

Brief Report: Dallas County Pedestrian Deaths among Children 0-17

This report will look at Dallas County pedestrian deaths among children 0-17 from two data sources; Dallas County Medical Examiner's Office and Dallas County Child Death Review Team.

Background

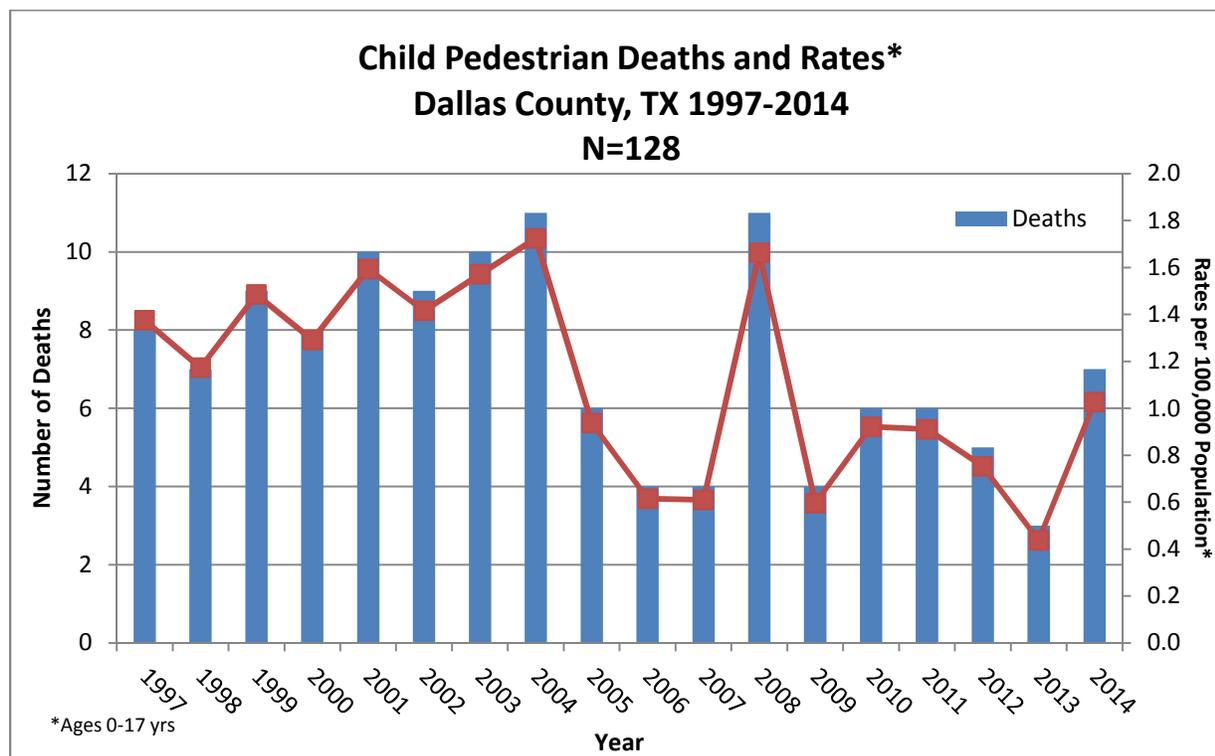
We reviewed data collected from the Dallas County Medical Examiner's Office (ME) and the Dallas County Child Death Review Team (CDRT). The Dallas County Medical Examiner investigates all intentional and unintentional injury deaths, deaths to infants, and any deaths that occurred in a hospital within 24 hours of admission. The Dallas County CDRT is a multi-agency, multidisciplinary team that reviews child and adolescent fatalities to better understand how and why children die in Dallas County. Data is collected and entered into the National Child Death Review case reporting system (CDR).

Data from Dallas County Medical Examiner's Office

The following information is ME data from 1997-2014.

From 1997-2014, there were 128 unintentional child pedestrian deaths in Dallas County (excluding trains) among children 0-17 years of age. Unintentional child pedestrian deaths made up 24% (128/528) of all motor vehicle deaths among children in Dallas County. There was an average of seven deaths per year (ranged, 3-11/yr.). The average annual death rate was 1.09 deaths per 100,000 population. The number of deaths and death rates have generally declined over time; however, there were increases in 2008 and 2014.

Pedestrian Deaths



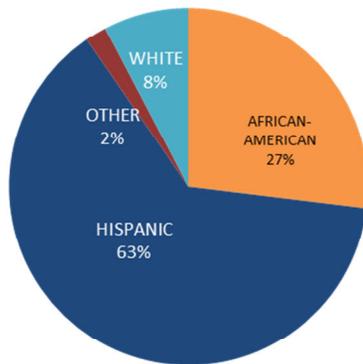
Overview

- Sixty-five percent (83/128) of the deaths occurred among males.
- Deaths were evenly distributed between Hispanic and African-Americans, followed by whites.
- African-Americans had the highest average annual rate of 1.9 deaths per 100,000 population.
- The average age of a child pedestrian fatality was 7.9 years.
- Sixty-four percent (81/126) of the fatal pedestrian deaths occurred during the day time (6 a.m. – 7:59 p.m.)

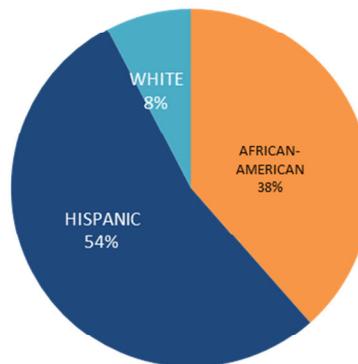
Demographics

The proportion of pedestrian deaths by race/ethnicity varied by age group. For children < 10 years old, the largest number of deaths was among Hispanics, followed by African-Americans. However, the highest pedestrian death rates were for African-Americans. For children > 9 years old, the largest number of deaths and highest rates was among African-Americans.

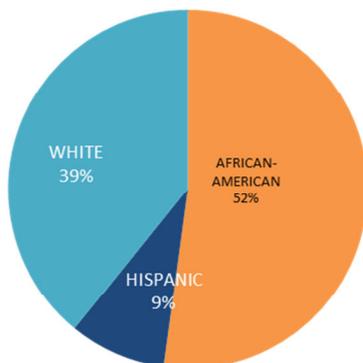
Child Pedestrian Deaths Race/Ethnicity by Age Groups Dallas County, TX 1997-2014



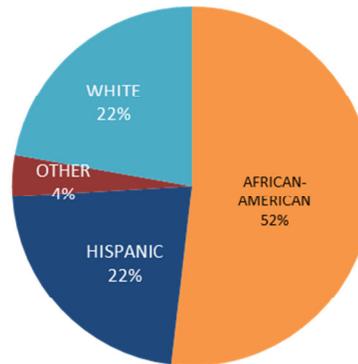
Age Group 0-4 yrs
N=52



Age Group 5-9 yrs
N=26



Age Group 10-14 yrs
N=23



Age Group 15-17 yrs
N=27

Source: Dallas County Medical Examiner Data

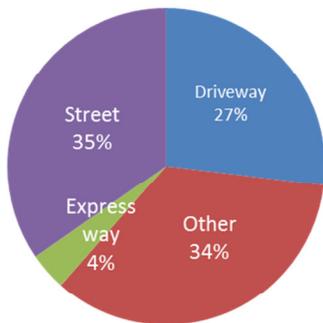
Annualized Death Rates (per 100,000 population) by Race/Ethnicity and Age Groups

RACE	AGE 0-9	AGE 10-17
AFRICAN-AMERICAN	1.7	2.2
HISPANIC	1.3	0.3
OTHER	0.3	0.4
WHITE	0.5	1.4

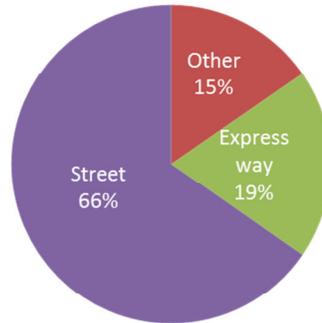
Incident Site

The sites for pedestrian deaths varied by age group. For children 0-4 years, the majority of deaths occurred on driveways and other sites (includes alleyway and parking lots). For children 5-14 years old, the greater number of deaths occurred on surface streets. For children 15-17 years, the majority of deaths occurred on expressways.

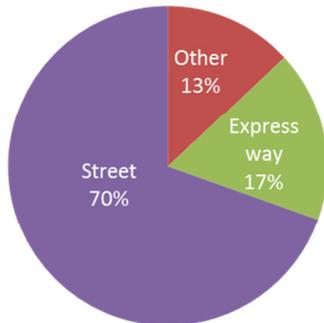
Child Pedestrian Deaths
Site of Injury by Age Groups
Dallas County, TX 1997-2014



Age Group 0-4 yrs
N=52



Age Group 5-9 yrs
N=26



Age Group 10-14 yrs
N=23



Age Group 15-17 yrs
N=27

Source: Dallas County Medical Examiner Data

Streets

Forty-nine percent (63/128) of the pedestrian deaths occurred on surface streets. Forty-nine percent (31/63) of the street deaths occurred when the child was crossing the street, while 30% (19/63) occurred while the child was in the street (i.e. playing in the street, retrieving a ball from the street). Fifty-seven percent (36/63) of street deaths were male, and 44% (28/63) were African-American. Seventy-one percent (45/63) of street pedestrian deaths occurred from 6 a.m. – 7:59 p.m.

Expressways

Twenty percent (25/128) of the pedestrian deaths occurred on expressways and frontage roads. Fifty-six percent (14/25) of the expressway deaths were among children between the ages 15-17 years. Forty percent (10/25) of the expressway deaths were African-American. Seventy-six percent (19/25) of deaths occurred from 8:00 p.m. – 5:59 a.m. Sixteen percent (4/25) of the deaths were labeled as “unintentional pedestrian,” meaning that the child had entered the expressway in a vehicle but got out of the vehicle before being killed as a pedestrian.

Other sites (Alleys and Parking Lots)

Twenty percent (25/128) of the pedestrian death occurred in parking lots (19), alleyways, etc. (6). Seventy-two percent (18/25) of these deaths occurred among males between the ages of 1-4 years. Fifty-six percent (14/25) of the deaths occurred among Hispanics. Eighty percent (20/25) of deaths occurred during the day from 6:00 a.m. – 7:59 p.m.

Driveways

Twelve percent (14/128) of the child pedestrian deaths occurred in a driveway. All of these deaths occurred among children 1 to 4 years old. Sixty-four percent (9/14) of driveway deaths were males, and 57% (8/14) occurred among Hispanics. In 71% (10/14) of the deaths, the driver was a relative of the child (parent, grandparent, uncle). The type of vehicle was collected for nine cases. For those cases with known vehicle type, 67% (6/9) were trucks, vans and SUVs. All of the deaths occurred between 12:00 p.m. – 10:30 p.m.

Data from Dallas County Child Death Review Team

The following information is CDRT data from 2006-2012.

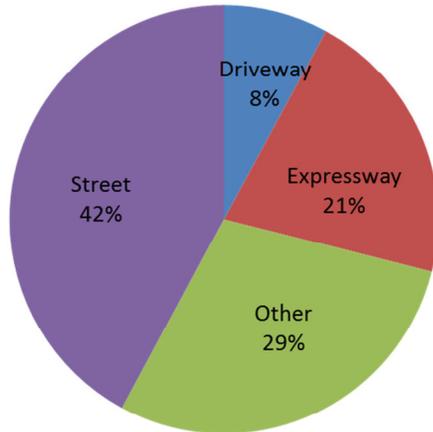
Overview

Between 2006 and 2012; there were 38 pedestrian deaths reported among children 0-17 years of age in Dallas County that was entered into the CDR database.

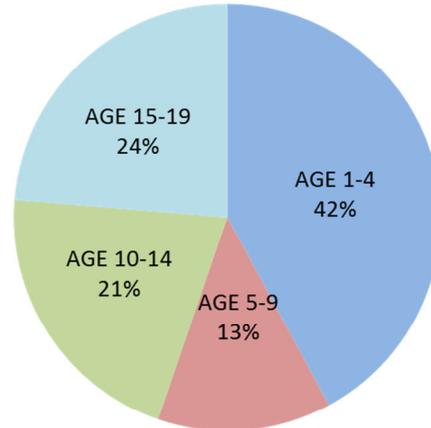
- Sixty-six percent of the deaths (25/38) were male.
- Fifty-three percent of the deaths (20/38) were Hispanic, followed by African-Americans (31%) and whites (16%).

- African-Americans had the highest average annual rate of .5 deaths per 100,000 population.

Child Pedestrian Deaths
Site of Injury
Dallas County, TX 2006-2012
CDRT



Child Pedestrian Deaths
Age Group
Dallas County, TX 2006-2012
CDRT



Child Activity

Forty-five percent (17/38) of the incidents listed the child's activity at the time death. Fifty percent (9/18) of the children were playing at the time of the incident.

Playing	9
Walking	7
Running	1
Unknown	21
Total	38

Child Information

Fifty-eight percent (22/38) of the children were enrolled in school. Fifty-five percent (12/22) of the school-age children enrolled in school were in Grades 9-12, followed by 36% (8/22) in Grades K-8, and 9% (2/22) in preschool. Eighteen percent (4/22) of the school children had experienced prior problems in school. Nine percent (2/22) had academic problems, 5% (1/22) had behavior problems, and 14% (3/22) had been truant. All of the school problems identified were among children 15-17 years of age. Fourteen percent (3/22) of the school children had delinquent or criminal history, including assault and drug use.

Investigation Information

A Child Protective Services (CPS) record check was conducted on 95% (36/38) of the pedestrian deaths. CPS investigated four of the deaths, but the investigations did not support abuse or neglect.

Circumstances around the crash

The following circumstances were identified by CDR team members who reviewed the death:

Driving Conditions

Normal Conditions	34
Inadequate Lighting	3
Wet	1

Contributing Factors*

Contributing factors were listed for 22 of the pedestrian deaths. Forty-one percent (9/22) of the deaths had more than one contributing factor to the crash.

Driver Distraction	2
Driver's Drug or Alcohol Use	2
Mechanical Failure	1
Recklessness	2
Speed	1
Poor Visibility	2
Poor Sight Line	9
Backover/Front	6
Rollover	6

*A crash could have more than one contributing factors listed.

Drivers involved in incident by Age, Responsibility, Alcohol involvement and License Status:

	Age
< 16 Ages	0
16-18 Ages	6
19-21 Ages	0
22-29 Ages	5
30-65 Ages	11
> 65 Ages	1
Unknown	15
Total	38

Thirty-five percent (10/38) of the drivers were responsible for the pedestrian death. Charges against the driver were filed in 26% (10/38) of cases. Five percent (2/38) of the drivers were alcohol/drug impaired at time of the crash. License status was available for 40% (15/38). Sixty-seven percent (10/15) of the drivers were fully licensed, 6.5% (1/15) had a graduated license, and 26.5% (4/15) had no license.

Prevention

The CDRT ruled that 100% (38/38) of the deaths were preventable.

Summary

Although pedestrian deaths have declined over time, they remain an important cause of injury-related deaths among children. The proportion of pedestrian deaths by race/ethnicity varied by age group with more deaths occurring among Hispanics in younger ages, and more among African-Americans in adolescent ages. The site of pedestrian deaths also varied by age group with younger children more likely to die as a pedestrian in driveways or parking lots, while school-age children were more likely to die from pedestrian injuries on surface streets. Pedestrian deaths among teenagers were more likely to occur on expressways. All the pedestrian deaths were ruled as preventable by the CDRT.