

Running the Numbers

*A Periodic Feature to Inform North Carolina Healthcare Professionals
about Current Topics in Health Statistics*

*From the State Center for Health Statistics, North Carolina Department of Health and Human Services
www.schs.state.nc.us/SCHS*

North Carolina Child Deaths from Violence in 2004: Data from the National Violent Death Reporting System

The National Violent Death Reporting System (NVDRS) is a congressionally mandated, state-based national repository of statistics that describe violence resulting in death. Its purpose is to quickly record and report standardized information on violent deaths, including suicides, homicides, unintentional deaths from firearms, and deaths of undetermined intent (many of which are the result of violence). Seventeen states, including North Carolina, are now funded and daily send more than 250 de-identified data items to the NVDRS. It is planned for all 50 states to eventually participate, making this a truly nationwide database.

The North Carolina Violent Death Reporting System (NC-VDRS) is operated by the North Carolina Division of Public Health, Injury and Violence Prevention Branch. Collection of data on deaths from violence to North Carolina residents began on January 1, 2004. The primary purpose of the NC-VDRS is to provide data to promote and support violence prevention strategies designed to reduce the number of people of all ages who die from assaults or self-inflicted injuries or from the accidental discharges of firearms. NC-VDRS data are obtained from public records (i.e., death certificates, medical examiner records) and nonpublic records (i.e., several different types of law enforcement reports on the victims and suspects prior to the completion of due process). The NC-VDRS has stringent privacy and confidentiality procedures to protect the nonpublic data. Collecting information from these multiple data sources allows us to describe the victims and suspects in each event and their relationship(s) and to document the methods and circumstances that led to these deaths.

Data Available from the NC-VDRS

The NC-VDRS releases provisional data on the first six months of each calendar year in a technical report every February/March of the following year. It releases an annual report for the previous calendar year in late October of the following year. The annual report for 2004 NC-VDRS data will be posted on the Injury and Violence Prevention Branch page of the NC Division of Public Health web site in late October 2005 (www.ncpublichealth.com).

NC-VDRS as Part of a North Carolina Child Maltreatment Surveillance System

The NC-VDRS is a valuable source of information to help us understand and prevent violence in children. Death is a most serious consequence of child abuse and neglect. Not every act of child maltreatment results in death, and not every child death in the NC-VDRS data base is the result of abuse or neglect. However, the availability of data from the NC-VDRS allows us to more quickly and carefully assess factors associated with deaths from violence in one of our state's most vulnerable populations, its children.

Selected Findings on Violent Deaths in Children from the NC-VDRS, 2004

In 2004, 87 North Carolina children under the age of 18 were killed from acts of violence. In contrast to the profile of violent deaths in North Carolina adults where there are almost twice as many suicides as homicides, more children died in 2004 from homicide than all other types of violence combined. Fifty-four children died from homicide in 2004 (42 boys; 12 girls). Table 1 shows the distribution of these homicide deaths by age. Half of these homicides (50%) occurred among African American children, 48% among white children, and 2% among American Indian children. Almost all of the homicides of North Carolina children occurred in the non-Latino population (96%).

Twenty-four children and teenagers died from self-inflicted injuries in 2004 (20 boys; 4 girls). Table 1 shows the distribution of these suicide deaths by age. Almost three-fourths of the suicides occurred among whites (71%, n = 17), with 29% (n = 7) among African Americans. There were no youth suicides recorded for North Carolina

continued on page 404

Table 1.
Deaths in Children age 17 and Younger: North Carolina, 2004 (Data from the NC-VDRS)

Age Group	Suicide ¹		Homicide ²		Unintentional Firearm ³		Undetermined Intent		Total
	N	%	N	%	N	%	N	%	N
<1	0	0	10	18.5	0	0	0	0	10
Ages 1-4	0	0	15	27.8	1	25.0	1	20.0	17
Ages 5-9	0	0	1	1.8	0	0	1	20.0	2
Ages 10-14	9	37.5	13	24.1	2	50.0	0	0	24
Ages 15-17	15	62.5	15	27.8	1	25.0	3	60.0	34
Total	24	100.0	54	100.0	4	100.0	5	100.0	87

1 A death resulting from the intentional use of force against oneself. This includes "Russian roulette" and assisted suicide involving only passive assistance to the decedent, such as supplying information or the means to complete the act.

2 A death resulting from the intentional use of force or power, threatened or actual, against another person, group, or community (not including acts of war). This includes "justifiable homicide."

3 A death resulting from a penetrating injury or gunshot wound from a weapon that uses a powder charge to fire a projectile when there was a preponderance of evidence that the shooting was not intentional. This includes a child less than the age of six who shoots himself or another person.

Latino residents in 2004. Four children died from the unintentional discharge of a firearm. The intent of five deaths in children under the age of 18 could not be determined by the medical examiner.

All but three of the 29 deaths from violence in children under age 10 were homicides. The exceptions were a three-year-old who died from an unintentional firearm injury, and a one-year-old and a five-year-old who died from undetermined intents.

For the 10 infants under age one who died from homicide, their deaths were the result of shaking (3); personal weapons, e.g., fists or kicking (2); intentional neglect, e.g., starving a baby (2); a blunt instrument (1); or an unknown weapon (2). According to narrative descriptions obtained from Medical Examiner data, some of the children had signs of prior abuse at the time of their deaths and most were killed by a parent or caretaker.

For the 15 children ages one to four who died from homicide, their deaths were the result of personal weapons (8), shaking (1), blunt instrument (1), drowning (2), firearm (1), or hanging/strangulation/suffocation (2).

For the two children ages five to nine who died from violence—ages when children begin to be more exposed to people outside the home—one death was a homicide and the intent of the other could not be determined by the Medical Examiner.

Among the 24 children ages 10 to 14 who died from violence, there were nine suicides, 13 homicides, and two unintentional firearm injuries. Among the 34 adolescents ages 15 to 17 who died from violence, 15 were suicides, 15 were homicides, one was from unintentional firearm discharge, and three were from deaths of undetermined intent. In this age group, firearms were responsible for 24 of the 34 deaths from violence, including 53% of the suicides and 87% of the homicides.

Conclusion

Preserving and protecting our children's health is most effective when our programs and policies are based on timely and accurate information. Because the data collected in the North Carolina Violent Death Reporting System are consistent across the multiple data sources from which they are obtained, we will be able to accurately detect changes over time. As a result, these data can be used to monitor child abuse and maltreatment over time and to formulate and evaluate programs and policies.

*Contributed by Catherine (Kay) Sanford, MSPH, Stephen W. Marshall, PhD, and Tammy Norwood, BS
North Carolina Violent Death Reporting System, North Carolina Division of Public Health*