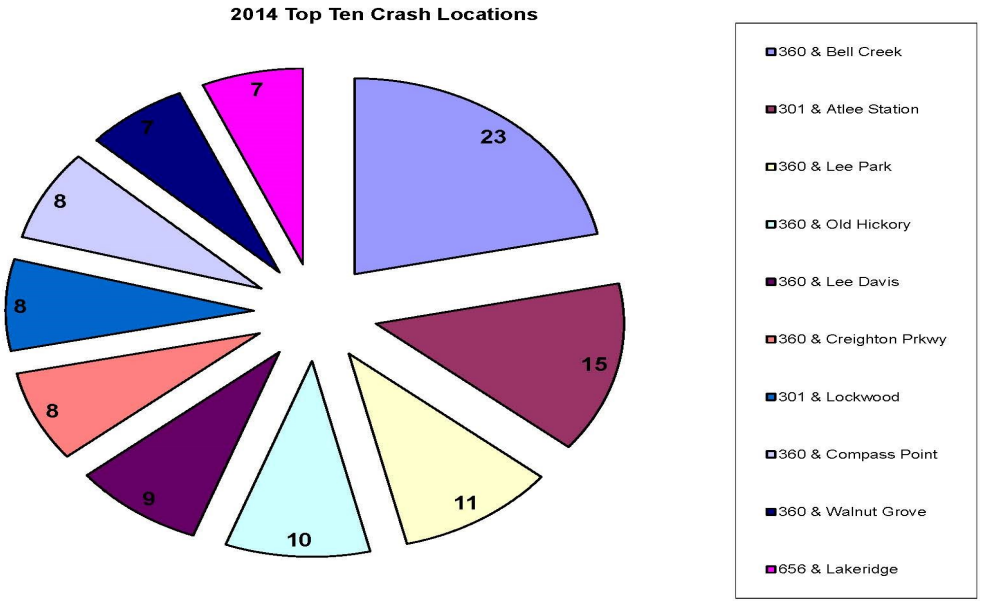
Local Issue

Problem Identification

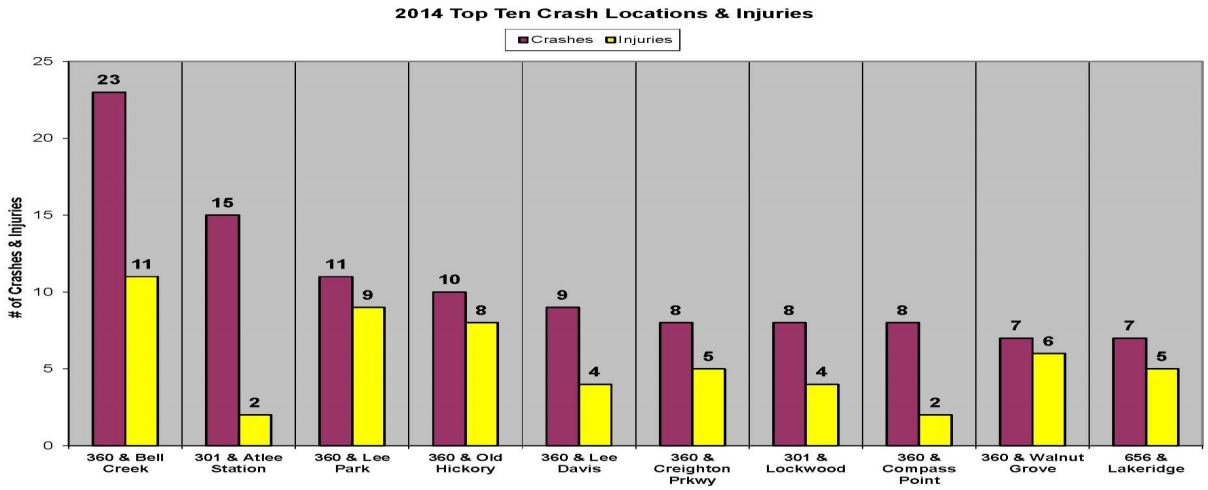
The Hanover County Sheriff's Office conducts an annual statistical survey to determine the locations in the county with the highest frequency of crashes. For the purposes of 2015 enforcement efforts, 2014 crash data was used to determine the ten locations with highest crash frequency. The 2014 crash data shows the majority of crashes occurred on the major thoroughfares in the county. The common causes of the crashes are following too close, red light violations, improper lane change, fail to yield, and improper turn. This information is then generated into a Top 10 Crash Locations list. These ten crash locations are entered into a traffic complaint database. Officers are then assigned enforcement efforts at these locations.

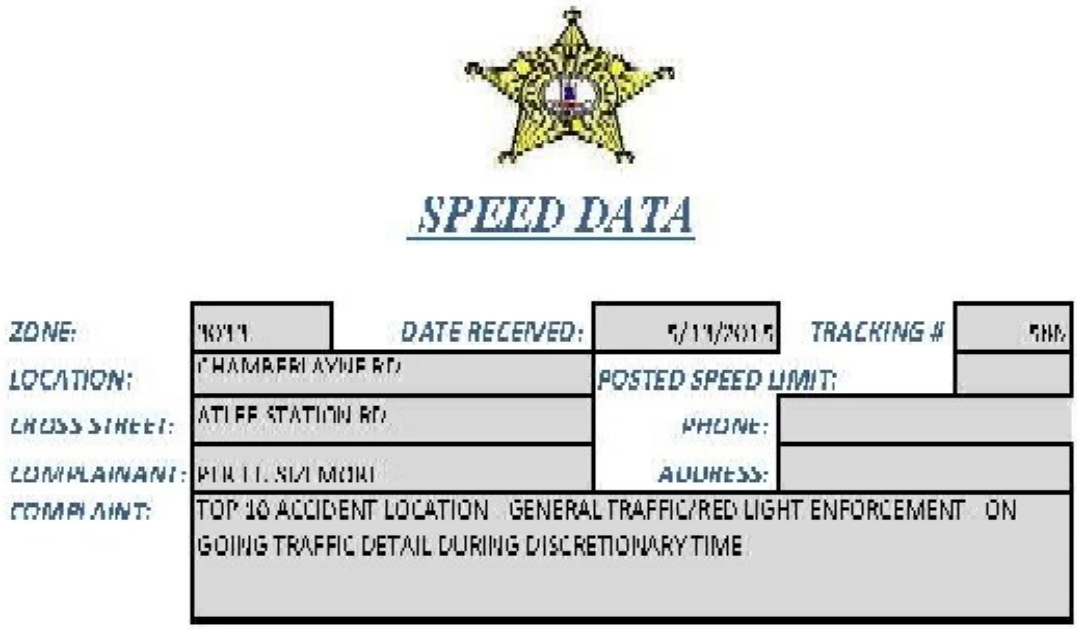


2015 National Law Enforcement Challenge

Local Issue

Problem Identification





SPEED DATA

ZONE:	[illegible]	DATE RECEIVED:	5/[illegible]/2015	TRACKING #	[illegible]
LOCATION:	CHAMBERLAYNE RD	POSTED SPEED LIMIT:			
CROSS STREET:	ATLEE STATION RD	PHONE:			
COMPLAINANT:	PORTLAND MORI	ADDRESS:			
COMPLAINT:	TOP 10 ACCIDENT LOCATION GENERAL TRAFFIC/RED LIGHT ENFORCEMENT ON GOING TRAFFIC DETAIL DURING DISCRETIONARY TIME				

Sample of a logged traffic complaint from an intersection in the Top 10 Crash Location list.

Local Issue

Policy

The Hanover County Sheriff's Office Traffic Law Enforcement AO 62-1 policy is attached for review. AO 62-1 encompasses the entirety of the Hanover County Sheriff's Office traffic law enforcement policy. The attached portion of AO 62-1 has been reduced to the applicable sections for Hanover County's Local Issue.

Planning

After the statistical survey was complete and the Top 10 Crash locations list was created, traffic complaints were logged at each of the 10 locations. Enforcement efforts were subsequently increased at these locations throughout 2015. The below is part of a memorandum explaining the Goals and Objectives pertaining to the Top 10 Crash Locations in 2015.

II. Reduction of the number of accidents at the Top Ten Locations by 3%.

1. Through educating the community on safe driving techniques through schools and business associations, and the media by utilizing Uniform Patrol, Crime Prevention, and the Pubic Information Officer.
2. With sufficient staffing, supervision will coordinate 5 red light enforcement details a quarter.
3. Conduct a combined 1000 radar enforcement details for the year.
4. If personnel are available, coordinate at least 2 traffic check points per month.
5. Work with VDOT to correct problem areas when identified as causes of vehicle crashes

Local Issue

Training

The Hanover County Sheriff's Office conducted roll call training pertaining to our local issue, the intersections with the highest frequency of traffic crashes. Each officer was instructed on the frequency of crashes at each of the ten locations, and the most common types of offenses resulting in crashes. Officers were additionally instructed to conduct special enforcement efforts at the ten locations and document their activity on a traffic complaint log. The following two pages are the documents pertaining to the Top 10 Crash Locations in 2014 that were covered during roll call training in 2015.

2015 National Law Enforcement Challenge

Local Issue

Training

2014 TOP CRASH LOCATIONS

ANALYSIS OF DATA

Location	# Crashes
1. Mechanicsville/Bell Creek	23
2. Chamberlayne/Atlee Station	15
3. Mechanicsville/Lee Park	11
4. Mechanicsville/Old Hickory	10
5. Mechanicsville/Lee Davis	9
6. Mechanicsville/Creighton Parkway	8
7. Chamberlayne/Lockwood/Cudlipp	8
8. Mechanicsville/Compass Point	8
9. Mechanicsville/Walnut Grove	7
10. Sliding Hill/Lakeridge	7*

* The intersection of Mechanicsville & Elm had (7) crashes, as well as Chamberlayne and Atlee. These intersections were not listed in the top ten due to less crash-related injuries than the other two intersections with seven (7) crashes.

There was a 2.9% increase in the number of crashes at the county's ten most dangerous intersections during 2014 (103 in 2013 versus 106 in 2014). Despite the slight increase in intersection-related crashes, the county experienced a -5.5% decrease in overall reported crashes (1,340 in 2013 versus 1,266 in 2014). This includes 104 deer/animal-related crashes in 2014.

Due to the overall decrease, crashes involving an injury dropped by -2.6% as compared with 2013 (425 in 2013 versus 414 in 2014) and the number of people injured in those crashes decreased (-4.8%) respectively. Injuries at the top ten crash locations dropped as well (-18.8%) from 69 in 2013 to 56 in 2014.

Mechanicsville Turnpike continues to dominate the top ten report; followed by Chamberlayne Road. All of the top crash locations are directly related to areas of business.

Four intersections from the 2013 top ten report (Mechanicsville & Brashier Blvd, Mechanicsville & Wynbrook, Mechanicsville & Northbound Bell Creek, and Sliding Hill & Peaks) were replaced by Mechanicsville & Lee Park, Sliding Hill & Lakeridge, Mechanicsville & Creighton Parkway, Mechanicsville & Walnut Grove, and Chamberlayne and Lockwood in 2014. This is a first appearance for Sliding Hill and Lakeridge and Chamberlayne and Lockwood, while the other three have appeared on previous top ten lists.

Local Issue

Training

The following intersections ranked just outside of this year's top ten list;

- Chamberlayne & Atlee 7 crashes and 1 injuries
- Mechanicsville & Elm 7 crashes and 1 injuries
- Mechanicsville & NB Bell Creek 5 crashes and 3 injuries
- BR Mechanicsville & Atlee 5 crashes and 3 injuries
- BR Mechanicsville & Elm 5 crashes and 1 injuries
- Rural Point & Studley 4 crashes and 3 injuries

The 2014 crash data states that the majority of crashes continue to occur on the major thoroughfares in Hanover County. The common cause of these crashes continues to be following too close (73), followed by red light violations (23), improper lane changes (6), fail to yield (3), Improper Turn (1). This is somewhat indicative of poor driving habits such as driver inattention and unsafe following distances. As with previous years, most crashes are occurring during the lunch hour (41 crashes between 10:00am and 4:00pm) or during the evening rush hour (35 crashes between 4:00pm and 8:00pm).

Despite recent design improvements to the Chamberlayne Road corridor, Atlee Road to I-295 continues to be a hazardous stretch of roadway. The majority of these incidents are occurring in the southbound lanes of Rt. 301. Based on the location and timeframes of the occurrences, the position of the afternoon sun, downhill grade, partially obscured view (railroad overpass), and increased commercial and residential construction, these intersections will likely continue its presence within the top ten.

For the past several years the Hanover County Sheriff's Office has conducted a consistent approach to enforcement of DUI/DUID laws (398 in 2008, 402 in 2009, 352 in 2010, 433 in 2011, 435 in 2012, 355 in 2013, and 384 in 2014). Despite the consistent approach, the county experienced a 10.7% jump in alcohol-related crashes during 2014. Although the number of alcohol-related crashes involving an injury decreased by -35% (34 in 2013 versus 22 in 2014) the number of people injured in those crashes increased by 41.5% (53 in 2013 versus 75 in 2014). The fatality rate remained consistent from 2008 to 2012 (8); however the trend has been climbing to eleven (11) fatal crashes in 2013 and thirteen (13) during 2014.* Three of these fatal crashes involved alcohol or drugs, while three more remain pending a laboratory analysis.

***The above statistical data is only relevant to crash investigations conducted by the Hanover County Sheriff's Office and does not include investigations conducted by the Ashland Town Police or the Virginia State Police.**

Local Issue

Enforcement Activity

In response to increasing enforcement efforts at each of the locations in the 2015 Top Crash Locations list, officers conducted **38** special enforcement efforts resulting in **22** traffic stops. The 22 traffic stops resulted in **10** summonses and **12** warnings.

2014 Top 10 Crash Locations

2015 Enforcement Data

Top 10 Location	Traffic Enforcement Efforts	Traffic Stops	Summonses	Warnings
Mechanicsville Tnpk/Bell Creek Rd	14	14	5	9
Chamberlayne Rd/Atlee Station Rd	5	2	1	1
Mechanicsville Tnpk/Lee Park Rd	3	1	1	0
Mechanicsville Tnpk/Old Hickory	0	0	0	0
Mechanicsville Tnpk/Lee Davis	5	3	2	1
Mechanicsville Tnpk/Creighton Pkwy	0	0	0	0
Chamberlayne Rd/Lockwood Blvd	2	0	0	0
Mechanicsville Tnpk/Compass Point	2	0	0	0
Mechanicsville Tnpk/Walnut Grove	4	1	1	0
Sliding Hill Rd/Lakeridge Pkwy	3	1	0	1
Totals	**38**	**22**	**10**	**12**

Local Issue

Outcomes

Decrease in crashes at the Top 10 Crash Locations

Analysis of the Hanover County Sheriff's Office's response to the top 10 crash locations in Hanover County revealed the Sheriff's Office's efforts had the desired impact of reducing accidents at these locations. There was an 8.5% decrease in the number of crashes at the county's ten most dangerous locations in 2015. There were 106 crashes at these locations in 2014 compared to 97 in 2015. Accidents with injuries also dropped at these locations in 2015. There was a 37.5% decrease in accidents with injuries at the top 10 crash locations in Hanover County. There were 56 such accidents in 2014 compared to 35 in 2015.

With an 8.5% decrease in the number of crashes at the ten most dangerous locations in Hanover County, the Hanover County Sheriff's Office exceeded its objective of reducing the number of accidents at the top ten locations by 3%.