp, 1976, p. 10).

The idea that public health’s role is to promote social change dates back at least 150 years. Public health arose out of the establishment of healthy social conditions as a societal goal and recognition of public institutions as responsible for achieving this social goal (Institute of Medicine, 1988). Public health is not just about studying problems and proposing solutions. It is about organizing the community to support and implement those solutions. And organizing the community requires social and political intervention. As the Institute of Medicine (1988) explained, “the history of public health has been one of identifying health problems, developing knowledge and expertise to solve problems, and rallying political and social support around the solutions” (p. 70).

Public health cannot be separated from the political process. In fact, politics is at the heart of public health. As Dr. Gro Harlem Brundtland, chief of the World Health Organization, stated, “you cannot implement it [public health] without making it a political issue” (Altman, 1998, p. C3).

Rosemary Stevens (1996) outlined these fundamental principles of public health in an *American Journal of Public Health* editorial reviewing the vision of Dr. Henry Sigerist (1891–1957), a medical historian and public health advocate: “For Sigerist, as for many of us who were

socialized into public health in the 20th century, health is quite simply a social good. The role of the state is to enhance and protect that good for all members of the population; indeed, in his view, the state has a public duty to do so” (p. 1522). Furthermore, it is the role of the public health practitioner to advocate for the necessary social reforms. For Sigerist, advocacy was a responsibility for the individual as well as for the public health institution. Sigerist “threw his own energy, commitment, and enthusiasm on the side of what he perceived to be social equity and justice” (Fee, 1996, p. 1644).

The principles of social justice, societal responsibility for public health and welfare, and advocacy for social change remain the three pillars of public health today. As expressed in a 1996 American Public Health Association (APHA) policy statement, “long-standing principles of the APHA establish a commitment to the right of all people to attain and maintain good health, through population based public health services and through access to personal health care services. . . . Further, it is the responsibility of society at large, and the public health system in particular, to safeguard the public interest in achieving these objectives” (APHA, 1997, p. 511).

Public health has begun to lose sight of its historical foundation and fundamental principles. No longer united by a common vision of its mission and role, public health has come to be viewed by many in the field more as an elite profession rather than a broad, social movement. In recent years, the “advocacy of an explosive and radical ethic” is all but lost. This, more than anything else, threatens the survival of public health as an institution.

Perhaps the most poignant illustration of the loss of the vision of public health as a broad social movement and its takeover by elite professionalism is the efforts of three national public health organizations—the National Center for Tobacco-Free Kids, the American Cancer Society, and the American Heart Association—to promote a congressionally mediated, “global” settlement to all but a strictly defined subset of past, present, and future lawsuits by citizens, businesses, and public bodies against the tobacco industry (Califano, 1998; “Koop Opposes Immunity in Tobacco Deal,” 1997; LoPucki, 1998; McGinley & Harwood, 1997; “The Reynolds Papers,” 1998; Schwartz, 1998; Shackelford, 1997; Siegel, 1996, 1997; “Tobacco Talk,” 1998; Torry, 1998; Weinstein & Levin, 1997). The process by which the settlement was pursued and promoted violated the core principles of public health, eschewed social justice, and co-opted a broad, social movement, wresting it from the hands of community public health practitioners across the nation and into the hands of a few powerful individuals and organizations (McGinley & Harwood, 1997; Shackelford, 1997; Siegel, 1996, 1997; Weinstein & Levin, 1997). The very organizations that claimed to represent the interests of cancer and heart disease victims were willing to trade away the legal rights of

these victims. The leadership of these organizations also remained willing to consider a deal that would grant the tobacco industry immunity for its wrongdoing, even after the grassroots membership of these organizations made it clear they opposed the concept of using the legal rights of American citizens as a bargaining chip.

A more recent example is the effort of the American Legacy Foundation, arguably the nation's most heavily funded antismoking organization, to forge corporate partnerships with conglomerates and companies that are the leading reasons for youth exposure to cigarette advertising in magazines and to portrayals of smoking in movies (Siegel, 2005a), both of which have been shown to be strong factors in smoking initiation (Pucci & Siegel, 1999; Sargent et al., 2005). As of 2005, the American Legacy Foundation maintained corporate partnerships with Time Warner (Siegel, 2005a), whose Warner Brothers movie division is the leading source of youth exposure to smoking in movies (Polansky & Glantz, 2004) and whose Time Inc. magazine division publishes magazines such as *Sports Illustrated*, *People Weekly*, *Entertainment Weekly*, and *TIME Magazine*, which collectively exposed more than 4 million adolescents to a total of 219 tobacco advertisements in 2004 (Siegel, 2005a). The American Legacy Foundation also partnered with the Hearst Corporation (Siegel, 2005b), which at the same time bombarded youths with ads for Kool and Camel cigarettes and for Skoal (smokeless tobacco) through its *Cosmopolitan*, *Esquire*, and *Popular Mechanics* publications and with Condé Nast Publications (Siegel, 2005c), which heavily exposed youths to cigarette ads for Camel and Kool through its *Vogue*, *Glamour*, and *GQ* magazines.

The American Legacy Foundation went so far as to honor Time Inc. with an award for "reaching millions with an anti-tobacco message" at a \$500-per-plate fundraiser, expressing gratification that "a selection of Time Inc.'s magazines . . . do not accept any tobacco product advertising" (Siegel, 2005a). It turns out that only 5 of the more than 125 Time Inc. publications did not accept tobacco advertising and the top 4 Time Inc. magazines alone reached millions of youths with pro-tobacco messages, carrying more than 100 cigarette ads per year (Siegel, 2005a). This represents a troubling example of the loss of the vision of public health as a broad social movement and its takeover by elite professionalism. The efforts of the American Legacy Foundation undermined years of work by public health advocates to attempt to eliminate cigarette advertising in Time Inc. publications, and without their knowledge or consultation.

An article in the *American Journal of Public Health* illustrated another way in which health advocates have compromised public health values. Many health advocacy groups, such as professional medical and nursing associations, the American Heart Association, the American Lung Association, and the American Cancer Society, have hired lobbyists who also represent the tobacco industry (Goldstein & Bearman, 1996).

For example, in 1994, more than 300 health organizations employed one or more tobacco lobbyists (Goldstein & Bearman, 1996).

Perhaps the most egregious example is the appointment of former tobacco industry lobbyist Kim Belshe as director of the California Department of Health Services in 1994. Belshe had been a lobbyist for the tobacco industry and had lobbied against Proposition 99, an initiative to establish a comprehensive, statewide tobacco control program funded by an increase in the state cigarette excise tax. There could hardly be a more inappropriate person to serve as director of a state health department than a former tobacco industry lobbyist who opposed one of the most important public health interventions in the state.

Although some public health organizations have turned to professional lobbyists with dubious associations, many other public health groups have gone so far as to halt all advocacy to prevent the appearance of improper lobbying activity. The widely held perception that education is the only appropriate role for public health agencies and that advocacy is illegal or inappropriate for public health officials has arisen largely because of a widespread misunderstanding of the difference between advocacy and lobbying.

Many public health practitioners are under the impression that advocacy is synonymous with lobbying and therefore is restricted by federal law. Lobbying, however, is a very specific and legally defined term. As defined in the Internal Revenue Service Code, lobbying refers to an attempt to influence the outcome of legislation through communication with a legislator, government official, or the public (26 U.S.C.S. 4911). Generally, a communication is considered lobbying only if it (1) refers to specific legislation and (2) promotes a specific vote on that legislation (National Cancer Institute, 1993). Policy advocacy activities, such as researching, developing, planning, implementing, enforcing, and evaluating public health policy, are not lobbying unless they involve the promotion of a specific vote on specific legislation.

Even when public health practitioners are convinced their activities are legal, they often are scared into inaction by pressure from special interest groups. A prime example is the use of federal funds to advocate for the control of tobacco use. The tobacco industry has used the Freedom of Information Act (FOIA) to intimidate tobacco control practitioners, often scaring them to inaction by forcing them to copy hundreds or even thousands of documents and accusing them of illegal activity (Levin, 1996; Mintz, 1997). For example, the Association for Non-smokers-Minnesota was hit with such a request. A spokesperson for the group explained, "They wanted people such as myself to be intimidated and fearful and confused—and at least to some extent they succeeded. Truly, we did almost nothing in the way of tobacco control for about three months" (Levin, 1996, p. D4). Similar FOIA requests were made to state health departments in California, Massachusetts, Indiana,

Colorado, and Washington (Levin, 1996; Mintz, 1997). According to an article in the journal *Tobacco Control*, the tobacco control section of the California Department of Health Services, which administers Proposition 99, received 59 FOIA requests from 1991 to 1993 (Aguinaga & Glantz, 1995). Although the tobacco industry's statements and actions imply something was wrong with the way tobacco control funds were being used, ethics board reviews cleared all the groups whose activities were challenged (Levin, 1996). Nevertheless, the tobacco industry's objective was accomplished: Many tobacco control groups have been scared into inaction or into a state of reserved action.

■ CONCLUSION

The public health movement is involved in a fight not only to protect the public from the emerging epidemic of chronic disease that threatens to dominate life in the 21st century but also to save itself as a vital and integral part of the societal infrastructure. A continuing societal focus on health care reform as the solution to the nation's public health crisis and on individual medical treatment rather than population-based prevention threatens to obscure the need for public health. The emergence of managed care and the perception, even among public health practitioners, that public health can somehow be integrated into a managed care system threaten to erode the independent role of the public health professional. Budget cuts, the emergence of bioterrorism and infectious disease threats, special interest group influence, and increasing antigovernment sentiment each contribute to unprecedented threats to public health infrastructure and programs. Finally, the failure of public health practitioners to assert their primary role as advocates for social change and the loss of a common vision for public health represent internal, yet critical, threats to the viability of the public health movement.

This is no longer only a fight to protect people's health. It is now a life-and-death struggle for public health as a societal institution.

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