

Blue Star Trail Feasibility Study Intersection Comparison – December 26, 2018

Old Allegan Road & Blue Star Highway

Average Daily Traffic: Blue Star Highway	7,392 (2016 count)
Average Daily Traffic: Old Allegan Road	929 (2016 count)
No. of Crashes (2013 – 2017)	10
No. of Injuries	5
No. of Fatalities	0

Lake Street & Blue Star Highway

Average Daily Traffic: Blue Star Highway	7,392 (2016 count)
Average Daily Traffic: Lake Street*	3,716 (2018 count)
No. of Crashes (2013 – 2017)	10
No. of Injuries	1
No. of Fatalities	0

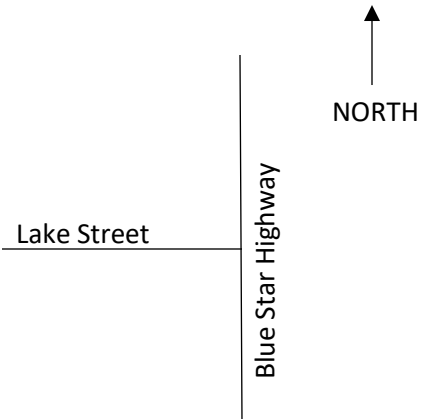
*daily traffic derived from peak hour traffic counts

MMUTCD Traffic Signal Warrants:

	Is Warrant Met?
Warrant 1: Eight-Hour Vehicular Volume	No
Warrant 2: Four Hour Vehicular Volume	Yes
Warrant 3: Peak-Hour Vehicular Volume	Yes

Operational Analysis:

Intersection	Approach	Existing Conditions: Minor Street Stop Controlled					
		AM Peak		MD Peak		PM Peak	
		Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS
Blue Star Memorial Highway & Lake Street	NB LT	8.1	A	9.4	A	8.9	A
	NB TH	Free		Free		Free	
	SB THRT	Free		Free		Free	
	EB LT	15.6	C	40.6	E	32.8	D
	EB RT	10.3	B	15.0	C	13.4	B



Intersection	Approach	Future Conditions: Minor Street Stop Controlled						Future Conditions: Signalized					
		AM Peak		MD Peak		PM Peak		AM Peak		MD Peak		PM Peak	
		Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS	Delay (s/veh)	LOS
Blue Star Memorial Highway & Lake Street	NB LT	8.2	A	9.6	A	9.1	A	17.5	B	12.3	B	11.0	B
	NB TH	Free		Free		Free		13.0	B	5.7	A	6.7	A
	SB THRT	Free		Free		Free		13.6	B	6.5	A	6.8	A
	EB LT	16.4	C	44.0	E	35.3	E	6.0	A	11.8	B	9.9	A
	EB RT	10.6	B	15.8	C	14.0	B	6.5	A	14.9	B	12.0	B
	Overall							13.3	B	8.9	A	8.4	A