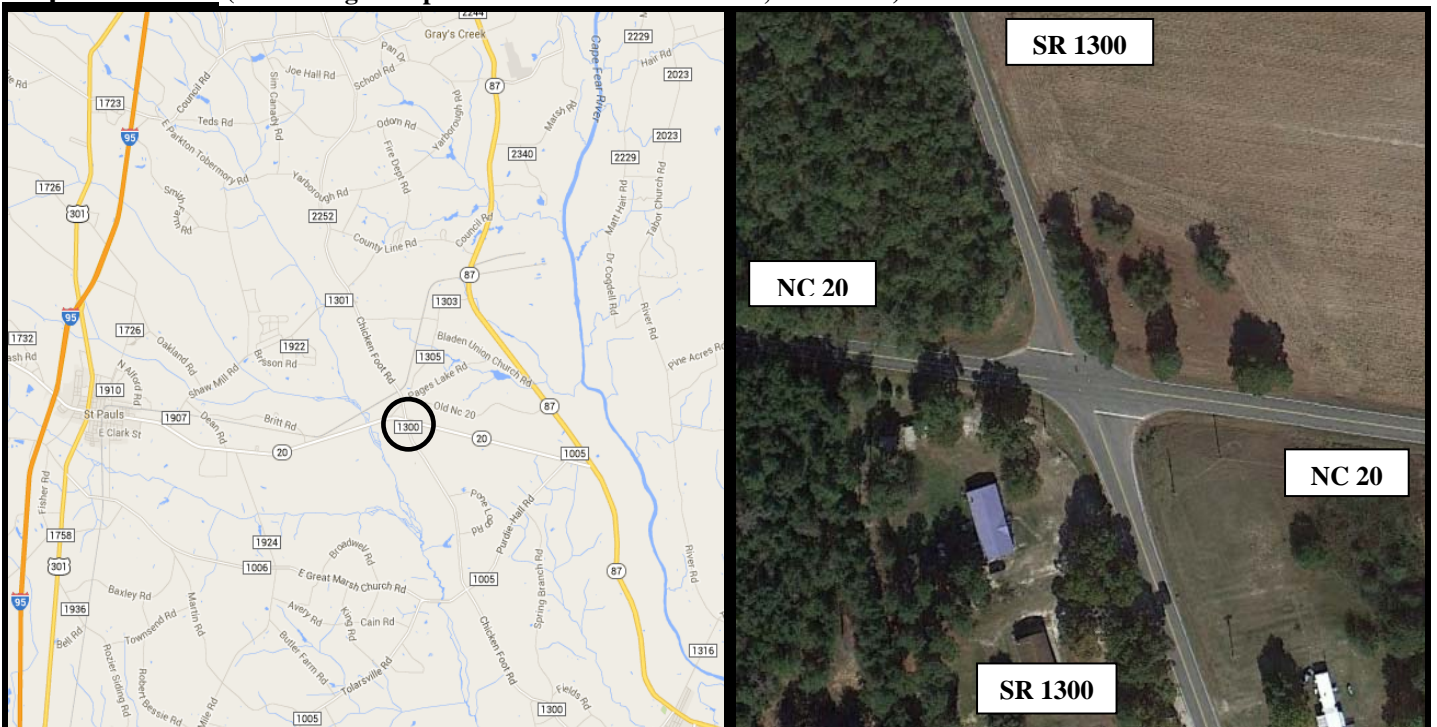


Spot Safety Project Evaluation

Project Information

Order ID: 41000028040
Project ID: 06-05-207
Location: NC 20 and SR 1300 (Chicken Foot Road)
County: Bladen
City: St. Pauls
Division: 6
Signal ID: 06-1284
Countermeasure: Install overhead flasher
Project Completion: Between November 1, 2008 and December 31, 2008
Project Cost: \$22,000.00

Map and Aerial (from Google Maps – Coordinates are 34.80503,-78.876321)



Naive Before and After Analysis

Before Period: August 1, 2003 through October 31, 2008 (5 years, 3months)

Const. Period: November 1, 2008 through December 31, 2008 (2 months)

After Period: January 1, 2009 through March 31, 2014 (5 years, 3 months)

Analysis Criteria: Treatment data consisted of all crashes within 150 feet of the subject intersection for the NC 20 and SR 1300 approaches.

Target Crashes: Frontal impact crashes between a vehicle entering from SR 1300 and a vehicle on NC 20

<u>Treatment Information</u>	Before	After	Percent Reduction (-) Percent Increase (+)
Total Crashes	28	17	-39.3%
Total Severity Index	11.7	6.66	-28.1%
Target Crashes	25	15	-40.0%
Target Crash Severity Index	12.10	6.43	-31.3%
Volume (2006, 2010)	6,000	5,500	-8.3%

<u>Injury Crash Summary</u>	Before	After	Percent Reduction (-) Percent Increase (+)
Fatal injury Crashes	1	0	-100.0%
Class A injury Crashes	1	0	-100.0%
Class B injury Crashes	8	4	-50.0%
Class C Injury Crashes	12	9	-25.0%
Property Damage Only	6	4	-33.3%

<u>Additional Information</u>	Before	After	Percent Reduction (-) Percent Increase (+)
Southbound SR 1300 Frontal Impact (Target)	12	5	-58.3%
Northbound SR 1300 Frontal Impact (Target)	13	10	-23.1%

Overall Summary Results

Total Crashes:	-39.3 %	(reduction)
Total Crash Severity:	-43.1 %	(reduction)
Target Crashes:	-40.0 %	(reduction)
Target Crash Severity:	-46.9 %	(reduction)
Volume:	-8.3 %	(reduction)

Additional Summary Results

Southbound SR 1300 Frontal Impact (Target):	-58.3 %	(reduction)
Northbound SR 1300 Frontal Impact (Target):	-23.1 %	(reduction)

Items for Discussion/Concerns

The installation of the overhead flasher resulted in a reduction of both total crashes and target crashes between the before and after periods. Also, the severity of both total crashes and target crashes experienced a reduction of over 40 percent between the before and after periods.

The target crashes involving vehicles from southbound SR 1300 experienced a 58.3 percent reduction while the target crashes involving vehicles from northbound SR 1300 experienced a reduction of 23.1 percent between the before and after periods.

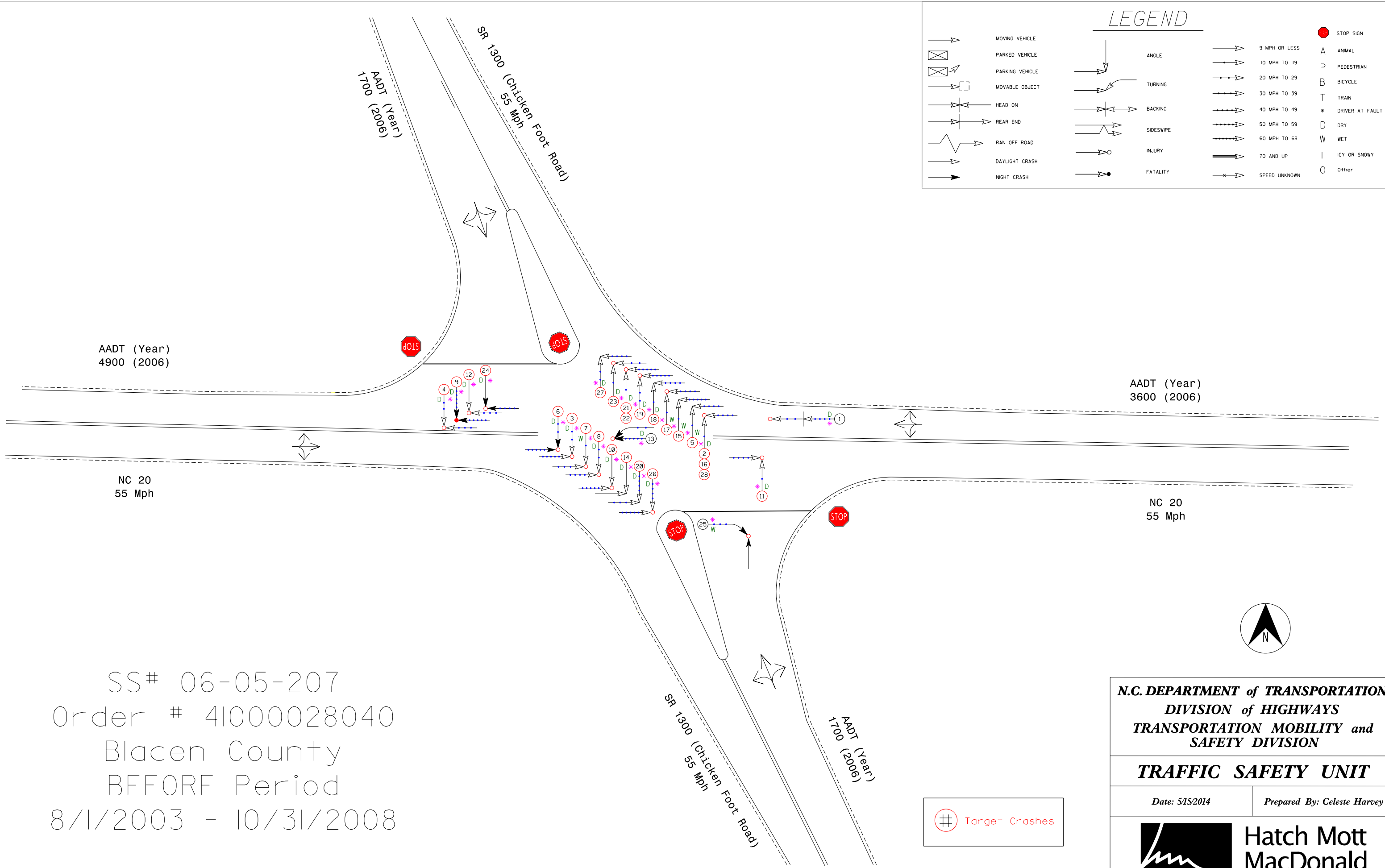
Data Prepared For

The Traffic Safety Unit *of the*
Transportation Mobility and Safety Division *of the*
Division of Highways *of the*
North Carolina Department of Transportation

Data Prepared By

Principal Investigator: Celeste Harvey
Work Group/Consultant: Hatch Mott MacDonald
Date: May 16, 2014

LEGEND			
	MOVING VEHICLE		ANGLE
	PARKED VEHICLE		TURNING
	PARKING VEHICLE		BACKING
	MOVABLE OBJECT		SIDESWIPE
	HEAD ON		INJURY
	REAR END		FATALITY
	RAN OFF ROAD		9 MPH OR LESS
	DAYLIGHT CRASH		10 MPH TO 19
	NIGHT CRASH		20 MPH TO 29
			30 MPH TO 39
			40 MPH TO 49
			50 MPH TO 59
			60 MPH TO 69
			70 AND UP
			SPEED UNKNOWN
	STOP SIGN		A ANIMAL
	A ANIMAL		P PEDESTRIAN
	P PEDESTRIAN		B BICYCLE
	B BICYCLE		T TRAIN
	T TRAIN		* DRIVER AT FAULT
	* DRIVER AT FAULT		D DRY
	D DRY		W WET
	W WET		I ICY OR SNOWY
	I ICY OR SNOWY		O Other
	O Other		



SS# 06-05-207
 Order # 41000028040
 Bladen County
 BEFORE Period
 8/1/2003 - 10/31/2008

Target Crashes

N.C. DEPARTMENT of TRANSPORTATION
DIVISION of HIGHWAYS
TRANSPORTATION MOBILITY and
SAFETY DIVISION

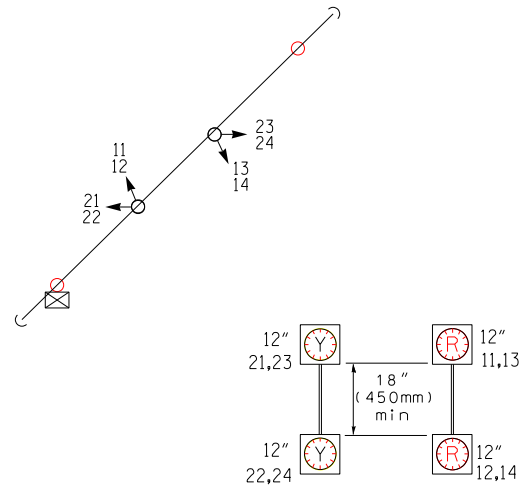
TRAFFIC SAFETY UNIT

Date: 5/15/2014 Prepared By: Celeste Harvey



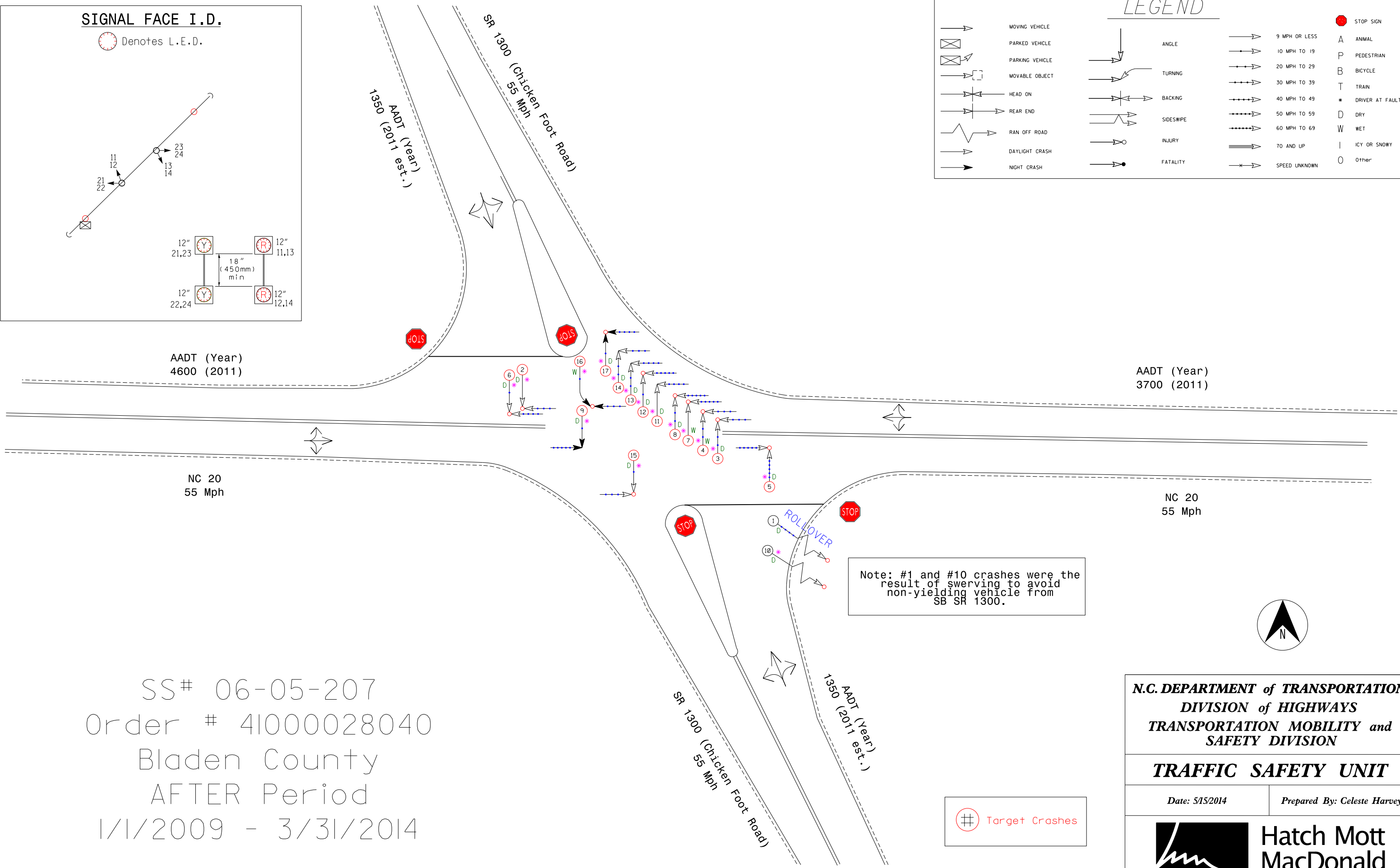
SIGNAL FACE I.D.

Denotes L.E.D.



LEGEND

	MOVING VEHICLE		ANGLE		9 MPH OR LESS		STOP SIGN
	PARKED VEHICLE		10 MPH TO 19		20 MPH TO 29		ANIMAL
	PARKING VEHICLE		30 MPH TO 39		40 MPH TO 49		PEDESTRIAN
	MOVABLE OBJECT		50 MPH TO 59		60 MPH TO 69		BICYCLE
	HEAD ON		70 AND UP		SPEED UNKNOWN		TRAIN
	REAR END		SIDESWIPE		* DRIVER AT FAULT		DRY
	RAN OFF ROAD		INJURY		W WET		ICY OR SNOWY
	DAYLIGHT CRASH		FATALITY				Other
	NIGHT CRASH						



Note: #1 and #10 crashes were the result of swerving to avoid non-yielding vehicle from SB SR 1300.



SS# 06-05-207
 Order # 41000028040
 Bladen County
 AFTER Period
 1/1/2009 - 3/31/2014

Target Crashes

N.C. DEPARTMENT of TRANSPORTATION
DIVISION of HIGHWAYS
TRANSPORTATION MOBILITY and SAFETY DIVISION

TRAFFIC SAFETY UNIT

Date: 5/15/2014 Prepared By: Celeste Harvey

