

## The Public Health Consequences and Costs of Bullets.

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I am so very grateful for the opportunity to testify before you all today.

To the members of the committee, I stand in awe of your mission and work. I cannot fathom the enormity of the decisions you must make in shepherding the nation's resources toward the great good with equity and justice. I am grateful to share this moment with the distinguished professionals who have spoken here today. I am deeply concerned about the disease running rampant in this country, the disease of bullet injury. I am a trauma surgeon. I was born right here in our nation's capital, grew up in the small town of Wellsville, Ohio, was educated in New Haven and Hartford, trained to be a surgeon in Baltimore and am now practicing emergency surgery in St. Louis. Along the way I have witnessed the ways in which bullets change the lives of people and the people who surround them. In the words of fellow Missourian Ms. Erica Jones, who lost her daughter to a high-powered, military-style bullet, I give a voice for those who are now voiceless.<sup>1</sup>

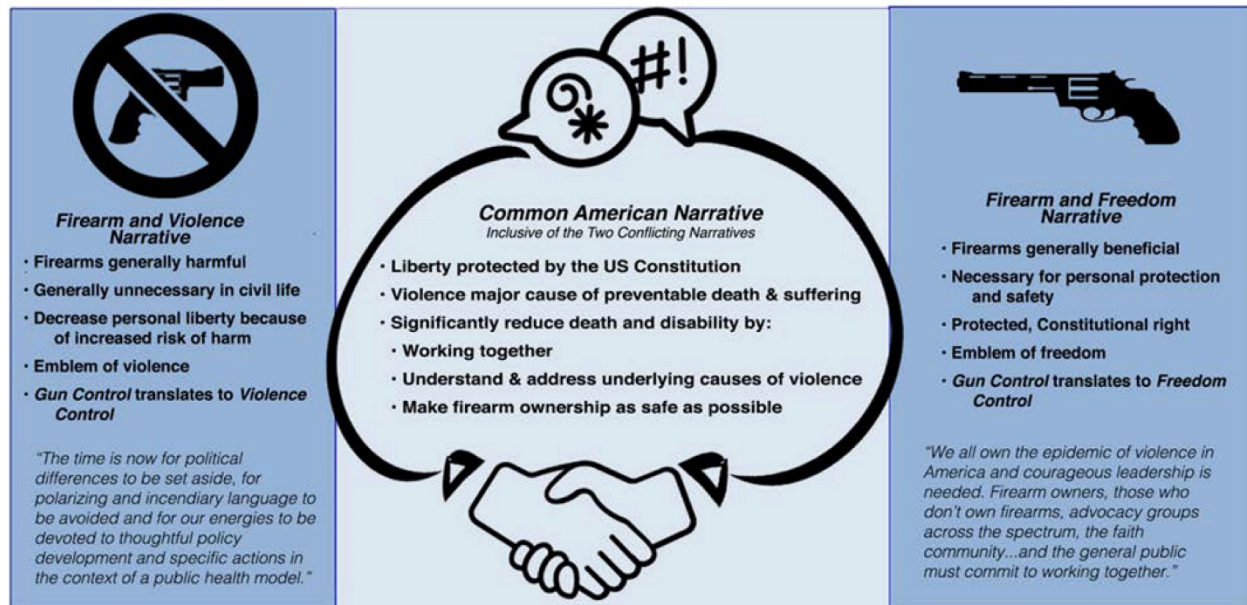
I don't want to spend my time reflecting on the unquestionable fact that bullet injuries are the second-leading cause of death in children, taking nearly twice as many lives as cancer. Dr. Rebecca Cunningham's study in The New England Journal of Medicine, which I have included in my report, will make that point clear.<sup>2</sup>

I don't want to use too many of my words to share the simple statistic that bullets took nearly as many lives as motor vehicle collisions in 2017. You can see in the National Vital Statistics Report there were 39,773 deaths from bullet injury that year. This total represents all bullet deaths including homicide, suicide, unintentional, and legal intervention. I should say it is odd to me that in this report — which details causes of death down to the strain of bacteria and the anatomic location of cancer — the word bullet is actually not found a single time, a missed opportunity to be precise about the disease. While media coverage of mass casualties has drawn attention to those tragic events, those represent less than 2% of all bullet injuries, while emergency departments across the U.S. witness multiple victims of this bullet-mediated violence daily.<sup>3</sup>

It would be redundant to discuss the structural injustice that puts children; people of color, specifically black men; women, alarmingly so in the context of intimate-partner violence; along with public, educational and sacred spaces, at risk of bullet injury and attack, be it intentional or not. In February of this year a medical summit of more than 40 professional organizations agreed upon a united statement on the impact bullets have on the health of people. The summit recommended utilizing public health as the framework to confront, understand and treat this disease. This report is also included here in my testimony.<sup>4</sup>

Quoted here is the summary of recommendations from this document:

- *Recognize* firearm injury as a U.S. public health crisis, and take a comprehensive public health and medical approach to address it.
- *Research* this public health crisis using a disease model, and call for research funding at federal and philanthropic levels commensurate with the burden of the disease on society.
- *Engage* firearm owners and communities at risk as stakeholders to develop firearm injury prevention programs.
- *Empower* the medical community across all health-care settings to act in the best interests of their patients in a variety of palpable ways, including counseling patients on safe firearm storage; screening patients at risk for firearm injury or death; and engaging the community in addressing the social determinants of disease, through hospitals and health-care systems.
- *Commit* professional stakeholder organizations to ensure that these statements lead to constructive actions for improving the health and well-being of our nation.



## Appendix 1. Medical and injury prevention organizations that support the consensus

statements from the Medical Summit on Firearm Injury Prevention

American Academy of Family Physicians (AAFP)

American Academy of Pediatrics (AAP)

American Association for the Surgery of Trauma (AAST)

American Association of Neurological Surgeons (AANS)

American College of Emergency Physicians (ACEP)

American College of Obstetrics and Gynecology (ACOG)

American College of Physicians (ACP)

American College Radiology (ACR)

American College of Surgeons (ACS)  
American Congress of Rehabilitation Medicine (ACRM)  
American Foundation for Firearm Injury Reduction in Medicine (AFFIRM)  
American Geriatrics Society (AGS)  
American Medical Association (AMA)  
American Medical Women's Association (AMWA)  
American Academy of Orthopaedic Surgeons (AAOS)  
American Public Health Association (APHA)  
American Pediatric Surgical Association (APSA)  
American Psychiatric Association (APA)  
American Psychological Association (APA)  
American Society for the Surgery of the Hand (ASSH)  
American Society of Plastic Surgeons (ASPS)  
American Surgical Association (ASA)  
American Spinal Injury Association (ASIA)  
American Trauma Society (ATS)  
Association of Academic Chairs of Emergency Medicine (AACEM)  
Association for Academic Surgery (AAS)  
Council of Medical Specialty Societies (CMSS)  
Cure Violence  
The Eastern Association for the Surgery of Trauma (EAST)  
Emergency Nurses Association (ENA)  
Injury Free Coalition for Kids  
National Association of Emergency Medical Technicians (NAEMT)  
National Medical Association (NMA)  
National Network of Hospital-based Violence Intervention Programs (NNHVIP)  
National Trauma Institute (NTI)  
Pediatric Trauma Society (PTS)  
Safe States Alliance  
Society for Academic Emergency Medicine (SAEM)  
Society of American Gastrointestinal and Endoscopic Surgeons (SAGES)  
Society for the Advancement of Violence and Injury Research (SAVIR)  
Society of Black Academic Surgeons (SBAS)  
Society of Critical Care Medicine (SCCM)  
Society of Trauma Nurses (STN)  
Trauma Center Association of America (TCAA)  
ThinkFirst National Injury Prevention Foundation  
Western Trauma Association (WTA)

There are over 18 million health professionals in this country, and while I do not presume to represent every one of them, nurses, physicians, therapists, technicians and specialists are all too aware of the way a bullet can change a patient's life. What I want to make so clear today is

while that bullet may strike the muscle and bone, ripping and shredding the tissue of only one person at a time, its effects migrate like a shock wave through homes, families, communities and even our country as a whole, tearing us apart. While bullets are a devastating cause of death, the suffering they bring in life is equally tragic.

Shannon was a 23-year-old man from St. Louis whose body was riddled with bullets one afternoon last summer. He lost his pulse and was near death as first responders rushed him to the Emergency Department. In a familiar cadence, the trauma team on call that day worked to save him. He had already lost so much blood, I had to slit his femoral artery and vein open just to begin to be able to revive him because his collapsed blood vessels could not even hold a needle. We gave him multiple blood transfusions as his body fought for survival. When his heart completely stopped, we cut his chest open and forced the blood in his heart to circulate by squeezing it rhythmically with our hands and injecting adrenalin directing into its chambers. When he came back to life, we rushed him to the operating room, where six surgeons and an enormous team worked diligently to repair his stomach, kidney, intestine, two major blood vessel injuries and bleeding from the bullet holes that were too many to count. We then rushed him to the intensive care unit, where another team did all they could to save him. By this time, his care had involved over 20 physicians and many more nurses, technicians and staff. In the four hours that I knew Shannon Hibler, I used everything in my power to save him, and still nothing could do that ultimately. He died in the ICU. After he died, I went to meet his parents and wife, who had arrived at the hospital. See, even though his life had passed, they were just beginning to bleed. His wife could barely speak, overwhelmed with the thought of how she and their child would continue. The pain and despair of the loneliness, vulnerability and financial ruin was rising like flood waters as I watched her sink. His mother's voice took on that wail that only a mother who has lost a child can make. She told me, "My baby was so tired," as she recalled the burdens Shannon had been carrying and this odd sense of relief that at least now he could put them down. His father raged and demanded brutal honesty from me, having last heard that his son was alive and in the operating room and instead arriving to see a body bag, a grotesque announcement of his son's now never-ending sleep.

All of them had to leave the hospital that day without Shannon, but I took Shannon home with me, his blood covering my shoes. These shoes can't put Shannon's baby to bed at night. These shoes will never hold his wife. These shoes won't give his momma that quick smile. These shoes will never tell his father, "I love you." Yet his death lives in me. I'm reminded of it by these blood stains that will never come out. I have more shoes just like this than I can count, because when you are running to save someone's life, blood gets on you, and there really is no way to wash it off. His death arrested me in a state of professional and personal despair, because not even the best medicine and the finest team truly ever had a chance to undo what those bullets did. He had such an overwhelming case of bullet injury that I did not know he had in fact been hit by 10 bullets until I read his autopsy. These are things we are not supposed to share, these are details you do not usually hear, but Shannon's family agreed to allow me to tell his story, and I share it now in honor of his life and family, and the hope that his death not be in

vain. This breaks me. This breaks us. It is everything a health-care professional dreads, when preventable causes overwhelm our best defenses and suffering abounds. Bullets create terror. Their power is devastating, far reaching, and more so, preventable.





While this story is just that of one man, in one family, in one city and in one state, bullets are impacting our lives everywhere, as evidenced by the enormous cost of these injuries. In Emergency Departments and hospitals alone, it has been reported that the cost of medical care for bullet injuries is \$2.8 billion annually.<sup>5</sup>

A report issued by the U.S. Congress Joint Economic Committee Democratic Staff on September 18, 2019, totaled the annual cost of bullet injuries at \$229 billion, estimating that in 2017, deaths due to this disease reached the highest level seen in the past four decades.<sup>6</sup>

Still, there may be no way to also estimate the ways in which high-profile events involving mass casualties and daily loss of life have caused us to lose our health and freedom. Exposure to violence is associated with the development of post-traumatic stress disorder. High-profile events in which multiple people are injured and killed by bullets make us think twice about the places we go, how our children go to school, and what protections we have in place. I am a parent of a 7-year-old. My child must comprehend and endure active-shooter drills, and classroom windows numbered on the outside for easy identification. He and other students from his school were cleared from the playground at recess last week when a bullet was fired within range of the school. The daily toll of this disease across this country cannot be understated. It takes the lives of nearly 100 people a day in the United States, people who will never come home again, just like Shannon.

As an academic surgeon, committed teacher and community member, my response to these injuries and the suffering they bring has been three-fold. First is a commitment to excellence in patient care. The medical teams across this country, often in partnership with pre-hospital systems of care and deeply influenced by the military, work tirelessly to ensure a high survival rate for those who experience bullet injury. The second area of focus I have centers on education. There is a paucity of education on bullet injury in medical schools. I have created a curriculum for surgery residents and medical students, which takes a systematic approach to the problem overall, breaking the disease into its multiple contributing factors and recognizing the complex relationships between them that result in bullet injury. Finally, I have partnered with other concerned health-care professionals in the St. Louis region to form Power4STL, a nonprofit organization that is working to reduce the impact of violence. Our flagship program includes ongoing work in the dissemination and implementation of the national Stop the Bleed campaign as a model of harm reduction in the experience of bullet injury.<sup>7</sup>

We also include community engagement to provide health education and positive opportunities for youth and families, such as employment in the creation of affordable, accessible trauma first aid kits, and community-focused events. Together, these efforts have allowed me to become woven into the fiber of my community as a responsive and committed leader, sharing my talents and resources beyond the walls of the hospital, and creating novel environments for others to do the same.

Other programs my colleagues work tirelessly to sustain are prevention models within acute settings. These include hospital-based violence-prevention programs, which work to provide comprehensive care and recovery for those impacted by violence, recognizing that one of the most prominent risks for experiencing bullet injuries includes having experienced a bullet injury in the past.<sup>8</sup> Another is counseling on access to lethal means, recognizing that the decision for suicide is often a transient event, lasting 10-15 minutes, a moment amenable to prevention techniques by keeping bullets at a distance. Intervening and modifying a patient's access to lethal means in the setting of suicidality, such as removing bullets from the home, can be truly lifesaving.<sup>9</sup> While these interventions are worthy, they struggle to maintain adequate funding throughout our health-care systems.

There is no single answer to ending unintentional, self-inflicted and violence-related injuries by bullets. One thing I know for sure is that in every single patient I've treated for bullet injuries, the bullet entered their bodies after having been fired into that space through the power of a controlled explosion almost always initiated by the pull of a trigger. It is disheartening to hear the discourse around these injuries and deaths, which often sets these concepts as controversial, political and immovable. It feels at times as if we are stuck in the equivalent of 1980 during the AIDS epidemic, when we knew that HIV was the bullet and sex the gun. While we know exactly what is happening and could move toward prevention, we continue to let children die from the infection, allowing bullets to infest their homes, schools and otherwise safe spaces. We seem at a complete loss as to how to act, and allow the bullets of intimate partners to terrorize women. We scratch our heads and ask for more thoughts and prayers while we continue to witness the extraction of generations of black men from their families. Veterans who provided our country with defense are defenseless to the bullet's ability to take their lives and still seem to not understand how.

While the anatomy is complex, the bullet is clearly a vector of death and despair. Bullets move faster than our hearts can see and our minds can feel. Our darkest thoughts become living nightmares, with no respect for human life. It need not be so.

In St. Louis from 2008 through 2013, nearly 400 children under the age of 16 were treated for bullet injuries in the two Level 1 pediatric trauma centers in the city.<sup>10</sup> A CDC report of firearm-related deaths in cities from 2006 through 2007 previously had reported St. Louis as the No. 2 city in the country for firearm injury in 10- to 19-year-olds.<sup>11</sup> In Dr. Choi's study, unintentional injury accounted for one-third of all injuries and 39% occurred in the child's home. Over that five-year period, 20 of the 398 children taken to the trauma centers died. Twenty-four children have been killed by bullets in the St. Louis region in 2019 alone.

Clifford Swan III - 13

Charnija Keys - 11

Rodney March III - 3



Nyla Banks - 9

Kennedi Powell - 3

Kayden Johnson – 3

Kristina Curry -14

Jashon Johnson – 16

Derrel Williams - 15

Eddie Hill IV - 10

Xavier Usanga - 7

Jason Eberhart - 16

Jurnee Thompson - 8

Jaylon McKenzie - 14

Sentonio Cox – 15

Robert Dorsey – 16

Omarion Coleman – 15

Ilen Coleman – 14

Myeisha Cannon – 16

Davaun Winters – 17

Evione Holts – 14

Malik Moore – 17

Curtis Marshall – 15

Michael Henderson – 15

As I think of my child, my heart sinks, considering the anguish of these parents and families, even as I consider that in another few years, nothing will be more likely to end my own son's life than a bullet.

What I am asking you to do today is to make bullets safer so they stop crashing into people, they stop colliding into families, they don't ram into safe spaces and they no longer skid unintentionally into children. I invite any of you to visit my hospital, or perhaps the hospital of one of your constituents, and spend the evening with the teams that serve in Level 1 Trauma Centers. I think you would be shocked by the bullet wounds and blood loss you would see. I ask

that you make it harder for a bullet to inject that kind of virulence into people. I am asking for you to support our students and future professionals and make an effort to understand the truth about what bullets do to people. I ask you to greatly increase the medical support for survivors of bullet injury; what they need as patients and families is not always held inside the word "victim." Invest in the research to find solutions, and hold it to accountability to create transformative results. There are many incurable diseases with complex origins that we invest in at every level. Bullet injuries are second only to falls in the relationship to how much morbidity and mortality they create compared with the paucity of support they receive in funding research. In many public health concerns, we have been able to separate our passions from our risks in so many ways. We have regulated pathogens, we have pushed back against choices that place entire populations at risk.

Bullets are not easy to find. They make lumps and bumps under the skin. They stay behind at crime scenes. They hide in bones. They cloak themselves inside livers and kidneys. They never talk and will never hold themselves accountable to anything. I can't help but wonder, how many of you have ever pulled those bloody pieces of metal out of a body, being then left with the task of spending hours to salvage the human who is left behind. Perhaps bullets are not unlike my surgical instruments, each with meaning and purpose, subtle features and at times a source of pride. Similarly, though, these tools can either save a life, or allow a life to end. The work of my tools and my hands is guided by an oath over 15 centuries old, a highly regulated system of care and my commitment to life itself, all lives. I would only ask, that as we consider bullets, we ask for the same. I know what it is like to have hands covered in blood. I am working to save lives. I take action, not sides. Congress must act to change the relationship we have with bullets and reduce the very real risk they present to our lives. Inaction is no more acceptable than me deciding to sit and not stand and rush to the bedside of patients bleeding from bullet injuries. Not only are we morally obligated to do so, we are ethically bound to act in the setting of such suffering and injustice the American people are experiencing through the toxicity of bullets. Enough is enough. Surgery doesn't allow me the ambivalence of indecision. It is either to cut and sew or not. But it takes more than a stitch to heal a bullet wound. I don't operate alone, and at the end of that surgery, the anesthesia doctors who put patients to sleep begin to talk to them. When someone has been asleep for a while, they need to be told it is safe to be awake. The mantra is always the same.

Open your eyes.

Take a deep breath.

Your surgery is over now.

It's time to wake up.

It's time to wake up.

It's time to wake up, and see the truth of what bullets do.

It's time to wake up, and hear the voices of our dead children.

It's time to wake up, and protect our people from the poison of apathy, an apathy that assures that bullets will continue to go deep, over and over and over again.

It's time to wake up.

It's time to wake up.

It's time to wake up.

It's time to wake up.

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