REPORT OF THE COUNCIL ON SCIENCE AND PUBLIC HEALTH

CSAPH Report 4-A-18

Subject: The Physician's Role in Firearm Safety

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INTRODUCTION

In March 2017, the American Medical Association (AMA) and the American Bar Association co-sponsored a conference titled, "Preventing Gun Violence: Moving from Crisis to Action." The conference was attended by members of the Council on Science and Public Health (Council) and the findings of this conference served as the impetus for developing this report as a Council initiative.

The Council previously studied the issue of preventing violence against health care workers and issued recommendations (see Policy H-515.957, "Preventing Violent Acts Against Health Care Providers"). That topic is not further addressed in this report.

METHODS

English language reports were selected from searches of the PubMed, Google Scholar, and Cochrane Library databases from January 2013 to January 2018 using the search terms "gun violence," "firearm safety," "firearm violence," "physician" and "firearm," "physician" and "gun," "suicide" and "gun" or "firearm", "children" and "firearm safety," "gun violence restraining order," and "domestic violence restraining order." Additional articles were identified by manual review of the reference lists of pertinent publications. Websites managed by federal and state agencies and applicable regulatory and advocacy organizations also were reviewed for relevant information.

CURRENT AMA POLICY

As one of the main causes of intentional and unintentional injuries and deaths, the AMA recognizes that firearms are a serious public health problem in the United States. The AMA has extensive policy on firearm safety and prevention of gun violence. Relevant to this report is existing policy that affirms the rights of physicians to have free and open communication with their patients regarding firearm safety and that calls on physicians to educate and counsel patients about firearm safety. AMA policy also supports increasing efforts to reduce pediatric firearm morbidity and mortality by encouraging its members to inquire about the presence of household firearms as a part of childproofing the home and routinely remind patients to obtain firearm safety locks, to store firearms under lock and key, and to store ammunition separately from firearms. AMA policy also urges Congress to provide sufficient resources to enable the Centers for Disease Control and

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Prevention (CDC) to collect and analyze data on firearm-related injuries in order to help prevent injury, death and the other costs to society resulting from firearms.

EPIDEMOLOGY OF FIREARM MORBIDITY AND MORTALITY

Firearm-related deaths are the third leading cause of injury-related deaths in the United States. In 2016, more than 38,000 persons died from injury by firearms in the United States.[1] While mass shootings are horrific, they represent a small percentage of firearm-related deaths (less than 1 percent). Firearm suicide deaths, on the other hand, constitute more than 60 percent of firearm deaths, with firearm homicides accounting for approximately 35 percent, and accidental firearm deaths accounting for approximately 1.5 percent.[1;2]

Males disproportionately bear the burden of firearm mortality, accounting for 86 percent of all victims of firearm death.[2] Young adults between the ages of 25 and 34 years have the highest rate of fatal firearm injury per 100,000 at 15.1, followed by those in the 15 to 24 year age group (14.4 per 100,000).[2] Rates of firearm homicide are highest among adolescents (8.9 per 100,000) and young adults (8.0 per 100,000) and tend to decrease with age.[2] Rates of firearm suicide tend to increase with age. The annual rate of firearm suicide was highest among persons aged 65 years and older (10.9 per 100,000) followed by those in the 55–64 year age group (9.4 per 100,000) and the 45–54 year old age group (9.2 per 100,000).[2]

Non-Hispanic blacks have the highest rates of firearm mortality overall (18.1 per 100,000), and this disparity is largely due to differences between racial/ethnic groups in firearm homicide.[2] Non-Hispanic whites (9.2 per 100,000) and non-Hispanic American Indian/Alaskan Native populations (7.8 per 100,000) have the highest rates of firearm suicide in the United States when compared to other groups.[2] Non-Hispanic white males account for the majority of firearm suicides.[2]

Although limited data are available to evaluate epidemiological trends for firearm-related injuries, it is estimated that more than 84,000 people suffered nonfatal firearm injuries in 2015.[3] A study utilizing data from the Nationwide Emergency Department Sample identified 150,930 people in the period 2006-14 who presented alive to the emergency department (ED) with a firearm-related injury, representing an estimated 25.3 ED visits per 100,000 people. The incidence of ED visits for firearm-related injuries varied by patient age. It was the lowest among patients younger than age 10 (less than 1.5 ED visits per 100,000) and the highest among patients ages 15–29 (66.4 ED visits per 100,000).[4] The incidence of firearm-related injuries was approximately nine-fold higher among male patients.[4]

The majority of patients who presented alive to the ED for a firearm-related injury were injured in an assault (49.5 percent) or unintentionally (35.3 percent). Attempted suicides and legal interventions accounted for 5.3 percent and 2.4 percent respectively.[4] Among all patients presenting to the ED with a firearm-related injury, 48.0 percent were discharged home and 7.7 percent were discharged to additional care facilities, while 37.2 percent were admitted to inpatient care and 5.2 percent died during their visit.[4] The financial burden associated with firearm-related injuries was estimated to be approximately $2.8 billion per year.[4]

PHYSICIAN COUNSELING

Households with firearms exhibit an increased risk of experiencing a homicide, suicide, or accidental firearm death of a household member.[5] While physicians counsel patients about a wide range of behaviors and conditions, a systematic review of the literature found that despite clinical acceptance of the need for firearm injury prevention among high-risk populations, screening and

counseling to increase safety is performed by a minority of clinicians.[6] A number of barriers exist that may contribute to the lack of physician counseling on firearm safety. These include legal barriers, the lack of training and time, low expectancy that counseling is effective, uncertainty regarding what to say to patients, and a desire to not offend patients.[6;7] As with many other behavioral interventions, clinicians who have high confidence in, and self-efficacy toward, counseling are more likely to screen.[6]

The Law Does Not Prohibit Counseling

While a number of states have considered laws limiting what physicians are allowed to ask their patients about firearms, Florida is the only state that enacted such a law, the Firearm Owners' Privacy Act (FOPA), which prohibited health care practitioners from inquiring about the ownership of a firearm.[8] An exception included in the law allowed practitioners who in good faith believed that the information was relevant to the patient's medical care or safety, or the safety of others, to inquire.[8] In 2017, the Eleventh Circuit Court of Appeals overturned the law, holding that FOPA's content-based restrictions violated the First Amendment as it applies to the states.[9]

Montana, Missouri, and Minnesota have laws around the collection of firearm information by health practitioners; none of these laws prohibit counseling. Minnesota's law prohibits the commissioner of health from collecting data on individuals regarding lawful firearm ownership or data related to an individual's right to carry a weapon.[10] Missouri's law prohibits health care professionals from disclosing information about the status of a patient as an owner of a firearm, unless medically indicated or necessitated.[11] Montana's law provides that health care providers may not refuse to provide health care to a person who declines to answer questions regarding firearm ownership, possession, or use.[12]

HIGH-RISK INDIVIDUALS

Little guidance is available regarding who should be screened for the risk of firearm injury.[6] The American Academy of Pediatrics (AAP) recommends that pediatricians incorporate questions about the presence and availability of firearms into patient histories and counsel parents about the dangers of allowing children to have access to firearms both inside and outside of the home.[13] Studies indicate that screening among high-risk populations may help identify patients at risk of firearm injury.[6] Risk factors for firearm injury include suicidal ideation or intent, homicidal ideation or intent, history of violence, alcohol or drug use disorder, mental illness, and conditions impairing cognition and judgment.[7]

Intimate Partner Violence (IPV)

Firearms in a violent home increase the likelihood that IPV incidents will result in death.[14;15] In 2013, approximately half of the 1,270 reported intimate partner homicides in the United States were committed with firearms.[15] Because of this risk, laws have been enacted to remove firearms from those who commit IPV. At the federal level, the Violent Crime Control and Law Enforcement Act of 1994 prohibits individuals subject to certain restraining orders from purchasing or possessing a firearm.[16] Furthermore, the Lautenberg Amendment makes it illegal for individuals convicted of misdemeanor domestic violence assault to purchase or possess firearms. However, there are a number of gaps in the federal law, including that it does not apply to non-spouse partners.

Mental Illness

According to the American Psychiatric Association, reasonable restrictions on gun access are appropriate, but should not be based solely on a diagnosis of mental disorder.[17] Diagnostic categories vary widely in the symptoms, impairments, and disabilities of affected individuals and a considerable heterogeneity exists.[17] Furthermore, individuals with mental illness, when appropriately treated, do not pose an increased risk of violence over the general population.[18]

Suicidal Ideation

Suicide is a leading cause of preventable death in the United States and firearms are among the most lethal suicide attempt methods, with nearly 9 out of 10 attempts resulting in death. In 2015, firearms were the most common method used in suicide deaths in the United States, accounting for almost half of all suicide deaths.[19] Over the past 15 years, the total suicide rate has increased 24 percent from 10.5 to 13.0 per 100,000.[19] The suicide rate among males has remained approximately four times higher (20.7 per 100,000 in 2014) than among females (5.8 per 100,000 in 2014).[19]

Physicians and other health professionals should be trained to assess and respond to individuals who may be at heightened risk for violence or suicide.[17] In the context of suicide prevention, "lethal means counseling" refers to assessing whether a person at risk for suicide has access to a firearm or other lethal means and then working with them, their family, and support system to limit their access until they are no longer at elevated risk.[20] Counseling of suicidal patients or (for youth) their parents about restricting "lethal means" may increase rates of firearm removal from the home.[6]

Community Violence/Assault

High-risk youth presenting to an urban emergency department (ED) for assault have elevated rates of subsequent firearm violence.[21] Nearly 60 percent of assault-injured youth report violent firearm aggression, victimization, and/or firearm injury within 2 years of their index ED visit.[21] Among assault-injured youth seeking urban ED care, nearly 25% report having a firearm.[22] Retaliation may be a significant motivation for ensuing firearm violence. This underscores the need for ED screening of retaliation risk and interventions that focus on alternative means of conflict resolution.

Childhood Injury Prevention

The most effective measure to prevent suicide, homicide, and unintentional firearm-related injuries to children and adolescents is the absence of firearms from homes and communities.[13] The AAP encourages firearm screening as a standard part of universal injury prevention screening.[6] Parents who possess firearms should be urged to prevent access by children because safer storage of firearms reduces injuries. Physician counseling linked with distribution of cable locks appears to increase safer storage.[13]

Cognitive Decline

Firearm access can pose a risk to cognitively-impaired individuals. It is estimated that as many as 60 percent of older people with dementia live in a home with a firearm, where there may be a greater likelihood that they are not locked or unloaded. The Alzheimer's Association suggests screening for firearm access along with other safety topics (i.e., driving) as well as keeping firearms locked, with ammunition stored separately.[23]

DISCUSSION

The federal Gun Control Act makes it unlawful for certain categories of persons to ship, transport, receive, or possess firearms or ammunition. Those categories include, but are not limited to individuals convicted of a felony; unlawful users or those with addiction involving any controlled substance; individuals adjudicated as a "mental defective" or under an order of civil commitment; individuals subject to a court order restraining them from harassing, stalking, or threatening an intimate partner or child of the intimate partner; or persons who have been convicted of a misdemeanor crime of domestic violence.[24] However, inconsistencies in states' reporting of disqualifying records to the National Instant Criminal Background Check System, as well as loopholes in the requirements for background checks prior to a firearm purchase, contribute to the unsuccessful identification of people who should not have firearms. Furthermore, the background check system was designed to prevent someone from purchasing a new firearm; it does not grant the authority to remove firearms from a high-risk individual who already possesses them.[25] A number of policies have been developed to help address those gaps.

Temporary Firearm Transfer

Reducing access to lethal means is an effective, evidence-based method for suicide prevention. Most states allow the private transfer of firearms without a background check, but 19 states and Washington, DC, have universal background check (UBC) laws mandating a background check whenever a firearm is transferred. While these laws make it harder for high-risk persons to acquire firearms, they could make it more difficult for patients to temporarily transfer a firearm to reduce access to lethal means.[26] Some UBC states have mechanisms that facilitate temporary transfers without a background check to certain persons (i.e., family members) or for certain time periods (e.g., 72 hours), but others do not.[27] In states with rigid UBC laws, physicians should understand existing background check requirements and exceptions so they can offer tailored advice to lower the risks facing their patient.[26]

Gun Violence Restraining Orders (GVROs)

GVRO laws, also referred to as firearm restraining orders and extreme risk protection orders, give law enforcement, family members, or household members who observe an individual's dangerous behavior and believe it could be a precursor to violence (against themselves or others), the authority to petition a court to temporarily remove firearms from the individual's possession and prohibit them from purchasing a new firearm or ammunition.[28] The purpose is to target high-risk individuals on the basis of behavior, regardless of mental illness diagnosis, to reduce firearm violence.[29] Four states (Connecticut, Indiana, California, and Washington) have adopted this risk-based, preemptive approach to firearm removal.[30-33] Similar laws have been introduced in 22 other states and the District of Columbia.

In 1999, Connecticut was the first state to authorize law enforcement to petition for the removal of firearms from individuals due to "a risk of imminent personal injury to himself or herself or to other individuals."[30] Connecticut's law was challenged in the courts, but was upheld by the Connecticut Appellate Court as not restricting the rights of law-abiding citizens to use arms in defense of their homes and thus, not in violation of the Second Amendment.[34]

An evaluation of Connecticut's risk-warrant law shows that from 1999–2013, 762 risk-warrants were issued.[34] Almost all gun removal subjects were male (92 percent). Nearly half of the firearm removal cases were initiated by an acquaintance, with family members initiating 41 percent of cases, and employers or clinicians initiating eight percent of cases. Suicidality or self-injury threat

was listed as a concern in sixty-one percent of cases, with the risk of harm to others a concern in thirty-two percent of cases.[34] Most risk-warrant subjects did not have contact with the public behavioral health system in the year before the risk-warrant was served. However, in the year following firearm removal, nearly one-third (29 percent) of risk-warrant subjects received treatment in the state system, suggesting the risk-warrant provided an entryway into needed mental health and substance use related services.[34] In nearly all cases (99 percent), police found and removed firearms when they conducted a search, with an average of seven firearms removed per subject.[34] It is estimated that there was one averted suicide for every 10 to 11 firearm removals—saving 72 lives over a 14 year period.[34]

Firearm Safety Programs

Eighteen states have child access prevention (CAP) laws.[35] These laws mandate that a firearm be stored so that a child or teen (the specific age varies by state) is not able to gain easy access to the firearm. CAP laws do not typically mandate a specific storage method, although unloading the firearm and locking it up separately from the ammunition is recommended by some researchers. State CAP laws have been associated with lower rates of both accidental deaths of children and suicides among teens.[36]

RESOURCES AND RELATED ACTIVITIES

At A-17, the House of Delegates adopted policy calling on the AMA to work with appropriate stakeholders to develop state-specific guidance for physicians on how to counsel patients to reduce their risk for firearm-related injury or death. In addition to this report, the Council is sponsoring an educational session at A-18 on "Preventing Gun Violence: What Physicians Can Do Now." The AMA is also in the process of developing an enduring continuing medical education (CME) module to help physicians navigate conversations with their patients on firearm safety. The CME module is expected to be available on the AMA's education center portal by the end of the year. The AMA is also working to provide physicians with state-specific guidance on firearm laws and how those laws interact with firearm safety counseling.

Other resources of interest include, "What You Can Do," a new initiative from University of California Davis' Violence Prevention Research Program designed to support health care providers in reducing firearm injury and death.[37] This initiative brings together a growing network of health care providers looking for ways to reduce firearm injury and death, with particular emphasis on addressing firearm injury for populations at elevated risk.[37]

CONCLUSION

Households with firearms are at increased risk of experiencing a homicide, suicide, or accidental firearm death of a household member. Despite clinical acceptance of the need for firearm injury prevention among high-risk populations, screening and counseling to increase safety is performed by only a minority of physicians. A need exists for physician training to increase physician confidence and self-efficacy toward counseling around firearm safety. While existing AMA policy encourages physicians to educate and counsel patients on firearm safety, it does not specifically address the issue of suicide. Given the prevalence of firearm suicides in the United States, physicians should be trained in lethal means safety counseling as a part of their suicide risk assessment and prevention efforts. Furthermore, laws in most jurisdictions do not provide the authority to remove firearms from a high-risk individual who already possesses them. The AMA should support common-sense laws allowing for the removal of firearms from individuals whose conduct indicates a heightened risk of violence to themselves or others.

RECOMMENDATIONS

The Council on Science and Public Health recommends that the following statements be adopted and the remainder of the report be filed.

1. That the following policy be adopted.

   Firearms and High-Risk Individuals
   Our AMA supports: (1) the establishment of laws allowing family members, intimate partners, household members, and law enforcement personnel to petition a court for the removal of a firearm when there is a high or imminent risk for violence; (2) prohibiting persons who are under domestic violence restraining orders, ~~or~~ convicted of misdemeanor domestic violence crimes or stalking, ~~including dating partners,~~ from possessing or purchasing firearms; (3) expanding domestic violence restraining orders to include dating partners; (4) requiring states to have protocols or processes in place for requiring the removal of firearms by prohibited persons; (~~4~~5) requiring domestic violence restraining orders and gun violence restraining orders to be entered into the National Instant Criminal Background Check System; and (~~5~~6) efforts to ensure the public is aware of the existence of laws that allow for the removal of firearms from high-risk individuals. (New HOD Policy)

2. That Policy H-145.975, "Firearm Safety and Research, Reduction in Firearm Violence, and Enhancing Access to Mental Health Care," be amended by addition and deletion to read as follows:

   H-145.975 Firearm Safety and Research, Reduction in Firearm Violence, and Enhancing Access to Mental Health Care
   1. Our AMA supports: a) federal and state research on firearm-related injuries and deaths; b) increased funding for and the use of state and national firearms injury databases, including the expansion of the National Violent Death Reporting System to all 50 states and U.S. territories, to inform state and federal health policy; c) encouraging physicians to access evidence-based data regarding firearm safety to educate and counsel patients about firearm safety; d) the rights of physicians to have free and open communication with their patients regarding firearm safety and the use of gun locks in their homes; e) encouraging local projects to facilitate the low-cost distribution of gun locks in homes; f) encouraging physicians to become involved in local firearm safety classes as a means of promoting injury prevention and the public health; and g) encouraging CME providers to consider, as appropriate, inclusion of presentations about the prevention of gun violence in national, state, and local continuing medical education programs. 2. Our AMA supports initiatives to enhance access to mental and cognitive health care, with greater focus on the diagnosis and management of mental illness and concurrent substance ~~ab~~use disorders, and work with state and specialty medical societies and other interested stakeholders to identify and develop standardized approaches to mental health assessment for potential violent behavior. 3. Our AMA (a) recognizes the role of firearms in suicides, (b) encourages the development of curricula and training for physicians with a focus on suicide risk assessment and prevention as well as lethal means safety counseling, and (c) encourages physicians, as a part of their suicide prevention

strategy, to discuss lethal means safety and work with families to reduce access to lethal means of suicide. (Modify Current HOD Policy)

3. That Policies, H-145.976, "Firearm Safety Counseling in Physician-Led Health Care Teams," H-145.990, "Prevention of Firearm Accidents in Children," and H-145.997 "Firearms as a Public Health Problem in the United States - Injuries and Death" be reaffirmed. (Reaffirm HOD Policy)

Fiscal Note: Less than $1,000

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