### MEDICINE AND SOCIETY

Debra Malina, Ph.D., Editor

# Health Effects of Dramatic Societal Events — Ramifications of the Recent Presidential Election

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A small but growing body of evidence suggests that election campaigns can have both positive and negative effects on health. Campaigns that give voice to the disenfranchised have been shown to have positive but short-term effects on health. Such associations have been observed among black South Africans at the time of Nelson Mandela's 1994 election, among black Americans during Jesse Jackson's 1988 presidential campaign, and among Hispanic and black Americans when Barack Obama was nominated for President in 2008.¹ Thus, increases in psychological well-being, pride, and hope for the future are likely to be evident among Donald Trump supporters.

At the same time, events linked to the recent presidential campaign and election have given rise to fear and anxiety in many Americans. Research suggests that these events can have negative health effects on people who have been direct targets of what they perceive as hostility or discrimination and on individuals and communities who feel vulnerable because they belong to a stigmatized, marginalized, or targeted group. It is worth exploring the scientific research in this area and considering its implications for health care providers.

#### INCREASED RACIAL HOSTILITY

There has been an increase in racial resentment, animosity, and political polarization in the United States in recent years. The election of President Obama played a key role: research indicates that Obama's election led to increases in the rate of belief among white Americans, especially conservatives, that racism no longer exists.<sup>2</sup> At the same time, in the wake of his election, one third

of white Americans indicated that they were "troubled" that a black man was President, the Tea Party movement emerged with antiminority rhetoric, resentment toward Democrats increased, support among whites for the Democratic party declined, and white support for addressing racial inequities decreased.<sup>2</sup> Obama's election also led to a marked increase in racial animosity expressed in social media: there was a proliferation of hate websites and anti-Obama Facebook pages, with the widespread use of historical racial stereotypes that are no longer seen in mainstream media.<sup>3</sup>

The presidential candidacy of Donald Trump appeared to bring further to the surface preexisting hostile attitudes toward racial and ethnic minorities, immigrants, and Muslims. In a national (nonrepresentative) survey of 2000 elementary and high school (K-12) teachers, more than half of respondents said that since the 2016 presidential campaign began, many of their students had been "emboldened" to use slurs and name calling and to say bigoted and hostile things about minorities, immigrants, and Muslims.4 Not surprisingly, 67% of these teachers reported that many U.S. students (especially immigrants, children of immigrants, and Muslims) were scared and worried and had expressed concerns or fears about what might happen to their family after the election. Even some native-born black children whose ancestors have been in the United States for centuries expressed concerns about a return to slavery or being sent back to

One of the first postelection messages on the Daily Stormer, a hate website, claimed that the election was a referendum on "multiculturalism" and encouraged verbal intimidation of foreign-

ers, especially those wearing Islamic clothing. It declared, "We want these people to feel unwanted. We want them to feel that everything around them is against them. And we want them to be afraid."5 The Southern Poverty Law Center has documented an increase in incidents of harassment and hateful intimidation since Trump's election.6 Disturbingly, the locations where incidents of harassment have most commonly been reported have been K-12 schools. Other research using relatively small, nonrepresentative samples has documented that incidents of racial discrimination experienced by teenagers predicted flatter diurnal cortisol slopes and lower cortisol awakening response in young adulthood,7 elevated levels of endocrine, cardiovascular, and metabolic parameters at age 20,8 as well as epigenetic patterns of aging at age 22.9

Beyond being potential personal targets of hostility, a large proportion of U.S. adults are stressed by the current political environment. A January 2017 national survey found that Democrats were more likely than Republicans (72% vs. 26%) and minorities (69% of blacks, 57% of Asians, 56% of Hispanics) more likely than non-Hispanic whites (42%) to report that the outcome of the 2016 presidential election was a significant source of stress. <sup>10</sup> Moreover, two thirds of all adults surveyed said they were stressed about the future of the United States.

### COMMUNITY-LEVEL PREJUDICE

Although their ecologic designs limit making inferences about causality, several recent studies have consistently found that living in communities with high levels of racial prejudice is associated with an elevated risk of disease and death. One study found an elevated risk of death among adults residing in communities where levels of racial prejudice were high.<sup>11</sup> The highest mortality risk was observed among people who themselves scored low on survey measures of self-reported racial prejudice but who resided in highly prejudiced communities.

Another study conducted in 1836 U.S. counties revealed an elevated risk of death from heart disease among both black and white residents of high-prejudice counties, with a stronger effect among blacks than among whites. 12 Research has also found that even an Internet-

based measure of the racial prejudice in a geographic area — communities with a higher proportion of Google searches using "the N-word" — predicted elevated all-cause mortality among black adult residents.<sup>13</sup> Similarly, research has found that lesbian, gay, and bisexual people residing in communities with high levels of antigay prejudice had a risk of death three times that of their counterparts in low-prejudice communities.<sup>14</sup>

### HOSTILITY IN THE LARGER ENVIRONMENT

A limited body of research also suggests that increased exposure to racial or ethnic hostility in the media or society in general can predict adverse changes in health among members of targeted groups. In the wake of the September 11th terrorist attacks, there were well-documented increases in harassment of and discrimination against persons perceived to be Arab American. Consistent with other research, a study in the Detroit area found that experiences of discrimination and abuse after September 11 were positively associated with psychological distress and inversely related to happiness among persons from the Middle East.<sup>15</sup> A study of birth outcomes among women of multiple racial and ethnic groups in California revealed that only among Arab American women was there a pattern of increased risk of low-birth-weight babies or preterm births in the 6 months after 9/11 as compared with the preceding 6-month period.<sup>16</sup>

In 2006, a black woman accused white members of the Duke University men's lacrosse team of rape, racial derogation, and violence. Although the accused players were eventually cleared of wrongdoing, the extensive media coverage and rhetoric immediately following the accusation were perceived by many people as racially divisive. Many of Duke's black students, especially women, were stressed and concerned about their safety. A small, ongoing experimental study at Duke compared the psychological and physiological responses of black students participating in a stressful laboratory task before and after the lacrosse-team incident. It found that black students, especially women, who took part in the study after media coverage of the accusations had higher levels of baseline cortisol and a blunted stress response to the experimental task in contrast to the lower levels of cortisol and normal stress response evident for those who participated before the incident.<sup>17</sup>

#### HOSTILITY TOWARD IMMIGRANTS

Research also suggests that anti-immigrant policies and initiatives can trigger hostility toward immigrants that can lead to perceptions of vulnerability, threat, and psychological distress among both immigrants who are personally targeted and other members of the group who are not direct targets. A 2010 Arizona law empowered local police to stop anyone suspected of being undocumented and detain anyone who lacked proof of citizenship. A study of mothers of Mexican origin documented a decline in the utilization of public assistance and preventive routine care for their children after the law's enactment.18 Strikingly, the decline in use of public assistance was steeper among U.S.-born than among foreign-born Hispanic mothers. Similarly, an Alabama immigration law that restricted undocumented immigrants' access to publicly funded health benefits was associated with a decline in the use of county public health services for communicable diseases, sexually transmitted infections, and family planning among Hispanic people, even though visits for these services were exempted from the law.<sup>19</sup>

A recent study of the health impact of a Postville, Iowa, immigration raid in 2008 showed that immigration-enforcement policies can have negative health effects on local Hispanic communities.<sup>20</sup> In this large raid at a meat-processing plant, 900 federal immigration agents handcuffed employees suspected of being undocumented immigrants (perceived to be Hispanic) until their immigration status was established. Almost 400 employees (98% of them Hispanic) were arrested and detained, and some 300 were eventually deported. After the raid, many Hispanic families lived with high levels of fear, some of them sleeping in churches instead of their homes. The study found an increase in the risk of low birth weight among infants born to Hispanic mothers in the year after the raid as compared with the previous year. No similar increase was evident among non-Hispanic white mothers. More generally, a recent study of Hispanic people in 38 states found higher rates of mental illness in states with more exclusionary polices with regard to immigrants.<sup>21</sup>

## WORRIES ABOUT REDUCTIONS IN HEALTH AND SOCIAL SERVICES AND HEALTH

Research indicates that stress adversely affects health not only through actual experiences but also because of rumination, vigilance, and worry over potential exposures.<sup>22</sup> The threatened repeal of the Affordable Care Act and other cuts in social services have members of economically marginalized groups, who are likely to be disproportionately affected, very concerned. History has taught us that such cuts in health and social service programs can have pervasive negative effects on health. In 1981, the administration of Ronald Reagan made large cuts in health and social service programs.<sup>23</sup> Some 500,000 persons lost eligibility for Aid to Families with Dependent Children, 1 million persons were dropped from the food stamps program, and 600,000 Medicaid beneficiaries lost health insurance.<sup>23</sup> In addition, over 250 community health centers were closed, a million poor children lost reducedprice school meals, the Women, Infants, and Children (WIC) program had enough funding to serve only a third of those eligible, and cuts in Medicare led to a doubling of the average deductible for a hospital stay. Negative effects were soon evident in the health of pregnant women, children, and adults with chronic disease.<sup>23</sup> There was an increase in women receiving no prenatal care and in the incidence of anemia in pregnant women. The overall decline in infant mortality slowed and an increase in infant mortality in poor areas of 20 states was evident between 1981 and 1982. There was also an increase in preventable childhood diseases in poor populations and deteriorating health for adults with hypertension who were dropped from the Medicaid program.

### HOW HEALTH CARE PROVIDERS CAN RESPOND

This research predicts that the current sociopolitical climate will negatively affect the mental and physical health of marginalized groups.

Concerns about hostility and discrimination or, in some cases, the possibility of sudden deportation and forced separation from one's family, can lead to increased symptoms of anxiety and depression that can, in turn, result in increased visits to health care providers and emergency departments. How can clinicians respond to these "postelection side effects"?

First, health care providers can address the emotional distress that some of their patients may be feeling. Some clinicians have reported increases in stress and anxiety among people receiving psychotherapy.<sup>24</sup> A New York City internist who works in a primarily immigrant community reported providing a sedative to a patient who presented with panic symptoms before an immigration hearing.25 Simply prescribing benzodiazepines or other palliative agents may be a less-than-optimal approach to comprehensively addressing what could be long-term heightened distress and concerns.

Clinicians should also be aware that whereas some patients may feel comfortable seeking help at local health agencies, social hostility renders many people less likely to use health care and social services. At a minimum, it's important that health care providers actively work to create safe spaces, where patients' fears and concerns are listened to and met with compassion and support. Within clinical encounters, patients should not be left with the burden of initiating a discussion about social stressors. Rather, clinicians can actively and sensitively inquire about patients' experiences, worries, and fears and the effects that they may be having on the patient's health and symptoms.

Second, clinicians and health care organizations can take a strong stance against hate crimes, discriminatory political rhetoric, and incivility. It is also important to make clear that their services are provided to all, regardless of race, ethnicity, nationality, socioeconomic status, religion, or citizenship status.

Third, in anticipation of an increase in stressrelated clinic visits, health care systems and clinicians can educate themselves about local and federal policies and their effects on vulnerable people and ensure that patients understand their rights and avenues for seeking help. Clinicians can be prepared to provide additional clinical and ancillary support and to actively connect the full text of this article at NEJM.org.

vulnerable patients and families with local advocacy groups. Making such connections would require strengthening alliances with community organizations, such as churches and other service organizations outside of the health care institution that can provide aid to people facing social and health challenges.

Fourth, clinicians can seek to enhance and affirm the resilience resources that patients have that may reduce some of the negative effects of stress on their health. Research on discrimination reveals that these resources may range from positive social ties and optimism to spiritual or religious involvement.<sup>22</sup>

Fifth, as members of their communities, clinicians can also consider more active engagement in advocacy and policymaking. They can begin within their own institutions to generate greater awareness of the challenges faced by stigmatized populations and to foster a culture of inclusion with a greater emphasis on promoting health equity. Approaches could include requiring antiracism and bias training, as well as cultural competency training, for all staff.

Clinicians can also participate in relevant community meetings and conversations to discuss the health impact of social policies and raise awareness of their impact on marginalized groups. In addition, community-based interventions can be designed and implemented. For example, given the prevalence of explicit prejudice and discrimination in K–12 settings, pediatricians could work with local schools and school boards to raise awareness, provide training for teachers, and assist in the development of school-based interventions to build a culture of respect and tolerance and reduce the anxieties and fears of stigmatized young people.26,27

Finally, the health care community can advocate for research and initiate studies that systematically assess the health effects of the societal climate and policies. Future research could delineate the psychosocial and biologic pathways by which these effects occur and identify the factors that facilitate effective coping and resilience. Relatedly, studies are urgently needed that can inform effective community interventions for mitigating the potential negative effects of social hostility on health.

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