

What Are We Talking About? Definitional Confusion Within Active and Mass Shooting Research

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<https://doi.org/10.53076/JMVR47829> | Article History: Received May 18, 2022; Accepted July 15, 2022

Volume: 1, Issue: 2, September 2022: Pages 4-16

ABSTRACT

Mass shootings and active shooter events have become a more prominent focus for practitioners, researchers, and the mass media. Unfortunately, there tends to be confusion regarding distinguishing characteristics of these events. This manuscript seeks to provide definitions and examples of cases to better formalize the understanding of such events. The terms selected for discussion are, at times, used inarguably when in fact they are markedly different. After discussing these various definitions, examples of existing datasets are provided along with their inclusion criteria. This transparency helps highlight confusion about these definitions as well as provide readers access to currently available data.

KEYWORDS

active shooter, mass shooting, mass murder/killing, active attack, terminology, definitions

Mass shootings, mass murder/killing, active shooter events, and active attacks are terms that are commonly – and incorrectly – used interchangeably. Each of these defines a very unique type of attack that cannot, and should not, be discussed as the same thing. Recent years have seen an increase in discussions, both socially and academically, surrounding attacks resulting in multiple victims. There is an increasing effort to establish the number of attacks that occur every year. This has proven to be a difficult task with a great deal of conflicting information published regularly. A majority of this conflict comes from the use of differing terms with differing definitions that tend to be used interchangeably. These terms generate various estimates depending on the precise definition for inclusion. This paper seeks to differentiate these definitions in order to move towards a better understanding of such events. Doing so will also provide a more accurate estimate for how many events take place every year.

This article will primarily focus on defining and differentiating mass shootings and killings from active shooter and active attack events. Other terms that will be discussed include serial killing, family annihilations, gang violence, terrorist attacks, and bombings. Such events are the mostly commonly associated with mass shootings and killings and/or have definitions with similar elements causing them to be easily mistaken. It should be noted that many of these definitions are not mutually exclusive, making it even more important to understand the different definitions to prevent over/under counting. Finally, it should be said that many variations of definitions exist for several of these terms. This discussion will focus on federally held definitions when possible and use the most widely held definitions when federal standards do not exist.

Differences in Mass Murder/Shooting and Active Shooter/Attacks

Mass Killing/Murder

For the purposes of this paper, mass murder and mass killing will be discussed interchangeably. An argument can be made to split the definitions to be more inclusive of events where a mass killing might not be considered murder under the guise of war. However, in the field of criminology and criminal justice for which this paper is written, these events are discussed in terms of a crime. There are several definitions regarding mass murder, which has increased the confusion surrounding such events (Holmes & Holmes, 2001). Prior to 2013 the mostly widely held definition of mass murder was an incident in which four or more people were killed in a single event (Krouse & Richardson, 2015; Levin & Fox, 1985, 2017). In addition to initiating a federal level investigation into mass murder and other similar events, the 2012 Investigative Assistance of Violent Crimes Act (IAVCA) established a new federal definition of mass murder. IAVCA states that “the term ‘mass killings’ means 3 or more killings in a single incident” (Investigative Assistance for Violent Crimes Act of 2012, 2013, para. 6). Researchers have agreed that this should be the new standard definition for academics as well (Levin & Fox, 2017). It should also be noted that a mass murder does not necessarily involve the use of a firearm. The most important thing to note is that for an event to qualify as a mass killing, both under the old and new definitions, there must be a minimum number of people killed. This is the primary difference between an active shooter event and a mass murder. Not a single person needs to be killed, or even injured, to qualify as an active shooter while a minimum of three people need to actually die for it to be a mass murder.

Many mass murders in the U.S. draw a lot of public attention; however, this is not always the case (Schildkraut et al., 2018). With the minimum victim count set by the IACVA, all cases where three or more people are killed qualify as mass murder. An example of a mass murder would be a shooting that took place in Pontiac, Michigan. A suspect who had a several-year-long dispute with his neighbors shot four of them one day while sitting on his front porch (Dickson, 2020). Three of the victims died, and one survived the shooting. This case meets the minimum criteria set forth by the federal standard of three people killed. This case would also necessarily qualify as a mass shooting, which will be discussed next.

Mass Shootings

Mass shootings garner a lot of media attention and focus but are statistically rare events (Schildkraut & Carr, 2020; Schildkraut et al., 2018). Mass shootings have not yet been federally defined; however, it is a logical step to use the federal definition for mass murder as a starting point. The IAVCA discusses mass shootings along with mass murder but never actually defines the shootings as a separate event. The term mass shooting should, however, be separately considered as the word *shooting* implies different context than the words *murder* or *killing*. This would mean that the definition for a mass shooting would be three or more people shot in a single event. Furthermore, the term “shooting” implies the use of a firearm in the event. A mass shooting would encompass everyone shot, meaning both injured individuals and those who were killed. There will, of course, be cases where someone might use the old definition of four or more people killed in a single event to inform their definition of a mass shooting, making it four or more people shot in a single event. Once again, unlike an active shooter event, this term specifies that a certain number of individuals be shot in order to qualify as a mass shooting. This is another reason confusion exist surrounding the idea of a multiple victim attack.

An example of a mass shooting would include a drive by shooting that occurred in San Antonio, Texas. In this case, four teenagers were shot when another vehicle pulled up beside them on the road and fired 20 rounds into the car (Croix, 2020). Two of the teenagers were killed and two injured. This illustrates a mass shooting, three or more shot, but does not qualify as a mass murder. As this attack was considered to be targeted (Croix, 2020) and there was no danger to the general public, it would not qualify as an active shooter event, which will be discussed in the next section.

Active Shooter Events

Active shooter events are a relatively recent topic of research in academia as they have become more prevalent in the last 20 years. The incident known for beginning the modern age of active shooter events

6 SANDEL & MARTAINDALE | DEFINITIONAL CONFUSION WITHIN ACTIVE AND MASS SHOOTING RESEARCH

occurred at Columbine High School located in Littleton, CO, USA in 1999. This shooting was the catalyst that changed law enforcement response to such events (Martaindale & Blair, 2019). Prior to, and including, this event, many departments were trained to have responding officers establish a perimeter and wait for the Special Weapons and Tactics (SWAT) team to arrive (Martaindale & Blair, 2019). Such a tactic can potentially lead to an increased number of civilians shot or killed because the attacker(s) is actively attempting to shoot people. This was unfortunately true for the Columbine High School attack where 13 people were killed and 21 injured by gunfire (Columbine Review Commission, 2001). The SWAT team was established and authorized to make entry 33 minutes after the first 911 call and actually made entry 14 minutes after that, totaling 47 minutes after the initial call (Jefferson County Sheriff's Office, 2000).

Working with the Advanced Law Enforcement Rapid Repose Training (ALERT) Center, the Federal Bureau of Investigation (FBI) released a report on active shooter events, hereafter referred to as the report, in 2014 that provided data and background on such events. Additionally, this report gave the first federally recognized and standardized definition of an active shooter event. It states that an active shooter event is defined as “an individual actively engaged in killing or attempting to kill people in a confined and populated area” (Blair & Schweit, 2014, p. 5). Directly following this definition, the report states that “[i]mplicit in this definition is that the subject’s criminal actions involve the use of firearms” (Blair & Schweit, 2014, p. 5). It is worth noting that this definition was agreed upon by the White House, U.S. Department of Justice/FBI, U.S. Department of Education, and U.S. Department of Homeland Security/Federal Emergency Management Agency (Blair & Schweit, 2014).

There are several important aspects of this definition and statement that need to be highlighted. The first of which is that the definition explicitly states that an individual is *actively* engaged in killing. This means that for events to qualify under this definition, they need to have an active component. An active component means that the attacker is not merely shooting a couple times and leaving, or that he/she is not attacking multiple locations with large amounts of time between attacks. The report specifically mentions the importance of this being a shooting that is in progress because officers and victims can affect the outcome of the event (Blair & Schweit, 2014). It is crucial for officers to know whether an incident is ongoing when they arrive to the scene. Remember, an active shooter event in-and-of-itself is not a defined crime, it is merely the title of a type of incident. This active component of the event demonstrated the need for a standardized definition of active shooter events for training and response purposes.

The second salient part of the active shooter definition is that the attacker is killing or *attempting* to kill people. This means that an attacker does not have to be successful in killing a single person for an event to qualify as an active shooter. Furthermore, an attack does not require a single person to even be shot if it can be shown that the attacker was actively attempting to commit murder. This fact is proven by the inclusion of the Memorial Middle School shooting, among others, which occurred in Joplin, Missouri in 2006. In this case, a student came to school with two guns but was only able to fire a single shot, hitting no one, before his gun jammed and he was stopped. This case demonstrates the fact that not a single person needs to be shot to qualify as an active shooter event. This is a defining characteristic of active shooter events that differentiates them from other types of attacks, which will be discussed in more detail later.

The third and final aspect of this definition worth noting is that the attack occurs in a *populated area*. The report mentions that the term *confined* is loosely used and events were included that occurred both indoors and out (Blair & Schweit, 2014). An event would not be considered an active shooter case if a person was randomly shooting in an unpopulated area where the general public was not at risk. An example of a case excluded from the FBI’s active shooter dataset based on this populated area was the Nacogdoches, TX shooting in 2019 where a man shot at, and hit, a few men working on a house down a private road where no other people were located (Sedovic, 2019). The general public was not potentially at harm because there was no general public in the area.

Moving beyond the definition, the follow-up statement provides more clarification, though this may seem obvious. For such attacks to be included in the dataset, the attacker needed to use a firearm. Once again, this may seem obvious being that the type of event is called an active shooter. This is, however, important when discussing the idea of active attacks rather than active shooter. The term and definitional requirement of the inclusion of a firearm can better help officers know the situation to which they are responding.

These pieces of the active shooter definition will be important in differentiating it from other definitions discussed later in this paper. Another way to think about the active shooter definition would be someone actively attempting to commit mass murder in a public space with a gun (Blair et al., 2021; Martaindale et al., 2017). Note that this reshaping of the idea of an active shooter definition does not say that mass murder has to be committed, but instead that it is someone actively attempting it. This will be an important distinction later.

Active Attack Events

The idea of an active attack event rather than an active shooter event is even more recent and has less research and attention. The ALERRT Center moved beyond the more confining definition of an active shooter to the more inclusive definition of an active attack to better capture cases that would require a similar response. The ALERRT Center, who is the national standard for active shooter training and response (FBI, 2020), states that “[a]n active attack occurs when an individual or individuals is actively killing or attempting to kill multiple unrelated people in a public space” (ALERRT, 2020, para. 2). This definition and title do not require a specific weapon type to be used. The ALERRT Center states that such events “include vehicle attacks, knife attacks, and any other type of event where the primary concern is an attempt at mass murder” (ALERRT, 2020, para. 1). Once again, the concept of an event being active is stressed by the ALERRT Center for the purposes of the police response. If an attack is not active or ongoing, then police officers do not have the chance to intervene (ALERRT, 2020). This definition is very similar to that of the active shooter definition with the exception of two phrases: multiple unrelated people and public space.

By including these two phrases, this definition is more inclusive while also being more specific. The concept of multiple unrelated people further differentiates the idea of an active attack from something like family annihilation. Recall that family annihilation cases are not included under the active shooter definition, mostly through the use of the phrase *populated area*. The active attack definition specifically addresses this exclusion by including the word *unrelated*. Additionally, it is stated a family annihilation case is typically confined to the home meaning that officers are mostly unaware of the attack until after it is complete (ALERRT, 2020).

The use of the phrase public space also improves on the definition of active shooter events by making the idea of potential harm to the general public more explicit. As previously stated, the active shooter definition mentions *populated areas* and, based on the discussion of the definition in the report, uses confined very loosely. This is the part of the active shooter definition that is used to exclude events such as the shooting in Nacogdoches, TX mentioned earlier. The definition for active attack rephrased this as a public space, which focuses the events to those where the public is potentially at harm while also further excluding family annihilation events.

Active attacks can be summarized at events where someone is actively attempting to commit mass murder in a public space with any weapon. Note that once again, there is no requirement that anyone being attacked is even injured, not to mention killed. This concept of an active attack expands on the definition of an active shooter by excluding the weapon type requirement and increases specificity by changing the two major phrases discussed above. An example of an active attack would be the incident in New York on October 31st, 2017. In this case, an individual drove a truck into people on a walking/biking path. This attack resulted in the death of eight individuals and 11 others being injured (Mueller et al., 2017).

Incident Overlap

8 SANDEL & MARTAINDALE | DEFINITIONAL CONFUSION WITHIN ACTIVE AND MASS SHOOTING RESEARCH

Mass murder is probably the term most commonly mistaken with, or used interchangeably with, active shooter events. Some of this confusion likely stems from the IAVCA, which began the federal level investigation into active shooter events. The IAVCA, in part, granted the authority to investigate violent acts, shootings, mass killings, and attempted mass killings (Blair & Schweit, 2014; Investigative Assistance for Violent Crimes Act of 2012, 2013). Active shooter events can be described as attempted mass murder (Blair et al., 2020; Martaindale et al., 2020). This concept, while a simplistic summation of active shooter events, is closely related to the concept of actual mass murder. Additionally, the proximity in which it is discussed with other multiple victim crimes means that it is easily confused when discussing data or statistics. This confusion is prevalent in the media's discussion of such events (Blair & Martaindale, 2015; Blair et al., 2021; Fox & Levin, 2015; Lott, 2015).

There are of course events that qualify as both a mass murder and an active shooter event. For example, the Sandy Hook Elementary shooting where 26 students and school personnel were killed. Under the current federal definition, 135 of the 333 active shooter events from 2000 - 2019 identified by the FBI also qualify as mass murder (FBI, 2021). The overlapping cases and variations in the definition of mass murder help generate conflicting reports of active shooter numbers. This confusion increases with the addition of the term mass shootings when discussing events with multiple victims.

As with mass murder, mass shooting cases can qualify as both mass shootings and active shooter events. Using the federally informed definition of a mass shooting (three or more shot in a single event), 226 of the 305 active shooter events would qualify as mass shootings. Using the older definition of four or more shot, 175 active shooter events would qualify as mass shootings. It should be noted that a mass shooting does not require that anyone actually be killed in order to qualify as an event. This means that by definition, a mass murder involving a firearm necessarily qualifies as a mass shooting, but a mass shooting does not necessarily qualify as a mass murder as there may not be any fatalities resulting from the shooting. The FBI report explicitly states “[t]his is not a study of mass killings or mass shootings, but rather a study of a specific type of shooting situation law enforcement and the public may face” (Blair & Schweit, 2014, p. 5).

Other Single-Incident Multi-Victim Crime Definitions

There are also other terms that can have overlap or are sometimes confused with mass murder, shooting, or active shooter incidents. Many of these terms have their own specifically defined criteria that need to be met in order to qualify. Understanding these definitions helps delineate different types of events and allows for a clearer picture of the state of mass violence in the US. Different crime types require different responses by law enforcement. For example, officers investigating a bombing would use different tactics than officers investigating a gang shooting. Additionally, different crime types are associated with varying level of danger to the public. For instance, there might be a high degree of danger to the general public during a terrorist attack but not during a family annihilation event. Finally, a better understanding of such definitions allows for better research to be conducted. Several of these definitions will be discussed in this section to further illustrate both the overlap and exclusion of such incidents when examining mass and active shootings.

Spree Killing/Murder

Spree killing/murder is an example of a specifically defined series of events that can be confused with mass murder. Some definitions of spree killing are similar to mass murder in that it requires a specific number of victims. For example, the FBI states that spree killing is “two or more murders committed by an offender or offenders, without a cooling-off period” (FBI, 2005, p. 9). Other documents define it as “the killing of three or more people usually within a 30-day period and typically during the course of another felony (such as a robbery)” (Holmes & Holmes, 2001, para. 1). The FBI active shooter report explicitly states that events do not qualify as active shooter events if they are “[c]rossfire as a byproduct of another ongoing criminal act” (Blair & Schweit, 2014, p. 44). Spree killing also does not necessarily qualify as mass murder because only two or

more murders need to be committed according to the FBI's definition. While these distinctions are important, it should be noted that the FBI has rejected the idea of spree killing as a salient term for law enforcement. The FBI (2005) stated that the idea of a cooling-off period was too subjective and that "[t]he designation [of spree killing as a separate crime] does not provide any real benefit for use by law enforcement" making it irrelevant for this discussion (p. 9). While this excludes it from common use at the federal level, the term may still be heard in media coverage.

Serial Killing/Murder

Serial killing, like mass murder, has seen a variety of federal definitions over the years. The most widely held definition prior to the new standard came from the Protection of Children from Sexual Predator Act of 1998, which stated "[t]he term 'serial killings' means a series of three or more killings, not less than one of which was committed within the United States, having common characteristics such as to suggest the reasonable possibility that the crimes were committed by the same actor or actors" (FBI, 2005, p. 8). This definition was created to allow the FBI to assist with investigations of serial murder and was not intended to be a generic definition of serial killing (FBI, 2005). A symposium was held to set forth a federally standardized definition of serial murder. The final definition stated that serial murder was "[t]he unlawful killing of two or more victims by the same offender(s), in separate events" (FBI, 2005, p. 9). Additionally, note that there is no use of the terms shooting or firearm to define this type of event.

Though rarely discussed with active shooter events, serial murder is important to discuss because of the similarity and proximity to mass murder, which is frequently confused with active shooter events. The distinguishing characteristic of serial murder being the phrase in separate events. Recall that mass murder occurs in a single incident, and active shooter events rely heavily on the term actively. Therefore, by definition, serial killing can never be an active shooter event because it lacks a continually active component. Additionally, a single event of a serial killing could qualify as a mass murder if three or more people were killed, but the series of killings as a whole, regardless of the number of victims, would not qualify as mass murder. The FBI (2005) stated that "incidents should be occurring in separate events, at different times" and that "the time period between murders separates serial murder from mass murder" (p. 9). These distinctions further separate serial murder from both mass murder and active shooter events.

Family Annihilation

Family annihilation is another term that has no federally standardized definition. The term was first introduced in the medical field by Dr. Park Dietz in the Bulletin of the New York Academy of Medicine. Dietz (1986) stated that the family annihilator "kills each member of the family who is present, sometimes including pets" (p. 482). Reinforcing this definition, experts in the FBI have stated "there's a term for people who kill their entire family -- they're called family annihilators" (as cited in Shapiro, 2019, para. 1). Such an event could easily qualify as mass murder if the number of family killed is three or more, however, this type of incident does not qualify as an active shooter event because it lacks some necessary elements.

One major element lacking in many family annihilations is potential harm to the general public. The active shooter report states "an event was excluded if research established it involved primarily [...] residential or domestic disputes" (Blair & Schweit, 2014, p. 44). For family attacks to be included, there had to be an aspect of danger to the public. The report explicitly states that events were considered for inclusion where the shooting occurred "in public places" (Blair & Schweit, 2014, p. 44). Furthermore, family annihilations do not require the use of a firearm to qualify. There are, however, incidents of family annihilation that then turned into active shooter events. One family attack that occurred at a residence that was determined to be an active shooter event involved a man shooting his family members at their home-run business and then moving to a different location to continue the attack (Blair & Schweit, 2014). This is an example of spillover that will be further discussed in the section on gang violence.

Gang Violence

Gang-related violence, or more specifically gang shootings, are another multi-victim crime that is frequently included in discussions of active shooter events. As part of the federal definition related to gang violence it is said that criminal offenses include “a [f]ederal felony crime of violence that has as an element the use or attempted use of physical force against the person of another” (as cited in National Gang Center, 2016, para. 7). It has been suggested that much gang violence is targeted towards other gang members and not the general public (Vaughan & Feere, 2008). This sentiment was also found in a study conducted by the Centers for Disease Control and Prevention (CDC) which found “gang homicides were more likely to occur with firearms and in public places, which suggests that gang homicides are quick, retaliatory reactions to ongoing gang-related conflict” (CDC, 2012, para. 1). This, like family annihilation, means most incidents of gang violence lack the necessary elements to be considered an active shooter event. While such shootings may occur in public places, the targets of the violence are generally not the public. Beyond the fact that most gang violence is targeted at other gang members and not the general public, the FBI’s active shooter report states “[s]pecifically, shootings that resulted from gang or drug violence—pervasive, long-tracked, criminal acts that could also affect the public—were not included” (Blair & Schweit, 2014, p. 5). Additionally, it states that “an event was excluded if research established it involved primarily [...] gang violence” (Blair & Schweit, 2014, p. 44). There are cases where gang violence can be considered an active shooter event and/or mass murder if the incident involves individuals not associated with gangs or has spillover.

In more recent research, gang violence has been found to spread into the community and involves victims not associated with gangs (Bichler et al., 2020). An incident might qualify as an active shooter event in a case where community members are randomly targeted rather than rival gang members. And such an event would qualify as mass murder if three or more people were killed. Furthermore, an incident involving spillover might also qualify. Spillover is where an event starts as targeted violence and then moves to an attack against the general public. For instance, spillover would occur if a gang member began shooting at a rival gang member but then began targeting members of the general public in the surrounding areas. While spillover is uncommon and has, to the knowledge of the authors, yet to occur in such a way to be include in the active shooter reports, it is possible and therefore should be mentioned. A more likely crossover with gang violence is mass shootings or murder. Gang violence can qualify as a mass shooting or murder when cases involve three or more individuals shot/killed in a single event. This contributes to the confusion surrounding gang shootings as active shooter events.

Terrorist Attacks

Terrorist attacks can result in multiple victims, though such attacks do not necessarily qualify as active attacks or active shooter events. Terrorism is federally defined as “the unlawful use of force and violence against persons or property to intimidate or coerce a government, the civilian population, or any segment thereof, in furtherance of political or social objectives” (Title 28 Judicial Administration, 2021, para. 12). There are important elements here that should be considered. The act has to be to intimidate or coerce in the furtherance of political or social objectives. This means that someone shooting/attacking the general public for the mere sake of doing so would not qualify as a terrorist attack. On the other hand, there are events that are deemed as terrorist attacks that do not qualify as active shooter/attack events because they lack some of the necessary elements such as an active component. An example of this would be the attack on the World Trade Centers in 2001. While there were multiple strikes, there was no real active component to the 9/11 attack. This attack would, however, qualify as a mass murder and a terrorist attack.

While terrorist attacks are not always active attacks/shootings, there are events where a terrorist attack would qualify if the attacker(s) committing an active attack/shooting to further a political or social objective. An example of this would be the 2015 shooting at the Inland Regional Center in San Bernadino, California that

was found to qualify as an act of terrorism under federal guidelines (Braziel et al., 2016; Lee et al., 2016). This event also qualified as a mass shooting and mass murder as 14 people were killed and 22 injured. Another example of such a crossover event would be the 2020 shooting at the Naval Air Station in Corpus Christi, Texas. This case, however, does not qualify as a mass shooting or a mass murder as only one person was injured.

Bombings

Bombings have no standardized federal definition though logically it would be defined as an attack using an explosive or incendiary device as the primary weapon. Explosives are federally defined by Title 18 Crimes and Criminal Procedures (2009) as

any chemical compound mixture, or device, the primary or common purpose of which is to function by explosion; the term includes, but is not limited to, dynamite and other high explosives, black powder, pellet powder, initiating explosives, detonators, safety fuses, squibs, detonating cord, igniter cord, and igniters. (para. 4)

Explosives are regulated and overseen by the Bureau of Alcohol, Tobacco, and Firearms. Bombings are typically discussed in regard to acts of foreign or domestic terror attacks nowadays. Such attacks can qualify under several other definitions discussed here including terrorist attacks, mass murder, serial killing, and even active attacks. An example of an active attack using primarily explosives would be one where an attacker was throwing Molotov cocktails or grenades around a building. This would mean the principle weapon used was an explosive, and there was an active component to the attack. That being said, no active attack shown in the data since 2000 has been counted as a bombing.

Most examples of bombings involve no active component, which excludes them from being considered active attacks. For example, the Boston Marathon bombing on April 15th, 2013, involved the use of two explosive devices resulting in the death of three individuals and resulting in hundreds of injuries (Sutton et al., 2015). While two explosive devices were used, the bombings were all part of one attack. This event qualifies as a terrorist attack, due to the motive of the attackers, and a mass murder, but does not qualify as an active attack. Another example includes the Austin, Texas bombings that occurred between March 2nd and March 22nd, 2018. This incident involved an individual planting five explosive devices around the Austin area resulting in the death of two individuals and injuring four others (Gaynor, 2020). This attack involved multiple explosive devices sent out over 20 days making it a serial bombing. The event would not qualify as mass murder or an active attack because the timing between attacks was too great.

Examples of Existing Data Sites

As we've pointed out, there are many different definitions used to describe what ultimately are meant to be mass shootings or murder and active shooter events. As such, it should come as no surprise that there are also several different data sites that collect and disseminate mass violence related data and resources. This section will attempt to identify different sources of data for the various mass violence related terms (i.e., active shooter, active attack, mass killing, and mass shooting) and not data sources for similar, but different, terms (e.g., family annihilation, gang violence, terrorist attack). We attempt to include all the data sources that are unique and do not simply reference another data source. It is important to understand what data sources are readily available and how they define their terms (as well as what data are actually included). Many of these sources are used by researchers, in the media, and by law enforcement to discuss the topic of mass violence. Using the information presented above as a foundation will allow for a better understanding what data are presented and if incorrect definitions are being applied. See Table 1 for links to the various data sources. The code referencing each data source will be linked in text (e.g., MK.1 refers to the first Mass Killing dataset discussed below). It is worth noting that data sources may operationalize constructs in different manners. For

12 SANDEL & MARTAINDALE | DEFINITIONAL CONFUSION WITHIN ACTIVE AND MASS SHOOTING RESEARCH

this reason, it is important for users to assess data sources to ensure the data are capable of answering specific research / policy questions. This article moves towards standardizing definitions and presents datasets for individuals to both better understand how to interpret the data and to make assessments regarding the usefulness of each dataset for their particular needs.

Mass Killing

The Violence Project (MK.1) maintains data from 1966 through 2020 where there are a minimum of four victims killed. Interestingly, the Violence Project refers to itself as a mass shooting database and not a mass killing or mass murder database. Visitors can request access to the full database of over 150 variables. Everytown for Gun Safety (MK.2) provides data from 2009 through 2021 for download. The data include events where at least four victims were killed in the attack. The Everytown for Gun Safety dataset also refers to the data as mass shooting even though the definition requires four victims to be killed. The dataset only includes 13 variables (including geospatial data).

The Washington Post (MK.3) also includes mass killing data from 1966 until May 2021. However, the website notes that the project is no longer being updated. The Washington Post also incorrectly refers to their data as mass shooting data. Furthermore, the raw data cannot be downloaded, but visitors can scroll through and manipulate several data visualization tools. Mother Jones (MK.4) maintains mass killing data from 1982 through November 2021. They too mislabel their data as mass shooting. Interestingly, their definition changes over time. From 1982 until 2012 the data required at least four fatalities to be included. However, beginning in 2013 the data only required three fatalities for inclusion to be consistent with changes to the federal mass murder definition. The Mother Jones data can be downloaded in raw form, and several data visualization tools are present on their website.

Lastly, USA Today (MK.5) provides visitors with mass killing data from 2006 until 2017. The USA Today data only include events where four people were killed and does not incorrectly refer to itself as mass shooting. These data are not downloadable; however, visitors do get to explore the dataset at the bottom of the website. The website does include several graphics for users to understand patterns in the data.

Mass Shooting

There are several sources for mass shooting data. The Gun Violence Archive (MS.1) curates news sources for any shooting where at least four people are injured by gunfire. The GVA list is updated daily, and users can download the raw data/source information. The GVA list does not exclude shootings unless they have less than four victims.

Stanford University's Mass Shootings in America (MS.2) contains data on mass shootings where at least three victims were struck by gunfire. The data include events from August 1966 until June 2016. The data have not been maintained since June 2016. However, the database is accessible via a GitHub repository.

Active Shooter

The most widely known active shooter database is maintained by the FBI (AS.1). The FBI active shooter dataset is updated yearly to include the previous year's attacks. Data are available from 2000 until 2020 as of this publication. Data do not require a specific number of victims to be included. Resources include multiple PDF reports wherein the list of events are maintained but are not downloadable as raw data. The Center for Homeland Defense and Security (CHDS; AS.2) maintains data on all K-12 school shootings. While the dataset includes any gun related incident, within these data are classifications for active shooter events that occur on school grounds. The CHDS utilizes the same definition of an active shooter as the FBI. The CHDS maintains data from 1970 to present day. The data can be downloaded in their raw form.

Table 1
Data Sources and Definitions

Event Type	Victim Requirements	Definition
<i>Mass Shooting</i>		
MS.1: www.gunviolencearchive.org/reports/mass-shooting	4+ Shot	Four or more shot and/or killed in a single event [incident], at the same general time and location, not including the shooter.
MS.2: www.library.stanford.edu/projects/mass-shootings-america	3+ Shot	Three or more shooting victims (not necessarily fatalities), not including the shooter. The shooting must not be identifiably gang, drug, or organized crime related.
<i>Mass Killing</i>		
MK.1: www.theviolenceproject.org/mass-shooter-database/	4+ Killed	A multiple homicide incident in which 4+ victims are murdered with firearms (not including the offender(s)) within one event, and at least some of the murders occurred in a public location or locations in close geographical proximity (e.g., a workplace, school, restaurant, or other public settings), and the murders are not attributable to any other underlying criminal activity or commonplace circumstance (armed robbery, criminal competition, insurance fraud, argument, or romantic triangle).
MK.2: www.everytownresearch.org/maps/mass-shootings-in-america-2009-2019/	4+ Killed	An incident in which four or more people are killed with a firearm, excluding the perpetrator.
MK.3: www.washingtonpost.com/graphics/2018/national/mass-shootings-in-america/	4+ Killed	Shootings in which four or more people were killed, usually by a lone shooter. It does not include shootings tied to robberies that went awry, and it does not include domestic shootings that took place exclusively in private homes.
MK.4: www.motherjones.com/politics/2012/07/mass-shootings-map/	'82-'12: 4+ Killed. '13-present: 3+ killed	Criteria: The perpetrator took the lives of at least four people. The killings were carried out by a lone shooter. The shootings occurred in a public place. Perpetrators who died or were wounded during the attack are not included in the victim tallies.
MK.5: www.gannett-cdn.com/GDContent/mass-killings/index.html#title	4+ Killed	Four or more killed, not including suspects, in an event. The killing may stretch over a day or more and some distance, especially if it includes killings committed in flight or against targeted people. It does not include an extended "cooling-off period" to distinguish this kind of crime from the acts of serial killers.
<i>Active Shooter</i>		
AS.1: www.fbi.gov/about/partnerships/office-of-partner-engagement/active-shooter-resources	None	An active shooter is an individual actively engaged in killing or attempting to kill people in a populated area.
AS.2: www.chds.us/ssdb/	None	A gun is brandished, is fired, or a bullet hits school property for any reason, regardless of the number of victims (including zero), time, day of the week, or reason.
<i>Active Attack</i>		
AA.1: www.ActiveAttackData.org	None	An individual, or individuals, actively killing or attempting to kill multiple unrelated people in a public space.

Note. Data sources and their definitions for active shooter events, active attack events, mass shootings, and mass murder cases.

Active Attack

The only known source of active attack data is maintained by the ALERRT Center at Texas State University (AA.1). Data are available from 2000 through 2020. While summaries of events are present, the raw data are not downloadable from the website. However, visitors can request data directly from the ALERRT Center. Visitors can also request specific data visualizations to be created.

Conclusion

Research into active shooter events has been on the rise over the last two decades. Unfortunately, it is not uncommon for authors to confound the terms *active shooter* with *mass shooting* or *mass killing/murder*. In fact, as the previous section illustrated, it's not uncommon for the original data sources to confuse terminology. Four of the five *mass killing/murder* data sources incorrectly refer to themselves as mass shooting data sources even though they only report events with at least three or four fatalities. While on its face, different terminology may seem like a minor inconvenience, it is important to be clear what data and issues are being discussed so scholars, practitioners, and other stakeholders can accurately address research questions and policy issues. This paper attempts to add much needed clarity to the different terms and definitions used to describe events, such as an active shooter. This ensures that the correct data are sourced. Ultimately it is our position that there is not a single definition that should be used by scholars or stakeholders. Rather, research questions should be accurately presented with a specific aim and scope, and the appropriate definition and dataset should be selected to answer the questions. The true salience of this discussion is that researchers, practitioners, and the general public are aware of what federally standardized definitions (or practically standardized definitions) exist, and what that means for defining mass violence in the US.

DISCLOSURE STATEMENT

No potential conflicts of interest were reported by the authors.

REFERENCES

- ALERRT. (2020). *ALERRT active attack data*. <https://activeattackdata.org/index.html>
- Bichler, G., Norris, A., & Ibarra, C. (2020). Evolving patterns of aggression: Investigating the structure of gang violence during the era of civil gang injunctions. *Social Sciences*, 9(11), 203. <https://doi.org/10.3390/socsci9110203>
- Blair, J. P., & Martaindale, M. H. (2015). Misrepresenting the FBI active shooter report: A response to Lott. *ACJS Today*, 40(3), 32-35. <https://www.hoplophobia.info/wp-content/uploads/2015/08/ACJSTodayMay2015.pdf>
- Blair, J. P., Sandel, W. L., & Martaindale, M. H. (2021). Correlates of the number shot and number killed in active shooter events. *Homicide Studies* 25(4), 335-360. <https://doi.org/10.1177/1088767920976727>
- Blair, J. P., & Schweit, K. W. (2014). A study of active shooter incidents in the United States between 2000 and 2013. *US Department of Justice*. <https://www.fbi.gov/file-repository/active-shooter-study-2000-2013-1.pdf/view>
- Braziel, R., Straub, F., Watson, G., & Hoops, R. (2016). *Bringing calm to chaos: A critical incident review of the San Bernardino public safety response to the December 2, 2015, terrorist shooting incident at the Inland Regional Center*. United States Department of Justice, Office of Community Oriented Policing Services. <https://www.justice.gov/usao-cdca/file/891996/download>
- Center for Disease Control and Prevention. (2012). *Gang homicides – five U.S. cities, 2003-2008*. <https://www.cdc.gov/mmwr/preview/mmwrhtml/mm6103a2.htm>
- Columbine Review Commission. (2001). *The report of Governor Bill Owens' Columbine Review Commission*. Denver, CO: Author. <http://hermes.cde.state.co.us/drupal/islandora/object/co:2067/datastream/OBJ/view>
- Croix, V. (2020, August 31). *Police identify 17-year-old victim killed in drive-by shooting*. KENS5 News. <https://www.kens5.com/article/news/crime/police-identify-17-year-old-victim-killed-in-drive-by-shooting/273-41354d6f-4084-4885-a618-d9ace7c02354>
- Dietz, P. (1986). Mass, serial and sensational homicides. *Bulletin of the New York Academy of Medicine*, 62(5), 477-491. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1629267/>

- Dickson, J. D. (2020, August 28). *Pontiac man faces 10 felony charges in triple homicide*. The Detroit News. <https://www.detroitnews.com/story/news/local/oakland-county/2020/08/28/pontiac-man-faces-10-felony-charges-triple-homicide/5657120002/>
- Federal Bureau of Investigation. (2005). *Serial murder multi-disciplinary perspectives for investigators*. <https://www.fbi.gov/stats-services/publications/serial-murder>
- Federal Bureau of Investigation. (2020). *Overview of FBI roles*. <https://www.fbi.gov/about/partnerships/office-of-partner-engagement/active-shooter-resources>
- Federal Bureau of Investigation. (2021). *Active Shooter Incidents 20-Year Review 2000-2019*. U.S. Department of Justice. <https://www.fbi.gov/file-repository/active-shooter-incidents-20-year-review-2000-2019-060121.pdf/view>
- Fox, J. A., & Levin, J. (2015). Mass confusion concerning mass murder. *The Criminologist*, 40(1), 8-11.
- Gaynor, J. (2020, October 20). *Inside the FBI's race to stop Austin, Texas, bombing spree*. CBS News. <https://www.cbsnews.com/news/austin-serial-bomber-mark-conditt-fbi-declassified/>
- Holmes, R. M., & Holmes, S. T. (2001). *Mass murder in the United States*. Upper Saddle River, NJ: Prentice Hall.
- Investigative Assistance for Violent Crimes Act of 2012, Pub. L. No. 112-265, § 1, 126 Stat. 2435 (2013).
- Jefferson County Sheriff's Office. (2000, May 15). *Jefferson County Sheriff's Office final report*. Author. <https://www.jeffco.us/3832/Columbine-Records>
- Krouse, W. J., & Richardson, D. J. (2015). *Mass murder with firearms: Incidents and victims, 1999-2013*. Congressional Research Service, Library of Congress. <https://sgp.fas.org/crs/misc/R44126.pdf>
- Lee, C., Walters, E., Borger, R., Clem, K., Fenati, G., Kiemeney, M., Seng, S., Yuen, H., Neeki, M., & Smith, D. (2016). The San Bernardino, California, terror attack: Two emergency departments' response. *Western Journal of Emergency Medicine*, 17(1), 1-7. <https://doi.org/10.5811/westjem.2016.1.29720>
- Levin, J., & Fox, J. A. (1985). *Mass murder: America's growing menace*. New York: Plenum Press.
- Levin, J., & Fox, J. A. (2017). Multiple Homicide: Understanding Serial and Mass Murder. *The Handbook of Homicide*, 249-267.
- Lott, J. R. (2015). The FBI's misinterpretation of the change in mass public shooting. *ACJS Today*, 40(2), 18-29. <https://dx.doi.org/10.2139/ssrn.2524731>
- Martaindale, M. H., & Blair, J. P. (2019). The evolution of active shooter response training protocols since Columbine: Lessons from the Advanced Law Enforcement Rapid Response Training Center. *Journal of Contemporary Criminal Justice*, 35(3), 342-356. <https://doi.org/10.1177/1043986219840237>
- Martaindale, M. H., Sandel, W. L., & Blair, J. P. (2017). Active-shooter events in the workplace: Findings and policy implications. *Journal of Business Continuity & Emergency Planning*, 11(1), 6-20. <https://pubmed.ncbi.nlm.nih.gov/28903808/>
- Mueller, B., Rashbaum, W. K., & Baker, A. (2017, October 31). Terror attack kills 8 and injures 11 in Manhattan. *The New York Times*. <https://www.nytimes.com/2017/10/31/nyregion/police-shooting-lower-manhattan.html>
- National Gang Center. (2016). *Brief review of federal and state definition of the terms "gang," "gang crime" and "gang member" (as of December 2016)*. <https://www.nationalgangcenter.gov/Content/Documents/Definitions.pdf>
- Schildkraut, J., & Carr, C. M. (2020). Mass shootings, legislative responses, and public policy: An endless cycle of inaction. *Emory Law Journal*, 69(5), 1043-1076. <https://scholarlycommons.law.emory.edu/cgi/viewcontent.cgi?article=1392&context=elj>
- Schildkraut, J., Elsass, H. J., & Meredith, K. (2018). Mass shootings and the media: Why all events are not created equal. *Journal of Crime and Justice*, 41(3), 223-243. <https://doi.org/10.1080/0735648X.2017.1284689>
- Sedovic, D. (2019, November 5). *Nacogdoches county sheriff: Murder may have been case of mistaken identity*. ABC News. <https://www.ktre.com/2019/11/05/nacogdoches-county-sheriff-murder-may-have-been-case-mistaken-identity/>
- Shapiro, E. (2019, February 27). *When people kill close relatives: Explaining 'family annihilators'*. ABC News. <https://abcnews.go.com/US/people-kill-close-relatives-explaining-family-annihilators/story?id=57305463>
- Sutton, J., Gibson, C. B., Spiro, E. S., League, C., Fitzhugh, S. M., & Butts, C. T. (2015). What it takes to get passed on: Message content, style, and structure as predictors of retransmission in the Boston Marathon bombing response. *PLoS one*, 10(8), 1-20. <https://doi.org/10.1371/journal.pone.0134452>
- Title 18 Crimes and Criminal Procedures. 18 U.S. Code § 841. (2009). <https://www.govinfo.gov/content/pkg/USCODE-2009-title18/html/USCODE-2009-title18.htm>
- Title 28 Judicial Administration. 28 CFR § 0.85. (2021). <https://www.ecfr.gov/cgi-bin/text-idx?node=pt28.1.0&rgn=div5>

16 SANDEL & MARTAINDALE | DEFINITIONAL CONFUSION WITHIN ACTIVE AND MASS SHOOTING RESEARCH

Vaughan, J. M., & Feere, J. (2008, September 30). *ICE and local law enforcement target immigrant gangs: Taking back the streets*. Center for Immigration Studies. <https://cis.org/Report/ICE-and-Local-Law-Enforcement-Target-Immigrant-Gangs>

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