FIREARM CONTAGION: A NEW LOOK AT HISTORY

Rachel Martin* & Michael R. Ulrich**

Gun violence is widely considered a serious public health problem in the United States, but less understood is what this means, if anything, for evolving Second Amendment doctrine. In New York Pistol & Rifle Association, Inc. v. Bruen, the Supreme Court held that laws infringing Second Amendment rights can only be sustained if the government can point to sufficient historical analogues. Yet, what qualifies as sufficiently similar, a suitable number of jurisdictions, or the most important historical eras all remain unclear. Under Bruen, lower courts across the country have struck down gun laws at an alarming pace, while scholars and jurists continue debating the so-called true meaning of centuries-old firearm restrictions at times when slavery existed, women could not vote, and it took Thomas Jefferson longer to travel from Washington, D.C. to Williamsburg, VA than it currently takes to fly to the other side of the planet.

This approach ignores the historical relevance of the government's authority, if not outright duty, to respond to public health crises even if constitutional rights were implicated. The lack of historical laws related to mass shootings, large capacity magazines, and bullets designed to expand inside the body reflects the drastic evolution of gun violence rather than an impenetrable Second Amendment scope. Indeed, while state police powers to protect public health and safety preexist the Constitution, gun violence would have hardly been a priority for elected officials historically. Thus, the absence of robust, widespread gun regulations hardly reflects a consensus

^{*} Research Assistant, Harvard Injury Control Research Center, Harvard T.H. Chan School of Public Health. MPH, Boston University School of Public Health.

^{**} Assistant Professor of Health Law, Ethics, and Human Rights, Boston University School of Law and Boston University School of Public Health; Solomon Center Distinguished Visiting Scholar, Yale Law School.

The authors would like to thank Saul Cornell for the invitation to participate in the 2023 Cooper-Walsh Colloquium, *Public Health, History & The Future of Gun Regulation after* Bruen, as well as the editors at the *Fordham Urban Law Journal*. We are especially grateful to Charlotte Moriarty, Sophia Slater, and Joseph Gomez for their help and patience in bringing this Essay to print.

understanding of Second Amendment protections. Instead, examining accepted government restrictions for public health crises such as infectious diseases may provide better insight into the scope of authority to limit constitutional rights to protect the public. A public health law lens also helps to clarify that cementing policy options to emerging public health problems lacks historical pedigree.

Introduction			280
I.	Reconsidering Historical Analogues for the Gun Violence		
	Epidemic		282
	A.	Separation of Powers, the Legislative Role, and the	
		Relevance of Silence	284
	B.	Characteristics of Contagion	285
II.	Histor	ical Support for Protecting the Public	289
	A.	Police Power Potency	289
	B.	Public Health Priorities	291
III. Historical Testing Through a Public Health Lens			293
	A.	Limiting Risks Through Civil Proceedings	294
	B.	Updated Understandings of Cooperation and Science.	296
Conclusion			298

INTRODUCTION

Gun violence continues to persist as an urgent public health crisis in the United States. The United States has the highest number of firearm deaths among all high-income countries in the world, with nearly 49,000 lives lost in 2021 alone. This number — the highest ever recorded — includes almost 21,000 gun homicides and over 26,000 suicides, amounting to one firearm death every 11 minutes. And while tracking nonfatal injuries is more difficult, one study estimates that approximately 85,000 people are wounded by guns annually. Meanwhile, a massive spike in gun-related incidents

^{1.} See Champe Barton & Daniel Nass, Exactly How High Are Gun Violence Rates in the U.S., Compared to Other Countries?, The TRACE (Oct. 5, 2021), https://www.thetrace.org/2021/10/why-more-shootings-in-america-gun-violence-data-research/ [https://perma.cc/8E9W-QPF9].

^{3.} *See id.* at 10.

^{4.} See Elinore J. Kaufman et al., Epidemiologic Trends in Fatal and Nonfatal Firearm Injuries in the US, 2009-2017, 181 JAMA INTERNAL MED. 237, 238 (2021). Nonfatal injuries are difficult to track because there is no system in place to track them in the same manner as

during the COVID-19 pandemic, which has further exacerbated existing racial disparities.⁵ Gun violence is also the leading cause of death among teenage children in the United States, making it a particularly important problem to address.⁶ But what policy options are available is dependent on determinations of constitutionality in the relatively nascent Second Amendment doctrine.

In New York State Rifle & Pistol Association, Inc. v. Bruen, the Supreme Court declared that laws infringing on the Second Amendment can only stand if they are consistent with "the Nation's historical tradition of firearm regulation."⁷ This novel approach not only disregards the evolving nature of technology and the current landscape of gun violence in this country but also the duty and responsibility of the government to respond to an emerging public health problem, even if this means infringing on constitutional rights.8 Gun violence was not a public health problem when the Second Amendment was ratified, nor did firearms present the same type of risk they do now.⁹ The logistical reality of long-guns and muskets in 1791¹⁰ meant suicides and mass shootings — which occurred at least 690 times in 2021 — were not a threat and, therefore, simply could not have been a legislative priority for elected officials.¹¹ Thus, limiting response efforts to these contemporary crises to the policy options in place centuries ago lacks sufficient legal foundation for a strict, unyielding Second Amendment boundary. Such an analytical approach is even more troubling when considering the current inequities in gun violence for communities of color and the historical racism that might prevent targeted approaches to mitigating racial disparities.¹²

firearm deaths, instead relying on hospital data systems and law enforcement tracking systems that are voluntary. *See* Catherine Barber, Philip J. Cook & Susan T. Parker, *The Emerging Infrastructure of US Firearms Injury Data*, 165 PREVENTIVE MED. 1, 2 (2022).

- 5. See John MacDonald, George Mohler & P. Jeffrey Brantingham, Association Between Race, Shooting Hot Spots, and the Surge in Gun Violence During the COVID-19 Pandemic in Philadelphia, New York and Los Angeles, 165 PREVENTIVE MED. 1, 2–5 (2022).
- 6. See CDC Wonder, CTRS. FOR DISEASE CONTROL & PREVENTION, https://wonder.cdc.gov/ [https://perma.cc/K87X-X8U2] (last visited July 21, 2023).
- 7. New York State Rifle & Pistol Ass'n, Inc. v. Bruen, 597 U.S. __, 142 S.Ct. 2111, 2117, 2130 (2022).
- 8. See Michael R. Ulrich, Revisionist History? Responding to Gun Violence Under Historical Limitations, 45 Am. J. L. Med. 188, 198–200 (2019).
 - 9. See generally RANDOLPH ROTH, AMERICAN HOMICIDE (2009).
- 10. See Christopher Ingraham, What 'Arms' Looked Like When the 2nd Amendment was Written, WASH. POST, (June 13, 2016), https://www.washingtonpost.com/news/wonk/wp/2016/06/13/the-men-who-wrote-the-2nd-amendment-would-never-recognize-an-ar-15/ [https://perma.cc/QQE6-SF4J].
- 11. See Chip Brownlee, Gun Violence in 2021, By the Numbers, THE TRACE (May 27, 2022), https://www.thetrace.org/2021/12/gun-violence-data-stats-2021/[https://perma.cc/L2Z9-7TQP].
 - 12. See MacDonald et al., supra note 5, at 1.

This Essay argues that if historical support is to be the primary focus of Second Amendment analysis after *Bruen*, gun laws cannot be the sole source of such an examination. Contagious diseases, a pressing public health problem in the 18th and 19th centuries, 13 provides a more fruitful examination of how individual rights were limited historically in the name of protecting the public. Part I of this Essay will use the government's authority to respond to public threats to suggest that Bruen's emphasis on analogues should make the analogous characteristics between gun violence and contagious diseases constitutionally relevant. Part II will detail historical examples of the government limiting constitutional rights to protect the public against the threat of contagious diseases, demonstrating a broader scope of government authority to protect against the threat of gun violence even under Bruen. Part III will explore how analogizing gun violence as a contagion may provide more historical support for contemporary firearm policies than may initially appear. In doing so, this Essay will demonstrate how, despite the constraints of Bruen, the government is still empowered to combat the gun violence epidemic and ensure safety among communities across the country.

I. RECONSIDERING HISTORICAL ANALOGUES FOR THE GUN VIOLENCE EPIDEMIC

Gun violence has shifted in recent years to being regarded as a public health crisis. ¹⁴ What was once considered an individual concern, both in terms of causes and impact, has now become recognized as a multifaceted challenge that impacts everyone. ¹⁵ Similar to the pivot in thought regarding motor vehicle deaths as a public health problem, the advancement of research and a greater understanding of the social determinants of health has aided in realizing that gun violence can be minimized through preventive measures. ¹⁶ This recognition was slowed by the Dickey Amendment, which prohibited the Center for Disease Control and Prevention ("CDC") from funding research that could be used to promote gun control. ¹⁷ Though the Dickey Amendment still stands, the prohibition has since been revised to allow for

^{13.} See generally Wendy E. Parmet, Health Care and the Constitution: Public Health and the Role of the State in the Framing Era, 20 HASTINGS CONST. L. Q. 267 (1993).

^{14.} See David Hemenway & Matthew Miller, Public Health Approach to the Prevention of Gun Violence, 368 New Eng. J. Med. 2033, 2033 (2013).

^{15.} See Michael R. Ulrich, A Public Health Law Path for Second Amendment Jurisprudence, 71 Hastings L. J. 1053, 1090–94 (2020).

^{16.} Hemenway & Miller, supra note 14, at 2033–35.

^{17.} See generally Allen Rostron, The Dickey Amendment on Federal Funding for Research on Gun Violence: A Legal Dissection, 108 Am. J. Pub. Health 865 (2018), https://ajph.aphapublications.org/doi/epdf/10.2105/AJPH.2018.304450 [https://perma.cc/XW32-WDFQ].

research regarding the causes of gun violence. ¹⁸ This shift in research funding has accompanied the newly recognized public health perspective that captures the variety of risk factors that contribute to high rates of gun victimization in this country, and the various avenues for prevention and intervention. ¹⁹ Conceptualizing gun violence as a public health problem also emphasizes the lack of control individuals have in their ability to protect themselves from being victimized, and the subsequent importance of government intervention.

The addition of more guns into society has been proven ineffective in combatting gun violence.²⁰ To wit, the United States is home to over 393 million guns and ranks among the countries with the highest rates of gun violence.²¹ Individuals arming themselves does not alleviate gun violence²² and is not a viable or feasible solution,²³ specifically given the increased threat of gun violence among youth.²⁴ Social determinants, such as poverty, poor public education, and substandard housing, are key factors that drive criminal behavior and prevent increasing firearm carry from having a deterrent effect.²⁵ The presence of firearms also increases the risk of harm that can arise from every day confrontations, creating gun violence where there may have been none without widespread firearm access.²⁶ The government as a result has a duty to intervene to protect communities from the wide-ranging impacts of gun violence.

- 18. See id.
- 19. See Hemenway & Miller, supra note 14, at 2033–35.
- 20. See David Hemenway & Matthew Miller, Firearm Availability and Homicide Rates Across 26 High-Income Countries, 49 J. TRAUMA 985, 985–88 (2000).
- 21. See Aaron Karp, Estimating Global Civilian-Held Firearms Numbers, SMALL ARMS SURV., at 4 (2018), https://www.smallarmssurvey.org/sites/default/files/resources/SAS-BP-Civilian-Firearms-Numbers.pdf [https://perma.cc/Q322-VLXB].
- 22. See John J. Donohue, Abhay Aneja & Kyle D. Weber, Right-to-Carry Laws and Violent Crime: A Comprehensive Assessment Using Panel Data and a State-Level Synthetic Control Analysis, 16 J. EMPIRICAL L. STUD. 198, 204 (2019).
- 23. See Michael R. Ulrich, Second Amendment Realism, 43 CARDOZO L. REV. 1379, 1426 (2022).
- 24. See Christopher R. Harper et al., Witnessing Community Violence, Gun Carrying, and Associations with Substance Use and Suicide Risk Among High School Students Youth Risk Behavior Survey, United States, 2021, 72 MORBIDITY & MORTALITY WKLY. REP. 22, 22 (2023).
- 25. See generally Daniel Kim, Social Determinants of Health in Relation to Firearm-Related Homicides in the United States: A Nationwide Multilevel Cross-Sectional Study, 19 PLOS MED. 1 (2019).
 - 26. See Donohue, Aneja & Weber, supra note 22, at 204.

A. Separation of Powers, the Legislative Role, and the Relevance of Silence

Bruen, however, raises doubt about the constitutional viability of government action to address gun violence because of its demand for historical analogues.²⁷ Since there was little to no threat of gun violence during most of this country's history — or at the very least a significantly different type of risk from firearms²⁸ — the absence or limited breadth of firearm regulations historically is both logical and uninformative of the Second Amendment's scope. Legislatures are not authorized to pass laws simply to etch out the scope of a constitutional right.²⁹ Indeed, it would be quite perplexing to suggest that the legislature's role is to determine the boundaries of constitutional rights when those rights are meant to limit government action.³⁰ This is the very purpose of the separation of powers.³¹ The Constitution is superior to legislative authority and, as a result, it is the judiciary and not the legislature that determines what the Constitution does and does not say.³² As the Supreme Court made clear shortly after the founding, "[it] is emphatically the province and duty of the judicial department to say what the law is."33

Instead, the legislature is authorized to pass laws in response to the wants and needs of their constituency.³⁴ To do so, the federal government uses its limited enumerated powers in the Constitution and states use their police power authority, which, while much broader, still must protect and promote public health, safety, and welfare.³⁵ In other words, laws are passed in pursuit of recognized government interests, not to provide legislative interpretations of constitutional provisions. Not only is the gun violence we see today, as well as the instruments that perpetrate that violence, vastly distinct from the 18th and 19th centuries, but so too are the threats the public and its elected officials would have been primarily concerned with

^{27.} See Michael R. Ulrich, Public Carry Versus Public Health — The Harms to Come from the Supreme Court's Decision in Bruen, 387 New Eng. J. Med. 1245, 1246 (2022).

^{28.} See Adam Winkler, Gun Fight 113-18 (2013).

^{29.} See Marbury v. Madison, 5 U.S. 137, 177 (1803) (describing the suggestion that the Constitution can be altered by legislative act as "an absurdity too gross to be insisted on").

^{30.} See id. at 176 ("To what purpose are powers limited, and to what purpose is that limitation committed to writing, if these limits may, at any time, be passed by those intended to be restrained?").

^{31.} See id.

^{32.} See id. at 178 ("The Constitution is superior to any ordinary act of the legislature.").

^{33.} Id. at 177.

^{34.} See WILLIAM J. NOVAK, THE PEOPLE'S WELFARE 42 (1996) (explaining that even in the Founding era the primary objects of governance were social order and the people's welfare).

^{35.} See Jacobson v. Massachusetts, 197 U.S. 11, 25 (1905).

addressing through legislative acts. This casts doubt then on the utility of examining historical firearm regulations exclusively to determine the Second Amendment's protective boundaries.

These points do not necessarily suggest relitigating the Court's *Bruen* decision — though the chaos in the lower courts might benefit from doing so³⁶ — but rather to say that a broader examination of responses to historically relevant public health problems should be acceptable under *Bruen*'s requirements. Even *Bruen* states that a "more nuanced approach" is warranted if the law addresses "unprecedented societal concerns or dramatic technological changes."³⁷ The Court went on to ensure that its pronouncement in *Bruen* was not to operate as a "regulatory straightjacket."³⁸ Novel problems then can perhaps open the door to search for historical laws that are related at a higher level of generality. Thus, an examination of other government responses to problems that implicate both public health and safety and fundamental constitutional rights should be informative.

Public health problems predate the founding of the country and, as a result, so too does government intervention to address threats to public health and safety.³⁹ Within this history are plenty of examples of the government limiting individual rights in furtherance of protecting the community.⁴⁰ Accordingly, it may be helpful to look to other public health measures, especially those related to threats more likely to be a concern for the people and the legislature, rather than solely relying on the unsettled conflicts over interpretations of a few historical firearm regulations. Contagious diseases provide a useful area of examination given disease was a perpetual and significant danger during the early parts of the country and has, perhaps surprisingly, some common characteristics to gun violence.

B. Characteristics of Contagion

Not only do some government efforts to control the spread of contagious diseases share characteristics to the measures used to combat gun violence, but contagious diseases and gun violence as threats to the public do as well. Gun violence is analogous to contagious diseases in some respects because they share similarities in their ability to spread through communities and

^{36.} See Clara Fong, Kelly Percival & Thomas Wolf, Judges Find Supreme Court's Bruen Test Unworkable, Brennan Ctr. for Just. (June 26, 2023), https://www.brennancenter.org/our-work/research-reports/judges-find-supreme-courts-bruen-test-unworkable [https://perma.cc/7XQ2-W3GU].

^{37.} New York State Rifle & Pistol Ass'n, Inc. v. Bruen, 142 S.Ct. 2111, 2132 (2022).

^{38.} Id. at 2133.

^{39.} Parmet, *supra* note 13, at 285–302.

^{40.} Id.

adversely impact a broad set of health outcomes. While gun violence is not caused by biological agents, it does operate similarly by diffusing through social networks. As a result, exposure increases the probability of harm for both contagious disease and gun violence. For example, gun violence is a risk that persists as a threat across all parts of the country, but most incidents are concentrated in populations and locations where gun violence has previously occurred. Research has displayed that gun violence occurs most frequently in large U.S. cities, with young non-White men ages 18 to 24 making up the vast majority of gun homicide victims. Black children experience over four times more neighborhood firearm violence exposure, with disparities growing even wider in recent years.

Social networks and interpersonal factors play a role in the spread of gun violence. This operates in part due to social contagion theory, which considers how attitudes and behaviors unconsciously spread throughout a social group. Social contagion theory can explain how clusters of individuals within a social network experience similar behavioral outcomes. To illustrate the power of social contagion: individuals can be influenced by the memories of others, which may lead them to believe they experienced something they were not present for or to add fictional elements to an existing memory. Social contagion theory is also apparent in many other public health behaviors, including vaccine hesitancy and alcohol consumption.

For gun violence specifically, peer influence has a dramatic impact on changes to an individual's behavior and opinions, encouraging compatibility in thought regarding violence.⁵¹ Continuous and repeated exposure to gun

^{41.} See Andrew V. Papachristos, Christopher Wildeman & Elizabeth Roberto, Tragic, but Not Random: The Social Contagion of Nonfatal Gunshot Injuries, 125 Soc. Sci. & Med. 139, 144 (2015).

^{42.} See id.

^{43.} See Charles C. Branas, Sara Jacoby & Elena Andreyeva, Firearm Violence as a Disease — "Hot People" or "Hot Spots"?, 177 JAMA INTERNAL MED. 333, 333 (2017).

^{44.} Papachristos, Wildeman & Roberto, supra note 41, at 139.

^{45.} Rachel Martin et al., Racial Disparities in Child Exposure to Firearm Violence Before and During COVID-19, 63 Am. J. PREVENTIVE MED. 204, 206 (2022).

^{46.} Papachristos, Wildeman & Roberto, supra note 41, at 144.

^{47.} See id.

^{48.} See Vanesa Fischer & Shane M. O'Mara, Neural, Psychological and Social Foundations of Collective Memory: Implications for Common Mnemonic Processes, Agency, and Identity, 274 PROGRESS BRAIN RSCH. 1, 13 (2022).

^{49.} See Pinelopi Konstantinou et al., Transmission of Vaccination Attitudes and Uptake Based on Social Contagion Theory: A Scoping Review, 9 VACCINES 607, 622 (2021).

^{50.} See J. Niels Rosenquist et al., The Spread of Alcohol Consumption Behavior in a Large Social Network, 152 Annals Internal Med. 426, 426 (2010).

^{51.} See Papachristos, Wildeman & Roberto, supra note 41, at 144.

violence alters social norms and manifests in collective feelings of hopelessness and decreased resilience. Exposure to violence — whether this means living in a neighborhood with frequent violence, losing a family member or friend, hearing gunshots, or directly surviving a shooting — culminates in community trauma. As more individuals are exposed to gun violence, affected social networks widen and increase the visibility of the threat of victimization. The likelihood of any individual in the United States knowing a victim of gun violence within a personal social network over their lifetime has grown to 99.85%. Since individuals exposed to gun violence are more likely to be victimized by a firearm in the future, the pool of individuals at risk continues to widen. Since individuals at risk continues to widen.

At first blush, a focus on the biological aspect of contagious diseases could imply a lack of influence from social factors. In reality, attitudes, behaviors, and social norms have a significant impact on the spread of contagious diseases and which communities are at greatest risk.⁵⁶ The COVID-19 pandemic clearly displayed how differences in socioeconomic status, education, and access to harm-mitigating resources disproportionately affected who suffered.⁵⁷ Indeed, both contagious diseases and gun violence illustrate the influence of social determinants and structural inequities, creating racial disparities in each circumstance. For gun violence, both overpolicing and underpolicing in neighborhoods of color, structural racism, income inequality, and residential segregation are some of the factors that create inequities in gun violence exposure and victimization.⁵⁸

The broad impact each factor can have on health is another commonality. Gun violence is often framed with a narrow focus on fatalities.⁵⁹ But similarly to how infectious disease impacts human health through illness and

^{52.} See Ijeoma Opara et al., "Bullets Have No Names:" A Qualitative Exploration of Community Trauma Among Black and Latinx Youth, 29 J. CHILD FAM. STUD. 2117, 2125–26 (2020).

^{53.} See id. at 2122-23.

^{54.} See Bindu Kalesan et al., Gun Violence in Americans' Social Network During Their Lifetime, 93 Preventive Med. 53, 54 (2016).

^{55.} See Ben Green et al., Modeling Contagion Through Social Networks to Explain and Predict Gunshot Violence in Chicago, 2006 to 2014, 177 JAMA INTERNAL MED. 326, 327 (2016).

^{56.} See Rebeca Bayeh et al., The Social Lives of Infectious Diseases: Why Culture Matters to COVID-19, 12 FRONTIERS PSYCH. 1, 3 (2021).

^{57.} See Sebastian D. Romano et al., Trends in Racial and Ethnic Disparities in COVID-19 Hospitalizations, by Region — United States, March–December 2020, 70 MORBIDITY & MORTALITY WKLY. REP. 560, 561–64 (2021).

^{58.} See Julia P. Schleimer et al., Neighborhood Racial and Economic Segregation and Disparities in Violence During the COVID-19 Pandemic, 112 Am. J. Pub. Health 144, 151 (2022).

^{59.} See Ulrich, supra note 15, at 1086-90.

other physical manifestations, gun violence has implications for mental, physical, and emotional health. In addition to the physical effects during the direct aftermath of being shot, there are risks of several longer-term adverse physical health outcomes from both gun exposure and victimization.⁶⁰ Exposure to community-wide violence is associated with reduced physical activity, long-term stress, and chronic physical illness.⁶¹ Research suggests that repeated exposure to community violence heightens neighborhood levels of chronic stress, which deteriorates physical health.⁶² Survivors of non-fatal shootings often experience physical complications from being shot in the years following the direct incident. For example, Colin Goddard, a survivor of the Virginia Tech shooting in 2007, experienced lead poisoning and subsequent chronic headaches and fatigue as the result of bullet fragments left in his body. 63 Leaving bullet fragments in the aftermath of a shooting is common medical practice, yet there are countless stories similar to Goddard's and still little government regulation surrounding lead and toxicity in bullets.⁶⁴ The physical impact of exposure to gun violence can also be transferred, as pregnant individuals exposed to mass shootings during their second trimester have an increased risk of giving birth to an infant with low birth weight.⁶⁵

Along with physical health, gun violence can also have a broad impact on mental health. Individuals exposed to gun violence display higher rates of psychological distress, suicidal ideation, and psychotic episodes compared to individuals not exposed.⁶⁶ Individuals who live through mass shootings often experience a variety of psychological impacts in the aftermath, including post-traumatic stress disorder, major depressive disorder, and generalized anxiety disorder.⁶⁷ Children and teens are particularly vulnerable to the health effects of gun violence. Youth exposure to gun violence is associated with the development of post-traumatic stress

^{60.} See Daniel C. Semenza & Richard Stansfield, Non-Fatal Gun Violence and Community Health Behaviors: A Neighborhood Analysis in Philadelphia, 44 J. Behav. Med. 833, 837 (2021).

^{61.} See id.

^{62.} See id.

^{63.} See Melissa Chan, They Survived Mass Shootings. Years Later, The Bullets Are Still Trying to Kill Them, YAHOO NEWS (May 31, 2019), https://news.yahoo.com/survived-mass-shootings-years-later-110059140.html [https://perma.cc/P2J5-YPM2].

^{64.} See id.

^{65.} See Bahadir Dursun, The Intergenerational Effects of Mass Shootings (Oct. 13, 2019), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3474544 [https://perma.cc/SMJ8-GRLN].

^{66.} See Melissa E. Smith et al., The Impact of Exposure to Gun Violence Fatality on Mental Health Outcomes in Four Urban U.S. Settings, 246 Soc. Sci. & Med. 1, 5 (2020).

^{67.} See Sarah R. Lowe & Sandro Galea, The Mental Health Consequences of Mass Shootings, 18 Trauma, Violence, & Abuse 62, 75 (2017).

disorder,⁶⁸ anxiety, disrupted sleep patterns, and difficulties concentrating.⁶⁹ These psychological impacts are most pronounced among children repeatedly exposed to violence.⁷⁰ The effects of gun violence can spread to other aspects of life that carry long-term consequences, such as reductions in school performance⁷¹ or less time outdoors. ⁷² Even just the threat of gun violence in this country has had mental health implications for youth, as 75% and 72% of Generation Z regard mass shootings and school shootings as significant sources of stress, respectively.⁷³ The widespread costs of gun violence upon the youth of this country highlight that the true impact of this epidemic is still unknown. The full scope of the devastating consequences of gun violence is unlikely to be more fully understood until decades later, as the next generation grows older.⁷⁴

II. HISTORICAL SUPPORT FOR PROTECTING THE PUBLIC

A. Police Power Potency

Given the breadth of damage caused by gun violence, the ability of individuals or communities to protect themselves from these harms is quite limited. It is precisely these types of circumstances that provide increased justification for government authority to act in the name of the public. ⁷⁵ For example, the government has greater authority to control an airborne disease that spreads asymptomatically than to protect against the spread of sexually transmitted infections where an individual has greater ability to take precautions. In fact, a government that simply left the public to figure out protective measures individually to protect against a fatal airbone contagion

^{68.} See James Garbarino, The War-Zone Mentality — Mental Health Effects of Gun Violence in U.S. Children and Adolescents, 387 New Eng. J. Med. 1149, 1149–50 (2022).

^{69.} See Patrick Sharkey, The Acute Effect of Local Homicides on Children's Cognitive Performance, 107 Proc. NAT'L ACAD. Sci. 11733, 11733 (2010).

^{70.} See Garbarino, supra note 68, at 1149-50.

^{71.} See Sharkey, supra note 69, at 11736–37.

^{72.} See Beth E. Molnar et al., Unsafe to Play? Neighborhood Disorder and Lack of Safety Predict Reduced Physical Activity Among Urban Children and Adolescents, 18 Am. J. HEALTH PROMOTION 378, 384 (2004).

^{73.} Am. PSYCH. ASS'N, STRESS IN AMERICA: GENERATION Z 2 (2018), https://www.apa.org/news/press/releases/stress/2018/stress-gen-z.pdf [https://perma.cc/KTA8-8VMS].

^{74.} See Giffords L. CTR., PROTECTING THE NEXT GENERATION: STRATEGIES TO KEEP AMERICA'S KIDS SAFE FROM GUN VIOLENCE (2018), https://files.giffords.org/wp-content/uploads/2019/12/Giffords-Law-Center-Protecting-the-Next-Generation.pdf [https://perma.cc/5VQY-YRZF].

^{75.} See JOHN STUART MILL, ON LIBERTY 6 (1880) ("The only purpose for which power can be rightfully exercised over any member of a civilized community, against his will, is to prevent harm to others.").

would be abdicating a primary role of representative governance.⁷⁶ Similarly, to suggest that gun violence is something that people need to address on their own is both unrealistic and anathema to civilized, ordered society.

States hold the primary authority to protect their citizens.⁷⁷ While the Constitution granted limited enumerated powers to the federal government, the states retained their police power, which provides broad authority to protect public health, safety, and welfare.⁷⁸ This duty still stands even when public health interventions infringe or limit the constitutional rights of an individual.⁷⁹ Police power is not boundless and rights provide an important and necessary barrier to arbitrary and oppressive government action.⁸⁰ The point, however, is that infringing on a constitutional right, even one with fundamental status, does not equate to unconstitutionality of a government intervention. If *Bruen* insists that history be centered in Second Amendment analysis,⁸¹ it is essential to note that there is insufficient historical support for a categorical binary that treats rights as impenetrable. Throughout this country's history, courts have repeatedly recognized the government's authority to infringe upon constitutional rights to a certain extent when it is necessary to protect public health, safety, and welfare.⁸²

Indeed, the police power predates the Constitution, 83 and its government empowerment to protect the public against threats to health and safety has a robust historical foundation. In 1824, well before the Fourteenth Amendment's passage, Chief Justice Marshall declared the police power "embraces every thing within the territory of a State, not surrendered to the general government." Soon after the ratification of the Reconstruction Amendments in 1868, the Supreme Court again made clear that "persons and property are subject to all kinds of restraints and burdens in order to secure the general comfort, health, and prosperity of the State." Rather than

^{76.} See, e.g., JOHN LOCKE, THE SECOND TREATISE OF GOVERNMENT (1689) ("The great and *chief end* therefore, of Mens uniting into Commonwealths, and putting themselves under Government, *is the Preservation of their Property*," which Locke defines as lives, liberties, and estates); WENDY E. PARMET, POPULATIONS, PUBLIC HEALTH, AND THE LAW 11–15 (2009) (discussing social contract theory and the obligation created for the government to pursue and protect the common good).

^{77.} See PARMET, supra note 76, at 272.

^{78.} See Jacobson v. Massachusetts, 197 U.S. 11, 24–25 (1905).

^{79.} See id. at 26-27.

^{80.} See id. at 38.

^{81.} See New York State Rifle & Pistol Association, Inc. v. Bruen, 142 S.Ct. 2111, 2118 (2022).

^{82.} See Ulrich, supra note 15, at 1084.

^{83.} See Jacobson, 197 U.S. at 25.

^{84.} Gibbons v. Ogden, 22 U.S. 1, 78 (1824).

^{85.} Slaughter-House Cases, 83 U.S. 36, 62 (1872).

framing the issue as a conflict between individual rights and public benefit, the Court saw the protection of the public as necessary for individuals to enjoy their private and social lives.⁸⁶

B. Public Health Priorities

Absence of specific examples where courts uphold firearm regulations in spite of limiting individual rights would make sense when gun violence did not warrant the legislative attention it does today. There are, however, many examples of government intervention limiting individual rights to protect the public against diseases, which posed the greatest threat to public health. In particular, the use of quarantine dates to at least the sixth century, with laws passed to isolate people arriving from regions where the bubonic plague was present.⁸⁷ For centuries, preventing exposure was the best approach for protecting the public given the lack of medicinal cures for many diseases prior to the modern era. 88 At English common law, quarantine regulations were written in 1663, when the term first appeared in the Oxford English Dictionary.⁸⁹ That same year, New York City issued a law requiring individuals arriving from areas that were known or suspected to have smallpox to remain outside of the city until health officials believed they were no longer a threat to the public. 90 Soon after the Founding, in 1797, Massachusetts enshrined in statute its police power authority to quarantine, and Pennsylvania built an entire quarantine complex to combat yellow fever during the same decade.⁹¹ Federal quarantine legislation followed in 1878, soon after the Fourteenth Amendment passed. 92

Quarantine is an especially useful historical restriction to consider because of how extreme an infringement it is. While it most obviously restricts the right to move freely, an involuntary hold in a government location can limit nearly all rights given the severe lack of autonomy. Quarantine is also a notable public health measure because it is enacted through civil procedures and not connected to any wrongdoing. By definition, quarantine means that an individual is held simply because there is a belief they have been exposed to and may be infected by a contagious

^{86.} See id.

^{87.} A.A. Conti, *Quarantine Through History*, INT'L ENCYCLOPEDIA PUB. HEALTH 454, 456 (2008). Isolating infected people as a health control measure is actually mentioned in the Bible, both the Old Testament and the New Testament. *Id.* at 455.

^{88.} Eugenia Tognotti, Lessons from the History of Quarantine, from Plague to Influenza A, 19 EMERGING INFECTIOUS DISEASES 254, 254 (2013).

^{89.} Conti, supra note 87, at 455; Tognotti, supra note 88, at 255.

^{90.} Conti, supra note 87, at 458.

^{91.} Id. at 458.

^{92.} Id. at 459.

disease.⁹³ In other words, the stern deprivation of individual rights is justified not by an identifiable harm but solely by the potential threat posed to the public.

Whether vaccination mandates infringe on individual rights to a similar degree as quarantine may be a matter of opinion, but the requirement undoubtedly impacts bodily autonomy and leaves people with limited choice of whether to get inoculated or be subject to some punishment. In the foundational 1905 case Jacobson v. Massachusetts, where the punishment was a five dollar fine, the Supreme Court upheld a smallpox vaccine mandate and confirmed state authority to infringe on individual rights to protect public health and safety. 94 As the Court explained, "the liberty secured by the Constitution of the United States . . . does not import an absolute right in each person to be, at all times and in all circumstances, wholly freed from restraint," nor is it an element of liberty "that one person, or a minority of persons, residing in any community and enjoying the benefits of its local government, should have the power...to dominate the majority when supported in their action by the authority of the state."95 Here, the Court explicitly rejected the notion that infringing a constitutional right is dispositive, 96 an approach that has been followed by the Supreme Court into the modern era even when impacting our country's most sacred rights.⁹⁷ Instead, the analysis must take stock of whether the public health threat warrants government action, the mechanism of action has a reasonable chance to mitigate the threat, and the benefits of government action justify the degree to which individual rights are limited. 98

An analytical approach that factors in both the individual and the public is particularly important in the context of gun violence given that different states experience different rates of gun exposure and victimization. The landscape of gun violence can vary by state, meaning states should enact policies that target the specific risks their constituents face. Policies of a state or locality with no substantive connection to the threat firearms pose for the public could justifiably be struck down as arbitrary. On the other

^{93.} Tognotti, supra note 88, at 254.

^{94. 197} U.S. 11, 38 (1905).

^{95.} Id. at 26, 38.

^{96.} See id. at 38.

^{97.} See Emp. Div. v. Smith, 494 U.S. 872, 885 (1990) (holding that it is constitutionally permissible for a state to refuse to carve out an exception from its generally applicable criminal laws for religious practice).

^{98.} See Ulrich, supra note 15, at 1077-78.

^{99.} See John Gramlich, What the Data Says About Gun Deaths in the U.S., PEW RSCH. CTR. (Apr. 26, 2023), https://www.pewresearch.org/short-reads/2023/04/26/what-the-data-says-about-gun-deaths-in-the-u-s/ [https://perma.cc/SN3Y-7WWJ].

^{100.} See Joseph Blocher, Firearm Localism, 123 YALE L. J. 82, 90 (2013).

hand, government authority is stronger when dealing with a public health problem where people are less able to protect themselves. ¹⁰¹ In many circumstances, this describes both disease and gun violence epidemics.

If history is indeed to be the focus of Second Amendment jurisprudence, context is critical. Not only can threats facing the public evolve over time; so too can government interests. For example, if a state were to enact measures to mitigate racial disparities stemming from the inequitable burdens gun violence inflicts on communities of color, it would be difficult to find historical support for such an endeavor. 102 Similar problems arise with efforts to curb gender-based violence from firearms. 103 The lack of historical analogues to such laws should not prove unconstitutionality. Rather, these gaps highlight the flaws in narrowly requiring sufficiently similar firearm laws and justifications from history. Not only were earlier legislatures unconcerned about the gun violence we face today, but they certainly were not focused on passing legislation to protect and promote the welfare and wellbeing of racial and ethnic minorities and women. We know that the early legislatures, made up entirely of property-owning white men, were not devised to represent all people, which makes it even more difficult to suggest the government today should only choose laws to combat gun violence from those enacted during the 18th and 19th centuries. To have a more representative governance that is truly empowered to protect all people, the constitutional analysis for the Second Amendment cannot paralyze policy options to an era of slavery and Black Codes, and when the response to domestic violence was to "draw the curtain, shut out the public gaze, and leave the parties to forget and forgive." ¹⁰⁴

III. HISTORICAL TESTING THROUGH A PUBLIC HEALTH LENS

The analogy between the gun violence epidemic and contagious disease epidemics is not to support the historical test described in *Bruen* or to suggest a comparison of the two answers every Second Amendment question. Rather, it is meant to highlight that U.S. history has a strong foundation of limiting individual rights in the name of promoting and protecting public health and safety. Further, the comparison is meant to demonstrate why public and legislative concern would have rightly been more concerned with the threat of diseases as opposed to the relatively minimal historical threat of gun violence. This provides context for the absence of firearm restrictions and undermines the proposition that a historical vacuum of firearm

^{101.} See supra notes 66-75 and accompanying text.

^{102.} See Martin et al., supra note 45, at 206.

^{103.} See United States v. Perez-Gallan, 640 F. Supp. 3d 697, 702-07 (W.D. Tex. 2022).

^{104.} Id. at 704-05.

regulations offers much insight into the perceived scope of the Second Amendment. As a result, historical analysis should include other rights restrictions that were more prevalent around the Founding and Reconstruction to provide a better understanding of how and why rights—even fundamental rights—could sometimes be infringed to address risks to the public. A detailed analysis of the current and potential variety of Second Amendment challenges and potential non-firearm historical analogues is beyond the scope of this Essay, but a few brief examples help illuminate a more holistic path for a *Bruen*-based historical exploration.

A. Limiting Risks Through Civil Proceedings

Quarantine, described above, is useful for a number of current Second Amendment questions. This includes challenges to firearm restrictions for people deemed a risk of harm to themselves or others — such as prohibiting firearms for those under domestic violence restraining orders, those convicted of felonies, or those with certain mental health issues. Much of the current analysis centers on examining historical gun limitations for people based on their threat of harm to the public to fit under Bruen. 106 But limiting modern firearm restrictions to determining the true meaning of surety laws of the eighteenth century, let alone the Statute of Northampton from 1328, ¹⁰⁷ is exceedingly narrow. Considering the limited threat that gun violence posed historically, individual rights were much more likely to be limited because of other types of threats posed to the public. 108 Quarantine would have been one of those more commonly used public health measures. And, importantly, the basis for quarantine was to limit the rights of dangerous people to minimize their risk to spread disease, which is similar to modern efforts to limit access to firearms for people considered dangerous. In fact, there is a strong argument to be made that involuntarily holding someone is a much greater infringement on fundamental rights than removing their firearms, and quarantine can occur before a hearing and without definitive evidence of infection or causing another to be infected. 109

^{105.} See Parmet, supra note 13, at 315 ("In a time of frequent epidemics, the preservation of self and property almost inevitably would have been seen as requiring public efforts to prevent the spread of disease."); cf. New York State Rifle & Pistol Ass'n, Inc. v. Bruen, 142 S.Ct. 2111, 2131 (2022) (suggesting that the absence of similar gun regulations is evidence that the challenged law is inconsistent with the Second Amendment).

^{106.} See, e.g., United States v. Rahimi, 61 F.4th 443, 456–61 (5th Cir. 2023), cert. granted, 143 S. Ct. 2688 (2023).

^{107.} See Bruen, 142 S.Ct. at 2139-43.

^{108.} See Parmet, supra note 13, at 285-302.

^{109.} See Michael R. Ulrich & Wendy K. Mariner, Quarantine and the Federal Role in Epidemics, 71 SMU L. Rev. 391, 408 (2018).

Some of the arguments against restrictions on individuals under a domestic violence restraining order help illustrate this point. In *United States v. Rahimi*, the Fifth Circuit placed emphasis on the rights restriction "even when the individual has not been criminally convicted or accused of any offense and when the underlying proceeding is merely civil in nature." When comparing the domestic violence restraining order to historic gun laws, the court identified four key features: the forfeiture of the right; after a civil proceeding; where the court enters a protective order based on a finding of a credible threat; in order to protect a person from domestic gun abuse. Yet quarantine, a measure that has existed and been upheld as constitutional for the entirety of the United States' existence, fits within these parameters for domestic violence restraining orders.

The most significant distinction between the two are that the former is in response to disease threats and the latter is responding to threats "from domestic gun abuse." This is certainly a difference, but contextualizing the era seems particularly relevant here. While gun violence was not a primary focus of 18th and 19th century legislatures, domestic violence as a government interest or justification for limiting rights would have been unfathomable. At the historical times *Bruen* declares relevant, women had no rights and were considered marital property, such that marital rape did not become a crime throughout the United States until the exemption from criminal law was finally extinguished in North Carolina and Oklahoma in 1993. 112

If courts are to look back to old laws for both how and why the government limited rights, laws related to diseases are more relevant because of the great threat diseases posed at the founding of this country. Returning to *Rahimi*, the Fifth Circuit dimissed ancient laws raised by the government in large part because those laws were more limited in their restrictions and to whom they applied. The relatively minimal threat of gun violence helps make sense of these differences while also underscoring why laws pertaining to disease control were more severe. To suggest that fundamental rights have not been and cannot be limited through civil trial is simply ahistorical. Moreover, it seems bizarre to indicate that constitutional rights are somehow more protected by simply charging suspected domestic violence abusers

^{110.} Rahimi, 61 F.4th at 455.

^{111.} See id

^{112.} See Bruen, 142 S.Ct. at 2119; Morgan Lee Woolley, Marital Rape: A Unique Blend of Domestic Violence and Non-Marital Rape Issues, 18 HASTINGS WOMEN'S L.J. 269, 276, 282 (2007).

^{113.} See Rahimi, 61 F.4th at 456-60.

criminally and then detaining and disarming them before trial, as Judge Ho stated in his *Rahimi* concurrence. 114

More proof can be found beyond quarantine. Involuntary civil commitment orders for mental illness also provide historical support, 115 including confining an individual against their will to protect them against self-harm. 116 This provides strong grounding for extreme risk protection orders, which allow the removal of firearms from people adjudicated to be a danger to themselves or others. 117 We are unlikely to find a so-called "historical twin" for this type of legislative effort — enacted to address the modern problems of mass shootings and firearm suicide — in the original colonies, but a historical search of greater, though still relevant, generality provides more support to laws limiting rights to limit dangers one poses to themselves or others.

B. Updated Understandings of Cooperation and Science

Historical non-firearm analogies do not have to be limited to only justifying restrictions on Second Amendment rights. Analogizing to contagious diseases also highlights the importance and relevance of cooperation. Part of evaluating the threat a person might pose is their willingness to take steps to limit exposure and risk to others. An infected individual who is willing to voluntarily treat their illness while remaining home until they are no longer a risk to spread a disease is not a threat to the public and therefore provides less justification for the government to limit their rights. For firearms, individuals who demonstrate they are willing to put their firearms in safe storage or give them to another person while suffering suicidal ideation may limit the government's authority to infringe on their Second Amendment rights involuntarily. 120

^{114.} See id. at 464 (Ho, J., concurring).

^{115.} See Paul S. Appelbaum, A History of Civil Commitment and Relevant Reforms in the United States: Lessons for Today, 25 Dev. Mental Health L. 13, 13 (2006).

^{116.} See Foucha v. Louisiana, 504 U.S. 71, 75-76 (1992).

^{117.} See Evan Vitiello, Kelly Roskam & Jeffrey Swanson, Balancing the Roles of Clinicians and Police in Separating Firearms from People in a Dangerous Mental Health Crisis: Legal Rules, Policy Tools, and Ethical Considerations, 51 J. L. MED. & ETHICS 93, 94 (2023).

^{118.} See Ulrich & Mariner, supra note 109, at 408.

^{119.} See Ulrich & Mariner, supra note 109, at 408; see also O'Connor v. Donaldson, 422 U.S. 563, 573–75 (1975) ("[T]here is still no constitutional basis for confining such persons involuntarily if they are dangerous to no one and can live safely in freedom.").

^{120.} See generally Leslie M. Barnard et al., Leveraging Community Context, Data, and Resources to Inform Suicide Prevention Strategies, 51 J. L. MED. & ETHICS 83 (2023) (describing legal and community-based interventions to help reduce suicide by firearms); see also Michael D. Anestis, Allison E. Bond & Shelby L. Bandel, Understanding Risk and Implementing Data-Driven Solutions for Firearm Suicide, 704 Annals Am. Academy Pol.

Updated understandings of diseases also alter how we view historical approaches to valid contagious disease countermeasures. A cure for a contagious disease can limit the authority to hold someone involuntarily, but only if the individual is willing to take the medication properly. For example, in *City of Newark v. J.S.*, the New Jersey Superior Court held that involuntary commitment of an individual with tuberculosis was justifiable to ensure public safety, despite the existence of a cure, because the patient refused to comply with the treatment regimen. ¹²¹ The defendant retained the right to refuse treatment but was not afforded the right to be free from isolation due to the risk he posed to others. ¹²² Similarly, an individual who has demonstrated an unwillingness to comply with voluntary gun safety measures to reduce the risk of harm could be subject to historically justified long-term limitations on their Second Amendment rights.

Just as analyses of government interventions to combat disease epidemics have evolved over time with medical and scientific advances, so too should measures to address gun violence. This helps to ensure that historical laws unrelated to firearms are relevant to a *Bruen*-based constitutional inquiry not only in support of restrictive measures. For example, even for mental illness-based restrictions on Second Amendment rights that have historical analogues and are labeled presumptively lawful in *Heller*, ¹²³ modern medicine and evolving understandings of mental health may undercut justifications for such lifetime prohibitions, especially with voluntary treatment compliance from individuals. ¹²⁴ There is no evidence that people with mental health issues are more likely to commit violence than the average person. ¹²⁵ Rather, evidence that they are more likely to be a victim of violence would seemingly increase their need for self-defense. ¹²⁶

Ultimately, if history is to continue as the sole factor in Second Amendment firearm analyses, freezing understandings of government interests and government options in the time of muskets places the Second Amendment as a constitutional outlier.¹²⁷ To construe the scope of Second

[&]amp; Soc. Sci. 204, 211 (2022); Frederick P. Rivara, Frederick E. Vars & Ali Rowhani-Rahbar, Three Interventions to Address the Other Pandemic—Firearm Injury and Death, 325 JAMA 343, 343 (2021); Michael C. Monuteaux, Deborah Azrael & Matthew Miller, Association of Increased Safe Household Firearm Storage with Firearm Suicide and Unintentional Death Among US Youths, 173 JAMA PEDIATRIC 657, 660 (2019).

^{121.} See 652 A.2d 265, 274 (N.J. Super. 1993).

^{122.} See id. at 278-79.

^{123.} See District of Columbia v. Heller, 554 U.S. 570, 626 (2008).

^{124.} See Jonathan M. Metzl & Kenneth T. MacLeish, Mental Illness, Mass Shootings, and the Politics of American Firearms, 105 Am. J. Pub. Health 240, 241–42 (2015).

^{125.} See id. at 241-42.

^{126.} See id. at 242.

^{127.} See New York State Rifle & Pistol Ass'n, Inc. v. Bruen, 142 S.Ct. 2111, 2132 (2022).

Amendment rights as an impenetrable barrier determined only by what laws legislatures prioritized centuries prior places Second Amendment rights on a pedestal above every other right. Such an approach is all the more confounding if Second Amendment protections are updated over time to include modern weaponry, as Justice Thomas indicated they should be in *Bruen*. A historical test that properly contextualizes the era — in terms of the threats present, the actions undertaken, and the people whose rights and safety were considered worthy of protection — is more in accordance with other constitutional rights and analyses. To ignore this would make the Second Amendment the only constitutional provision in which the public's wellbeing is completely and utterly subservient to the past.

CONCLUSION

As gun violence remains a serious public health problem, it is necessary to understand the government's authority to respond to this crisis. Despite the decision laid out in Bruen requiring regulations limiting the Second Amendment to point to historical analogues, the government still has a duty to respond to this growing epidemic. Historical gun regulations that could be analogized to take into account modern technology and current inequities in gun violence exposure and victimization are clearly difficult to pinpoint. There is, however, a long history of the U.S. government intervening to protect against emerging public health threats. Parallels between gun violence and infectious disease can help illustrate this duty to protect the public, even if that means limiting the Second Amendment rights of individuals. Amidst forthcoming challenges regarding a range of firearm regulations, it is important that policymakers are able to adequately take into account the emerging public health crisis of gun violence to ensure safety and wellbeing for all, and not simply the limited populations deemed worthy by this country's exclusionary founding generations.

128. See id.