

2-15-1.1 AASHTO Guide for Supplemental Signs

September 2007

GUIDELINES

Following is a copy of the 2001 AASHTO Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways. These are the AASHTO Guidelines that are incorporated by reference in Section 2E.35 of the MUTCD. This section of the MUTCD also recommends that states *should* adopt an appropriate policy for installing supplemental signs using the AASHTO Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways.

The department has adopted policy pursuant to Section <u>2E.35</u> which is found in <u>TEOpS 2-15-3</u>. Both the AASHTO Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways" as incorporated in the MUTCD and the department policy found in <u>TEOpS 2-15-3</u> apply.

PART I

Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways

The Manual on Uniform Traffic Control Devices for Streets and Highways (MUTCD) is the national standard for installing traffic control devices on all roads open to public travel. The MUTCD contains the standards for signing freeways and expressways for motorists who are unfamiliar with an area, but who are traveling between and through the Nation's principal traffic generating centers.

The selection of information to be presented at an interchange is critical to the safe and efficient use of the highway system. The MUTCD provides mandatory requirements for installing many free-way signs, but leaves other signing discretion to the States. One of these discretions is the selection of destinations to be used on major guide signs and supplemental guide signs. Numerous facilities that warrant inclusion on supplemental guide signs, and the addition of new facilities, have posed signing problems in many states.

The guidelines contained herein were developed to assist the States in selecting the most appropriate generators for display on freeway supplemental guide signs. These guidelines provide a basis for development of individual State policies which should consider local needs, customs, and legal requirements.

The MUTCD provides several restrictions on the use of supplemental guide signs on freeways. Those portions of the MUTCD are repeated below.

Sec. I A-3.1

"Traffic control devices shall be placed only by the authority of a public body or official jurisdiction, for the purpose of regulating, warning, or guiding traffic. No traffic control device or its support shall bear any advertising or commer-

PART I

Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways

PART II
Guidelines for Airport Guide
Signing

PART III List of Control Cities for Use in Guide Signs on Interstate Highways

2001

© Copyright, 2001, by the American Association of State Highway and Transportation Officials. All Rights Reserved. Printed in the United States of America. This book, or parts thereof, may not be reproduced in any form without written permission of the publisher.

ISBN 1-56051-154-0



Published by the American Association of State Highway and Transportation Officials 444 North Capitol Street, N.W., Suite 249 Washington, D.C. 20001 cial message, or any other message that is not essential to traffic control... All unofficial and non-essential signs should be removed."

Sec. 2F-20

"...the major signs at freeway interchanges and on their approaches are advance guide signs and exit direction signs. It is essential that the same destination messages be displayed on these signs. New destination information should not be introduced into the major sign sequence for one interchange, nor should information be dropped... Supplemental guide signing should be used sparingly, as provided in Section 2E-28."

Sec. 2E-28

"Information regarding destinations accessible from an interchange, other than places shown on the standard interchange signing, may be shown on a supplemental guide sign. Such a sign may list one or two destinations followed by the interchange number (and suffix) or if interchanges are not numbered, by the legend 'NEXT RIGHT' or 'SECOND RIGHT' or both, as appropriate. The supplemental guide sign installation should be erected approximately midway between the two major advance guide signs. If only one advance guide sign is used, the supplemental guide sign should follow by at least 800 feet.

Supplemental signing can reduce the effectiveness of the other important guide signing because of the possibility of overloading the vehicle operator's capacity to receive and make decisions on visual messages. The AASHTO Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways is incorporated in this section as a guide. States may develop an appropriate policy for such signing. Such items as population, traffic generated, and distance should be taken into account.

Only one supplemental guide sign may be used on each interchange approach. If used, it is normally installed as an Independent guide assembly.

Guide signs directing motorists to park-and-ride facilities shall be considered as supplemental signs..."

Sec. 2F-34

"Scenic area signing should be consistent with that specified for rest areas. Standard messages should read 'SCENIC AREA' or 'SCENIC VIEW' or the equivalent."

Sec. 2H-16

"Supplemental guide signs with a white legend and border on a brown background may be used on an expressway or freeway when a park or recreational or cultural interest area is signed as a significant destination for users of these roads. The same color combination may be used for the advance guide sign and the exit direction sign for an interchange where the crossroad leads exclusively to a park, or to a recreational or cultural interest area.

Where the crossroads of an expressway or freeway leads to a destination other than a park or a recreational or cultural Interest area, the advance guide sign and the exit direction sign shall retain the white on green color combination.

All gore signs shall have a white legend on a green background, regardless of the above conditions. The background color of the interchange exit number panel shall match the background color of the guide sign proper."

Secs. 2F-41, 2E-42, 2D-49 (paraphrased) If they do not interfere with signing for interchanges or, other equally critical points, miscellaneous guide signs, or various types may be used to show state, county, and other significant local jurisdictional boundaries. Signs of this character should not be installed unless there are specific reasons for orienting the users of the freeway or identifying control points for activities that are clearly in the public interest. Sec. 2F-40

"The commonly used name or trailblazer symbol for a toll facility may be displayed on free sections of the Interstate System at

- the last exit before entering a toll section
 of the Interstate System;
- the interchange or connection with a toll facility, whether or not the toll facility is a part of the Interstate System; and
- other locations within a reasonable approach distance of toll facilities when the name or trailblazer symbol for the toll facility would provide better guidance to drivers unfamiliar with the area than would place names and route numbers.

The toll facility name or marker may be included as a part of the guide sign installations on intersecting highways and approach roads to indicate the interchange with a toll section of an Interstate highway. Where needed for the proper direction of traffic, a trailblazer for a toll facility that is part of the Interstate System may be displayed with the Interstate trailblazer assembly."

General Criteria and Limitations

General signing criteria and limitations should be established by the States. Generators which have the greatest traffic should be shown on supplemental guide signs. This does not mean that all facilities that meet the criteria should automatically receive informational signing. Signing for traffic generators is considered supplemental to the overall signing system for freeways. Therefore, before a sign for a traffic generator is installed, sufficient space should exist to accommodate the placement of the sign without interfering or conflicting with required signing. Normally, supplemental guide signs for traffic generators should not be installed at freeway-to-freeway interchanges.

Not more than one supplemental guide sign for a traffic generator should be provided in each direction along any freeway. Signs for these facilities shall be located in advance of the interchanging road that provides the most direct route to the facility.

Information relating to a traffic generator should be displayed at the freeway exit nearest to the facility. Consideration may be given to displaying the information at a second freeway when the prime criterion is exceeded by at least 50 percent and the traffic generator is within two-thirds of the specified distance for the nearest freeway and within the specified distance for the farthest freeway. Supplemental guide signs should not be erected for a traffic generator that would require a motorist to travel on the interchanging road beyond a second freeway.

Signing for a seasonal generator may be displayed when warranted. Such signing shall be removed at the end of the season, or a changeable message type installation may be used.

Two traffic generators may be displayed on a single, permanent, or seasonal guide sign. When more than two traffic generators meet the signing criteria, generators having the greatest need for signing should be shown. Permanent supplemental guide sign and seasonal supplemental guide sign information for traffic generators may be installed on the same supports.

Signing for a traffic generator should not be displayed on a supplemental guide sign until signing has been installed at the ramp terminals and along the interchanging road and other roads as necessary to direct the motorist from the freeway to the traffic generator.

Specific Criteria

Certain types of generators appear through attendance or special activities to warrant signing with minimal traffic volume criteria. While it is recommended that criteria be established, signs may, at the option of the States, be erected for the following types of generators, without establishing a traffic volume warrant.

- 1. Major airports
- 2. Major military installations
- 3. Major colleges and universities
- 4. Federal and State parks
- 5. Major recreational areas
- 6. Other incorporated cities

Other generators that may qualify for signing on the conventional highway system are not normally of interest to the freeway user. Except under unusual circumstances, supplemental signing should not be considered for the generators shown in Table I. This table is not all-inclusive, but provides an indication of the type of facilities not normally warranting signs.

Table II provides guidelines to establish criteria for selection of destinations to be shown on supplemental guide signs. In view of the broad range of population densities throughout the Nation, numerical values may be altered as required by local conditions. A typical selection of generators was included in this table and geographical conditions, legal requirements, or administrative policy may require certain deletions or expansion of the table in individual states.

TABLE I

Traffic Generators That Do Not Normally Warrant Signing

Businesses TV/Radio Stations Theaters Motels/Hotels/Inns* Trailer Parks* Industrial Parks and Plants Shopping Centers

Cemeteries Local or State Private/Public Military

Communities
Civil Centers Military
Libraries
Churches
Subdivisions

Governmental Research/Experimental County and City Facilities Courthouses Driver's License Centers Highway Buildings Jails/Prisons Civil Defense Facilities Maintenance Facilities Power Plants

Historical Homes and Buildings Privately Owned Facilities Medical
Mental Facilities
Research Facilities
Sanitariums
Infirmaries or Treatment
Centers
Veterans Facilities
County, Fraternal, or Nursing
Homes
Retirement Facilities
Humane Facilities
Humane Facilities
Emergency Medical Services*

Military Sites or Detachments Armories Arsenals

Recreational/Conservational Country Clubs and Golf Courses Fish Hatcheries, Game Farms, Preserves, and Refuges Tree Nurseries/Arboretums Points of Interest Camps: Scout, Church, 4 H, Youth, and YMCA/YWCA

Schools Grade/High Vocational/Trade Seminaries Private

6

^{*}Items may be included on Motorist Service signs (GAS-FOOD-LODGING-HOSPITAL-CAMPING)

TABLE II Guideline Criteria for Signing Traffic Generators These numerical values are provided as guides and may be modified by each

state as required by local conditions, laws, and customs.

Type of Generator	Specific Criteria	Major Metro Area ^l	Urban Area²	Rural Area
College or University	Total Enrollment Full & Part Time Students or	4,000	2,500	1,500
	No. of Trips ³ Generated Annually	900,000³a 1,200,000³b	550,000 750,000	300,000 450,000
	Distance from Interchange (mi) ⁴	3	4	as 5
Military Bases	No. of Employees & Permanently Assigned Military Personnel or	5,000	4,000	3,000,000
	No. of Trips ³ Generated Annually	5,000,000³c	4,000,000	3,000,000
	Distance from Interchange (mi) ⁴	5	7.5	10
Arenas Auditoriums	Annual Attendance	300,000	250,000	200,000
Convention Halls				
Stadiums	No. of Seats (If Applicable)	6,000	5,000	4,000

Type of Generator	Specific Criteria	Major Metro Area	Urban Area²	Rural Area
State & National Parks			and the first	
Monuments	Distance from Interchange	.5	. g 5	5
Major Recreational Areas (Fairgrounds,				
Amusement Parks, Zoos, Etc.)			* . * . * . * . *	

¹ 50,000 or more population in Urban Area.

Note: When the traffic generator is not located on the crossroad, written confirmation is required from the local government agency that they will install and maintain trailblazing signing for the logical direction of traffic to

2-15-3 AASHTO Guide for Supplemental Signs

April 2017

DIRECTIONAL AND INFORMATIONAL SIGN REQUESTS

The following is a table intended to provide preliminary information on the eligibility of specific sign requests for installation on the state trunk highway system, including freeways and expressways. It shall be used in combination with the rest of this subject, which gives more specific qualifying criteria.

Abbreviations:

Supplemental C: The category for traffic generator supplemental signing on conventional highways

Supplemental F: the category for traffic generator supplemental signing on freeways

SS (numbers): A reference to a numbered subsection of the state statutes

TEOpS (numbers): A reference to another subject in the Traffic Engineering, Operations and Safety Manual

Trans 200.nn: A reference to a subsection in Chapter Trans 200 of the Wisconsin Administrative Code

DESTINATIONS or INFORMATION	CATEGORIES	AUTHORIZATION	REMARKS
Agricultural Experiment	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Agricultural Farms	Not Permitted		·
Air Traffic Control	Not Permitted		
Airport – Major	Govt. Transportation		
Airport – Public General	Govt. Transportation		
Aviation			
Amtrak Station	Govt. Transportation		
Amusement Parks	Supplemental C, SIS,	SS 86.195	Qualifying Criteria

² 5,000-49,999 population in Urban Area.

³ Trip: A single or one-direction vehicle movement to the generator. The following trip generation rates are suggested:

³a College or University without dorms, each student = 1.5 trips

³b College or University with dorms, each student=2 trips
3c One employee or military personnel=0.9 trips
4 The distance may be increased 1/2 mile for each 10 percent over the minimum requirement listed to a maximum of two times the minimum distance listed.

	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Animal Hospitals,	Not Permitted		
Emergency			
Animal Ranches	Not Permitted		
Animal Shelters	Guidance Signs	Trans 200.03	
Arboretums	Supplemental C		Qualifying Criteria
Arenas, multi-purpose	Supplemental F & C		Qualifying Criteria
Armories, Reserve Ctrs	Supplemental C		Qualifying Criteria
Arrow Boards	Guidance Signs	Trans 200.03	aka Guidance signs
Athletic Fields and/or	Community wayfinder	TEOpS 2-15-	<u> </u>
Facilities	Guidance Signs	60Trans 200.03	
Attractions	SIS	SS 86.195	
Auditoriums	Supplemental F & C		Qualifying Criteria
Auto Repair	Not permitted		
Aviation Flight School	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Banners	Information	TEOpS 13-12-1	4100 <u>12000 2 10 00</u>
Boat Landings	Inter-agency	1LOPO 10-12-1	Conventional Hwy only
Botanical Gardens	Supplemental C		Same as Arboretums
Braking, Engine (Jake)	Special	TEOpS 2-2-30	Same as Arboretums
Bus Terminals	Not Permitted	<u>TEODS 2-2-30</u>	
Business District	Special	TEOpS 2-6-50	Alternative to "Downtown"
Dualitesa Diatifet		TEOpS 2-0-50 TEOpS 2-15-6	VICELLISTING TO DOMITIONIT
Cabine Cottages Non	Community wayfinder Not Permitted	1EUpo 2-10-0	
Cabins, Cottages, Non-	Not Permitted		
rental Cabina Cottagos Bontal	Guidanca Siana	Trans 200.03	also TEOnS 2 15 60
Cabins, Cottages, Rental	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Camping, including Logo	SIS, TODS, Guidance		Category depends upon highway type
0	Signs		
Campgrounds (public)	Inter-agency	T 000.00	1 750 004500
Camps, Private	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Canoe, Kayak, Tubing	TODS	SS 86.196	
Facilities			
Casinos	Supplemental F & C		Qualifying Criteria
Cemeteries	Not permitted		See Veterans Cemeteries
Churches	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
City Hall	Community wayfinder	TEOpS 2-15-6	
City Parks	Community wayfinder	TEOpS 2-15-6	
Civic Centers	Community wayfinder	TEOpS 2-15-6	
Clinics	Not Permitted		
Colleges	Supplemental F & C		Qualifying Criteria
Community Destination	Community wayfinder	TEOpS 2-15-6	aka "Wayfinder" signs
Signs			
Community Welcome Signs	Special/Not Permitted	TEOpS 2-1-41	
Conservation Center	Inter-agency		Conventional Hwy only
Convention Centers	Supplemental F & C		Qualifying Criteria
	Community wayfinder	TEOpS 2-15-6	· -
	Guidance Signs	Trans 200.03	Also TEOpS 2-15-60
Correctional Institutions	Inter-agency		Conventional Hwy only
Country Clubs	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
County Fairgrounds	Inter-agency		
County Institutions	Inter-agency,		
(Healthcare Facilities)	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
County Parks	Inter-agency		
Courthouses	Community wayfinder	TEOpS 2-15-6	
Crime Stoppers	Special/Not Permitted		
Cruises, Boat	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Dance Halls	Not Permitted		
D.A.R.E.	Special/Not Permitted		
DMV Service Center	State Govt. Service		Conventional Hwy only
DIVIA DELAIDE CELITEI	Centers/Intra-agency		Conventional riwy only
DNP Sonios Contor			Conventional Hyay andy
DNR Service Center	State Govt. Service		Conventional Hwy only
Dog Trooks	Centers		Qualifying Critoria
Dog Tracks	Supplemental F & C	TEO 0 6 17 5	Qualifying Criteria
Donation Centers	Community wayfinder	TEOpS 2-15-6	
Downtown	Special	TEOpS 2-6-	
	Community wayfinder	50TEOpS 2-15-6	

Drive-In Theatres	TODS	SS 86.196	
Emergency Medical	Special	TEOpS 2-4-45.1 &	Emergency Room criteria
Treatment		TEOpS 2-4-45.2	
Emissions Testing Station	State Govt. Service Centers/Intra-agency		Conventional Hwy only
Environmental Center	Inter-agency Guidance Signs	Trans 200.03	Conventional Hwy only, also TEOpS 2-15-60
Events, Special	Special	TEOpS 2-15-25	uiso <u>12000 2-10-00</u>
Exhibition, Exposition	Supplemental F & C	120002 1020	Qualifying Criteria
Center	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Fairgrounds	Inter-agency		
Factories	Not permitted		
Ferries	Govt. Transportation		
Fish Hatcheries	Inter-agency		Conventional Hwy only
Food, includes logo	SIS, TODS	SS. 86.195 SS 86.196	
Forest boundaries	Not permitted		
Forest Headquarters	Inter-agency		
Freight Terminals	Not Permitted		
Fuel (with logo)	SIS,	SS. 86.195	
	TODS	SS 86.196	
Game Farms	TODS		
Gas, (with logo)	SIS, TODS	SS. 86.195 SS 86.196	
Golf Courses	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Government Offices	State Govt. Service Centers		Also the State Capitol
Gun Clubs, Ranges	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Half-way Houses	Not Permitted		
Health Clubs	Not Permitted		
Heritage Tourism Sites	Program discontinued as of 12/1/13		Also TEOpS 2-4-52
Highway Departments	Not Permitted		
Highway Maintenance Facilities	Not Permitted		
Historic Buildings	Special or Inter-Agency		Could be Community wayfinder
Historic District / Historic	Special or	TEOpS 2-6-55	
Downtown	Community wayfinder	TEOpS 2-15-6	
Historic Neighborhoods	Not Permitted		
Historic Sites	Special or Inter-Agency		Conventional Hwy only
Historic Society Sites	Special or Inter-Agency		
Historical Markers		TEOpS 2-4-40	
Horseback Riding	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Hospitals	Special	TEOpS 2-4-45.1	Emergency Room criteria
Hotel (See Lodging)	SIS, TODS, Guidance	T 000 00	-I TEO: 0.0 45.00
I la company of the Charles	Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Humane Society Shelter	Guidance Signs Community wayfinder	Trans 200.03 TEOpS 2-15-6	also <u>TEOpS 2-15-60</u>
Ice Arenas, community	Community wayfinder	TEOpS 2-15-6	
Industrial Parks	Supplemental C	120p0 2*10*0	
Jails	Not Permitted		
Jurisdictional Boundary Signs	Information	TEOpS 2-1-41	
Kennels	Not Permitted		
Lake, River, Stream	Information	TEOpS 2-4-55	
Libraries	Community wayfinder Guidance Signs	TEOpS 2-15-6 Trans 200.03	alsoTEOpS 2-15-60
Lacal Davis	Community wayfinder	TEOpS 2-15-6	aiso <u>1 LOp3 2-10-00</u>
Local Parks		1	
	Inter-agency	CC 96 10F	
Lodging (with logo)	Inter-agency SIS	SS. 86.195 SS. 86.196	
Lodging (with logo)	Inter-agency SIS TODS	SS 86.196	also TEOnS 2-15-60
	Inter-agency SIS	SS. 86.195 SS 86.196 Trans 200.03 SS. 86.195	also <u>TEOpS 2-15-60</u> also TEOpS 2-15-4

Malls	Not Permitted		-
Marinas (Public)	Inter-agency		Qualifying Criteria
Marinas (Privately owned)	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Memorial Facilities	Information	SS. Chapter 84	Legislated
Mental Facilities (Public)	Not Permitted	CC. Chapter or	Logiciated
Military Academies	Community wayfinder	TEOpS 2-15-6	
Military Bases, Major	Inter-agency	120p0 2 10 0	
Mobile Home Parks	Not Permitted		
Motel (See Lodging)	SIS, TODS, Guidance		
Motor (Coo Loaging)	Signs	Trans 200.03	also TEOpS 2-15-60
Museums	Supplemental F & C		Could also be Community Wayfinder
	TODS,	SS 86.196	,
	Guidance Signs	Trans 200.03	
National Forest boundaries	Not Permitted		Off R/W only
National Historic Landmark	Inter-agency		Could also be Historical Marker Guide
			Signs (TEOpS 2-4-40)
Neighborhood Watch	Special	ss. 66.0429(2)	ss. 86.19 & TEOpS 2-4-45.3
3	'	ss. 60.23(17m)	
NEXT (n) EXITS	Information		Primary signing, freeway only
Nursing Homes – Private	Not Permitted		See County Institutions
Office Buildings	Not Permitted		See Government Offices
Orchards	TODS	SS 86.196	-
Park & Ride Lots	Govt. Transportation		
Parks, State/county/local	Inter-agency		Or Community wayfinder
Parking Lots, municipal	Community wayfinder	TEOpS 2-15-6	- , -,
Parking Restrictions	Special Special	ss. 349.13	MUTCD 2B.41
. a.i.i.g . teeareae.ie		TEOpS 2-2-41	<u></u>
Pharmacy	Not Permitted		
Police Stations	Community wayfinder	TEOpS 2-15-6	
Population Signs	Information	TEOpS 2-1-41	
Ports	Supplemental F & C	TEOPO Z T TT	Great Lakes Shipping only
Post Offices	Community wayfinder	TEOpS 2-15-6	Grout Earlos Gripping Grily
Power Plants (utilities)	Not Permitted	TEOPO E 10 0	
Preserves, Nature/Wildlife	Not Permitted		See Wildlife Refuges &
Troodivoo, reacaro, vinamo	Trot i cimitod		Watchable Wildlife
Prisons	Inter-agency		Conventional Hwy only
Private Camps	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Public Access, lake/river	Inter-agency	114110 200.00	4100 <u>12000 2 10 00</u>
Race Tracks	Supplemental F & C		Qualifying criteria
Rail Passenger Stations	Govt. Transportation		Amtrak only
Trail 1 docorigo: Otationo	COVI. Transportation		7 und die only
Recreation Trails		TEOpS 2-15-15	
1. Corcation mails	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Recycling Centers	Community wayfinder	TEOpS 2-15-6	12000 2 10-00
Rehabilitation Centers	Not Permitted	1 LOPO Z-10-0	
Religious Camps	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Religious Worship	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Research Facilities	Guidance Signs Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Research Facilities Resorts	TODS.	SS 86.196	ais0 <u>1 EUp3 Z-13-00</u>
17090119	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Restaurants	SIS, TODS, Guidance	114115 200.03	aisU <u>1 EUp3 Z-13-00</u>
restatiants	Signs	Trans 200.03	also TEOpS 2-15-60
Retirement Facilities	Not Permitted	114115 200.03	aisU <u>1 EUp3 Z-13-00</u>
River, Lake, Stream	Information	TEOpS 2.4.55	
Sanitariums (Public)	Community wayfinder	TEOpS 2-4-55 TEOpS 2-15-6	
Samanums (Public)	Supplemental C	1 EOp3 2-13-0	
Schools High Middle		TEOpS 2 45 6	
Schools, High, Middle,	Community wayfinder	TEOpS 2-15-6	also TEOnS 2 15 60
Elementary	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Scientific Experiment	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
(public owned)	Cuidenes Cimas	T 200 02	-l TFO=0 0 45 60
Seminaries	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Service Organization	Not Permitted		Face and the Control
Sheriff Freeway Patrol	Inter-agency		Freeways Only
Substations	0	T 000 00	-I TFO: 0.0 45.00
Shooting Ranges	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>

0	111.15		
Shopping Centers	Not Permitted		
Ski Areas, Downhill	Inter-agency		
Skiing – Cross Country Trails	Inter-agency		Conventional Hwy only, For trailheads only
Snowmobile Trails (named)		TEOpS 2-1-50 TEOpS 2-15-15	
Stadiums	Supplemental F & C		Qualifying criteria
State Forest / State Parks	Not Permitted		
Boundaries			
State Forest / Parks HQs	Inter-agency		
State Historical Markers		TEOpS 2-4-40	
State Historic Sites	Supplemental or Interagency		Operated by WI Historical Society
State Patrol HQs	Intra-agency		
State Trails	Inter-agency	TEOpS 2-15-15	
Subdivisions	Not Permitted	TEOPO E 10 10	
Supper Clubs	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Swimming Pools &	Community wayfinder	TEOpS 2-15-6	120pc 2-10-00
Natatoriums			1 750 00 45 00
Synagogue	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Taverns	Not Permitted		
Technical College	Supplemental F & C		Qualifying criteria
Theaters, Live	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Theatres, Movie	Not Permitted		
Tourist Information Centers		TEOpS 2-6-35	County or Local
Tourist Oriented Directional	TODS category	ss. 86.196,	
Signs		Trans 200.08	
Township Boundary	Not permitted	TEOpS 2-4-60	
Trails, Recreation		TEOpS 2-15-15	
	Guidance Signs	Trans 200.03	also <u>TEOpS 2-15-60</u>
Train rides (Entertainment)	TODS	SS 86.196	_
	Guidance Signs	Trans 200.03	also TEOpS 2-15-60
Train station	Govt. Transportation		See Amtrak & Rail Passenger Stn
Travel Information	Inter-agency		State Tourism
Tree City	Special / Not Permitted		
Tree Nurseries	Not Permitted		
Truck Stops, Truck Parking	SIS, TODS		
Tubing, River	TODS	SS 86.196	
TV/Radio Stations	Not Permitted		
Unincorporated	Information and/or	TEOpS 2-4-48	
Communities	Special		
Universities	Supplemental F & C		Qualifying criteria
UW Extension Offices	Not Permitted		
Vehicle Emissions Testing	State Govt. Service		Conventional Hwy only
Stations	Centers/Intra-agency		
Vehicle Registration	State Govt. Service Centers/Intra-agency		Conventional Hwy only
Veterans Cemeteries	1	TEOpS 2-15-20	
Veterans Centers	Inter-agency		
Veterans Memorials	Not Permitted		
Vocational Schools	Supplemental F & C		
Watchable Wildlife Area	Inter-agency		DNR designation
Wayfinder Signs	Community wayfinder	TEOpS 2-15-6	Ĭ
Welcome To	Not Permitted	TEOpS 2-1-41	
			Conventional Hwy only,
Wildlife Refuges	Supplemental C		
Wildlife Refuges		Trans 200.03	To Instructional Centers only
Wildlife Refuges Wineries	Guidance Signs	Trans 200.03 SS 86.196	To Instructional Centers only
Wineries	Guidance Signs TODS	Trans 200.03 <u>SS 86.196</u> Trans 200.03	
· ·	Guidance Signs TODS Guidance Signs	SS 86.196	also <u>TEOpS 2-15-60</u>
Wineries Youth Camps	Guidance Signs TODS	SS 86.196	

Any facilities not included in this listing, **shall** be considered non-qualifying and **shall not** be permitted.

Policy purpose and background begins on	page 7.
General guidance for freeway & expressway signing begins on	page 12.
General guidance for conventional highway signing begins on	page 16.
Specific guidance for signing in all categories begins on	page 18.
Community Destination (Wayfinder) Signs	page 18
Government Service Centers	page 19
Government Transportation Facilities	page 19
Guidance Signs	page 20
Information Signs	page 20
Inter-Agency Facilities	page 22
Intra-Agency Facilities	page 25
Special	page 25
Specific Information Signs (SIS)	page 26
Tourist Oriented Directional Signs (TODS)	page 27
Specific guidance for miscellaneous generator supplemental signing	
On freeways and expressways begins on	page 27
On conventional highways begins on	page 29
Methods for sign installation and cost reimbursement begin on	page 31

DEFINITIONS

<u>Freeways</u> are defined as divided highways with fully controlled access at interchanges only. Interstate highways are freeways with the interstate route designation.

<u>Expressways</u> are defined as divided highways with partially controlled access by a combination of interchanges, at-grade intersections, and driveways.

<u>Conventional highways</u> are defined s streets or roads other than freeways or expressways. They *may* be divided or undivided, two-lane or multi-lane, and access is available at intersections and driveways.

<u>Traffic generators</u> are defined as any facility, activity, or special point of interest which attract large numbers of people, the majority of whom are unfamiliar with the local area and/or access routes.

<u>Trailblazing signs</u>, in this context, are community destination signs or other directional guide signs that direct subsequent turns on local streets to reach a destination.

GENERAL PURPOSE AND GUIDELINES

Department Functions and Responsibilities

The Wisconsin Department of Transportation (hereinafter referred to as Department) has the primary responsibility to develop, maintain, and operate a state trunk highway system designed to move traffic from one destination to another in a safe, efficient, and expeditious manner. Erecting and maintaining highway traffic signs on the state highway system is a part of this responsibility.

Standards for the design and application of all highway traffic signs erected on public highways are specified in the MUTCD which, in turn, is required by statute to conform to national standards on highway signing. Refer to \$\frac{SS}{84.02(4)(e)}\$ and \$\frac{(f)}{N}\$, \$\frac{SS}{84.60(1)(a)}\$ and \$\frac{SS}{84.00(5)}\$.

Signing under permit is addressed in <u>Chapter Trans 200.03 Wisconsin Administrative Code</u>. Specific Information Signing (Logo), authorized pursuant to <u>SS. 86.195</u>, is addressed in Chapter <u>Trans 200.06</u>, Wisconsin Administrative Code.

The basic supposition of supplemental signing is that the facility or institution as a class is of interest and concern to a sufficient number of motorists to warrant special directional signing. It is also a basic assumption that the purpose of this signing is guidance and not advertising.

It is the purpose of these guidelines to describe all types of facilities and institutions for which signs may be

erected on State Highway right-of-way by state forces or under contract to the state. Conversely signs will not be permitted for any type of facility or institution not addressed herein.

Need for Signing Policy

The Highway Beautification Act of 1965, public law 89-285, placed severe restrictions on billboard advertising. Governor Lee S. Dreyfus issued an administrative order in 1981, requiring the Department to permit supplemental guide signs, directing to the University of Wisconsin campuses. Ever since, there has been a substantial demand on the Department to permit additional directional signs on highway rights-of-way. In order to respond to all sign requests in a fair and consistent manner, the Department recognized the need to establish a signing policy that addressed all aspects of highway signing while maintaining a safe and logical sequence of informational displays in the highway environment. This document supersedes all previous policy guidance on supplemental signing for public and private facilities.

Although the WMUTCD contains standards for design and application of traffic control devices, it does not contain specific criteria on the following subjects:

- (1) Allowable sign messages,
- (2) Qualifications which permit placement of highway signs for various facilities and/or activities, or
- (3) Priority (ranking) of the various sign groups on the basis of highway user needs which, in turn, should determine the selection process for sign installations.

These guidelines provide criteria by which to evaluate all highway signing requests in an equitable manner without penalizing the greater majority of highway users.

Human Factors

As vehicles move along a highway, each driver is confronted with many elements; the presence of other vehicles and pedestrians, roadway alignment and other design features, roadside signs and other obstacles, commercial development, wildlife, and adverse weather conditions. Any or all of these factors *may* affect highway safety, as well as the driver's ability to observe, assimilate, and react to pertinent highway sign messages

Studies of human behavior have shown that a driver can focus attention on only one thing at a time, but he can respond very rapidly to several stimuli. However, receiving too much information in a short time can adversely affect the driver's ability to process information effectively, causing what is known as information overload. Information overload is a condition in which the driver is unable to perceive and/or use the information displayed. When this condition occurs, the driver will shift attention from one source of information to another and *may* overlook important sign messages.

Considering the large number of highway elements confronting each driver, it is apparent that the amount of information which can be effectively conveyed by traffic signs, is limited. Therefore, a system for avoiding information overload must be established.

MUTCD References

As a general background, several pertinent paragraphs from the MUTCD, as adopted by Wisconsin, are enumerated below.

Section 1A.01 Purpose of Traffic Control Devices

Support:

The purpose of traffic control devices, as well as the principles for their use, is to promote highway safety and efficiency by providing for the orderly movement of all road users on streets and highways throughout the Nation.

Traffic control devices notify road users of regulations and provide warning and guidance needed for the reasonably safe, uniform, and efficient operation of all elements of the traffic stream.

Standard:

Traffic control devices or their supports shall not bear any advertising message or any other message that is not related to traffic control.

Support:

Tourist-oriented directional signs and Specific Service signs are not considered advertising; rather, they are classified as motorist service signs.

Section 1A.02 Principles of Traffic Control Devices

Support:

This Manual contains the basic principles that govern the design and use of traffic control devices for all streets and highways open to public travel regardless of type or class or the public agency having jurisdiction. This Manual's text specifies the restriction on the use of a device if it is intended for limited application or for a specific system. It is important that these principles be given primary consideration in the selection and application of each device.

Guidance:

To be effective, a traffic control device should meet five basic requirements:

- A. Fulfill a need;
- B. Command attention;
- C. Convey a clear, simple meaning;
- D. Command respect from road users; and
- E. Give adequate time for proper response.

Section 2D.02 Application

Support:

Guide signs are essential to direct road users along streets and highways, to inform them of intersecting routes, to direct them to cities, towns, villages, or other important destinations, to identify nearby rivers and streams, parks, forests, and historical sites, and generally to give such information as will help them along their way in the most simple, direct manner possible.

Section 2D.03 Color, Retroreflection and Illumination

Standard

Except where otherwise specified herein for individual groups of signs, guide signs on streets and highways shall have a white message and border on a green background. All messages, borders, and legends shall be retroreflective and all backgrounds shall be retroreflective or illuminated.

Historic downtown, State and National Historic Sites and Historical Marker signs shall have a white retroreflective message and border on a brown retroreflective background.

Section 2D.07 Amount of Legend

Support

The longer the legend on a guide sign, the longer it will take road users to comprehend it, regardless of letter size.

Guidance:

Guide signs *should* be limited to three lines of principal legend. Where two or more signs are included in the same overhead display, the amount of legend *should* be minimized. The principal legend *should* include only place names, route numbers, and street names.

Option

Symbols, action information, cardinal directions, and exit numbers *may* be used in addition to the principal legend where sign space is available.

Section 2E.02 Freeway and Expressway Signing Principles

Support:

The development of a signing system for freeways and expressways is approached on the premise that the signing is primarily for the benefit and direction of road users who are not familiar with the route or area. The signing furnishes road users with clear instructions for orderly progress to their destinations.

Section 2E.03 General

Support:

Signs are designed so that they are legible to road users approaching them and readable in time to permit proper responses. Desired design characteristics include: (a) long visibility distances, (b) large lettering and symbols, and (c) short legends for quick comprehension.

Standard:

Standard shapes and colors shall be used so that traffic signs can be promptly recognized by road users.

(End of MUTCD references)

Signing Priorities

Basic concepts of traffic engineering recognize that the primary function of traffic control signs is to warn, regulate, and guide traffic. Sign spacing and the amount of information displayed have an impact on the driver's ability to read and respond to sign messages in an expected, predictable manner.

Accordingly, traffic control signs on the highway are primarily intended to enable drivers to react promptly, naturally, and properly to the traffic and design conditions encountered; to advise of the regulations and use of streets and highways; to warn of potential roadway hazards; and to provide guidance to major destinations.

Secondary functions of traffic control signs are to advise drivers of various services normally required to complete an extended journey (emergency services, motorist services, public transportation), and of supplemental services, such as recreational facilities or points of interest.

Traffic control signs can be classified into eight basic sign groups. Following is the order of priorities for these sign groups, and a brief description of their specific function, as adopted by the national committees of the American Association of State Highway and Transportation Officials and the Institute of Transportation Engineers.

- Regulatory Signs Advise the driver of traffic laws or regulations concerning vehicle operation on the highway.
- 2. Warning Signs Advise the driver of unexpected highway conditions which require extra care in driving.
- Navigational Guide Signs Identify the route, or routes, that the driver should follow to complete a trip.
 Navigational guide signs indicate directions and distances to cities and to other destinations or regions.
- Emergency Services Signs Advise of and direct the driver to facilities providing emergency medical service
 or assistance. Such facilities include state enforcement agencies and hospitals providing outpatient
 emergency medical treatment.
- 5. Motorist Services Signs Advise of and direct the driver to basic services normally needed to complete a long trip (motor fuel, food, lodging, camping, tourist information centers, and rest areas).
- 6. Public Transportation Signs Advise of and direct the driver to facilities providing commercial passenger travel service (airports, park and ride lots, rail passenger stations).
- Traffic Generator Signs Advise of and direct the driver to activities, facilities, or special points of interest
 which attract large numbers of people, a majority of whom are unfamiliar with the local area and/or access
 routes.
- 8. General Information Signs Advise the driver of information that *may* be of interest, though not necessary for travel (municipal boundaries, landmarks).

Signing needs to be evaluated and signs installed in descending order of the priorities indicated as long as adequate space between signs is maintained, thus avoiding information overload and confusion to the driver.

It may be necessary to prioritize sign requests. An example of this situation would be where there are more qualifying traffic generators than can be accommodated under the established guidelines. In these circumstances, the several qualifying generators will be ranked according to which generator exceeds, by the greater percentage, the minimum criterion for signing. Those exceeding the warrants by the greatest percentage will be given priority. Where specific criteria are not applicable, those traffic generators closest to the intersection where signing is requested **shall** determine the priority for signing.

FREEWAY & EXPRESSWAY GUIDE SIGNING GENERAL POLICY CRITERIA & RESTRICTIONS

Guide signing can be divided into two basic categories: primary and supplemental. Each category is subject to various practical requirements.

Primary signing includes standard interchange and intersection signing, destination signs, distance signs, required motorist services signs, plus regulatory, warning, and route marker signs. This type of signing always takes precedence in the signing scheme of any intersection or interchange because it is directly related to the primary purpose of the intersection or interchange.

Supplemental freeway signing includes signing to places of lesser importance. Signing for traffic generators is considered secondary to primary signing needs. Highway signing is not intended for the purpose of advertising or promoting the facility, but to direct and guide traffic seeking that facility.

As stated in the MUTCD Section 2E-35:

Support:

Supplemental Guide signs can be used to provide information regarding destinations accessible from an interchange, other than places shown on the standard interchange signing. However, such Supplemental Guide signing can reduce the effectiveness of other more important guide signing because of the possibility of overloading the road user's capacity to receive visual messages and make appropriate decisions.

Guidance:

No more than one Supplemental Guide sign should be used on each interchange approach.

A Supplemental Guide sign (see Figure <u>2E-24</u>) should not list more than two destinations. Destination names should be followed by the interchange number (and suffix), or if interchanges are not numbered, by the legend NEXT RIGHT or SECOND RIGHT or both, as appropriate. The Supplemental Guide sign should be installed as an independent guide sign assembly.

Where two or more Advance Guide signs are used, the Supplemental Guide sign *should* be installed approximately midway between two of the Advance Guide signs. If only one Advance Guide sign is used, the Supplemental Guide sign *should* follow it by at least 245 m (800 feet). If the interchanges are numbered, the interchange number *should* be used for the action message.

States and other agencies *should* adopt an appropriate policy for installing supplemental signs using "The AASHTO Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways." In developing policies for such signing, such items as population, amount of traffic generated, distance from the route, and the significance of the destination *should* be taken into account.

Standard

Guide signs directing drivers to park and ride facilities shall be considered as Supplemental Guide signs (see Figures 2E-25).

(End of MUTCD reference)

Placement of supplemental guide signs for a traffic generator **shall** be limited to the nearest freeway or expressway. Signing which would require a motorist to travel on the crossroad beyond another state highway and/or through a community **shall not** be permitted.

Supplemental signs **shall not** be permitted in advance of a system interchange connecting two freeways in which all legs or roadways are declared freeways.

The minimum spacing between guide signs *should not* be less than 800 feet on freeways and expressways (see Figure 1 on page 15). Actual sign installation will depend on whether there is sufficient longitudinal space to accommodate the new sign Installation without violating the minimum allowable 800 feet spacing between signs.

Along a freeway, only one supplemental guide sign **shall** be permitted in each direction of travel for a traffic generator. Signs for generators are to be located In advance of the interchanging roadway that provides the most direct and best route to the facility. In determining the most direct and best route, the Department will consider all relevant conditions including directness of route, speed of travel, length of travel, and ease of locating the facility.

Information relating to more than two traffic generators **shall not** be displayed on supplemental guide signs in advance of an interchange. Both traffic generators **shall** be shown on a single supplemental guide sign installation except where a traffic generator message is included as part of a major guide sign destination. The

traffic generator message on the major guide sign **shall** count as one of the two acceptable signs, but an additional sign installation *may* be allowed in such cases.

In the event that there are more than two qualifying facilities, the two facilities that generate the greatest need for providing directional information to motorists **shall** have signs displayed. In determining which signs are most necessary, the Department will consider such factors as the amount of traffic generated, distance from the freeway exit, and ease of locating the facility. If a quantitative comparison is needed, the Principal Destination formula in <u>TEOpS 2-15-5</u> may be used, substituting comparable attendance or enrollment figures for the population.

TABLE 1

GENERAL QUALIFYING CRITERIA FOR SIGNING TRAFFIC GENERATORS ON FREEWAYS OR EXPRESSWAYS

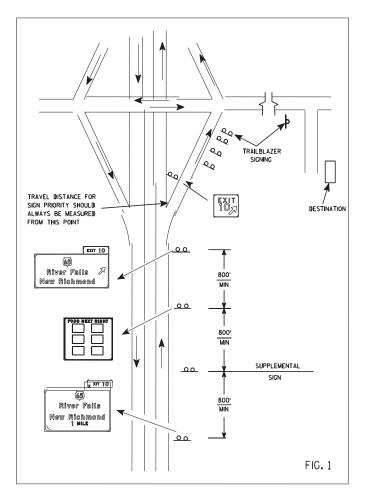
		EXI KEGGWATO			
TYPE OF	SPECIFIC CRITERIA	POPULATION OF METROPOLITAN AREA			
GENERATOR					
		Major ¹	Urban	Rural	
		OVER 500,000	50,000-500,000	Under 50,000	
Colleges,	Minimum Campus	2,500	1,000	1,000	
Universities,	Enrollment ²				
Vocational,	Maximum Distance	2	8	12	
Technical & Adult	From Interchange (mi.)				
Education Colleges	. ,				
Multipurpose	Minimum Annual	300,000	200,000	100,000	
Arenas, Auditoriums,	Attendance				
Fairgrounds,	Minimum No. of Seats	6,000	5,000	4,000	
Museums,	(If Applicable)				
Race Tracks,	Maximum Distance	2	5	7	
Stadiums, & Zoos.	from Interchange (mi)				

¹ Major Metropolitan Area is defined as within Milwaukee County.

Information relating to traffic generators **shall not** be displayed on a supplemental guide sign until signing has been installed along the interchanging and/or intersecting minor roads to adequately direct the motorist from the freeway exit or intersecting road to the facility. (See <u>SUBSEQUENT TRAILBLAZING SIGNING</u> in **PART 5**.)

For additional specific criteria, see PART 6 and PART 7.

² Campus enrollment is defined as the total number of full and part-time students that physically attend classes on the specific campus site.



CONVENTIONAL HIGHWAY GUIDE SIGNING GENERAL POLICY CRITERIA & RESTRICTIONS

- 1. All specific WisMUTCD requirements must be met in all situations.
- Location and placement of all signing is dependent upon the availability of longitudinal spacing (200 feet desirable, 100 feet minimum) with respect to existing traffic control devices.
- 3. A significant portion of the traffic volume generated by the facility must be drivers who are unfamiliar with the local area and/or access routes to the facility. The adverse effects on highway operations created by motorists seeking a facility without guide signing will also be taken into consideration.
- 4. In designing signs and selecting locations for sign installation on state highways, the department retains the authority to specify message content (including abbreviations), size of sign, sign location, and combination of message, in accordance with standards for acceptable signing practice. The department also retains the authority to deny requests for signing where it deems acceptable standards cannot be met, including locations where other supplement al signs are already in place.
- 5. Signing for a specific traffic generator:
 - a. Shall be limited to a maximum of four signs on state trunk highways

- b. Shall be installed only at an intersection that gives the best, most direct access to the traffic
- Shall not be installed at more than one intersection for each direction of traffic on a state trunk highway, but not necessarily at the same intersection for both directions.
- 6. Signing will normally not be permitted if the establishment is readily visible from the state trunk highway.
- 7. An on-premise sign identifying the facility is required. A sign may be installed on the highway fronting a facility if the on-premise sign is not feasible due to terrain-related visibility.
- Supplemental signs and/or trailblazing signs shall not be permitted at an intersection from one state highway to another state highway.
- Placement of supplemental guide signs for a traffic generator shall be limited to nearest state highway. Signing which would require a motorist to travel on the crossroad beyond another state highway and/or through a community shall not be permitted.
- 10. Facilities must be open a minimum of five days a week, including normal business hours.
- 11. The traffic generator must be located within the distance noting in Table 2 from the highway intersection at which signing is requested, unless a different distance is noted in other specific criteria.
- 12. Signing for a seasonal generator shall be covered, removed, or overlaid with a "CLOSED" plaque during the off-season.
- 13. When two or more qualifying facilities are affiliated with the same agency or institution and share a common access, only one specific name will be permitted on the sign to identify the conglomerate.
- 14. A facility may, at any time, request that a sign erected under these guidelines be removed and the department will arrange for its removal.

TABLE 2. General Qualifying Criteria for Signing Traffic Generators on Conventional Highways

TYPE OF GENERATOR	SPECIFIC CRITERIA	POPULATION OF METROPOLITAN AREA			REA
		Major¹ Over 500,000	Urban 50,000 – 500,000	Urban 20,000 – 50,000	Rural Under 20,000
Colleges, Universities,	Minimum Campus Enrollment²	2,500	750	500	500
Vocational, Technical & Adult Education Colleges	Maximum Distance from Intersection (mi.)	2	8	12	15³
All Other Traffic Generators	Minimum Annual Attendance	150,000	100,000	50,000	20,000
	Minimum No. of Seats (if applicable)	3,000	2,500	2,000	2,000
	Maximum Distance from Intersection (mi.)	2	7	10	15³

Subsequent Trailblazing Signing

Appropriate local road signing to guide motorists to a facility which will be signed from a State Highway or freeway is the responsibility of the facility and the local road authority.

Information relating to traffic generators shall not be displayed on a supplemental guide sign until signing has been installed along the interchanging and/or intersecting minor road and other roads to adequately direct the motorist from the freeway exit or intersecting road to the facility. In determining whether there is adequate signing to direct the motorist from the State Highway to the facility, the Department will consider such factors as the directness of the route, the distance involved, and the environment in which the signs are installed.

These signs, used only on non-freeways, are to be placed at sufficiently frequent intervals to adequately guide and reassure motorists. A trailblazing sign with the appropriate arrow shall be placed in advance of each intersection where the route changes from one highway to another or where there may be confusion as to the direction, which the route takes.

¹Major Metropolitan Area is defined as within Milwaukee County.
² Campus enrollment is defined as the total number of full and part-time students that physically attend classes on the specific campus site.

³The distance designated, or half the distance to the next parallel State Trunk Highway, whichever is greater.

The Department *may* issue a written permit for trailblazing signing on a conventional State Highway to a qualifying traffic generator, which has been signed from a freeway or expressway exit ramp. Subsequent trailblazing signing **shall not** be erected on a State Trunk Highway without such written authority.

Supplemental signs and/or trailblazing signs **shall not** be permitted through a system interchange from one freeway to another or at an intersection from one conventional State Highway to another conventional State Highway.

CATEGORIES & SPECIFIC CRITERIA

The following are categories and relevant information regarding directional and informational signs permitted on the state trunk highway system. References are made to authorization in the statutes, administrative rules, MUTCD, and other subjects in the TEOpS. For each type of sign listed earlier, there is a category below, a TEOpS reference, and/or a notice that the sign is not permitted.

Community Destination (Wayfinder) Signs

These signs are installed, owned and maintained by the community. They direct to area destinations such as Downtown, or Historic District, and individual destinations such as City Hall, Convention Center, museums, and local parks. The individual destinations are generally publicly owned and operated for public use or privately owned non-profit and open to the public. Complete guidance is in <u>TEOpS 2-15-6</u>.

Government Service Centers

State agencies *may* request signs to be installed on state trunk highways to direct traffic to certain service centers. This policy pertains only to state agencies. Local agencies are not included since local agencies generally serve local traffic and the need is not as significant.

Signs *may* be permitted on a state highway only when the service center is not located directly on the state highway system; signs will not be permitted on the state highway system when extensive trail blazing would be required or when guidance *may* be reasonably provided to the service center using street names and addresses.

No signs will be permitted on freeways or expressways.

Signs *may* be allowed at only two intersections of the state trunk highway system with county or local roads for any service center or complex of service centers.

Sign messages must be approved by the department and signs *may* only be installed under the direction of the department.

Service centers are those governmental offices whose primary purpose is to provide direct customer service to the public. Service centers do not include those offices that are predominantly administrative or serving internal agency operations. The extent of external customer traffic will be considered in determining eligibility for service center signs.

The service center requesting the sign is responsible for all costs related to those signs which are incurred by the department.

This guidance is premised on the view that only a select number of locations will qualify for signs. *Should* the number of signs allowed under this guidance adversely affect the safe and efficient operation of the state highway system, signs *may* be further restricted.

Government Transportation Facilities

Guide signs are Department funded and installed on freeways and conventional highways.

Major Airport

The facility must provide regularly scheduled commercial passenger flights and be located within 15 miles of the freeway or expressway, or within 5 miles of a conventional state trunk highway. Signing to General Mitchell International Airport and Austin Straubel International Airport shall be evaluated as a special case.

Public Airport, General Aviation

The facility must be classified as a Large General Aviation Airport or Medium General Aviation Airport, as listed in the Wisconsin State Airport System Plan that is published by the Wisconsin Department of Transportation, Bureau of Aeronautics. The General Aviation airport **shall** be located within 15 miles of the freeway or expressway, or within 5 miles of a conventional state trunk highway.

Park & Ride Lots

The facility must provide free parking, be approved by the Department, and be located within ½ mile of the state trunk highway.

Ports and Harbors

The port or harbor facilities must serve commercial Great Lakes shipping and be located within 10 miles of the freeway or expressway, or within 5 miles of the conventional state trunk highway.

Amtrak Passenger Stations

Facility must provide regularly scheduled intercity passenger service, protection for passenger comfort, public parking, and be within 5 miles of the state trunk highway.

Ferries

Facility must provide regularly scheduled passenger service, protection for passenger comfort, public parking, and be within 5 miles of the state trunk highway.

Guidance Signs

Sometimes called arrow boards, guidance signs are only permitted on conventional state highways or expressway approaches to at-grade intersections. As prescribed in the Wisconsin Administrative Code Chapter Trans 200, these narrow horizontal sign panels *may* bear the names of, and direct to:

- Resorts,
- Hotels,
- · Places of public entertainment or instruction,
- Any place of religious worship,
- · County institutions,
- Scientific experimental locations for the furtherance of agriculture, science or art.

The term "entertainment" in this case does not include nightclubs, taverns, or similar establishments.

The regions *may* issue a permit; there is no permit fee, and installation **shall** be by the requestor's choice of a WisDOT approved signing contractor or county signing crew. Detailed department guidelines and the permit application Form DT1903 are contained in <u>TEOpS 2-15-60</u>.

Information Signs

Information signs *may* be permitted or installed by the Department to identify geographic features and/or provide information to the traveling public. Qualifying geographic features are those found on the official state highway map

The following specific guidelines **shall** be applied to these individual signs.

- City or village population signs limit signs may be installed and maintained by the Department in accordance with TEOpS 2-1-41.
- County Line signs **shall** be installed by the Department on all state highways at or near the county line. No other signs **shall** share the supports.
- Lake, River or Stream signs may be installed and maintained by the Department in accordance with <u>TEOpS</u> 2-4-55.
- Memorial Facilities signs shall be installed and maintained by the Department in accordance with <u>Chapter</u> 84 of the State Statutes.
- NEXT (n) EXITS signs may be installed and maintained on freeways by the Department, upon request by an
 incorporated city or village being appropriately served by two or more consecutive exits.
- Street Name Signs may be independently installed and maintained on the STH right-of-way by the
 municipality with jurisdiction over the side road or crossroad.
- Unincorporated Community signs may be installed and maintained by the Department in accordance with TEOpS 2-4-48.
- Advance Crossroad Name signs may be installed and maintained by the Department in accordance with TEOpS 2-4-50.

Inter-Agency Facilities

Signs *may* be permitted on the basis of agreements with other state, federal, and county agencies, such as state and county historical societies, the Department of Natural Resources, and Department of Tourism. In most cases, the Department of Transportation will arrange for sign installation and maintenance and request reimbursement. Agreements and permits are subject to the department's evaluation and approval based on the following specific requirements.

- Boat landings; public access to lakes & rivers
 - o Conventional highways only.
 - No attendance criteria.
 - A sign shall not be permitted unless the access point is located on a road that is sufficiently improved so that a passenger car can use the road without being scratched, dented, or otherwise damaged.
 - Additional criteria:
 - Maximum distance from state trunk highway intersection: 2 miles
 - Parking provided at access site
 - Gravel surface (or better) at access site
 - Improved boat-launching ramp
- · Campgrounds, public
 - Conventional highways only
 - No attendance criteria
 - Signing may be permitted on conventional highways only, subject to all other general criteria applicable to each facility and location
 - Additional criteria:
 - Public-owned and operated campgrounds may be signed if they have a minimum of 50 campsites, adequate toilet facilities, and safe drinking water
 - Only requests from the public agency owning the campground shall be considered
 - Campgrounds that are a part of a national, state, county, or local park shall not be signed separately, but signing may be considered for the park
 - Privately-owned camping facilities may qualify for signing under the Specific Information Sign (SIS), Tourist-Oriented Directional Sign (TODS)
 or Trans 200 Guidance Sign programs
- Conservation or environmental centers
 - Supplemental signing may be permitted on conventional highways, subject to the general criteria applicable to each facility and location and the following additional criteria:
 - Provide on-site, off-street parking for minimum 50 vehicles
 - Provide educational programs and/or audio/visual presentations
 - Centers that are part of a national, state, county, or local park or forest shall not be signed separately, but signing may be considered for the park or forest headquarters entrance
- Corps of engineering facilities (such as lock and dam sites)
 - Conventional highways only
 - No attendance criteria
 - Signing may be permitted on conventional highways only, subject to all other general criteria applicable to each facility and location
 - Additional criteria:
 - Must provide picnic and park facilities
 - Must provide viewing provisions for the public
 - Must provide parking for 25 vehicles or more
- Fairgrounds, state and county

Supplemental signing *may* be permitted on freeways or conventional highways, subject to all the general criteria applicable to each facility and location

- Fish hatcheries
 - Conventional highways only
 - No attendance criteria
 - Signing may be permitted on conventional highways only, subject to all other general criteria applicable to each facility and location
 - Additional criteria:
 - Must be state-owned facilities
 - Must provide visitor accommodations
- Forest headquarters
 - No attendance criteria

- Supplemental signing may be permitted on freeways or conventional highways, subject to all other general criteria applicable to each facility and location
- - Provide on-site, off-street parking for minimum 50 vehicles
 - Provide educational programs and/or audio/visual presentations
- Only requests from the public agency managing the forest shall be considered
- Historic sites
 - Conventional highways only 0
 - No attendance criteria
 - Sings on freeways or conventional highways may be permitted for state historical sites operated by the Wisconsin Historical Society, subject to all other general criteria applicable to each facility and location
- Institutions, county (publicly-owned nursing homes)
 - Conventional highways only
 - No attendance criteria
 - Signing may be permitted on conventional highways only, subject to all other general criteria applicable to each facility and location
- Marinas (publicly-owned)
 - Signs on freeways or conventional highways may be permitted for marinas, subject to all other general criteria applicable to each facility and location
 - Additional criteria:
 - To qualify for freeway signs, the marina **shall** have a minimum of 500 boat slips
 - To qualify for conventional highway signs, the marina **shall** have a minimum of 125 boat slips
- Military bases, major
- Signs may be permitted to Fort McCoy, Volk Field, and Camp Williams
- National historic landmarks
 - Signs may be permitted for freeways, expressways and conventional highways, subject to all other general criteria applicable to each facility and location
 - Additional criteria:
 - The site **shall** be a documented national historic landmark that is officially on the listing for National Historic Landmarks in Wisconsin designated by the secretary of the U.S. Department of the Interior (www.nps.gov/nhl/find/statelists/wi/WI.pdf)
 - Only historical sites are eligible, not individual buildings
 - A historical site is comprised as a complex of buildings or an entire district that is a documented national historic landmark
- Parks, national state, and county freeway
 - Supplemental signing may be permitted, subject to the general criteria applicable to each facility and location
 - No annual attendance criteria
 - Signing may be erected for state parks with the Department of Transportation and the Department of Natural Resources mutually agreed upon. The following shall be provided as a minimum:
 - Off-highway parking Safe drinking water

 - Toilet facilities
 - 50 camping sites
 - Swimming
 - Handicapped-accessible camping and picnic areas
 - State parks shall also offer other special attractions, such as skiing, nature trails, improved hiking trails, interpretive centers, vistas and overlooks, or be of statewide historical significance
 - Signs directing to National, County and local parks may be permitted on freeways or conventional highways if the criteria applicable to state parks are satisfied and the ownership agency and operating authority has requested the signing.
- Parks, Conventional highway
 - Supplemental signing may be permitted, subject to the general criteria applicable to each facility 0 and location
 - No annual attendance criteria
 - Signing may be erected for state parks with the Department of Transportation and the Department of Natural Resources mutually agreed upon. The following shall be provided as a

minimum:

- Off-highway parking
- Safe drinking water
- Toilet facilities
- Handicapped-accessible picnic areas
- State parks should also offer other special attractions, such as camping, swimming, skiing, nature trails, improved hiking trails, interpretive centers, vistas and overlooks, or be of statewide historical significance
- Signs directing to National, County and local parks may be permitted on freeways or conventional highways if the criteria applicable to state parks are satisfied and the ownership agency and operating authority has requested the signing.
- · Prisons, federal/state
 - o Conventional highways only
 - No attendance criteria
 - Signing may be permitted on conventional highways only, subject to all other general criteria applicable to each facility and location
- Sheriff freeway substations
 - Signs on freeways may be permitted for county sheriff freeway substations
 - County sheriff's office shall have unique statutory authority for patrolling the freeway system to qualify for signage. Presently, only Milwaukee County has this statutory authority.
- Ski areas, downhill
 - No attendance criteria
 - Signs on freeways or conventional highways may be permitted for downhill ski areas, subject to all other general criteria applicable to each facility and location
- Travel information, state
 - No attendance or usage criteria
 - Subject to other general criteria, state travel information stations may be signed under mutual
 agreement between the Department of Transportation and the Department of Tourism. As a
 minimum, the locations shall provide parking facilities and public restrooms.
- Veterans centers/facilities
 - No attendance or usage criteria
 - Signs on freeways or conventional highways *may* be permitted for veterans centers with hospitals providing major medical or outpatient services, subject to all other general criteria applicable to each facility and location
- Intra-agency

Signs are permitted under agreements with other divisions in the Department of Transportation, such as DMV and DSP. No reimbursement is required.

Special

This category addresses these specific types of signs which are described in other parts of the TEOpS or in other policies

- Downtown: the department permits downtown sign(s) at strategic freeway or expressway exit(s) into the city in accordance with <u>TEOpS 2-6-50</u>
- Historic downtown/district: the department permits historic downtown or historic district sign(s) at strategic freeway or expressway exit(s) into the city in accordance with <u>TEOpS 2-6-55</u>
- Business district: as an alternative to downtown, the department permits business district signs on conventional highways at main street intersections
- Emergency medical: standard hospital or emergency medical services signs are installed by the department on state trunk highways to direct to facilities which meet the qualifying criteria in TEOpS 2-4-45.1 and 2-4-48
- Unincorporated communities: the department may install signs directing to unincorporated communities in accordance with <u>TEOpS 2-4-48</u>
- Engine braking: WisDOT standard signs are permitted on conventional highway entrances to communities in accordance with <u>TEOpS 2-2-30</u>
- Events, special: the department may permit signs directing to special events in accordance with TEOpS 2-15-25
- Heritage tourism: program has been discontinued as of 12/1/13 in accordance with <u>TEOpS 2-4-</u>
- Neighborhood watch: approved signs are permitted within cities and villages under <u>State</u> <u>Statute 66.0429(2)</u>. Further guidance is provided in <u>TEOpS 2-4-45.3</u>
- Parking restrictions: no parking zones and seasonal or overnight parking restrictions may be

- signed by the department or cities and villages in accordance with <u>State Statute 349.14</u>. Sign messages *should not* attempt to detail complex parking ordinances. Further guidance is provided in MUTCD Section 2B.41 and TEOpS 2-2-41.
- Miscellaneous non-permitted: some municipalities desire various nonstandard promotional signs. Examples include, but are not limited to, CRIME STOPPERS, DARE COMMUNITY, MAIN STREET USA, TREE CITY, COMMUNITY RECYCLING, SERVICE CLUBS, WELCOME TO _____, and HOME OF THE _____. Such signs shall not be permitted on the state highway right-of-way under WisDOT jurisdiction. They may be displayed at or outside the right-of-way line.
- Special information signs (SIS)
 - References: <u>State Statute 86.195</u> and Administrative Code Trans 200.06. Specific information signs are only allowed on the highway segments listed in this statute.
 - Business signs are separately attached rectangular plates which show the brand, symbol, trademark, name or combinations of these for motorist services accessible from an approaching interchange or intersection. They are commonly called "logos" and are confined to five categories: fuel, meals, lodging, camping, and attractions.
 - Specific information signs are technically the blue rectangular sign panel on which the business signs are mounted along with directional information.
 - Interstate logos: Wisconsin is under contract to administer this signing program for the department. He contractor verifies the qualifications, and installs and maintains all signs.
 Application and annual fees are charged.
 - All inquiries, including damage reports, may be referred to Jordan VanGeffen at 1(844)496-9163 or visit the website.
- Tourist-oriented directional signs (TODS)
 - o References: State Statute 86.196, and Administrative Code Trans 200.08
 - These signs are blue panels in rural areas (outside urban area boundaries) on conventional state highways that are not under the SIS sign program. Businesses which make all or most of their sales to visitors or tourists may be eligible. Applications, installation, and maintenance should be arranged by the county, subject to the approval of the maintaining authority. Application and renewal fees are charged. These signs are not permitted on the freeway system.

SPECIFIC POLICY FOR SUPPLEMENTAL SIGNS ON FREEWAYS & EXPRESSWAYS

The document, *Guidelines for the Selection of Supplemental Guide Signs for Traffic Generators Adjacent to Freeways*, published in 2001 by the American Association of State Highway and Transportation Officials, has been used as the basis for WisDOT policy in order to be in substantial conformance with the national standards, required by Federal and State law. This AASHTO document is reprinted with permission in TEOnS 2-15-11

Supplemental guide signs, directing to municipalities, *may* be permitted, upon request, as provided for in <u>ss. 86.19(6)</u>, but subject to the other general policy criteria & restrictions in PART 4. Qualifying municipalities **shall** be incorporated cities or villages shown on the official State Highway map and **shall** be within 5 miles of the freeway exit. The municipality **shall** be billed for all costs of fabrication, installation, maintenance and removal. The Department **shall** specify the sign design and *may* arrange for fabrication, installation, maintenance and/or removal.

Signing for a municipality or traffic generator *should not* be displayed on a supplemental guide sign until signing has been installed at the ramp terminals and along the interchanging road and other roads as necessary to direct the motorist from the freeway exit to the municipality or traffic generator.

Signing for a seasonal generator *may* be displayed when warranted. Such signing **shall** be removed, covered, overlaid with a "CLOSED" plaque, or fitted with a "CLOSED" flip-panel during the off-season.

The cost of signs erected under this section of the guidelines, **shall** be segregated from other signs in order to properly invoice the municipality or facility to cover the cost of installation and maintenance of these signs. The cost of the installation **shall** include the cost of the signs, posts, mounting hardware, labor, vehicles and miscellaneous materials.

Sign installation and cost reimbursement methods are in PART 9.

If only one municipality or facility makes a request but others could qualify later, the initial facility will be invoiced for the total initial installation cost. The subsequent facility will be invoiced only for the additions to the existing installation. The facilities *may* agree between themselves to share the costs in a different

manner, but no such agreement **shall** involve the Department. (For example: The first facility *may* request the second to reimburse it for a portion of the post cost.)

Maintenance costs associated with these signs **shall** be shared equally by all destinations on the installation. Maintenance includes replacement of the signs when they wear out and the cost of repairing the signs in the case of damage, when that cost is not recovered from the person causing the damage.

A facility or municipality *may*, at any time, request that a sign erected under these guidelines be removed and the Department will arrange for its removal.

If a facility or municipality fails to pay any invoice within six months of billing, the Department will remove the sign.

In-Place Signing

- Conforming to Policy: Signs which are in place and meet all established provisions of this policy may
 remain in place until they have reached the end of their useful life, or are rendered useless by damage
 or vandalism. If desired, the sign(s) will be replaced, and the facility served by the sign shall pay the full
 cost of replacement.
 - Before replacing a sign when it wears out or is damaged, the Department will evaluate other requests for signing at the same location, selecting the request with the greatest priority among the requests. If there are no other requests, the Department will contact each facility on the sign to determine whether or not they wish their name retained and are willing to bear the replacement cost. The Department is not obligated to leave a sign in place after judging it to be worn out, merely because the facility is unwilling to pay for a replacement.
- Non-conforming Signs will be allowed to remain until the end of their useful life, or are rendered useless by damage or vandalism, or are removed under a sign replacement or highway reconstruction project. Prior to the removal of any non-conforming signs, the Region shall contact the Bureau of Traffic Operations to discuss potential political impacts and acceptable signing alternatives.
- 3. Sign Replacement Program: Periodically, the Department replaces traffic signs along a complete segment of a highway route, so that all devices are uniformly maintained and proper retroreflectivity is assured on all signs. When this activity occurs, supplemental guide signing to traffic generators will generally be included in the replacement program, and facilities will be billed for their particular sign costs.

Milwaukee Metropolitan Area: Specific Policy

Because of the numerous and often closely-spaced interchanges, the frequency of in-place primary signing, and the adequacy of route and str5eet identification signing already in place, supplemental signing is limited by these additional restrictions:

- 1. All supplemental signing—downtown loop:
 - Other than supplemental guide signing for National Major League Sports teams venues, signing for any other specific facility or generator (including educational institutions) **shall not** be permitted on the entire length of I-794, nor on any downtown freeway comprising a loop bounded by McKinley Avenue on the north, I-43 on the west, I-794 on the south and Lincoln Memorial Drive on the east. The only exceptions to these restrictions *may* be: LAKEFRONT, PORT OF MILWAUKEE, DOWNTOWN, or any large area within the loop boundaries which can be meaningful to the visitor and whose area name has broad community support (subject to Department approval). Signing for such large area(s) will be considered on the basis that it is a substitute for other exceptions named herein and in consideration of the other space restrictions cited in this policy. If a substitute is approved, it *may* be funded with Department funds. National Major League Sports teams venues *may* be permitted if they follow all other criteria as spelled out in this policy.
- 2. Medical facilities:

Signing to the Milwaukee Regional Medical Center (but not to individual facilities within the Regional Medical Center) will be permitted.

SPECIFIC POLICY FOR SUPPLEMENTAL SIGNS ON CONVENTIONAL HIGHWAYS

The basic supposition of supplemental signing is that the facility or institution as a class is of interest and concern to a sufficient number of motorists to warrant special directional signing. It is also a basic assumption that the purpose of this signing is guidance and not advertising.

Supplemental guide signs, directing to municipalities, *may* be permitted, upon request, as provided for in <u>ss. 86.19(6)</u>, but subject to the other general policy criteria & restrictions listed previously. Qualifying municipalities **shall** be incorporated cities or villages shown on the official State Highway map and **shall** be within 5 miles of the state highway intersection. The municipality **shall** be billed for all costs of fabrication, installation, maintenance and removal. The Department **shall** specify the sign design and *may* arrange for fabrication, installation. maintenance and/or removal.

Signing for a municipality or traffic generator *should not* be displayed on a supplemental guide sign until signing has been installed along the intersecting road and other roads as necessary to direct the motorist from the intersection to the municipality or traffic generator.

Signing for a seasonal generator *may* be displayed when warranted. Such signing **shall** be removed, covered, overlaid with a "CLOSED" plaque, or fitted with a "CLOSED" flip-panel during the off-season.

Only one supplemental sign designating traffic generators *may* be erected under this policy on the approach to an intersection, and the maximum number of facilities listed on the sign **shall** be three.

Actual sign installation will depend upon sufficient longitudinal space to accommodate the new sign without violating the minimum spacing between signs.

Signing on connecting highways **shall** be the responsibility of the respective local unit of government having jurisdiction. The provisions of this policy **shall not** be construed to be the policy for the signing on connecting highways.

The cost of signs erected under this section of the guidelines, **shall** be segregated from other signs in order to properly invoice the municipality or facility to cover the cost of installation and maintenance of these signs. The cost of the installation **shall** include the cost of the signs, posts, mounting hardware, labor, vehicles and miscellaneous materials, and *may* be based on average costs for a typical installation.

Sign installation and cost reimbursement methods are in PART 9.

If only one municipality or facility makes a request but others could qualify later, the initial facility will be invoiced for the total initial installation cost. The subsequent facility will be invoiced only for the additions to the existing installation. The facilities *may* agree between themselves to share the costs in a different manner, but no such agreement **shall** involve the Department. (For example: The first facility *may* request the second to reimburse it for a portion of the post cost.)

Maintenance costs associated with those signs **shall** be shared equally by all facilities in the installation. Maintenance includes replacement of the signs when they wear out and the cost of repairing the signs in the case of damage, when that cost is not recovered from the person causing the damage.

In-Place Signing

- (1) Conforming to Policy: Signs which are in place and meet all established provisions of this policy may remain in place until they have reached the end of their useful life, or are rendered useless by damage or vandalism. If desired, the sign(s) will be replaced, and the facility served by the sign shall pay the full cost of replacement.
 - Before replacing the sign when it wears out, the Department will evaluate other requests for supplemental signing at the same location (if any), selecting the sign with the greatest priority from among the requests prior to contacting a facility with the original sign to determine whether or not they wish the sign replaced and are willing to bear the cost. The Department is not obligated to leave a sign in place after judging it to be worn out merely because the facility is unwilling to pay for a replacement.
- Non-conforming Signs will be allowed to remain until the end of their useful life, or are rendered useless by damage or vandalism, or are removed under a sign replacement or highway reconstruction project. Prior to the removal of any non-conforming signs, the Region shall contact the Bureau of Traffic Operations to discuss potential political impacts and acceptable signing alternatives.
- 3. Sign Replacement Program: Periodically, the Department replaces traffic signs along a complete segment of a highway route, so that all devices are uniformly maintained and proper retroreflectivity is assured on all signs. When this activity occurs, supplemental guide signing to traffic generators will generally be included in the replacement program, and facilities will be billed for their particular sign costs.

METHODS FOR SIGN INSTALLATION AND COST REIMBURSEMENT

There are several methods that can be utilized by the regions for the installation and maintenance of signs for supplemental traffic generators. County forces *may* be used for the installation and maintenance of Type II

signs. The statewide open-end signing contractor *should* be used for all Type I signs and *may* be used for Type II signs also. Private individuals or facilities themselves **shall not** be allowed to install signs on WisDOT roadways.

The common methods for accomplishing sign installation are detailed below. The regions have the opportunity to work within these guidelines and select a method that best fits the region and/or situation.

Setting up a Professional and Technical Project ID (P & T ID)

When cost reimbursement is part of the permit agreement, the Region **shall** set up an individual P & T project ID to track all costs, which would include sign manufacturing, installation (either County or Contractor), subsequent maintenance and/or replacement, and any Region personnel field layout costs associated with the sign request. Under this method, if county crews install the signs, the signs **shall** be furnished by WisDOT. The Region *should* furnish the P & T project ID to the county to charge their time, fleet and material costs. WisDOT staff *should* stake the sign location(s).

If the statewide open-end contractor is utilized, it is expected that the contractor will furnish the signs. WisDOT will provide the sign fabrication detail to the contractor and field stake the location of the sign(s). Charge the P & T project ID for all sign manufacture, for county installation and/or contractor installation costs once invoices are received.

Permitting the County to Install a Sign Directing to a County Facility

This method would only be utilized if a county were to request a sign for one of their own facilities off the state trunk highway. WisDOT would permit the county to install the sign(s). If this option were utilized, WisDOT would field stake the sign location and *may* either provide a fabrication detail so the county can get the sign made or manufacture and sell the sign to the county. If WisDOT manufactures the sign for the county, the Region *should* utilize the Sales to Others Form (DT1668). The Region *should* fill out the form and send it to the Central Office Sign Mfg. Shop. The requestor will then be invoiced for the sign manufacture costs. This option would only be used for county facilities.

Signing for Government, State University Facilities

For these types of government facilities, the Region *may* elect to have them work directly with the county. If this option were utilized, WisDOT would field stake the sign location and provide a fabrication detail to the requesting agency. The requesting agency would then work directly with the county to get the sign(s) manufactured and installed. The county would direct bill all charges to the requestor.

WisDOT may manufacture the sign(s) also. If WisDOT manufactures the sign(s), the Region should utilize the Sales to Others Form (DT 1668 form). The Region should fill out the form and send it to the Central Office Sign Mfg. Shop. The requestor will then be invoiced for the sign manufacture costs.

Figure 2. REQUEST FOR GUIDE SIGN INSTALLATION ON STATE HIGHWAY (DT1332)

s	ign Requested For 🔲 Instit	ege/University ution icipality er:	
Name of Requesting Facili	ity or Municipality		
Street Address		City	Zip Code
Contact Person:		P	hone:
		E	mail:
ION MESSAGE With the	da a a tha airm dina at ta 2		
IGN MESSAGE or What o	_	SIGN LOCATIONS	
	PROPOSEL	SIGN LOCATIONS	
Hwy. Interchange or Intersection	Town/City/Village	County of	Traffic Direction at Proposed Sign Site
			bound on Hwy
Hwy. Interchange or Intersection	Town/City/Village	County of	Traffic Direction at Proposed Sign Site
Intersection			bound on Hwy
he requesting facility agree nd general signing policy p	rovisions attached to this app the facility represented above	nditions contained with blication, which is mad e. The requestor agree	in the Supplemental Guide Sign Policies e by the undersigned official under proper is to pay for installation costs and costs to if they become damaged, when the cost is
place the signs when they			
eplace the signs when they	fficial	Title	Date

2-15-4 Pictog

This guideline provides criteria for determining when pictographs *may* be allowed on supplemental traffic generator signs which qualify for a permit under <u>TEOpS 2-15-3</u> (Sign Categories and Policy for Directional Signing). The term "pictograph" is defined by the Federal Highway Administration as a pictorial representation used to identify a governmental jurisdiction, a governmental agency, a governmental approved university or college, or a branch of the military service. In general, the use of pictographs is limited to those conditions where an easily recognized, widely understood pictograph *may* add to the effectiveness of a standard text sign by providing a quick visual cue to drivers in need of guidance. This guideline establishes criteria for determining when pictographs *may* be used, and establishes standards for the type and design of pictographs in order to assure their effective use through consistent application. The guideline also is intended to prevent the inappropriate use of pictographs as a means of promoting or advertising destinations, as advertising on the right of way is not legal.

DEFINITIONS

<u>Freeways</u> are defined as divided arterial highway facilities that have full controlled access, by means of grade separation at interchanges only.

<u>Expressways</u> are defined as divided arterial highway facilities that have partial control of access and generally with grade separations at major intersections.

<u>Conventional highways</u> are defined as either divided or undivided roadway facilities that have no control of access with grade separations at intersections. These highways can be two lane or multilane facilities.

<u>Pictographs</u> are defined as a pictorial representation used to identify a governmental jurisdiction, a governmental agency, a military base or branch of service, a governmental-approved university or college, or a government-approved institution.

<u>Logos</u> are defined as a distinctive emblem or trademark that identifies a commercial business and/or the product or service offered by the business.

<u>Symbols</u> are defined as the approved design of a pictorial representation of a specific traffic control message for signs, pavement markings, traffic control signals, or other traffic control devices, as shown in the MUTCD.

POLICY

Pictographs may be used on supplemental traffic generator signs, provided that the following criteria are met:

- The supplemental traffic generator sign shall be approved for installation by meeting the criteria
 outlined in <u>TEOpS 2-15-3</u> (Sign Categories and Policy for Directional Signing). Central office approval
 shall be obtained for any pictograph requests.
- Pictographs shall only be allowed for guide signs that are listed below:
 - Colleges/universities
 - o Auto tour route (Great River Road, Lack Michigan/Superior Circle Tour)
 - Wayfinding signing
 - Airport signing
 - o Street name signs, including overhead
 - Military branch
- College and university pictographs shall be the official seal adopted by the educational institution.
 Pictorial representatives of college and university programs are not permitted.
- · Advanced street name signs shall not contain pictographs.
- Per an October 11, 2017 Official Ruling Letter from FHWA (2(09)-(136)I), federal government facilities (US Fish & Wildlife Service, National Park Service, US Forest Service) shall not contain pictographs.
- Auto tour route pictographs shall not be displayed on advance guide or exit direction signs. Auto tour
 route pictographs shall only be displayed on supplemental guide signs on freeways and expressways.
 For conventional highways, auto tour route pictographs shall be displayed on conventional route
- Military branch pictographs shall not be displayed on advance guide or exit direction signs. Military branch pictographs, related to military installations, shall only be displayed on supplemental guide signs.
- Commercial graphics for businesses **shall not** be used on community wayfinding signs, including within the pictographs.
- Wayfinding signing shall be approved for installation by meeting the criteria outlined in <u>TEOpS 2-15-6</u>.
- The pictograph shall fit within the sign face and should be placed to the left of the accompanying
 message. Whenever the addition of a pictograph requires a change in the size or shape of a sign, all
 costs of the change must be paid by the requestor.
- The maximum dimension (height or width) of a pictograph shall not exceed the size of the route shield
 on the guide sign. If the guide sign does not include a route shield, the maximum size of the pictograph
 (height or width) shall not exceed two times the height of the destination legend.

	Typical Sizes of Pictographs
Lettering Size on Sign	Pictograph Dimensions
6" upper case / 4 1/2" lower case	e 12" x 12"
8" upper case / 6" lower case	16" x 16"
10" upper case / 8" lower case	20" x 20"
13.33" upper case / 10" lower of	case 26" x 26"
16" upper case / 12" lower case	e 32" x 32"
20" upper case / 15" lower cas	e 40" x 40"

• Pictographs shall be retroreflective. Colors, arrows, and borders of the logos should meet the

requirements defined in TEOpS 2-15-6.

- Pictographs that resemble an official traffic control device shall not be used.
- The sign requestor **shall** pay for the manufacture, installation, and maintenance of all pictographs, including the sign(s) and posts. The actual method of pictograph installation will be left up to the discretion of each regional traffic section.
- Pictographs currently installed that do not meet the criteria in this policy will be allowed to remain in place until the end of their useful life. Useful life ends when the pictograph message no longer meets legibility or condition standards. Existing pictographs shall be removed prior to the end of their useful life when opportunities arise such as knockdown or damage, when other work is occurring nearby, or projects make removal practical.

2-15-5 Destinations on Signs

January 2018

GENERAL

The display of appropriate destinations on guide signs can be particularly helpful to drivers, regardless of the type of road or highway. It is the purpose of this policy to set specific standards and guidelines for the selection of destination names for various types of guide signs on each classification of highway. General guidance is provide din the following sections of the MUTCD.

Section 2D.37 Destination Signs (D1 Series)

Section 2D.36 Distance Signs (D2 Series)

Section 2E.07 Characteristics of Urban Signing

Section 2E.10 Amount of Legend on Guide Signs

Section 2E.12 Pull-Through Signs
Section 2E.13 Designation of Destinations

Section 2E.30 Interchange Guide Signs

Section 2E.33 Advance Guide Signs

Section 2E.35 Other Supplemental Guide Signs

Section 2E.36 Exit Direction Signs

Section 2E.39 Distance Signs

Section <u>2E.40</u> Interchange Sequence Signs

Section 2E.41 Community Interchanges Identification Signs

Section 2E.42 NEXT X EXITS Sign

DEFINITIONS

- Freeways are defined as divided arterial highway facilities that have full controlled access, by means of grade separation at interchanges only.
- 2. Expressways are defined as divided arterial highway facilities that have partial control of access and generally with grade separations at major intersections.
- Conventional highways are defined as either divided or undivided roadway facilities that have no control of access or grade separations at intersections. These highways can be two-lane or multi-lane facilities.
- 4. A major state trunk highway (STH) is defined as
 - a. A state highway operated as a freeway
 - b. A highway designated as part of the National Highway System, or
 - A state highway route or segment approved as such by the state traffic engineer, based on its character as a principal route for cross-state traffic, traffic between major cities in Wisconsin and adjacent states, or traffic from major cities to major northern resort areas.
- 5. A standard highway is defined as any conventional state or local highway which is not a major STH.
- Urban areas are defined as
 - a. An established urbanized area, based on the US Bureau of the Census and adjusted by metropolitan planning organizations and the DOT
 - b. Two or more contiguous cities and/or incorporated villages, or
 - c. A single city or incorporated village which is not contiguous with any other.
- 7. National control cities are Chicago, Milwaukee, Beloit, Rockford, Janesville, Madison, Wisconsin Dells,

La Crosse, Albert Lea, Eau Claire, St. Paul, Sheboygan, and Green Bay.

- 8. Regional Control Cities are defined as
 - a. Urban areas in Wisconsin or within 60 miles of the state line with a population in the most recent decennial census of 30,000 or more.
 - Other communities, such as Sturgeon Bay, Woodruff, Minocqua, and Lake Geneva, which are approved by the State Traffic Engineer based on their character as widely known tourism destinations, and
 - c. Urban areas on or north of Highway 64 with a population exceeding 3,500, and urban areas south of Highway 64 with a population exceeding 10,000.
- 9. Communities are defined as
 - a. Any urban area, or
 - b. An unincorporated village which is identified on the official state highway map and is not adjacent to or within an urban area.

PRINCIPAL DESTINATION CALCULATION

A Principal Destination is defined as a community served by a standard highway and located within 25 miles of a major state trunk highway, as measured along the standard highway, and having a location and population such that

$$\underline{Pp} \ge \underline{Dp}$$
 where \underline{Pc} \underline{Dc}

Pp = Population of Principal Destination (from official state highway map)

Dp = Distance in whole miles from the major STH to the Principal Destination

Pc = Population of the community closest to the major STH and in the same direction from it (from official state highway map)

Dc = Distance in whole miles to the closest community

If more than one community meets the above criteria, the community for which the term

$$\underline{Pp}$$
 \underline{Dp} is the greatest **shall** be selected. Pc \underline{Dc}

Notes: When measuring distances Dp and Dc, it is recommended that consistency be applied in what points are being measured to.

Where the through highway passes adjacent to or within the closest community, Dc will approach zero, and $\underline{\mathsf{Dp}}$ will approach infinity.

Do

Therefore, in this case, the closest community **shall** be the principal destination.

POLICY

On Hwy Intersecting		Standard STH	Major STH	Interstate Highway
Standard Highway	Ahead Destination	Next Community	Regional Control City (1)	(2)
	Crossroad Destination	Next Community	Principal Destination	Principal Destination
Major STH	Ahead Destination	Next Community	Regional Control City (1)	(2)
	Crossroad Destination	Regional Control City	Regional Control City	Regional Control City
Interstate Highway	Ahead Destination	Next Community	Regional Control City (1)	National Control City
	Crossroad Destination	National Control City	National Control City	National Control City

- If the major STH is constructed and signed as an expressway or freeway, an ahead destination is generally not displayed except as a pull-though sign at a system or directional interchange.
- An ahead destination is generally not displayed except as a pull-through sign at a system or directional interchange.

SPECIFIC SELECTION CRITERIA

- 1. On standard state trunk highways: Destination signs (D1 series) should be used on the standard state highway approach to a numbered interstate. If designated, the "ahead" destination shall be the closest community on the through route. The first choice of destination names for the interstate shall be the closest national control city in each direction. The first choice of destination name for other freeways shall be the closest regional control city in each direction.
 - a. If the intersecting route does not serve a national control city, then the regional control city, next community, or principal destination *may* be designated.
 - b. Unincorporated communities meeting the qualifying criteria in definition 9 *may* be displayed on destination signs (D1 series) on conventional state highways.
 - c. Unincorporated communities **shall not** be displayed on distance signs (D2 series) unless the community is designated a regional control city according to the definition 8b. However, they *may* be identified as unincorporated on the I2-3 name sign.
- 2. On major state trunk highways: Use regional control cities according to definition 8 and selected as follows:
 - a. Select urban areas meeting the criteria of definition 8a & 8b
 - b. If less than two meet the criteria of 8a or 8b, select urban area(s) meeting the criteria of 8c
 - c. If the distance between areas selected above exceeds 160 miles, select urban areas between them, which meet the criteria of 8c.

Unincorporated communities **shall not** be displayed on freeway or expressway exit signs, unless the community has been designated a regional control city according to the definition 8b.

- 3. **On interstate highways:** Use national control cities, except regional control cities or principal destinations *may* be selected as appropriate for intersecting highway destinations.
- 4. Urban areas with more than one city or village:
 - a. On highways which serve the largest city in the urban area, only the largest city **shall** be named and **shall** be considered to represent the entire urban area.
 - b. Destination signs **shall not** be erected within an urban area directing to a city or village within the same urban area, except:
 - On major state trunk highways, signs may direct to the central business district of the largest city
 - ii. On highways near the edge of urban areas, signs may direct to the largest city in the urban area which is served by the crossroad

iii. In bi-state urban areas, signs may direct to the largest out-of-state city.

5. Control cities beyond the end of a highway:

A national or regional control city located beyond the end of a highway *may* be considered to be served by that highway if the connecting route:

- a. Is of the same or higher classification, and
- b. Continues in the same general direction as the ending highway, and
- c. Carries considerable through traffic from the ending highway.

6. Bi-state urban areas:

In determining the population of an urban area, part of which is in Wisconsin and part of which is in an adjacent state, for the purpose of selecting regional control cities, the population of the in-state and out-of-state cities **shall** be added. Directional signs *may* name the largest Wisconsin city and/or the largest out-of-state city, as provided in criteria 4c(3) above.

7. Other supplemental guide signs:

Additional communities are allowed on other supplemental guide signs. Only one supplemental guide sign with cities/communities **shall** be allowed per interchange, maximum of two cities/communities per sign.

When opportunity presents itself (improvement project, refurbishment project, etc.), the destinations on primary and supplemental guide signs should be reevaluated to ensure conformance to this policy.

2-15-6 Community Wayfinding Signs

January 2015

PURPOSE

This policy sets the uniform, Wisconsin state standards for signs, which communities *may* install <u>by permit</u> on conventional State Trunk Highways under DOT jurisdiction to provide directional guidance to public facilities and traffic generators within the community.

The MUTCD Section <u>2D.50</u> provides guidelines and standards for Community Wayfinding signing. Substantial conformance of these signs to the MUTCD and DOT policy is required by state law. Poorly designed and/or cluttered guide signs will not meet these requirements and could adversely impact safety.

On local streets and connecting highways, local agencies have the authority to install destination signs for local attractions and generators. If there is deviation from state and national standards to the extent that highway signing would adversely affect driving behavior, local agencies *may* face liability problems.

Therefore this policy establishes the following to be applied to Community Wayfinding Signing on State Highways under DOT jurisdiction:

- 1. the qualifying criteria for Community Wayfinding Signing;
- 2. guidance on qualifying destinations or facilities;
- 3. clarification of sign design and installation standards, applicable to WisDOT
- 4. the application and permit process for roadways under WisDOT jurisdiction.

DEFINITIONS

Community Wayfinding Signs

These are the signs, allowed by permit, which are owned and maintained by the community and direct to

- 1. municipal area destinations such as Downtown, or Historic District,
- 2. individual destinations that are publicly leased or owned and operated for public use, such as City Hall, Convention Center, and local parks, or
- 3. Privately owned non-profit facilities open to the public, such as a local museum or ice center.

Trailblazing Signs

In this context, these are community destination signs that direct subsequent turns on local streets to reach the

destination.

Trailblazing (directional route signing) to state routes is the responsibility of WisDOT and will not be permitted on Community Wayfinding Signs.

POLICY FOR INSTALLATION ON STATE TRUNK HIGHWAYS

The Department will allow the local agency, by permit, to install and maintain community wayfinding signs on the right-of -way of the conventional state trunk highway system, subject to the destinations, design, location, and maintenance of the signs being reviewed and found satisfactory by the Department. These signs **shall not** be permitted on freeways or expressways.

WisDOT may fund the installation of wayfinding signs as part of a Community Sensitive Solutions project. For all Community Sensitive Solutions projects that include wayfinding signs, the sign design and locations **shall** be reviewed for conformity to WisDOT and MUTCD policies by the Region Traffic Operations. Wayfinding signs that are funded and installed as part of a Community Sensitive Solutions project **shall** be maintained by the community

This policy does not apply to banners or civic displays, which are addressed in TEOpS 13-12-1.

Qualifying Criteria for Community Wayfinding Signing Programs

Community wayfinding signs will not be permitted outside a readily apparent urban developed area, usually characterized by a reduced speed limit, nearby transition to curb and gutter, and dense residential and/or business development adjacent to the highway.

Geographical areas or districts within a community *may* be permitted Community Wayfinding Signing. Two or more adjacent communities in an urbanized area *may* coordinate a common signing program, but the department will issue separate permits to each individual municipality.

No countywide programs will be permitted.

The community must develop a Master Plan for Community Wayfinding Signing, which contains the following information:

- 1. A map of the community, including the city street/local road system, which clearly identifies:
 - a. Exact locations of destinations and attractions to be included in this signing program.
 - State trunk highway approaches to city street/local road intersections where signing is proposed.
 - c. Which destination(s) and attraction(s) are to be signed on each state trunk highway approach at each city street/local road intersection
 - d. City street/local road intersections where trailblazing signing is required to direct motorists to each facility.
- A concept design of a typical community wayfinding sign, which may include the city logo, a street name and up to a total of three destinations/attractions. A maximum of three destinations should be displayed on a sign.

The Master Plan **shall** be submitted to the WisDOT Regional Traffic Engineer for review. This submittal **shall** be initiated and coordinated by the community and **shall** identify one contact or lead person in the community, through which all Department correspondence and contact will be made.

If a community obtains DOT approval for Community Wayfinding Signing, no new requests for traffic generator signing, which would qualify for Community Destination Signs, will be approved within the community.

Qualifying Destinations or Facilities

Destinations or attractions must be of general interest to the traveling public and **shall not** be a retail, business or manufacturing center. The individual destinations **shall** be publicly leased or owned and operated facilities for public use or privately owned non-profit facilities open to the public.

Destinations which qualify for either Supplemental Traffic Generator signing or Community Wayfinding Signing,

- 1. should be included on the Community Wayfinding Signs,
- 2. may be on permitted supplemental signing,
- 3. but **shall not** be on both at the same intersection approach.

A specific destination **shall** only be displayed on one sign structure in each direction on a highway unless straight ahead signing is also approved by the Regional Traffic Engineer.

This type of signing shall not display advertising for a commercial product or service.

IH, USH or STH directional signage **shall not** be allowed on Community Wayfinding signs.

Sign Design Standards

Shape

The shape of the signs **shall** be rectangular and *may* have rounded corners. A rounded or other regular geometric shape on the top will be allowed to accommodate a logo.

Pictograph

Only one community pictograph *may* be incorporated in the top of the sign subject to WISDOT approval. If used, it **shall** be simple and easily recognizable. The height of the pictograph **shall not** exceed two times the height of the upper-case letters of the principal legend on the sign. For coordinated programs, a unique pictograph for each municipality *may* be used.

If a community name is to be displayed at the top of the sign panel, instead of or in addition to a pictograph, the lettering **shall** be of a size, font style and high color contrast for motorists to read at the posted speed.

All signs in a Community Wayfinding Signing program **shall** have the same format. If a community pictograph, and/or name, and/or street name, is to be used on any sign, it **shall** be used on all signs in the community program.

Pictographs for destinations and attractions **shall not** be permitted, since the traveling public will not recognize pictographs of local destinations.

Facing

Sign panel legends and backgrounds **shall** be reflective to meet the minimum standards of High Intensity sheeting.

Fluorescent reflective sheeting of any color shall not be permitted on these signs.

The sign shall not contain any animated or moving parts, flashing or moving lights, or flashing disks.

Color

Colors **shall** meet the standards for highway colors specified by the Federal Highway Administration. Color combinations **shall** have high contrast. Two-color combinations which *may* be used are:

- 1. White or yellow on blue, green or brown.
- 2. Blue, green, black or brown on white.
- 3. Red or orange on white, but not the reverse.
- 4. A third color, if used, must provide suitable contrast (i.e., not red on blue).

The background colors of orange, red, yellow, purple, or the fluorescent versions thereof, fluorescent yellow-green and fluorescent pink **shall not** be permitted on Community Destination Signs. One background color is preferred. A third color for the logo area *may* be used, or that area *may* be reversed in color. Color plaques or accents **shall not** be used under arrows or destination names. Lettering, arrows, and border **shall** be the same color.

Border

Border is optional. If used, it shall be plain, retroreflective, not decorative, and the same color as the letters.

Lettering & Sign Size

A minimum Series B font as specified in the Standard Highway Signs manual is preferred. A similar font is allowable, unless the style detracts noticeably from legibility.

The preferred letter size is 6" Upper Case/ 4 $\frac{1}{2}$ " Lower Case. In areas, where the posted speed is less than 35 mph, a minimum 5" Upper Case/ 3 $\frac{3}{4}$ " Lower Case or 5" Capital Letters will be allowed.

The resulting sign width **shall not** exceed five feet adjacent to a roadway posted at 35 MPH or above. The sign width **shall not** exceed four feet adjacent to a roadway posted at 30 MPH or below.

Arrows

Arrows **shall** be as big in dimension as the lettering, and the same color as the adjacent lettering. The arrows **shall not** have encircling accents, or contrasting mini-backgrounds.

Arrows shall be left of the message for left destinations, and right of the message for right destinations.

Ahead arrows **shall not** be used except in combination with left and/or right arrow(s) and destination(s) to pull through to one major area destination, such as DOWNTOWN, or direct ahead to one or more qualifying destinations where the through route turns. When used, ahead arrows **shall** be on the left side of the top line.

Destinations

Destinations/attractions on a community destination sign **shall** be displayed (from top to bottom of sign) in the following sequence:

- 1. ahead destination (if used);
- 2. left-oriented destinations/attractions (closest to furthest);
- 3. right-oriented destinations/attractions (closest to furthest).

Community Wayfinding Signs should be limited to three destinations per sign.

Sign Installation Standards

Signs **shall** be installed by the community on separate supports furnished and typically used by the community. They **shall not** be combined with other signing by the community or the Department.

If signing is approved on the state trunk highway directing to a facility, any necessary trailblazing signing **shall** be installed on the city streets/local roads by the community before signing is installed on the state trunk highway.

The community **shall** affix an identification code number label to the back of each sign in accordance with <u>State Statute Section 86.19(5)</u> and <u>TEOpS 2-1-30</u>.

Sign supports shall conform to TEOpS 2-15-52.

Sign installation and placement **shall** be in accordance with WisDOT Standard Sign Details <u>A4-3</u>, <u>A4-4</u>, and <u>A4-8</u>, <u>A4-9</u>, <u>A4-11</u>, or <u>A5-9</u>, as applicable.

Signs **shall** be placed in advance of the intersection where a turn would be required.

Only one sign **shall** be permitted in each direction approaching an intersection and it *should* be located on the right side of the roadway.

The preferred sign spacing is 200 feet from any other highway sign. The minimum spacing **shall** be 100 feet.

Signs erected on the state trunk highway system **shall** have their locations approved by the Regional Traffic Engineer. Signs at all locations *should* be installed with due care to be visible, and to not obscure other traffic control devices. Further guidance on location is contained in Section <u>2A.16</u> of the MUTCD.

Application and Permit

Sign destinations, designs, and locations on State highways under DOT jurisdiction **shall** be approved by the WisDOT Regional Traffic Engineer. Installation of these signs **shall** be through this permit process.

Upon receipt of a master plan for Community Wayfinding Signing, including the typical standard sign design and the identification of the community contact person, the Regional Traffic Engineer will review the plan for

- 1. appropriate qualifying destinations,
- 2. direct and effective routing to the destinations, including trailblazing on local roadways,
- 3. appropriate sign locations,
- 4. individual sign designs, and
- 5. roadside conditions and constraints.

In order to expedite the process, the community *should* prepare the master plan in compliance with the guidelines in this policy. Any necessary denials or revisions *may* cause a return of the plan to the community contact person, resulting in a delay of the permit.

The permit will consist of an approved master plan attached to a permit letter signed by the Regional Traffic Engineer, and *may* include the necessary standard sign installation details mentioned above.

All sign panel designs should be reviewed and approved by the Regional Traffic Engineer before fabrication.

The community **shall** be responsible for the construction, installation and maintenance of the community wayfinding sign structures and sign panels at its own expense.

If community wayfinding signs are not properly maintained, the community **shall**, upon request by WisDOT, replace or remove the signs at its own expense. If not replaced or removed within 30 days of notification, WisDOT will remove the community wayfinding signs at the expense of the community.

Roadway reconstruction and/or installation of new regulatory, warning or guide signs *may* necessitate relocation or removal of community wayfinding signs by the community at its own expense.

GRANDFATHER CLAUSE

Existing <u>permitted</u> Community Wayfinding Signs will be allowed to remain temporarily without modification or replacement until the end of their useful life, or December 31, 2015, whichever comes first. Unpermitted signs **shall** be removed as soon as possible, unless they meet the standards contained in this policy. In that case, the community *may* apply for a retroactive permit by submitting the required master plan.

SAMPLE PERMIT FORM LETTER

Copy and paste to your Region letterhead. Provide date, contact name, and address Modify as needed.

RE: Community Wayfinding Signing Permit

This letter **shall** serve as the Community Wayfinding Signing Permit for (city, village, town) of (name) to install and maintain guidance signing on STH (number) as contained and approved in the attached master plan

No additions or changes will be allowed without a revised <u>and approved</u> master plan.

WisDOT Standard Sign Installation Details, A4-3, A4-4, and (others as needed), are attached. Adherence to these standards is required.

Sincerely,

(signature)

(name, P.E.) (Region) Traffic Engineer

2-15-7 Temporary Traffic Generator Signing on Improvement Projects

January 2013

BACKGROUND AND PURPOSE

Section <u>2E-35</u> of the MUTCD allows states and other agencies the option to adopt policies for Supplemental Traffic Generator (Directional Signing). Correspondingly, WisDOT has adopted a Supplemental Traffic Generator policy for permanent signs (<u>TEOpS 2-15-3</u>). However, there are cases (most notably improvement projects) where temporary Supplemental Traffic Generator signs are needed. Temporary Traffic Generator signs *may* be needed to temporarily replace SIS signs or previously approved Supplemental Traffic Generator signs that were previously installed on the roadway, but taken down temporarily for the project. There are other times where a business *may not* have been previously signed, but the improvement project closes off an access to a business and temporary signs *may* be needed to ease the construction impact to the business. In some of these cases, a Temporary Business Guidance Sign *may* be permitted.

The following policy provides guidance on the different types of Temporary Traffic Generator signs that *may* be utilized on improvement projects.

DEFINITIONS

<u>Freeways</u> are defined as divided highways with fully controlled access at interchanges only. Interstate highways are freeways with the interstate route designation.

<u>Expressways</u> are defined as divided highways with partially controlled access by a combination of interchanges, at-grade intersections, and driveways.

<u>Conventional Highways</u> are defined as streets or roads other than freeways or expressways. They *may* be divided or undivided, two-lane or multi-lane, and access is available at intersections and driveways.

POLICY

Projects that have previously approved SIS or Supplemental Traffic Generator Signs that have been temporarily removed during construction.

- Temporary SIS Signs and Supplemental Traffic Generator signs shall only be allowed for approved SIS
 or Supplemental Traffic Generator signs that were removed as part of the improvement project (See
 Figure 1).
- Temporary SIS Signs and Supplemental Traffic Generator signs shall be black on orange and contain no logos.
- Temporary SIS Signs and Supplemental Traffic Generator signs shall be designed by WisDOT Bureau
 of Traffic Operations for all Regions, except SE. For SE Region projects, the signs shall be designed by
 the SE Region Traffic Operations. Sign details and installation details should be included as part of the
 improvement project plans.
- Temporary SIS Signs and Supplemental Traffic Generator signs are typically paid for as part of the improvement project under the bid item, Traffic Control Signs Fixed Message.

<u>Temporary Business Guidance Signs (signs not previously approved as SIS or Supplemental Traffic Generator signs).</u>

- Temporary directional signing for local businesses may be allowed in the highway right-of-way, at locations approved by the Project Manager.
- Privately erected signs shall require an approved permit (see attached Temporary Business Guidance Signs Permit Application). Privately erected signs Temporary directional signing for local businesses shall not be allowed on freeways, expressways or at the exit ramp.

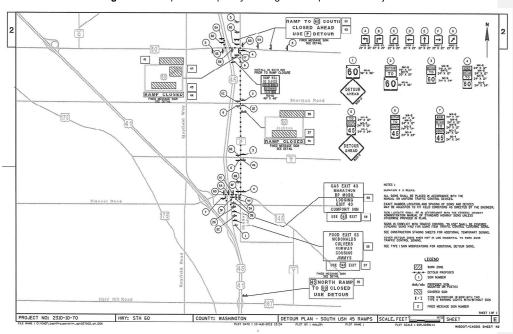
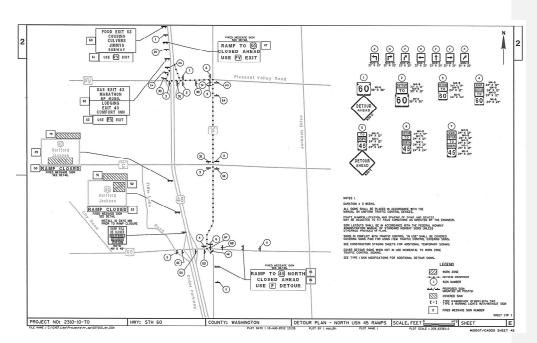


Figure 1. Example of Temporary SIS Signs for Improvement Projects



Page 38

Figure 2. Temporary Business Guidance Signs Permit Application

APPLICATION FOR PERMIT TO INSTALL TEMPORARY BUSINESS SIGN(S)

ON HIGHWAY RIGHT-OF-WAY DURING IMPROVEMENT PROJECT ` ´	
APPLICANT:	
ADDRESS OF BUSINESS / ACTIVITY:	
PHONE:	
TYPE OF BUSINESS / ACTIVITY:	
SIGN LOCATION(S): (number and placement to be coordinated with Project Engineer)	
On what highway? At o	r approaching intersection with what highway?
1) On: At:	
2) On: At:	
3) On: At:	
4) On: At:	
5) On: At:	
6) On: At:	
Remarks:	
Two drawings MUST be attached: One drawing must show the proposed sign design(s) and dimensions and the other must show the proposed sign location(s).	
I apply for permission to install and maintain temporary directional signs at the locations listed and in conformance with the guidelines attached to this application. I agree to comply with these guidelines and will remove all signs upon completion of the project, or when directed by the project engineer. I understand that signs may be removed without notice if they do not comply with the attached guidelines, do not match the attached drawings or do not comply with any additional conditions stated on or attached to the permit. I further understand that WISDOT is not responsible for lost or stolen temporary signs.	
Reviewed by:Traffic Operations	Applicant signature
Approved by:	
Project Manager	Maintaining authority (if sign location is not on STH, a representative's signature

Project I.D.:

Maintaining authority (if sign location is not on STH, a representative's signature

is required)

GUIDELINES FOR INSTALLATION OF TEMPORARY BUSINESS GUIDANCE SIGNS ON IMPROVEMENT PROJECTS

Whenever a traffic generator (typically a commercial business) normally obtains its access from within the limits of a construction project or detoured roadway, WisDOT may allow the placement of temporary directional signs in the highway right-of-way at locations approved by the Project Manager. Privately erected signs require an approved permit (see attached permit form) and will not be allowed on the mainline of freeways or expressways or at the exit ramp. Approval may be granted to place a sign at the intersection where the ramp connects to the crossroad (ramp termini). Signs with generic messages not containing individual business names (e.g., Access to Downtown) should generally be shown on the traffic control plan and erected as part of the improvement contract as a fixed message sign (643.1000 pay item) in orange background and black letters Typical locations for generic message signs in the improvement contract may include endpoints of the construction project or detour (as shown on Standard Detail Drawing 15C2-(X)a, Detail A), sideroads approaching the project.

The following guidelines apply to privately erected signs along conventional highways (non-freeway/non-expressway) or at the ramp termini where it connects to the crossroad near the project:

- 1. The signs will not obstruct the view of, interfere with, or be attached to official traffic control devices such as signs and barricades, or obstruct the view of drivers entering or traveling on the highway. Signs shall be placed to allow at least 6 feet of clearance from edge of gravel shoulder to edge of sign, or at least 2 feet from back of curb to edge of sign (per MUTCD 2A.19). Signs shall be placed as near the right-of-way line as possible and shall not be placed in the median of divided highways.
- 2. Where several neighboring businesses are affected, every effort shall be made to identify these businesses on common signs. In the interest of legibility and not creating undue distraction to drivers, it may be necessary to identify businesses by their general location, e.g., "Main Street Businesses", "Downtown Businesses", or "City Business District", rather than by individual business names. Use the phrase "Access To" instead of "Open To" on signs to clarify that although access is provided to businesses, the roadway is still closed to through traffic. No one sign may be larger than 4' x 6'. For a sign request for one business the maximum sign size is 2' x 4'.
- 3. If access to the business(s) will be through the closed portion of the highway under construction, one directional sign at the beginning of the detour, from each direction, will be allowed. Additional "trailblazers" may be necessary to guide traffic along the closed portion of the road, as approved by the Project Engineer.
- 4. If access to the business(s) will be via a road connecting the detour route to the closed portion of the highway, one sign will be allowed in each direction on the detour at the point where a motorist must leave the detour. Additional "trailblazers" may be necessary to guide traffic along the local road system after leaving the detour route. These signs must be approved by the Project Engineer and the local road's maintaining authority.
- 5. For uniformity and readability, the lettering shall be black block style letters on an orange or white background and shall conform to the following size requirements: 4" high for posted

speeds less than 45 mph; 6" high for posted speeds 45 mph or greater. No other colors will be allowed for lettering. Business logos may be used as an alternative to word messages but maximum allowable logo size is 4 square feet per policy in Traffic Guidelines Manual. Trademark logos may be permitted in alternate colors subject to approval by the Project Engineer. No advertising is allowed on signs such as SALE, or MERCHANDISE REDUCED.

6. Sign supports shall be of FHWA approved breakaway materials, i.e., 4" x 4" wood posts, or smaller, as appropriate to the size and weight of the sign. It is the responsibility of the sign installer to contact Diggers' Hotline at 1-800-242-8511 prior to installation. When it is not possible to mount the signs on post supports, use portable mounts, i.e type II or III barricades, approved by the Project Engineer. Business signs shall not be placed on any devices that are part of the official traffic control for the project. In urban locations, the project manager may have the work zone contractor install a type III barricade for mounting of the sign, and coordinate obtaining the sign from the permit requestor. This avoids the permit requestor being out on our state highways in high traffic volume areas for safety reasons

The following guidelines apply along freeway/expressway mainline:

1. No privately erected signs will be allowed on mainline freeways/expressways. Temporary Business Signs are <u>not allowed on freeway</u>. All signs on mainline freeways/expressways will be erected by contractor, county, or state forces, at the discretion of the Region Traffic Operations Engineer. Where there are existing green traffic generator signs on the freeway that met statewide policy approval (TGM 2-15-3) prior to the project starting, temporary fixed message sign details should already be included in the original contract. Examples: University of Wisconsin, Waukesha or Bristol Renaissance Faire.

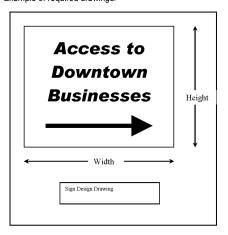
General Coordination & Permit Conditions for Privately Erected Signs

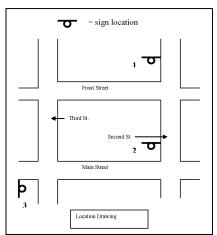
The Project Engineer will coordinate the design and placement of the signs with the owner, and the Project Manager will grant or deny approval. All approved signs, their design and locations, will be documented on the permit form attached to these guidelines. A copy of the permit shall be sent or faxed to the WisDOT Region Traffic Engineer and the maintaining authority in the case of local roads. The approved signs will be erected and removed at the expense of the applicant. If consultation on sign design or installation requirements is needed, contact the Region Traffic Engineer.

If non-complying signs or signs with potential to cause safety problems are located on a project, the Project Engineer will notify the business identified on the sign. Such signs not removed or corrected immediately will be removed by the department or its representatives and the cost billed to the sign owner.

All temporary signs must be removed by the applicant within 48 hours following restoration of normal traffic patterns. Such signs not removed after 48 hours will be removed by the department or its representatives and the cost billed to the sign owner. The Project Engineer is responsible for seeing that all signs are removed at the completion of the project.

Example of required drawings:





2-15-11 Transition, Two to Four Lanes

June 2005

GUIDANCE

Figure 1 portrays recommended pavement markings and signing for typical transitions of two-lane highways to divided highways.

The main feature of the pavement markings is the formation of a large "V," which will give continuous guidance to the left of the driver leaving the divided section.

The choice between using a W4-2R or L has been debated and has arguments on both sides. The illustration provides an acceptable signing choice in the absence of any other determinant factors.

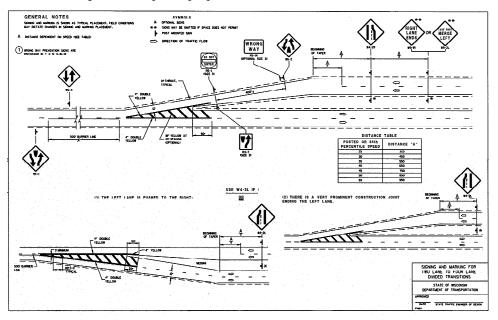


Figure 1. Marking and Signing for Two-Lane to Four-Lane Divided Transitions

2-15-12 Wrong Way Prevention

November 2015

PURPOSE

Prevention of wrong way movement is a concern wherever an entire roadway is dedicated to one-way traffic. Wrong-way prevention signing consists of the appropriate use and placement of Turn Prohibition signs, Keep Right signs, DO NOT ENTER signs, WRONG WAY signs, ONE WAY signs, and Divided Highway Crossing signs.

The need for wrong way prevention signing in any situation is determined by the complexity of the situation requiring positive guidance and the consequence of error. The following guidance and details are intended to define the typical amount of signing for the various applications.

APPLICATIONS

DIVIDED HIGHWAY WITH WIDE MEDIAN intersection with TWO-WAY CROSS STREET (See Figure 1)

This typical signing plan should be sufficient for most intersections of this type.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 allows the single installation of DO NOT ENTER and WRONG WAY SIGNS. Where the median width is 30 feet or greater, the signs *should* be installed on the median side.

<u>DIVIDED HIGHWAY WITH NARROW MEDIAN intersection with TWO-WAY CROSS STREET</u> (See Figure 2)

This typical signing plan *should* be sufficient for most intersections of this type. Additional needs *may* be met by installing additional signs as shown in MUTCD Figure 2B-15.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 to allow the single installation of DO NOT ENTER and WRONG WAY SIGNS. Where the median width is less than 30', the signs *should* be installed on the outer side.

DIVIDED HIGHWAY WITH WIDE MEDIAN intersection with INTERCHANGE RAMPS (See Figure 3)

This typical signing plan *should* be sufficient for most intersections of this type. It combines the typical signing requirements from **Figure 1** with the Standards, Guidance and Options in the MUTCD Section <u>2B.41</u> and Figure 2B.18, except that the Turn Prohibition signs are designated optional. This is consistent with the last Option

paragraph in the MUTCD Section 2B.18.

<u>DIVIDED HIGHWAY WITH NARROW MEDIAN intersection with INTERCHANGE RAMPS</u> (See Figure 4)

This typical signing plan *should* be sufficient for most intersections of this type. It combines the typical signing requirements from **Figure 2** with the Standards, Guidance and Options in the MUTCD Section <u>2B.41</u> and Figure 2B.18, except that the Turn Prohibition signs are designated optional. This is consistent with the second to last Option paragraph in the MUTCD Section <u>2B.18</u>.

TWO-WAY UNDIVIDED HIGHWAY intersection with INTERCHANGE RAMPS (See Figure 5)

This typical signing plan *should* be sufficient for most intersections of this type. It reflects the Standards, Guidance and Options in the MUTCD Section <u>2B.41</u> and Figure 2B.18, except that the Turn Prohibition signs are designated optional. This is consistent with the second to last Option paragraph in the MUTCD Section 2B.18.

TRANSITION FROM TWO-WAY UNDIVIDED HIGHWAY TO DIVIDED HIGHWAY (See Figure 6)

This typical signing plan *should* be sufficient to prevent wrong-way movements in these transition areas. <u>TEOpS 2-15-11</u> illustrates the overall signing and pavement marking requirements in greater detail.

DIVIDED HIGHWAY WITH INTERSECTING SIDEROAD (See Figures 7 and 8)

These typical signing plans *should* be sufficient for most side roads of these types. Additional needs *may* be met by installing additional signs as shown in the MUTCD Figure 2B-15.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 allows for the single installation of the DO NOT ENTER and WRONG WAY signs. Where the median width is less than 30', the signs *should* be installed on the outer side.

DIVIDED HIGHWAY WITH NARROW OR WIDE MEDIAN DRIVEWAY (See Figures 9, 10, 11, 12 and 13)

These typical signing plans *should* be sufficient for most driveways of these types. Additional needs *may* be met by installing additional signs as shown in the MUTCD Figure 2B-15.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 allows for the single installation of the DO NOT ENTER and WRONG WAY signs. Where the median width is less than 30', the signs *should* be installed on the outer side.

ROUNDABOUTS (See Figure 14)

This typical signing plan *should* be sufficient for the prevention of wrong way movements on roundabouts with single and multiple approach lanes and interchange off-ramps.

<u>DIVIDED HIGHWAY WITH SIGNALIZED WIDE MEDIAN INTERSECTION</u> (See Figure 16)

This typical signing plan should be sufficient for most intersections of this type.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 allows the single installation of DO NOT ENTER and WRONG WAY SIGNS. Where the median width is 30 feet or greater, the signs *should* be installed on the median side.

<u>DIVIDED HIGHWAY WITH SIGNALIZED NARROW MEDAN INTERSECTION</u> (See Figure 17)

This typical signing plan *should* be sufficient for most intersections of this type. Additional needs *may* be met by installing additional signs as shown in MUTCD Figure 2B-16.

The MUTCD Section <u>2B.37</u> and Figure 2B-12 to allow the single installation of DO NOT ENTER and WRONG WAY SIGNS. Where the median width is less than 30', the signs *should* be installed on the outer side.

POLICY

At approaches to multi-lane roadways with median widths less than 30', the R6-1 ONE WAY sign **shall** be installed at the near right installation above the STOP or YIELD sign. At approaches to multi-lane roadways with median widths 30' or greater, two R6-1 ONE WAY signs **shall** be installed back to back at the near right installation above the STOP or Yield sign. The R6-1 ONE WAY sign **shall** be used at "T" intersections with divided highways or above the roundabout directional arrow (R6-4b) sign.

At divided highways with wide medians that have a STOP or Yield sign in the median, a R6-1 ONE WAY sign **shall** be installed back to back above the STOP or Yield sign (See Figure 15).

The R6-2 ONE WAY sign shall be used for all other locations on the STH system.

The DO NOT ENTER sign **shall** be installed where it does not obscure the outline or shape of STOP or YIELD signs. If space does not permit, it is permissible to trim the DO NOT ENTER sign into an octagon shape,

however the preference is to install the DO NOT ENTER sign on a separate post, next to the STOP sign.

GUIDELINES

Short divided sections with low traffic volumes and a posted speed of 40 mph or less *may* not need the DO NOT ENTER and WRONG WAY signs.

An urban boulevard with frequent cross streets and median openings *should* not need repeated DO NOT ENTER and WRONG WAY signs.

A history of wrong way movements and/or related crashes *may* warrant further measures. If visibility of the far roadway from the side street or ramp is obscured by geometrics or cross section, additional ONE WAY signs *may* be necessary and positioned as shown in the MUTCD Figure 2B-15.

Highway lighting may be a solution to visibility problems, eliminating the need for extra signing.

Pavement marking arrows *may* be used to supplement signing and reinforce the wrong way prevention message, especially on exit ramps.

Freeway ramps *may* warrant additional signing and marking strategies to help prevent wrong way movements. The following strategies *may* be used at freeway ramp locations that have exhibited problems with wrong way drivers entering the freeway:

- 1. Upsizing of DO NOT ENTER and WRONG WAY signs
- 2. Stop bars and type 4 pavement marking arrows
- 3. Dotted pavement marking line extensions through the intersection

The following strategies *may* be used in addition to the ones above or on their own. All of the following strategies are optional, and **shall** only be used at side by side ramp locations that have exhibited problems with wrong way drivers entering the freeway:

- Additional WRONG WAY signs mounted below the DO NOT ENTER signs at a 3 foot mounting height as measured vertically from the bottom of the sign to the top of the near edge of pavement.
- Reflective strips on WRONG WAY and DO NOT ENTER sign posts. These strips shall be 2 inches
 wide, composed of red Type H sheeting on 0.040 inch sheet aluminum, and shall run from the bottom
 of the sign to within 2 feet above the edge of pavement.
- 3. A FREEWAY ENTRANCE sign placed at the entrance to the on ramp
- 4. Dynamic (flashing) WRONG WAY signs

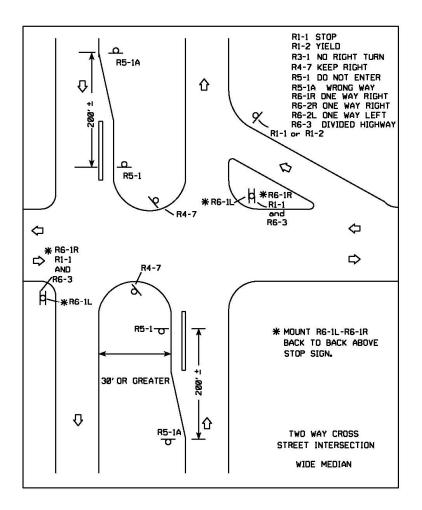


FIG. 1 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

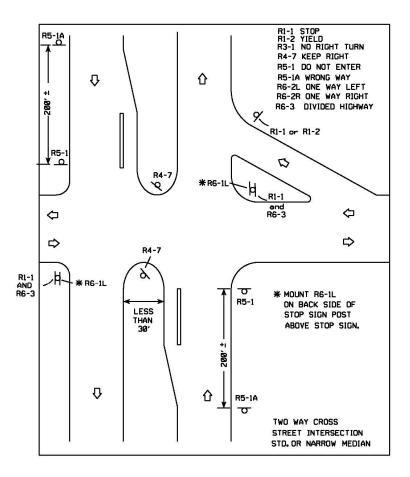


FIG. 2 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

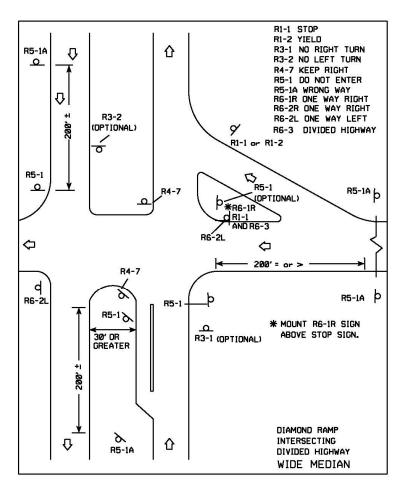


FIG. 3 WRONG WAY SIGNING RELATIVE TO RAMP.

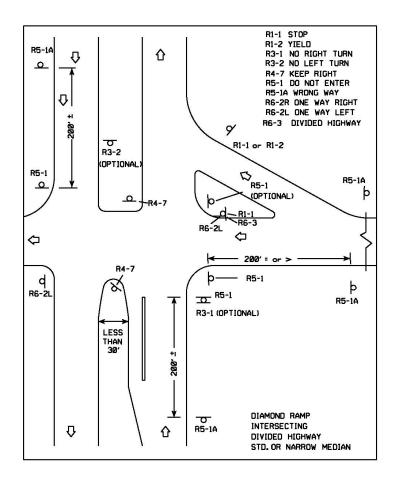


FIG. 4 WRONG WAY SIGNING RELATIVE TO RAMP.

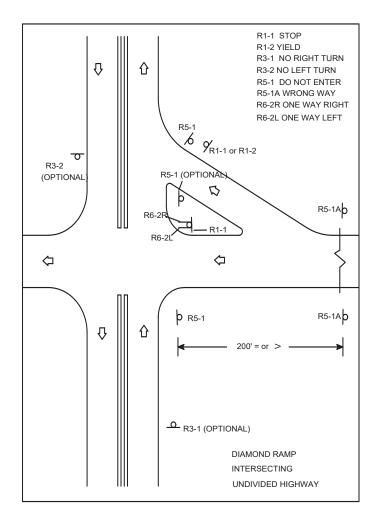


FIG. 5 WRONG WAY SIGNING RELATIVE TO RAMP.

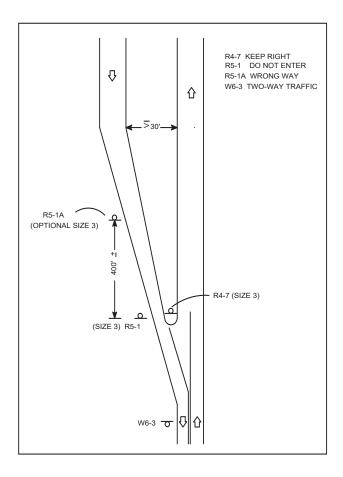


FIG. 6 TRANSITION FROM TWO-WAY UNDIVDED HIGHWAY TO DIVIDED HIGH

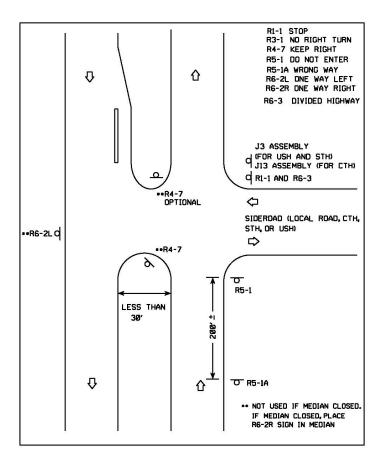


FIG. 7 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

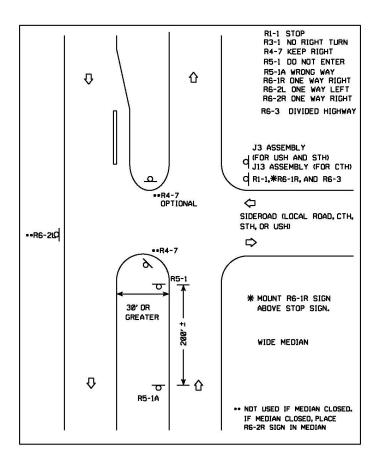


FIG. 8 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

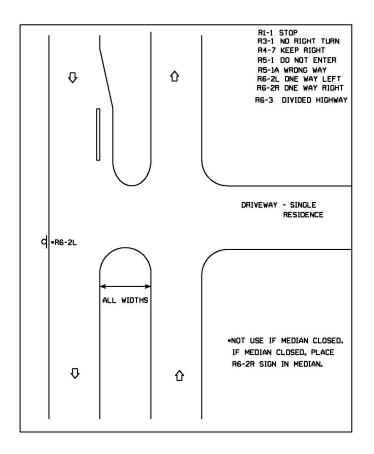


FIG. 9 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

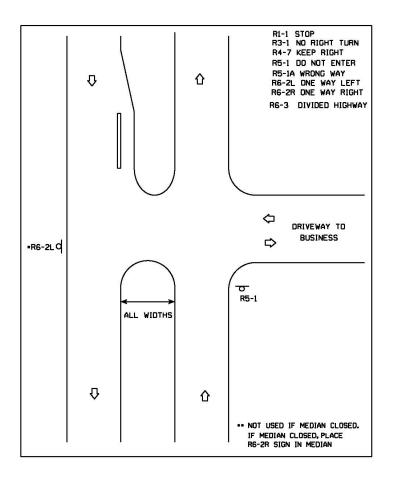


FIG. 10 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

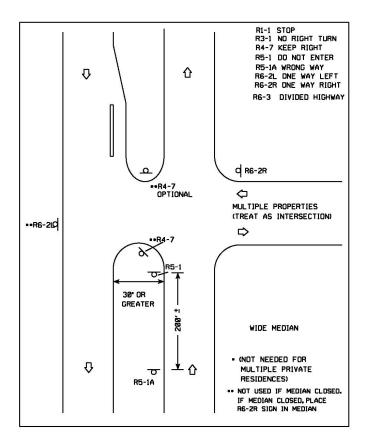


FIG. 11 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

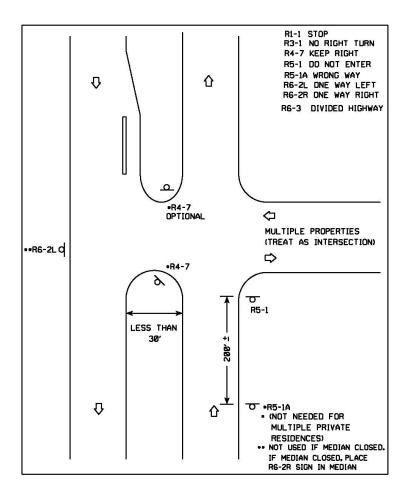


FIG. 12 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

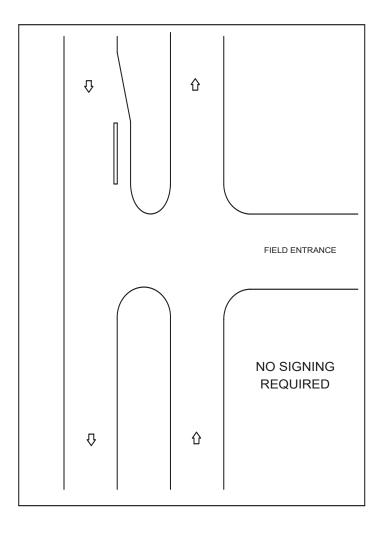
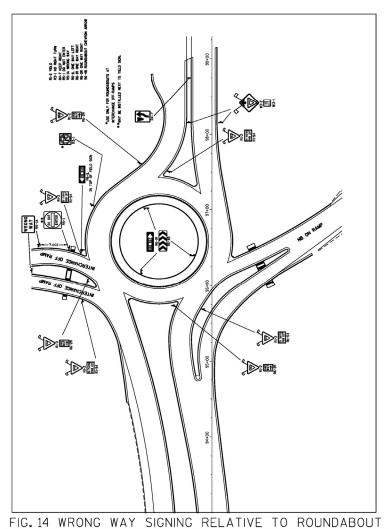


FIG. 13 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY



NOTE: SIGNING IS SHOWN AS TYPICAL SIGN PLACEMENT. FIELD CONDITIONS MAY DICTATE CHANGES IN SIGN PLACEMENT

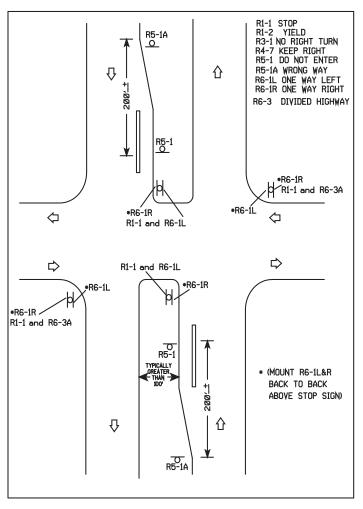


FIG. 15 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

(WIDE MEDIAN WITH STOP OR YIELD SIGN IN MEDIAN)

NOTE: SIGNING IS SHOWN AS TYPICAL SIGN PLACEMENT.

FIELD CONDITIONS MAY DICTATE CHANGES IN

SIGN PLACEMENT.

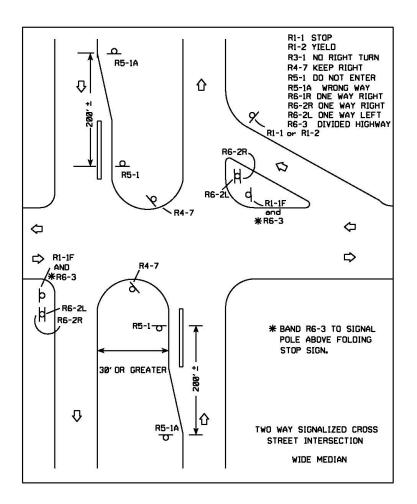


FIG. 16 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

NOTE: SIGNING IS SHOWN AS TYPICAL SIGN PLACEMENT.

FIELD CONDITIONS MAY DICTATE CHANGES IN

SIGN PLACEMENT.

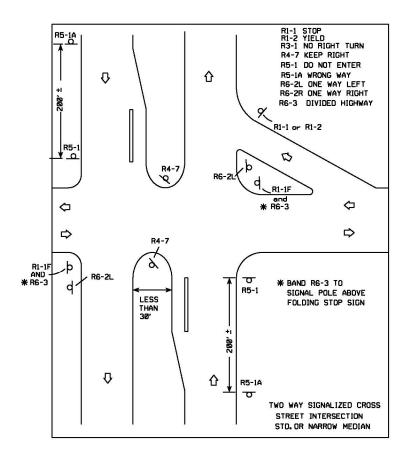


FIG. 17 WRONG WAY SIGNING RELATIVE TO DIVIDED HIGHWAY.

2-15-15 Recreational Trail Signing

January 2015

PURPOSE

This policy provides guidance for the installation of guide signs to direct traffic to major access points for public recreational trails. This policy does not address warning signs that *may* apply to locations where the recreational trail crosses a highway.

DEFINITION

<u>Freeways</u> are defined as divided arterial highway facilities that have full controlled access, by means of grade separation at interchanges only.

Expressways are defined as divided arterial highway facilities that have partial control of access and generally with grade separations at major intersections.

<u>Conventional highways</u> are defined as either divided or undivided roadway facilities that have no control of access with grade separations at intersections. These highways can be two-lane or multilane facilities.

POLICY

The following criteria shall apply for a trail to be eligible for signing on WisDOT-maintained roadways:

- Public recreational trails owned and/or managed by the state government shall be the only trails that qualify for signing on freeways.
- 2. Public recreational trails owned and/or managed by the state or county government, or by a multi-state agency or commissions **shall** be the only trails that qualify for signing on expressways.
- 3. Public recreational trails owned and/or managed by the state or county government, by a multi-state agency or commission, or by a city, village, or township *may* be signed for on conventional highways.
- 4. All trailblazing signing off the State Trunk Highway system **shall** be in place prior to the installation of any signs on the State Trunk Highway system.
- 5. The trail shall be constructed and maintained to Wisconsin DNR standards, with an improved surface of compacted aggregate or better and be open year round. National Trails, as established by Congress, on the National Trails System with a natural surface may qualify for signing, provided the access points to be signed meet all other applicable criteria, including off-street parking facilities.
- 6. Evidence of poor trail maintenance or inadequate or poor trailblazing signage will be cause to remove any existing signs from the State Trunk Highway system.
- The message on the signs should read "XX State Trail" for state owned trails and "XX Trail" for county, regional, city, village or township trails. The signs shall be composed of white lettering on a brown background.
- 8. For all roadways, only the trail termini will be signed. Intermediate access points may qualify for signing. The intermediate access points shall be spaced a minimum of 15 miles. A maximum of 2 signs shall be installed, one in each direction of travel, for each trail access point to be signed. For freeways and expressways, a directional sign (D1 sign) shall be placed on the freeway/expressway ramp to lead to the trail access.
- 9. Trail termini and intermediate access points should have the following amenities:
 - Public restrooms or toilets on freeways and expressways, but are optional on conventional highways
 - b. Public, off-street paved or gravel parking facilities
 - c. Trail information
- 10. Where trail access points from two different trails have the same point of access from the State Trunk Highway, both trail names **shall** be identified on the same sign.
- 11. These signs shall be placed at the closest State Trunk Highway intersections to the trail termini. Trailblazing signing from a conventional State Trunk Highway to another conventional State Trunk Highway will not be allowed.
- 12. For freeways, expressways, and conventional highways, trail access points **shall** be no more than 5 miles from the nearest exit or State Trunk Highway.
- 13. The cost for fabrication, installation, and maintenance of any recreational trail signing shall be the responsibility of the trail owner or managing organization or agency. WisDOT shall coordinate the fabrication, installation, and maintenance of all signs on State Trunk Highways, including ramps, and shall be reimbursed for all costs. Installation of signs may be performed by WisDOT forces or by permit/letter.

2-15-16 ATV Route Signing

November 2015

PURPOSE

Section 23.33(1)(c) Wisconsin Statute defines an all-terrain vehicle (ATV) route as a highway or sidewalk designated for use by ATV operators by the governmental agency having jurisdiction as authorized under this section. In addition, s. 23.33(11)(am)(3) allows ATV operation on non-interstate highway bridges 1,000 feet in

length or less by ordinance of the county <u>and</u> the municipality in which the bridge is located, regardless of iurisdiction.

At some locations on state trunk highway right of way, local agencies *may* erect signing for the purpose of directing and controlling ATV trail operations. This is permissible unless there is some problem generated by the existence of ATVs at specific locations. Signing for ATV trails and routes is described in <u>Administrative Code NR 64.12</u> and also described with typical applications illustrated in WDNR's <u>"Trail Signing Handbook"</u>, <u>2012</u>. A copy of this book *should* be kept in each traffic section. This policy will clarify that handbook with regards to ATV use on WisDOT maintained highways.

DEFINITIONS

ATV crossing: A location where an ATV route or trail crosses, but does not run along, a highway.

ATV route: Any roadway or sidewalk properly designated for use by ATV operations per s. 23.33.

<u>ATV trail:</u> A marked corridor on public property or on private lands subject to public easement or lease, designated for use by all-terrain vehicle operators by the governmental agency having jurisdiction, but excluding roadways of highways except those roadways that are seasonally not maintained for motor vehicle traffic.

POLICY

ATV crossing warning signs:

- ATV crossing warning signs (<u>W11-50</u>) are shown routinely in the WDNR Trail Signing Handbook. On state maintained highways, these signs **shall** only be installed by WisDOT, and only where warranted due to sight conditions, per the table in Section <u>2C.46</u> of the MUTCD.
- WisDOT will assume the installation and maintenance costs for any ATV Trail crossing warning signs installed on the state highway system.

ATV Route guide signs and arrows:

The following policy criteria shall be used when ATV Route guide signs are requested from municipalities:

- 1. ATV Route signs (<u>D11-10</u>) **shall** be installed immediately downstream from where an ATV Route turns onto a State or US Highway. From a safety standpoint, it is desirable to keep ATVs on the shoulder; however, this *may* cause shoulder rutting issues, especially in locations where ATVs will tend to straddle the paved shoulder/gravel shoulder transition. For this reason, it *may* be desirable to supplement the initial D11-10 signs with "STAY ON PAVEMENT" (R4-55) or "STAY ON SHOULDER" (R4-55-S) signs, mounted directly below the D11-10 sign. Region maintenance *should* be consulted to determine if these signs are necessary. A second D11-10 sign **shall** be installed where the ATV Route turns off of the State or US Highway. This sign **shall** be supplemented with an appropriate <u>M7 series arrow</u>.
- 2. It should be noted that the WDNR Trail Signing Handbook shows a 6" x 12" "directional arrow" above a 6" x 6" ATV symbol sign at locations where the ATV route ends at an ATV trail. This combination of sign shall not be installed along ATV routes on State or US Highways. This "directional arrow" sign mimics the design of standard large one-direction (night) arrows. As ATV users will be using some or all of the traffic lane, these signs will be installed at the same offset and mounting height as other traffic signs. This could lead to motorist confusion. ATV routes on State or US Highways ending at ATV trails shall utilize the D11-10/M7 sign combinations.
- The county or local municipality shall be required to obtain a permit (see <u>TEOpS 2-15-3</u>) for these signs from the WisDOT Region Traffic Engineer. The written request should contain:
 - a. A copy of both the municipal and county ordinances
 - b. A map showing the ATV Route

The Region Traffic Engineer *should* contact Bureau of Highway Maintenance (BHM), State ROW Permits Engineer, to ensure that the county and municipal ordinances have been reviewed by WisDOT and WDNR. Signs **shall not** be erected until the ordinances are legally in effect. The current BHM contact is <u>Bob Fasick</u>, (608) 266-3438.

- 4. WisDOT will set up a Professional and Technical Project ID to charge costs to and will coordinate manufacture and installation of the signs. All costs for the installation and maintenance of ATV Route signs shall be billed to the county or local municipality. For county requested signs, the Sales to Others process may be utilized in lieu of the P&T process.
- 5. All ATV Route signs, auxiliary arrows and plaques, and ATV crossing signs on State or US Highways

shall be installed on WisDOT standard breakaway supports. Mounting height and offset **shall** follow sign plate A4-3.

Other comments on the WDNR Trail Signing Handbook:

- 1. Any and all responsibility for signing along trail, off of the state highway, is local, including installation and maintenance.
- 2. Regarding illustrations in the book:
 - a. Warning signs on the trail when visible from the highway should be the minimum size specified.
 - b. Orange markers on the right-of-way would usually be unnecessary except to mark a turn.
 - c. STOP signs are shown too close to the highway. They *should* be back of the snowplowing range, at least 20' from the pavement and desirably more.
 - d. STOP signs *should* be parallel to the highway, and the trail approaching the highway *should* be aligned to be as near to a right angle as possible.
- 3. On page 14 of the handbook: If requested WisDOT will install and maintain guide signs for trail head parking lots. The signs *should* contain the word "Parking".
- Trail sign posts on the right of way installed by local agencies shall meet the same small support safety standards as those erected by WisDOT.
- 5. Trail signs shall not be attached to any of WisDOT's signposts.

ADDITIONAL INFORMATION

BHM has developed a comprehensive policy on ATV routes and Trails that is available at HMM 09-10-11.

2-15-20 Cemetery Signing

January 2003

PURPOSE

This policy provides guidance for the permitting of signs on WisDOT-maintained roadways directing road users to certain cemeteries. These guidelines apply to conventional highways, expressways, and freeways.

DEFINITIONS

<u>Freeways</u> are defined as divided arterial highway facilities that have full controlled access, by means of grade separation at interchanges only.

<u>Expressways</u> are defined as divided arterial highway facilities that have partial control of access and generally with grade separations at major intersections.

<u>Conventional highways</u> are defined as either divided or undivided roadway facilities that have no control of access with grade separations at intersections. These highways can be two-lane or multi-lane.

POLICY

The following criteria shall apply for a cemetery to be eligible for signing on WisDOT maintained roadways:

- 1. Only veterans' cemeteries that are exclusively for veterans and that are owned and/or managed by the state or national Department of Veterans Affairs are eligible to be permitted for signing under this policy. The primary function of the facility shall be a cemetery. Presently, the Northern Wisconsin Veterans Memorial Cemetery in Spooner and the Southern Wisconsin Veterans Memorial Cemetery near Union Grove are the only two veterans cemeteries that qualify for signage under this policy.
- 2. All other cemeteries shall not be signed on WisDOT maintained roadways.
- 3. Signing from one conventional State Trunk Highway to another conventional State Trunk Highway will not be allowed. Any necessary signing off of the State Trunk Highway system **shall** be in place prior to the installation of any signs on the State Trunk Highway system.
- 4. The signs shall be white message on green background.
- On conventional highways, signs should be erected a minimum of 500 feet in advance of the intersection or cemetery entrance.
- 6. On freeways and expressways, signs should be erected within one mile in advance of the exit ramp or

- side road. Destination signs (D1-1 signs) **shall** be erected at or near the end of the exit ramp or side road approach.
- For freeways, expressways, and conventional highways, the cemetery shall be no more than 5 miles from the nearest exit or State Trunk Highway.
- 8. The cost for fabrication, installation, and maintenance of this signing shall be the responsibility of the cemetery owner or managing organization or agency. WisDOT shall coordinate the fabrication, installation, and maintenance of all signs on State Trunk Highways, including ramps, and shall be reimbursed for all costs.

2-15-30 Hydrant Signing

November 2015

PURPOSE

Coordination with fire departments has indicated problems with limited identification of fire hydrant locations from the freeway or expressway. This is especially important in areas where the view of fire hydrants from the highway is obstructed. It has been learned that response to freeway or expressway fires can be a two-squad operation. There is response time to the freeway or expressway fire scene, and there is response time to fire hydrants off of the highway right-of-way. The freeway or expressway response crew must coordinate location and hook-up to the hydrant. When location of the hydrant is uncertain, time is lost. The purpose of this guideline is to establish criteria on the usage of fire hydrant location signs and sign identification blades along noise walls.

DEFINITIONS

Freeways are defined as divided arterial highway facilities that have <u>full</u> controlled access, by means of grade separation at interchanges only.

Expressways are defined as divided arterial highway facilities that have <u>partial</u> control of access and generally with grade separations at major intersections.

POLICY

The placement of hydrant signs is most critical where the vision of the fire hydrant or local street from the highway (freeway or expressway) is restricted. Sounds walls are an excellent example of where vision is completely restricted. Topography of landscape *may* also hinder vision. It is the intent of the Department to install hydrant signs that satisfy the following conditions:

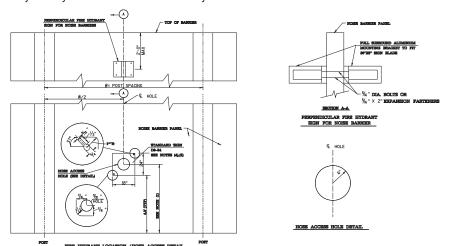
- At all sound wall installations where the wall creates a visual and physical barrier between the roadway and the hydrant.
- At locations where topography or landscape create a visual or physical barrier between the highway and the hydrant, the hydrant signs should be mounted either on posts or the right-of-way fence on the highway side.
- 3. At locations where crash experience is above average, and expeditious response is advantageous.
- 4. At locations where fire hose standpipes have been installed. Signs *should* be mounted on posts near the standpipe access joint.
- 5. The local fire department or fire district **shall** pay for all costs of the sign, sign blade and all mounting hardware. This includes the costs for initial installation and long-term maintenance. The Department *may* pay for the initial installation provided they are part of a project.

SIGN INSTALLATION

- The hydrant sign (D9-54 sign) shall be placed, with movable capability, over the fire hose access hole (See Figure 1).
- 2. A two-sided sign blade (D9-54A sign) with blue Type H Reflective sheeting **shall** be placed on all new sound wall installations. Existing sound wall installations without the two-sided blade *should* be retrofitted with the blade as opportunities allow. The sign blade *should* be placed near the top of the sound wall on the highway side, above the fire hose access hole (See Figure 1).

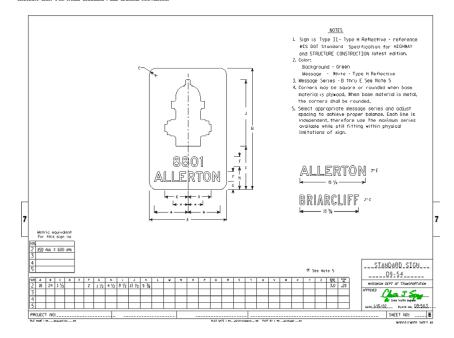
Standard sign plate D9-54 (See Figure 2) has been developed for hydrant signs (See attached sign plate detail). The sign is white on green, containing a fire hydrant symbol and the approximate numerical address of the fire hydrant.

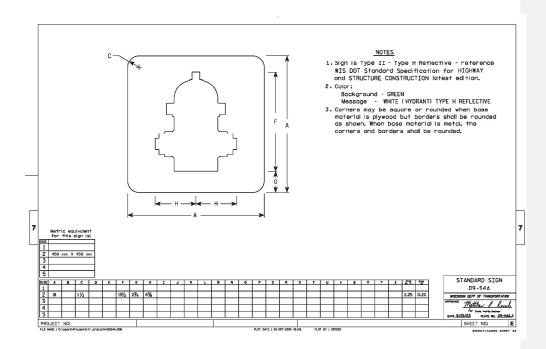
It is strongly encouraged that contact is made with the fire department jurisdictions responding to the freeway or expressway to verify the numerical address of the hydrant.



NOTES

- 1. STANDARD SIGNS D9-54 WILL BE FURNISHED BY THE CONTRACTOR SEE PLAN
- 2. THREE STANDARD SIGNS DO-54 TO BE FURNISHED PER STATION. ONE SIGN SHALL BE INSTALLED ON EACH SIDE OF THE BARRIER ONE ADDITIONAL SIGN TO BE INSTALLED ON FERCE AT BW LINE WITH MESSAGE FACING AWAY FROM FREEWAY.
- ADDITIONAL FIRE HYDRANT SIGNS SHALL SE ATTACHED TO THE NOSE BARRIER PANEL NEAR THE TOP OF THE BARRIER SEE DETAIL ABOVE, PAID FOR UNDER "PERFENDICULAR FIR NUTBALK" PURE POR MOUTE BARRIER SEE SET SHEET, NOOMEN'S





2-15-31 Signing for Low Inlets Along Barrier Walls

March 2011

PURPOSE

County maintenance personnel, first responders, and WisDOT maintenance staff have indicated problems with identification of low inlets along freeway barrier walls. There could be times that the inlets are covered with snow, ice or other debris that makes location difficult. Clogged inlets can present potential traffic safety issues and efficient, rapid location of them is very essential.

FHWA has indicated that a sign used for marking such inlets would not be considered an official traffic sign. Technically, the sign would not be in the line of sight or directed to passing motorists.

This policy governs the design and placement of signing for low inlets along freeway barrier walls.

POLICY

The sign used for the identification of low inlets along barrier walls is the green object marker (W5-53S) sign. This sign *may* be used, provided the following criteria are met:

- 1. The request to use the signs **shall** be coordinated with both the WisDOT Region Maintenance Engineer and Traffic Engineer.
- 2. The signs **shall** be installed on the face of the barrier, near the top to prevent covering by snow. See Figure 1 for typical installation detail.
- 3. Signs are paid for under the bid item: Signs Reflective Type II.
- 4. The signs **shall** be manufactured on 0.040" thick aluminum and fastened to the concrete wall with an adhesive with 1 ½" concrete anchor screws at each corner.
- 5. Replacement signs for maintenance **shall** be obtained through WisDOT.

Figure 1. Typical Installation of Storm Drain Inlet Marking



2-15-36 Distance Signs, D2-Series and Post-Interstate E8-Series

February 2018

PURPOSE

The purpose of this policy is to provide guidance for the use of Distance signs on State Highways under Department of Transportation jurisdiction. This policy guidance will address the selection of destinations, consistent determination of appropriate distances, sign design, and typical Distance sign placement.

<u>General guidance on selection of destinations</u> can be found in the MUTCD Sections <u>2D.37</u> and <u>2E.35</u>. <u>Specific guidance on the selection of destination cities</u> can be found in <u>TEOpS 2-15-5</u>.

Guidance on the location of Distance signs is found in MUTCD Sections 2D.38 and 2E.39.

This policy does not apply to Interchange Sequence signs, which are addressed in MUTCD Section 2E.36.

B. Definitions

<u>Distance Signs</u> are defined as guide signs displaying a sequence of one to three destinations ahead with the distance to reach those destinations.

<u>Freeways</u> are defined as divided highways with fully controlled access at interchanges only. Interstate Highways are freeways with the interstate route designation.

<u>Expressways</u> are defined as divided highways with partially controlled access by a combination of interchanges, at-grade intersections, and driveways.

<u>Conventional Highways</u> are defined as streets or roads other than freeways or expressways. They *may* be divided or undivided, two-lane or multi-lane, and access is available at intersections and driveways.

National Control Cities are Chicago, Milwaukee, Beloit, Rockford, Janesville, Madison, Wisconsin Dells, La Crosse, Albert Lea, Eau Claire, St. Paul, Sheboygan, and Green Bay.

Regional Control Cities are defined as

- Urban areas in Wisconsin or within 60 miles of the state line with a population in the most recent decennial census of 30,000 or more,
- Other communities, such as Sturgeon Bay, Woodruff, Minocqua, and Lake Geneva, which are approved by the State Traffic Engineer based on their character as widely known tourism destinations, and
- 3. Urban areas on or north of Highway 64 with a population exceeding 3500, and urban areas south of Highway 64 with a population exceeding 10,000.

<u>Major Crossroads or Side Roads</u>, in most cases, *should* be state highways, but *may* be a county highway or local arterial serving a nearby community.

POLICY

General Guidance

- 1. The combination Destination Direction and Distance signs, such as is designated D1-1a. D1-2a, or D1-3a in MUTCD, **shall not** be used on state highways.
- 2. Unincorporated communities shall not be displayed on Distance signs unless the community is

designated a Regional Control City.

- 3. Traffic generator supplemental sign destinations **shall not** be displayed on Distance signs.
- 4. The sign design format for distance signs shall use upper and lower case letters.
- 5. The letter sizes **shall** be appropriate for the highway class; minimum 6-inch/4½-inch on conventional highways and minimum 8-inch/6-inch on expressways and freeways.

The selection of destinations **shall** be solely for the purpose of guidance and information for the non-local state highway driver, and **shall not** be used to promote communities, facilities, or preferential routes.

The first line of the sign **shall** designate the next selected "destination" in the direction of travel. If used, a second line of the sign *may* designate the second, or an interim, destination of importance in the direction of travel. The bottom line **shall** designate a National Control City or Regional Control City or the last incorporated city or village of the greatest significance, in that order of priority.

Distances shall be rounded up or down, as appropriate, to display the even mile.

Specific Guidance - Conventional Highways

The first destination on a Distance sign on a conventional state highway **shall** display either the next incorporated community (city or village), or the next <u>major</u> crossroad or side road, whichever is deemed the most beneficial information for the driver.

If used, the second line of the Distance sign *may* display the second major crossroad or a subsequent incorporated community served by the state highway. Selection of the community *may* be guided by use of the comparative population and distance formula in <u>TEOpS 2-15-5</u>. Selection *may* also be varied on successive Distance signs to display alternative communities served by the route.

The bottom line of a Distance sign on a state highway **shall** designate a National Control City or Regional Control City or the last incorporated city or village of the greatest significance, in that order of priority. The bottom line control city *should* be the same on all successive Distance signs along the route until that city is reached.

If the conventional state highway does not enter the corporate limits of a community, the community **shall not** be displayed on the Distance sign, but *may* appear on a Direction sign (D1-series) at the appropriate location.

Distances to a crossroad **shall** be rounded to the nearest even mile.

Distances to a community *may* be measured differently depending on the size of the community and how the state highway passes through it.

- If the community is not very large and the highway serves the central business district, the distance should be measured to that "downtown" area and may be rounded down.
- 2. If the highway does not serve the downtown, the distance *may* be measured to the municipal limits or a major crossroad within the municipal limits and *may* be rounded up.
- If the city is large, the distance may be measured to a major crossroad or municipal feature within the city limits.

Distance signs *should* be installed downstream from rural interchanges and STH/USH intersections, following the J4 and R2-1 signs. Distance signs are typically not installed within incorporated city or village limits. A distance sign *should* be installed where a conventional highway exits the limits of the last contiguous incorporated city or village, across from the I2-3. Distance signs *should not* be installed where the highway leaves an unincorporated community, unless the community is designated a Regional Control City.

Specific Guidance - Expressways

The first destination on a Distance sign on an expressway **shall** display either the next incorporated community (city or village), or the next <u>major</u> crossroad or interchange, whichever is deemed the most beneficial information for the driver.

If used, the second line of the Distance sign *may* display the second major crossroad or interchange or a subsequent incorporated community served by the state expressway. Selection of the community *may* be guided by use of the comparative population and distance formula in <u>TEOpS 2-15-5</u>. Selection *may* also be varied on successive Distance signs to display alternative communities served by the route.

The bottom line of a Distance sign on an expressway **shall** designate a National Control City or Regional

Control City or the last incorporated city or village of the greatest significance, in that order of priority. The bottom line control city *should* be the same on all successive Distance signs along the route until that city is reached

If the state expressway does not enter the corporate limits of a community, the community **shall not** be displayed on the Distance sign, but *may* appear on a Direction sign (D1-series) or Exit sign (E1- or E4-series) at the appropriate location.

Distances to a crossroad or interchange **shall** include the exit ramp and **shall** be rounded to the nearest even mile

Distances to a community *may* be measured differently depending on the size of the community and how the state expressway passes through it.

- If the community is not very large and the highway serves the central business district, the distance should be measured to that "downtown" area and may be rounded down.
- 2. If the highway does not serve the downtown, the distance *may* be measured to the municipal limits or an interchange or major crossroad within the municipal limits and *may* be rounded up.
- 3. If the city is large, the distance *may* be measured to an interchange or major crossroad or municipal feature within the city limits.

Distance signs should be installed downstream from rural interchanges and STH/USH intersections, following the J4 and R2-1 signs. At interchanges, a Distance sign *should* be installed on the mainline downstream from the on-ramp, after the J4 and R2-1. Where multiple interchanges serve the same community, a Distance sign *should* only be installed after the last interchange serving that community. Where less than 3 miles exists between the on-ramp taper point and the next off-ramp theoretical gore, the Distance sign *may* be omitted.

Specific Guidance - Freeways

The first destination on a Distance sign on a freeway **shall** display either the next interchange, or the next incorporated community (city or village), whichever is deemed the most beneficial information for the driver.

If used, the second line of the Distance sign *may* display the second interchange or a subsequent incorporated community served by the freeway. Selection of the community *may* be guided by use of the comparative population and distance formula in <u>TEOpS 2-15-5</u>. Selection *may* also be varied on successive Distance signs to display alternative communities served by the route.

The bottom line of a Distance sign on a freeway **shall** designate a National Control City or Regional Control City or the last incorporated city or village of the greatest significance, in that order of priority. The bottom line control city *should* be the same on all successive Distance signs along the route until that city is reached.

If the freeway does not enter or pass within one mile of the corporate limits of a community, the community **shall not** be displayed on the Distance sign, but *may* appear on an Exit sign (E1- or E4- or E9-series) at the appropriate location.

If the freeway does pass within one mile of the corporate limits of a community, the community *may* be displayed on the Distance sign, and *may* appear on an Exit sign (E1- or E4- or E9-series) at the appropriate location.

Distances to an interchange **shall** include the exit ramp to the crossroad and **shall** be rounded to the nearest even mile.

Distances to a community *may* be measured differently depending on the size of the community and how the freeway serves it.

- If the community is not very large and the freeway serves the central business district, the distance should be measured to a "downtown" interchange and may be rounded down.
- If the freeway does not serve the downtown, the distance may be measured to the municipal limits or a major interchange within the municipal limits and may be rounded up.
- If the city is large, the distance may be measured to a major interchange or municipal feature within the city limits.

At interchanges, a Distance sign *should* be installed on the mainline downstream from the on-ramp, after the J4 and R2-1. Where multiple interchanges serve the same community, a Distance sign *should* only be installed after the last interchange serving that community. Where less than 3 miles exists between the on-ramp taper point and the next off-ramp theoretical gore, the Distance sign *may* be omitted.

2-15-51 Routine Sign Replacement Criteria

January 20152019

PURPOSE

Over time the visual characteristics of signs deteriorate as a result of weather, age and ultraviolet radiation, resulting in reduced legibility performance day and/or night. As a result, signs have to be changed periodically as part of a routine sign replacement. There are a number of mechanisms to accomplish the replacement of signs on the WisDOT system. Often questions arise as to when signs should be changed, who should change the signs and what criteria should be used in determining replacement. Therefore, it is necessary to have clear, consistent guidelines for the routine replacement of signs on state highways.

FEDERAL HIGHWAYS MINIMUM SIGN RETROREFLECTIVITY VALUES

Section <u>2A.08</u> of the MUTCD requires all units of government to use an assessment or management method that is designed to maintain the retroreflectivity of signs at or above the levels prescribed in the MUTCD Table 2A-3. To maintain compliance with the minimum sign retroreflectivity values in the MUTCD, WisDOT utilizes the following approved assessment and management methods:

- Blanket Replacement. All signs in an area/corridor are replaced at specified intervals. This commonly takes place during improvement projects.
- Expected Sign Life. Age of the sign is tracked and the sign is replaced when it meets its expected life. Current WisDOT expected sign life period is 12 years.
- 3. <u>Control Signs.</u> Replacement of signs in the field is based on the performance of a sample of control signs. The data from the control signs can provide engineering support to the Expected Sign Life method. Over time the Expected Sign Life replacement cycle *may* be revised based on data from the Control Signs test deck, which is located at the Madison Sign Shop yard.

DETAILED SIGN REPLACEMENT POLICY

General Sign Replacement due to age/condition of sign

- The Department's <u>Traffic Operations Asset Management System (TOAMS) Sign Inventory Management System (SIMS) shall be used to track inventory data on signs that include manufacture date of sign, sign sheeting code and condition of sign.
 </u>
- 2. Sign date and sheeting code tags shall be placed on the upper right corner on the back of Type II signs by the sign manufacturer or contractor. Type I signs shall have the sign date and sheeting code tag placed on the lower right corner on the back of the sign. The WisDOT Bureau of Traffic Operations Central (BTO) Sign Shop provides all date and sheeting code tags to sign manufacturers and
- In general, signs should be replaced on a twelve_year cycle, based upon the corridor replacement program, following the priority established by the Bureau of Traffic Operations_on an annual basis.
- 4. In general, signs needed for let projects will not be supplied through the <u>BTO Sign Shop. Region Sign Shops or Central Sign Shops.</u> The exception to this would be if there is an unexpected lack of signs by the contractor that *may* otherwise cause a delay in the completion of the project or needed for safety or operational issues. Detailed guidance is given below on the sign replacement criteria for let projects.
- For Type II signs not installed in projects. County Highway Departments, through Traffic Maintenance Agreements, should will handle the installation and maintenance. all of the other routine Type II sign replacements where a let project is not anticipated any time soon.
- WisDOT shall provide all signs to the County Highway Departments. There are statewide procurement contracts to handle this. Counties shall not furnish signs, other than TODS or TRANS 200 arrow boards that are covered by other policies.
- 7. Routine Type I sign replacements, that are not part of an improvement project, are to should be performed by the annual statewide Let Contract. The statewide open-end signing contractor should only be used for knock-down repairs and replacements of Type I signs, Type I or Type II Supplemental Traffic Generator sign installations or for safety or operational issues where the county cannot get to the site in the timeframe needed.
- 8. Any signs or posts that are damaged, illegible, leaning, not in proper orientation to the roadway *should* be repaired or replaced as soon as opportunities permit.

Sign Replacement Due to Changes in Sign Standards

- Signs no longer meeting mounting height, size, message, letter size or sheeting material criteria may be replaced through the following methods:
 - a. Let Project or refurbishment project in the area.
 - b. Knockdown, storm or vandalism damage that would cause the sign and/or posts to be replaced.
 - b.c. Utilization of 12-year corridor replacement plan.
- 2. Examples of signs not meeting standards would include:
 - a. Too low of mounting height.
 - b. Too close to roadway.
 - c. Wrong size sign used for roadway.
 - d. Wrong letter size used on sign.
 - e. Signs containing Engineer Grade sheeting.
 - f. Change of Standard in the MUTCD resulting in a compliance period.
 - g. Change of Signing Policy in the Traffic Guidelines Manual.
- If there is a safety issue/concern due to a sign not conforming to standards, the sign shall be replaced
 or removed as soon as practical. An example would be a restriction of motorist visibility due to an
 improper mounting height.
- Analysis of intersection crash data may be used to help determine if sign standards attributed to any safety issues.
- 5. The methods of sign replacement *should* be followed as explained in the <u>General Sign Replacement due to age/condition of sign part of this policy.</u>

Sign Replacement as part of Let Projects

When a Let project will take place in the area in the near future, the Region should strive to include all Type I and Type II sign replacements as part of the project. Typical Let projects may include roadway reconstruction, pavement overlays, base patching, joint repair and slurry seal projects. Typically the signs on the whole segment of the project would be replaced; however engineering judgment will have to be exercised on the part of the Region to determine the feasibility of this type of replacement.

Below are guidelines that shall should be followed to help determine if replacement of signs on a let project is feasible.

Type I signs

Overhead Type I guide signs should be replaced in all let projects. The recently published FHWA minimum sign retroreflectivity standards do not permit the usage of Engineer Grade or Encapsulated Lens high intensity sheeting for overhead guide signs. Exceptions to replacement of overhead mounted Type I guide signs can be made if the overhead Type I guide signs are prismatic high intensity sheeting or above and there is another let project programmed or scheduled on the same readway segment within the next five years. Any signs not conforming to WisDOT and MUTCD policies shall be replaced in the let project. Any exceptions to replacement of Type I signs shall be coordinated with the Region Traffic Engineering Supervisor.

All lighted overhead signs **shall** be replaced in the let project unless the signs already contain Type SH reflective sheeting.

- 2. In general, ground mounted Type I guide signs should be replaced in all let projects. Exceptions to replacement of ground mounted Type I guide signs may be made if signs that will be replaced in another let project that is programmed or scheduled on the same roadway segment within the next five years. Any signs not conforming to WisDOT and MUTCD policies shall be replaced in the let project. Any exceptions to replacement of Type I signs shall be coordinated with the Region Traffic Engineering Supervisor.
- . Per Department policy, type I guide signs should be replaced in qualifying improvement projects.

Commented [RM-D1]: We should discuss this further.

Formatted: Font: Bold

Formatted: Indent: Left: 0.5", No bullets or numbering

Exceptions to this policy include:

- It is not required to replace Type I signs on non-pavement-preservation preventive maintenance projects (see FDM 3-5-5), and
- It is not required to replace Type I signs on Group 3 pavement-preservation preventive maintenance projects (see FDM 3-5-5 - work consists of milling, rut filling, seal coating, microsurfacing and crack filling projects) because:
- When Group 3 pavement strategies are applied early in the pavement life cycle, most signing should still be in good condition.
- The work can easily exceed 10% of the project, i.e., it would not meet the requirement for incidental construction.

Exceptions to replacement of overhead mounted Type I guide signs can also be made if there is another improvement project programmed or scheduled on the same roadway segment within the next five years. Any signs not conforming to WisDOT and MUTCD policies shall be replaced in the improvement project. Any exceptions to replacement of Type I signs shall be coordinated with the Region Signing Engineer or Region Traffic Engineering Supervisor.

- 3-2. Galvanized steel I-beams *should* only be replaced if Type I sign is not at the proper offset (30 foot desirable / 17.5 foot minimum from edge line to edge of sign) or if the new Type I sign is larger. All corten steel I-beams and bases **shall** be replaced.
- 4-3. Steel I-beams and bases that are re-used *should* have the base bolts replaced by utilizing bid item 635.0300 (Sign Supports Replacing Base Connection Bolts).

Type II signs

- 1. In general, per Department policy, the replacement of Type II signs will be handled through maintenance as part of a 12-year corridor replacement schedule. However, there are situations that will require Type II signs to be placed in improvement projects that include:
 - Project is on a new alignment.
 - Projects that are installing new signs, signs that are not currently at the needed locations, e.g. changing intersection control or adding chevrons.
 - Updating or adding signs that were not there before, e.g. population, street name signs, overhead signs.
 - Placing no passing zone signs after the roadway has been re-spotted.
- 2. Projects that require removal, stockpiling and re-installation of Type II signs and posts will use the bid items of Moving Signs Type II and Moving Small Sign Supports.
- Designers should include an undistributed quantity of posts (10% of existing) to account for the
 replacement of any posts that are rotted, warped, too short or get damaged during the removal/reinstallation.
- 4. The designer should consult with the Region Signing Engineer or Region Sign Program Supervisor to confirm the use of improvement projects for the installation of Type II signs.
- All Type II signs should be replaced in all let projects. The recently published FHWA minimum sign
 retroreflectivity standards do not permit the usage of Engineer Grade on warning and guide signs. It is
 also WisDOT policy to not use Engineer Grade on any signs, including regulatory signs.
- Any exceptions to replacement of Type II signs shall be coordinated with the Region Traffic
 Engineering Supervisor. Exceptions for replacement of Type II signs may be made if all the following
 criteria are met:
 - a. If signs that will be replaced in another let project that is programmed or scheduled on the same roadway segment in the next five years.
 - b. If existing Type II signs are not damaged or do not have any other material defects.
 - c. If sign size, mounting height and lateral offset still meet WisDOT standards.
 - d. If sign message still conforms to WisDOT and MUTCD policies and minimum FHWA/MUTCD

Formatted: Bulleted + Level: 1 + Aligned at: 0.75" + Indent

Formatted: Indent: Left: 0.5", No bullets or numbering

Formatted: Font: Not Italic

Formatted: Indent: Left: 0.5", No bullets or numbering

retroreflectivity requirements.

Formatted: Indent: Left: 1"

2-15-52 Maintenance of Signs and Sign Post Designs

September 2014

PURPOSE

This policy establishes maintenance responsibility for signs and sign post designs on state trunk highways and crossroads intersecting state maintained highways, either by at-grade intersections or service interchanges. In addition, roundabouts often times add complexity for the responsibility of sign maintenance, especially for local and county roadway approaches. DOT improvement projects often include signs that are installed on county highways and local roads. Because the local unit idid not install the signs, there are often questions about the responsibility for maintenance, and many of these signs are left to deteriorate. On several occasions the local unit requests a special type of signpost to be used on state maintained highways through their community. As a result, questions arise as to what type of signposts are acceptable, who would maintain the posts and potential liability issues. Therefore, it is necessary to have clear, consistent guidelines for the maintenance of signing, and designs of signposts, on state maintained highways and at locations of local crossroads intersecting state maintained highways.

SIGN MAINTENANCE POLICY

WisDOT is responsible for maintenance of permanent signs on all state trunk highways. As part of its responsibility, WisDOT *may* contract for services to accomplish the maintenance and *may* require that others fund the costs, for example costs of supplemental traffic generator signs, as approved in <u>TEOpS 2-15-3</u>.

Should WisDOT allow a local unit of government to erect or maintain any signing, a permit in the form of a letter **shall** be signed by a representative of the local unit of government and the Region's Traffic Supervisor.

In addition, WisDOT is responsible for maintenance of certain other permanent signs on connecting roadways, local streets and business highways described below. It *should* be noted that this policy is not all-inclusive.

Intersecting and Interchanging Roadways (excluding roundabouts)

- 1. On local public roadways intersecting state maintained highways, WisDOT will maintain the STOP sign and directional assembly (J3 or J13 assembly), adjacent to the STOP sign.
- 2. On county roadways intersecting state maintained highways, WisDOT will maintain the STOP sign and directional assembly (J3 or J13 assembly), adjacent to the STOP sign.
- 3. On local and county roadway interchanges with state maintained highways, between the junction assembly (J1 sign) and the ramp, WisDOT will maintain the route markers and destination signs (D1 signs), including the junction assembly.
- 4. On local and county roadway interchanges with state maintained highways, between ramp to ramp, WisDOT will maintain all signs. An exception to this would be a special agreement with the local unit of government/county or if WisDOT would not have jurisdiction of the intersecting roadway.
- 5. On state and U.S. highway interchanges with state maintained highways, WisDOT will maintain all the
- 6. All advanced signing on local and county roads that intersect state maintained highways **shall** be the responsibility of the county/local unit of government to maintain, regardless of who installed it originally.
- 7. WisDOT will not maintain street name signs at the intersection.
- 8. For blinker stop signs and blinker stop ahead signs, refer to the separate policy for criteria and permits.

Roundabouts

- On all roundabouts with at least one WisDOT maintained approach roadway, WisDOT will maintain, at a minimum, the following signs:
 - a. Chevron bank (R6-4b)
 - b. One Way signs (R6-1R and R6-2R)
 - c. Yield signs (R1-2)
 - d. To Traffic From Left Plaque (R1-54)
 - e. Splitter island signs (J-3 or D1 series)

- 2. On state trunk highway approaches, including interchange ramps, WisDOT will maintain all signs, including overhead sign supports (See Figure 2).
 - On county and local road approaches, in addition to the Yield sign (R1-2), To Traffic From Left Plaque (R1-54) and One Way sign (R6-2R), WisDOT will also maintain any overhead guide signs that have an Interstate, U.S. or State highway shield on them, including their associated overhead sign support(s) (See Figures 3A and 3B). The county and/or local unit of government would maintain all other signs and associated sign structures on their approaches, including overhead regulatory lane control signs and the ground mounted map sign (D1-62 sign).
- 3. For roundabouts on Connecting State Highways, WisDOT will maintain any overhead guide signs that have an Interstate, U.S. or State highway shield on them, including their associated overhead sign support(s). For any overhead guide signs that exclusively contain business route signing, the local unit of government would maintain the sign and associated overhead sign support. WisDOT will also maintain any splitter island signs that have a U.S. or State route shield (J-3 or D1 series) and any U.S. or State reassurance marker (J4 series). All other signs in the roundabout on connecting highways shall be maintained by the local unit of government.
- 4. For roundabouts with county highway and/or local road approaches, it is recommended that early in the design process, a Maintenance Agreement be developed. By having the Maintenance Agreement developed early in the design process, the county or local unit of government will clearly have knowledge of what they are to maintain.

Some particular items that should be included in the Maintenance Agreement would include:

- Specific signs that WisDOT would maintain and what the locals/county would maintain. This
 would also include signposts.
- b. Specific overhead sign supports (if any), that WisDOT would maintain and what the locals would maintain
- Recommended inspection frequencies for overhead sign supports that the locals would maintain.

Connecting Highways and Local Streets

- On connecting highways WisDOT maintains only route markers and trailblazer assemblies, including
 overhead guide signs that contain interstate, U.S. and State route shields and their associated overhead
 sign supports or sign bridges. For any overhead guide signs that exclusively contain business route
 signing, the local unit of government would maintain the sign and associated overhead sign support.
- On local streets, upon coordination with the local unit of government, WisDOT would maintain only those trailblazer assemblies that are installed and/or approved by WisDOT.

Business Route Signing

- For business routes located on state maintained highways, WisDOT will install and maintain all route markers.
- When business routes of state highways are marked over county highways, local streets or highways, WisDOT may initially install route markers, but will not be responsible for their maintenance. The installation and maintenance of all other signs shall be the responsibility of the local unit of government.
- 3. Expanded guidance on the usage of business route signing is included in TEOpS 2-4-19.1.

SIGN POST DESIGN POLICY ON STATE MAINTAINED ROADWAYS

- On state maintained roadways, 4"x6" wood posts and 2"x2" square steel posts are typically used for sign posts. Municipalities may be allowed to install signs on customized posts. The municipality shall pay for the cost of the customized posts.
- 2. Any customized posts allowed **shall** be NCHRP 350 or MASH crash compliant. The municipality **shall** provide WisDOT a copy of the certification letter from the Federal Highway Administration.
- A permit for non-standard sign supports shall be filled out by the municipality and signed by the City/Village Engineer or Director of Public Works or Official Governmental Representative and, upon approval, the WisDOT Region Traffic Operations Engineer. A sample Application/Permit form is shown in Figure 4.
- 4. Municipalities may be allowed to paint the posts a neutral color that does not detract from the face of the

- sign. Acceptable neutral colors are black, brown or dark green.
- Red, white and orange colors **shall not** be used for signposts. A yellow color *may* only be used if the color is to mark a truck route. The municipality **shall** be required to have a local ordinance in place before painting the posts.
- 6. For any painted sign posts requiring replacement by WisDOT, the municipality will be responsible for repainting signposts. Any customized signposts requiring immediate replacement by WisDOT will be replaced with 2"x2" square steel posts or 4"x6" wood posts. The municipality may later replace the DOT installed post with a NCHRP 350 or MASH crash compliant customized post at their cost.
- 7. Municipalities shall not paint the backside of the signs.
- 8. Signs installed on customized sign posts **shall** meet WisDOT/MUTCD design and size standards. WisDOT **shall** provide the municipality with all state-owned signs to be installed on customized sign posts. WisDOT *may* require the municipality to replace signs due to age or damage of signs or changes to sign design standards. WisDOT reserves the right to replace existing signs on customized posts owned by the municipality.
- Sign installation and placement shall be to WisDOT standards. See Standard Sign Plates A4-3 and A4-4 for sign mounting height and lateral offset.
- 10. Existing customized posts on state maintained highways which are not NCHRP 350 or MASH crash compliant **shall** be replaced immediately with 2"x2" square steel posts, or 4"x6" wood posts. The municipality *may* later replace the DOT installed post with a NCHRP 350 or MASH crash compliant customized post at their cost.
- 11. Wood 4"x6" posts **shall** have 1 ½" diameter breakaway holes drilled into the 6-inch face of the post, (see figure 1). Breakaway holes are not required in 4"x6" wood posts if the post is mounted behind beam guard or concrete barrier.

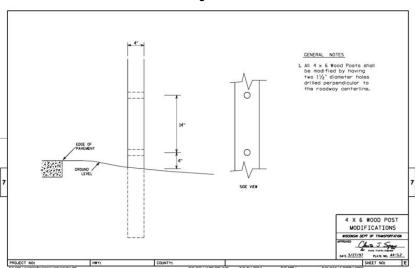
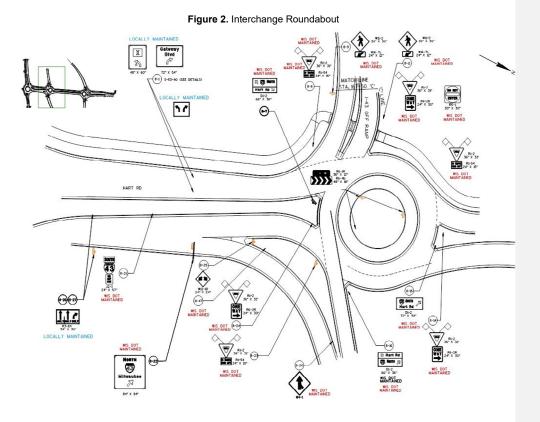
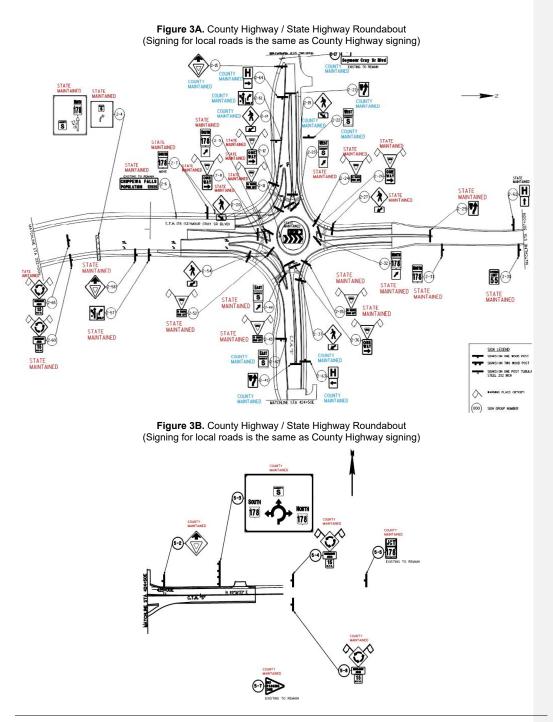


Figure 1



Page 78



Page 79

Figure 4. Custom Sign/Post Installation Permit

APPLICATION/PERMIT FOR CUSTOM SIGN POSTS

Wisconsin Department of Transportation 7/2014

When approved, this permit documents the terms and conditions or use by the municipality for installation and/or maintenance of custom sign posts on highways under the jurisdiction of the Wisconsin Department of Transportation. The applicant must obtain this approved permit prior to installation of custom sign posts.

Submit the completed application to the WisDOT Regional Office that has maintenance jurisdiction of the state trunk highway in the county where the posts will be located. A single application may be made for all installations along a continuous segment of highway.

Applicant (City, Village, Town):	County:
Mailing Address:	Area Code-Telephone Number:
	Email Address or FAX Number:
	Email Address of FAX Number:
Highway (STH/USH):	Local Street Name of STH/USH:
	Local direct Name of 611 Woort.
Installation Limits:	
From: Installation Type	To:
☐ Improvement Project Agreement – Project ID:	
Installation by Permit – Permit to Work on Highway R	ght-or-vVay (WisDOT form DT1812) required Items to Install:
Locations.	items to mstall.

Page 1 of 3

Installation Conditions

- Terms and conditions of this application/permit shall be in conformance with WisDOT Traffic Guidelines Manual Policy 2-15-52 *Maintenance of Signs and Sign Post Designs*. By entering into this agreement, the Municipality agrees to the terms and cost arrangements in this policy document.
- For permit requests or sign replacement, WisDOT shall furnish all standard state-owned signs to the municipality for installation on custom posts. For let project installations, the custom posts will be installed as part of construction let plans as non-participating item.

 All custom sign posts shall be NCHRP 350 or MASH crash compliant. A copy of the certification letter from the
- Federal Highway Administration shall be attached to this application for each manufacturer's model and style of custom post used.

 Replacement of custom posts from a different manufacturer or model shall require a new permit/application.
- The applicant shall retain a copy of this permit and supporting documentation for future reference.
- Custom post details shall be attached to this application. Region Traffic Operations Engineer shall approve final
- post design.

 Region Traffic Operations Engineer shall approve final sign locations. For Improvement Project Agreements, these locations shall be included on the final construction plans.
- The municipality shall be responsible for costs for removal should future highway projects require the removal of the custom posts.
- Sign installation and placement shall be to Wisconsin Manual of Uniform Traffic Control Devices and WisDOT
- This application shall be signed by the City/Village Engineer or the Director of Public Works or Official Governmental Representative.

X		
Authorized Representative		Date
Print Name	Title	
Approved for the W	isconsin Department of Transportation ;NE,NW,SE,SW) – County Number – Permit Number in county	
Permit Number	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
	X	
	Region Traffic Operations Engineer	Date
	Print Name	Area Code-Phone Number

INDEMNIFICATION

The Applicant shall save and hold the State, its officers, employees, agents, and all private and governmental contractors and subcontractors with the State under Chapter 84 Wisconsin Statutes, harmless from actions of any nature whatsoever (including any by Applicant itself) which arise out of or are connected with or are claimed to arise out of or be connected with any of the work done by the Applicant, or the construction or maintenance of facilities by the Applicant, pursuant to this permit or any other permit issued by the State for location of property, lines or facilities on highway right-of-way, (1) while the Applicant is performing its work, or (2) while any of the Applicant's property, equipment, or personnel, are in or about such place or the vicinity thereof, or (3) while any property constructed, placed or operated by or on behalf of Applicant remains on the State's property or right-of-way pursuant to this permit or any other permit issued by the State for location of property, lines or facilities on highway right-of-way; including without limiting the generality of the foregoing, all liability, damages, loss, expense, claims, demands and actions on account of personal injury, death or property loss to the State, its officers, employees, agents, contractors, subcontractors or frequenters; to the Applicant, its employees, agents, contractors, subcontractors, or frequenters; or to any other persons, whether based upon, or claimed to be based upon, statutory (including, without limiting the generality of the foregoing, worker's compensation), contractual, tort, or whether or not caused or claimed to have been caused by active or inactive negligence or other breach of duty by the State, its officers, employees, agents, contractors, subcontractors or frequenters; Applicant, its employees, agents, contractors, subcontractors or frequenters; or any other person. Without limiting the generality of the foregoing, the liability, damage, loss, expense, claims, demands and actions indemnified against shall include all liability, damage, loss, expense, claims, demands and actions for damage to any property, lines or facilities placed by or on behalf of the Applicant pursuant to this permit or any other permit issued by the State for location of property, lines or facilities on highway right-of-way in the past or present, or that are located on any highway or State property or right-of-way with or without a permit issued by the State, for any loss of data, information, or material, for trademark, copyright or patent infringement, for unfair competition or infringement of personal or property rights of any kind whatever. The Applicant shall at its own expense investigate all such claims and demands, attend to their settlement or other disposition, defend all actions based thereon and pay all charges of attorneys and all other costs and expenses of any kind arising from any such liability, damage, loss, claims, demands and actions.

Any transfer, whether voluntary or involuntary, of ownership or control of any property constructed, placed or operated by or on behalf of the Applicant that remains on the State's property or right-of-way pursuant to this

permit shall not release Applicant from any of the indemnification requirements of this permit, unless the State is notified of such transfer in writing. Any acceptance by any other person or entity, whether voluntary or involuntary, of ownership or control of any property constructed, placed or operated by or on behalf of the Applicant that remains on the State's property or right-of-way pursuant to this permit, shall include acceptance of all of the indemnification requirements of this permit by the other person or entity receiving ownership or control.

Notwithstanding the foregoing, a private contractor or subcontractor with the State under Chapter 84 Wisconsin Statutes, that fails to comply with sections 66.047 and 182.0175 Wisconsin Statutes (1985-1986), remains subject to the payment to the Applicant of the actual cost of repair of intentional or negligent damage by the contractor or subcontractor to any property, lines or facilities placed by or on behalf of the Applicant pursuant to this permit or any other permit issued by the State for location of property, lines or facilities on highway right-of-way, and remains subject to payment to the Applicant for losses due to personal injury or death resulting from negligence by the contractor or subcontractor.

Notwithstanding the foregoing, if the State, or its officers, employees and agents, fail to comply with sections 66.047 and 182.0175 Wisconsin Statutes (1985-1986), the State or its officers, employees and agents, remain subject to the payment to the Applicant of the actual cost of repair of willful and intentional damage by the State, or its officers, employees and agents, to any property, lines or facilities placed by or on behalf of the Applicant pursuant to this permit or any other permit issued by the State for location of property, lines or facilities on highway right-of-way, and remain subject to payment to the Applicant for losses due to personal injury or death resulting from negligence by the State, its officers, employees and agents.

No indemnification of private contractors or subcontractors with the State under Chapter 84 Wisconsin Statutes, shall apply in the event of willful and intentional damage by such private contractors or subcontractors to the property, lines and facilities of the Applicant located on the highway right-of-way pursuant to this permit or any other permit issued by the State for the location of property, lines or facilities on highway right-of-way.

Page 3 of 3

2-15-53 New Bypass Signing

January 2007

PURPOSE

Quite often, a highway bypass is constructed to divert traffic around a community, thus reducing traffic congestion and increasing traffic safety within the community. However, bypasses have the potential to

experience more crashes than expected when designed, due primarily to several human factors issues. Even when designed to the proper geometrics, drivers *may not* be mentally prepared for the increased speed of traffic on the bypass and the quick decisions that need to be made, as a result of the increased speed. This has led to several angle type collisions, primarily at intersections.

In February 2006, FHWA prepared a report for WisDOT that outlines several enhancements that *should* be made to increase safety at bypasses. Several of these enhancements include signing improvements. This policy provides requirements and guidance to the proper usage of signs for new bypasses on state maintained highways.

DEFINITIONS

<u>Freeways</u> are defined as divided highways with fully controlled access at interchanges only. Interstate Highways are freeways with the interstate route designation.

<u>Expressways</u> are defined as divided highways with partially controlled access by a combination of interchanges, at-grade intersections, and driveways.

<u>Conventional Highways</u> are defined as streets or roads other than freeways or expressways. They *may* be divided or undivided, two-lane or multi-lane, and access is available at intersections and driveways.

A <u>Bypass</u> is defined as a new route that diverts traffic around a community and re-connects to the existing routes on the outskirts of the community (See Figure 1).

POLICY

Sign Sizes

- 1. For all bypasses, regulatory, warning and school signs shall be minimum size code 3.
- 2. Route assemblies *should* be minimum size code 2 for conventional highways and minimum size code 3 for four lane divided and expressway bypasses.
- 3. Advance crossroad name signs (M1-94 sign) **shall** be size code 3 (8" upper case / 6" lower case) for all conventional highway bypasses 45 mph and higher and all four lane and expressway bypasses. Advance crossroad name signs (M1-94 sign) *may* be size code 2 (6" upper case / 4 ½" lower case) for conventional highway bypasses, less than 45 mph.

Regulatory Sign Installations

- Double up STOP signs (R1-1 signs) at all side roads (right and left signs). 200' minimum of centerline on the side road shall be used.
- 2. STOP signs (R1-1 signs) **shall** be installed in the pork chop islands or in the median island.
- 3. For median widths greater than 40' (measured from median edge of travel lane to median edge of travel lane), STOP (R1-1 signs) or Yield (R1-2 signs) signs should be installed as appropriate at the second crossroad intersection (in the median) of a four-lane bypass. Typically for median widths 30' or less, the Yield sign is used in the median to discourage any long trucks from hanging over into the adjacent travel lanes.
- 4. Cross Traffic Does Not Stop signs (R1-52C sign) shall be installed below all STOP signs (R1-1 sign) on both two lane and four lane bypasses. For four lane bypasses, the Cross Traffic Does Not Stop sign (R1-52C sign) should be placed below the Divided Highway sign (R6-3 or R6-3a sign).
- The One-Way sign (R6-1 sign) shall be used for all divided bypasses. The R6-1 One-Way signs shall
 be placed above the STOP sign (R1-1 sign). Refer to <u>TEOpS 2-15-12</u> (Wrong-Way Prevention) for
 additional criteria on Wrong Way signing.
- 6. Temporary orange warning flags *may* be added to all STOP signs (R1-1 sign). The flags *should* remain in place until the end of their useful life.
- The Divided Highway Now Open Use Proper Lane sign (R3-57 sign) should be installed 300–500 feet
 in advance of the intersection on side roads for divided highway bypasses. The sign shall remain in
 place for up to a year and then removed.

Warning Sign Installations

 Supplemental roadway name plaques below the crossroad warning signs (W2-1 and W2-2 signs) shall not be used. The crossroad warning sign and advanced crossroad name sign shall be on separate installations and spaced properly.

- 2. Crossroad warning signs may be installed at mainline intersections, regardless of sight distance issues.
- STOP Ahead or Signal Ahead signs shall be used on all side roads, regardless of sight distance. STOP
 Ahead or Signal Ahead signs may be doubled up.
- 4. Temporary orange warning flags *may* be added to all STOP Ahead signs and Signal Ahead signs. The flags *should* remain in place until the end of their useful life.
- 5. The Two-Way Traffic warning sign (W6-3 sign) shall be used if a two-lane bypass is graded or paved for a four-lane capacity that could make it appear like a four lane highway. The Two-Way Traffic warning sign (W6-3 sign) should be placed after major intersecting side roads or at least at two mile intervals and should not be doubled up.

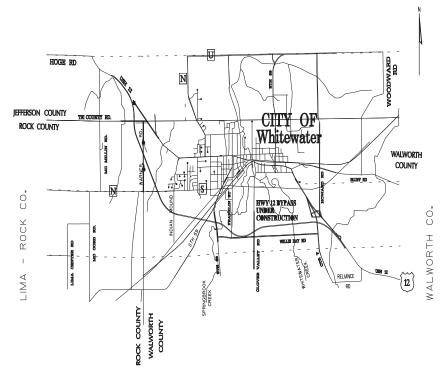


Figure 1. Sample of New Bypass Highway

2-15-55 Signing for J Turns

December 2011

BACKGROUND

The usage of the Restricted Crossing U-Turn (RCUT), or also referred to as a "J" turn intersection, has been a low cost intersection safety improvement method that was introduced in the early 1980's. A characterization of a "J" turn intersection is the prohibition of left turn and through movements from side street approaches. Instead, these side street movements are accommodated by requiring drivers to make a right turn onto the main highway, and then make a U-turn at a median opening downstream. Left turns from the main roadway onto the sideroad *may* be allowed to remain at the existing sideroad intersection, or, in the case of a full median closure, *may* be executed by making a U-turn at the downstream median opening and then turning right onto the sideroad.

The Federal Highway Administration has indicated several advantages in the "J-turn" concept over grade-separated interchanges and at-grade intersections. Some of these advantages include increased safety, better operational issues, lower construction costs and less right-of-way impacts. Other states that have implemented the J-turn concept have seen significant safety benefits by eliminating the "far side" right angle crash.

PURPOSE

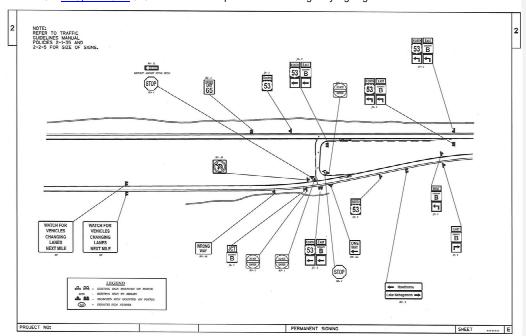
Currently the Federal MUTCD does not contain guidance on the signing of "J" turn intersections. As the construction of "J" turn intersections increases, it is critical to have a consistent signing practice for motorist expectations. The signing can be accomplished utilizing traditional regulatory, warning and guide signs outlines in the MUTCD.

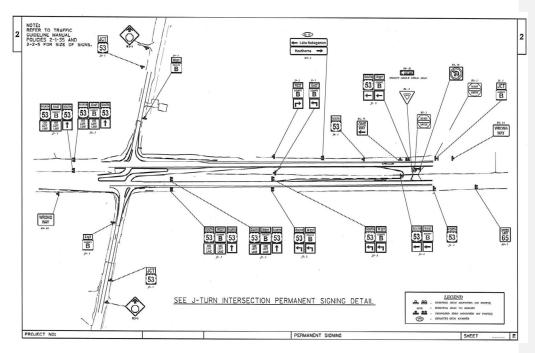
Below are guidelines that *should* be followed for the signing of "J" turn intersections:

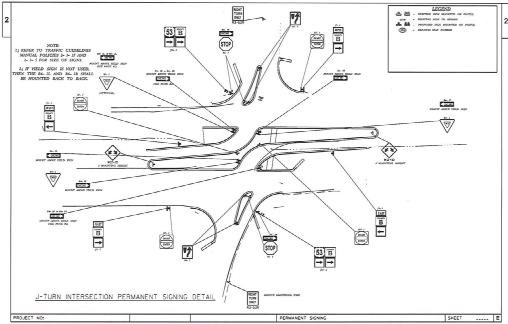
GUIDELINES

The attached typical signing plan should be sufficient for most intersections of this type.

- For numbered or lettered routes, advance directional and directional assemblies should be used. For
 routes that are not numbered or lettered, advanced street name signs should be used.
- 2. On divided roadways with posted speeds of 45 mph or greater or inadequate sight distance, advanced warning signs WATCH FOR VEHICLES CHANGING LANES NEXT MILE *may* be used as a warning to motorists for turning traffic.
- 3. TEOpS 2-15-12 shall be followed for placement of Wrong Way signing.







2-15-56 Signing for Diverging Diamond Interchanges

January 2015

BACKGROUND

The usage of the Diverging Diamond Interchange (DDI) is a relatively new development in highway design in the United States. DDIs allow free-flow left turns from the crossroad to the freeway on-ramps. This is accomplished by crossing traffic on the crossroad from the right-hand side to the left-hand side through the interchange area.

Several advantages in the DDI concept over traditional diamond interchanges include increased safety, increased capacity of left turn movements, and less right-of-way impacts.

PURPOSE

Currently the Federal MUTCD does not contain guidance on the signing of DDIs. As the construction of DDIs increases, it is critical to have a consistent signing practice for motorist expectations. The signing can be accomplished utilizing traditional regulatory, warning and guide signs outlined in the MUTCD.

Below are guidelines that should be followed for the signing of DDIs:

GUIDELINES

The attached typical signing plans *should* be sufficient for most interchanges of this type. Figure 1 shows a DDI with the crossroad over the freeway, and Figure 2 shows a DDI with the freeway over the crossroad.

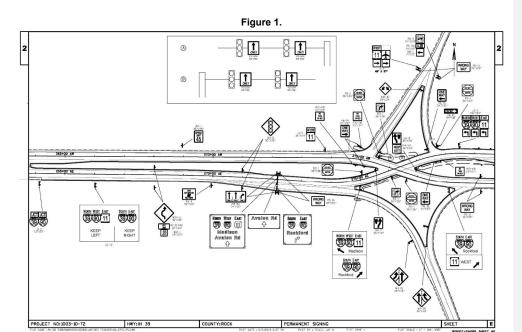
Field review of signing is critical before opening the DDI to traffic. Signing *should* be adjusted to ensure that wrong way prevention signs (Do Not Enter, No Left/Right/U-turns) are positioned to minimize the possibility of confusion for drivers.

Single-lane Crossroad Approach to DDI

- The double reverse curve warning sign (W24-1) should be used on all approaches to DDIs. The W24-1 sign shall be used on approaches to DDIs with safe operating speed less than posted/statutory speed of the roadway.
- 2. R3-50A signs should be installed above all through lanes on the signal mast arms within the DDI.
- 3. TEOpS 2-15-12 shall be followed for placement of Wrong Way signing. Sign plate R3-4R (reverse no U-turn) has been developed for use at the signals within the DDI.
- 4. TEOpS 2-4-44 should be followed for placement of guide signs.

Mulit-Lane Crossroad Approach to DDI

- The double reverse curve warning sign (W24-1L) should be used on all approaches to DDIs. The W24-1L with an advisory speed sign (W13-1P) shall be used on approaches to DDIs with safe operating speed 10 mph or more less than posted/statutory speed of the roadway. When a W24-1 is used, an appropriate supplementary plaque ("All Lanes", "Left 2 Lanes", etc.) shall be placed below the W24-1L.
- 2. R3-50A signs **shall** be installed above all through lanes on the signal mast arms within the DDI.
- 3. <u>TEOpS 2-15-12</u> **shall** be followed for placement of Wrong Way signing. Sign plate R3-4R (reverse no U-turn) has been developed for use at the signals within the DDI.
- 4. Approaching the DDI, advance overhead lane selection guide signs (E6 series) shall be used.
- For DDIs with the crossroad over the freeway, J2 and D1-7x series signs should be used within the DDI.
 For DDIs with the freeway over the crossroad, overhead guide signs shall be used in place of the J2 series signs.
- If overhead guide signs are used within the DDI, D1 or J3 series signs may be used at the on-ramp terminal within the DDI.



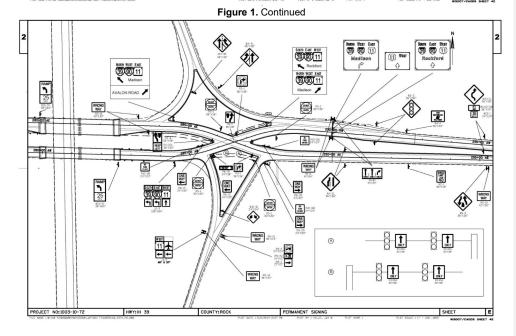
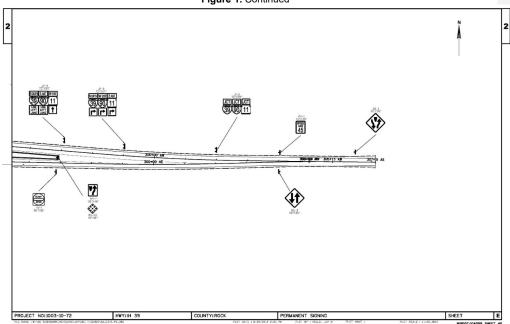


Figure 1. Continued





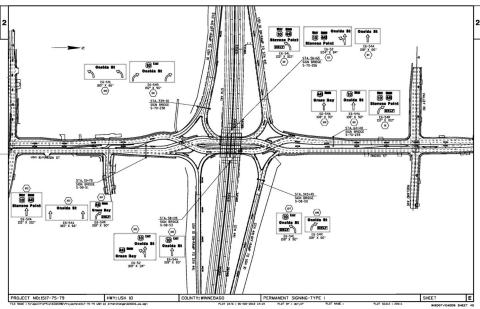


Figure 2. Continued

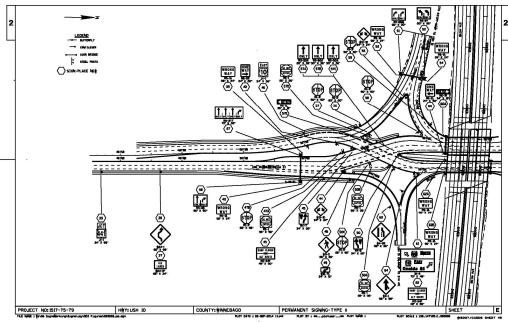
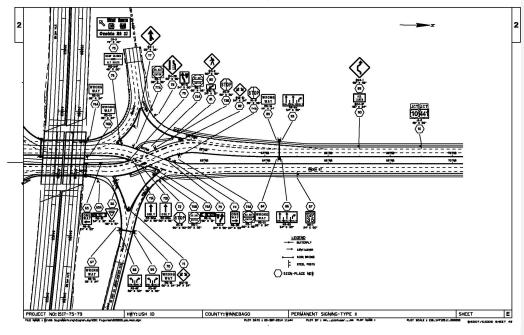


Figure 2. Continued



2-15-58 Specific Information Signs

April 2017

PURPOSE

The purpose of this policy is to provide consistent statewide direction for the permitted use of Specific Information Signs under Wisconsin Administrative Code Chapter Trans 200.06 and Wisconsin Statute 86.195.

The Specific Information Signs (SIS) have the business's logos on blue signs. These **shall** only be permitted on SIS highways.

DEFINITIONS

<u>SIS Highway</u>: SIS Highway *may* be a major highway, interstate, freeway, or expressway and are approved by the state legislature. In Trans 200.03, Chapter 86.195 contains all SIS approved highways. (https://docs.legis.wisconsin.gov/statutes/statutes/86/195/6/a)

POLICY

In addition, the following DOT qualifying considerations shall be met.

Gasoline

- Businesses shall be open a minimum of 16 hours per day, seven days a week for freeways and expressways.
- 2. Businesses **shall** be open a minimum of 12 hours per day, seven days a week for other highways.
- 3. Businesses shall provide a restroom, drinking water, and a public telephone.
- 4. Businesses shall provide vehicle services including fuel, oil and water.
- Businesses shall be within three miles of the exit unless no businesses are within the same category the maximum distance may be extended to 15 miles.

Food

- 1. Businesses **shall** be open five days per week and open from at least 10 a.m. to 7 p.m.
- 2. Businesses shall have licensing and approval where required.
- 3. Businesses shall have at least 50 percent of the gross receipts from food and non-alcoholic beverages.
- 4. Businesses **shall** have a public telephone.
- Businesses shall be within three miles of the exit unless no businesses are within this category the maximum distance may be extended to 15 miles.

Lodging

- 1. Businesses shall have licensing and approval where required.
- 2. Businesses shall have adequate sleeping accommodations.
- Businesses shall be within three miles of the exit unless no businesses are within this category the maximum distance may be extended to 15 miles.

Camping

- 1. Businesses **shall** have licensing and approval where required.
- 2. Businesses **shall** have restrooms, drinking water, and a public telephone.
- 3. Businesses shall have adequate parking accommodations.
- Businesses shall be within three miles of the exit unless no businesses are within this category the maximum distance may be extended to 15 miles.

Tourist Attractions

- The primary purpose shall be to provide amusement, historical, cultural, or leisure activities to the public.
- 2. The business shall have regional significance and adequate parking accommodations.
- 3. Businesses **shall** be within 30 miles of the exit.

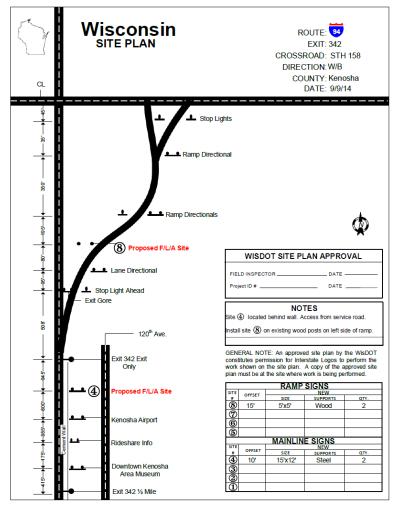
4. Applications shall be sent to BTO and forwarded onto the Advisory Council for approval.

Installation of Specific Information Signs
Contact Interstate Logos for an application.
4918 Triangle St.
McFarland, WI 53558
(844) 496-9163 or (608) 579-1570

www.wisconsin interstatelogos com

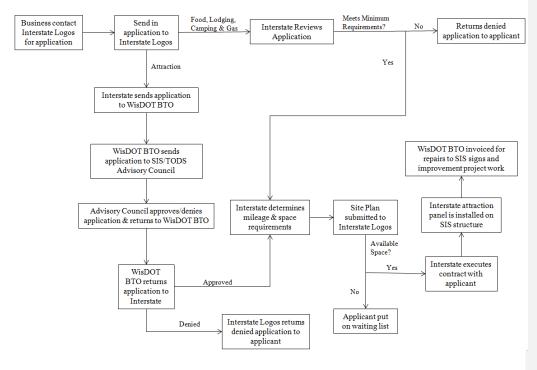
Improvement Projects

- Site Plans shall be requested from Wisconsin Logos (see attached example below).
- Project contractors shall not perform work on SIS signs.
- STSP 638-010 **shall** be included in projects with SIS signs.



The flow chart below describes the application process to obtain a SIS sign.

SIS Application Process



2-15-59 Tourist Oriented Directional Signs

April 2017

PURPOSE

The purpose of this policy is to provide consistent statewide direction for the permitted use of Tourist Oriented Directional Signs under Wisconsin Administrative Code Chapter Trans 200.08 and the <u>Wisconsin Statute</u> 86.196.

The Tourist Oriented Directional Signs (TODS) are white on blue signs. These are not permitted on SIS highways or in urban areas.

The application/permit form DT1864 incorporates Trans 200.08 and Statute 86.196 and specifies complete guidance on the use of these signs.

DEFINITIONS

SIS Highway: Specific Information Sign highways can be found in TEOpS 2-15-58.

<u>Federal Urban Area:</u> Federal urban areas are defined as "Urban Federal Aid Systems" with populations of 5,000-49,000.

<u>Urban Areas:</u> Urban areas are defined as urban boundaries with populations of 50,000 or greater.

GUIDANCE

The following businesses are qualified for a TODS sign under the gas, food, lodging, or camping categories.

Bed and Breakfast	Campground
Hotel	Motel
RV Park	Resort
Restaurant	Service Station
Coffee Shops	

The following table provides a list of facilities which, if open and available to the public, *may be* eligible for a TODS <u>attraction</u> sign.

ouon sign.			
American Indian Craft	Amusement Park		
Antique Shop	Art Gallery		
Bait and Tackle Shop	Beach (privately owned)		
Bicycle Rental	Boat Tour		
Boat/Canoe Rental	Brewery (with tours)		
Candy Store (Primary Business)	Cave (with tours0		
Cheese Factory Shop (Primary Business)	Farm Tour		
Ferry	Fish Farm		
Game Farm (open to Public)	Golf Course		
Hot Air Balloon Rides	Museum		
Orchard	Park		
Petting Zoo	Pick-Your-Own Fruits and Vegetables		
Rafting/Tubing Business	Sausage Factory Shop (primary business)		
Ski Resort/Hill	Stable		
Tree Nursery	Wildlife Refuge		
Winery (with tour)	Zoo		
Botanical Gardens	Fairgrounds		
Water Park	Casino/Bingo		

The following table proves a list of facilities which are *not* eligible for TODS <u>attraction</u> signs.

Tennis Court	Fireworks
Book Store	Go-Kart Track
Taxidermy Shop	Grotto
Car Rental	Health Club
Swimming Pool/Natatorium	Hobby Shop
Civic Center	Ice Rink/Arena
Conservation Area	Movie Theater
Outlet Mall	Religious Shrine
Sports Arena/Stadium	-

POLICY

TODS signs are intended for use in rural or outlying urban areas. They **shall not** be installed in Federal Urban Areas or Urban Areas due to sidewalks, terraces, and right of way constraints. TODS Signs **shall not** be installed in urban areas.

In addition, the following DOT qualifying considerations shall be met.

- 1. Name changes shall require cancellation of the old sign and issuance of a new permit.
- Only the name of the facility and mileage shall be allowed for guidance. Additional sign features, such as vacancy, hours of operation or products offered shall not be allowed on the sign or on an attached plague or board.
- 3. If a conventional highway facility qualifies for signs in more than one category (TODS, SIS, Trans 200 Guidance or Supplemental Guide sign), only one category will be allowed in each direction.
- 4. If outdoor advertising signs for the facility are within 1,000 feet of the intersection or entrance, guidance signs **shall not** be permitted.
- 5. Businesses shall be within five miles and have direct access of the State or U.S. Highway.
- 6. Businesses shall have no illegal outdoor advertising signs.

Category specific information:

Gasoline

- 1. Businesses **shall** have fuel, oil, and water available.
- 2. Businesses **shall** be open a minimum of twelve hours per day, seven days a week.
- 3. Businesses shall provide a restroom, drinking water, and a public telephone.

Food

1. Businesses shall have licensing or approval, where required.

- 2. Businesses **shall** be open five days per week and open from at least 10 a.m. to 7 p.m.
- 3. Businesses **shall** have at least 50 percent of the gross receipts from food and non-alcoholic beverages.
- 4. Businesses shall provide a restroom, drinking water, and a public telephone

Lodging

- 1. Businesses **shall** have licensing or approval, where required.
- 2. Businesses shall have adequate sleeping accommodations.
- 3. Businesses shall have parking accommodations.
- 4. Businesses **shall** provide restrooms, drinking water, and a public telephone.

Camping

Businesses shall have licensing or approval, where required.

Businesses shall have parking accommodations.

Businesses shall provide restrooms, drinking water, and a public telephone.

Tourist Attractions

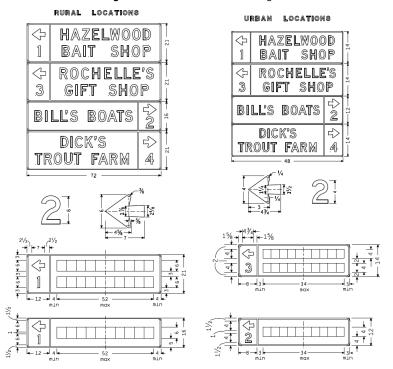
Businesses shall have licensing or approval, where required.

Businesses shall be open at least eight hours per day, five days a week for three consecutive months.

Businesses shall provide restrooms and drinking water

Businesses shall have significant interest to the traveling public, as approved by the Advisory Council.

Figure 1. Standard Plate for TODS signs



As shown on Figure 1 of the Standard Sign Plate E10-82, the sign message shall consist of 4 or 6 inch white

lettering on type H reflective blue background. Letter sizes and spacing **shall** conform to the standards in the FHWA Standard Highway Signs manual. Overall sign sizes used **shall** conform to the dimensions as shown on Figure 1 of the Standard Sign Plate E10-82. A half inch white border with a 1 ½" radius shall be placed around the sign.

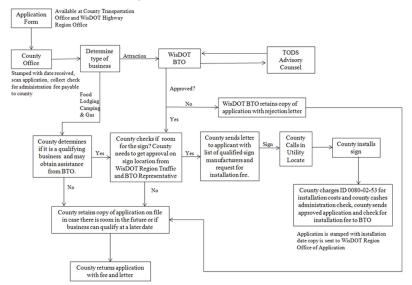
The WisDOT Region office reserves the right to remove non-conforming signs from the highway right-of-way. The owner *may* contact the WisDOT Region office to pick up any signs that have been removed. Upon pickup of the removed signs, the sign owner **shall** be responsible for sign removal costs.

Installation of Tourist Oriented Directional Signs by Counties

- Businesses shall bring in the completed <u>DT1864</u> form with a check payable to the county for the \$100/sign for administration fee. Businesses need to pay fee every 5 years.
- Once approved, the business may have the sign manufactured from one of the businesses on the Qualified Manufacturer list.
- The business shall bring in the sign along with a check for \$250 per sign payable to the Wisconsin Department of Transportation. These checks should be sent to: Wisconsin Department of Transportation, attn: Jeannie Silver, 3609 Pierstorff St. Madison, WI 53703.
- 4. Signs shall be mounted on 4" x 6" treated posts.
- For removal and/or installation of 1 sign on existing posts the cost is \$100 per sign for the installation fee. Checks *should* be sent to: Wisconsin Department of Transportation, attn: Jeannie Silver, 3609 Pierstorff St. Madison, WI 53703.
- **6.** All applications **shall** be forwarded to Jeannie Silver to verify the location is outside urban area boundaries.
- All county costs for TODS repairs and installations shall be charged to the 0080-02-53 project ID and appropriate invoicing shall be submitted to the requestor as outlined in item 3 above.
- 8. The county should only repair damaged TODS when directed to do so by the sign owner.
- 9. Any existing white arrow boards for the business **shall** be removed before a TODS sign is installed

The application process for a TODS sign is shown below in the Figure 2.

Figure 2. TODS Application Process



DT1864 8/2	2014		ECTIONAL S	IGN	APPLICAT		PERMIT Wisconsin Department of Transportation Check Payable To
Complete Submit a This is an the county Staple the This check Send this Commissi	INSTRUCTIONS: 1. Complete both sides of the form. PLEASE PRINT CLEARLY. 2. Submit a check for \$100 per sign. This is an administration fee. Make the check payable to the county in which the proposed sign(s) is (are) located. 3. Staple the check to the upper left corner of this application. 4. This check will be returned if the application is rejected. 5. Send this application and check to your County Highway Commissioner. Business/Service/Activity NAME for which TODS Sign is Requested		e to ited. cation. ed. way	Mail To			
Street Address,	, City, State,	ZIP Code					
Business/Service Gas Services Availa Restroor	ble at the Fa	Food	lich TODS Sign is Lodgin	g	sted. (Check ON Can	E) nping	☐ Tourist Attraction ☐ Public Telephone
Period of Busin		Activity Functi			en Each Year om (month/day):	To (month/day):
Hours of Opera	tion	OPEN	CLOSE		Annual Attenda		
Monday		☐ a.m. ☐ p.m.		a.m. p.m.	Number of V	isitors	
Tuesday		a.m.		a.m. p.m.	Special Rule for If you are apply the following:		Category a TODS sign under the FOOD category, please answer
Wednesday		☐ a.m. ☐ p.m.		a.m. p.m.	Yes I		Do you serve 3 meals per day? Are at least 50% of your gross annual receipts for
Thursday		☐ a.m. · ☐ p.m.		a.m. p.m.	Sign Conflicts	40 Z.	food and nonalcoholic beverages?
Friday		☐ a.m. ☐ p.m.		a.m.] p.m.	Yes 🗆	No 1.	Do you have a "White Arrow Board" sign (Ch. Trans 200.03, Wis. Admin. Code) at the
Saturday		☐ a.m. ☐ p.m.		a.m. p.m.	Yes 🗆	No 2.	intersection of the proposed TODS signage? Do you have an outdoor advertising sign, which is
Sunday		☐ a.m. ☐ p.m.		a.m. p.m.			not in accordance with s.84.30 Wis. Stats. or Ch. Trans. 201 Wis. Admin. Code?
Number of Sign	18	Proposed S	ign Wording				
One TOD	OS sign	Fill in the	name and the d	istanc	e from the inte	rsectio	n to the business/service/activity e character or space per box.
	tration fee	ior each I	ODS Sign requ	ested.	. Limit the nam	= 10 OF	e character of space per box.
is \$100 p the count	payable to by)						4
Two TOE	OS signs						
	payable to	,				=79	
		70					

Page 1 of 2

TOURIST ORIENTED DIRECTIONAL SIGN APPLICATION/PERMIT (continued)

PROPOSED SIGN LOCATION INSTRUCTIONS

- 1. Label the intersecting roads.
- Place an arrow in the circle pointing to the North.
 Check (X) one or two of the boxes ☐ corresponding to the proposed sign location(s). (TODS signs are only permitted on State Highways or U.S. Highways. They must direct motorists to businesses, which are located on County Highways or Town Roads.)
 Place an O (circle) at the approximate location of your business.

- 5. Write in the name of the county in the lower left corner.6. Write in any additional details or comments that would be helpful in determining the proposed sign location. (Optional)

Road Name	Road Name
	II Road Name
County	
	Road Name

CERTIFICATION

I, the applicant, certify that the statements contained on this application/permit are true and correct, and that the business identified is conducted in conformity to all laws applicable to nondiscrimination, and that discrimination is not exercised in regard to race, religion, color, sex, sexual orientation, or national origin. I understand that in addition to the attached administration fee, I am responsible for the manufacturing and installation costs for the proposed sign(s). I understand that this permit is revocable, and that it is subject to renewal every five years. I further understand that if my business is a seasonal business, that a "CLOSED" plaque will be placed on my sign when my business is closed for the season.

Applicant Name (First, MI, Last)		
	X	
(Area Code) Telephone Number	(Applicant Signature)	(Date – m/d/yyyy)

APPROVAL - APPROVED FOR WISCONSIN DEPARTMENT OF TRANSPORTATION

Subject to present and continuing compliance by the applicant with all requirements of s.86.196 Wis. Stats. and Chapter Trans. 200.08, Wisconsin Administrative Code, a permit is granted for the TODS sign described. This permit expires on the five-year anniversary date of the installation of the TODS sign panel.

x		x	
(WisDOT Region Traffic Engineer)	(Date - m/d/yyyy)	(State Traffic Engineer or Authorized Agent)	(Date - m/d/yyyy)

	For W	isDOT Use ONLY —			
SIGN SIZE	PE	RMIT NUMBER	IN.	STALLATIO	N DATE
☐ RURAL (72") ☐ URBAN (48")	County	Number	Month	Day	Year

Page 2 of 2

2-15-60 Trans 200 Guidance Signing

April 2017

PURPOSE

The purpose of this policy is to provide consistent statewide direction for the permitted use of guidance signs under Wisconsin Administrative Code Chapter Trans 200.

These narrow horizontal signs are only permitted on conventional state highways or expressway approaches to at-grade intersections. As prescribed in subsection Trans 200.03, these signs *may* be permitted to direct to:

- · resorts,
- hotels,
- · places of public entertainment or instruction,
- · any place of religious worship,
- any county institution,
- any scientific experiment location for the furtherance of agriculture or other science or art.

The term "entertainment" in this case does not include nightclubs, taverns, or similar establishments.

Trans 200.03, this policy, and the Application/Permit Form DT1903 specify complete guidance on the use of these signs.

DEFINITIONS

<u>Freeways</u> are defined as divided highways with fully controlled access at interchanges only. Interstate Highways are freeways with the interstate route designation.

Expressways are defined as divided highways with partially controlled access by a combination of interchanges, at-grade intersections, and driveways.

<u>Conventional Highways</u> are defined as streets or roads other than freeways or expressways. They *may* be divided or undivided, two-lane or multi-lane, and access is available at intersections and driveways.

GUIDANCE

The following table provides a list of facilities which, if open and available to the public, *may* be eligible for a White Arrow Board permit.

TYPE OF FACILITY	MAY BE ELIGIBLE QUALIFYING CONSIDERATIONS
Agricultural experiment	Q0.12.11.11.0 00110.12.10.11.01.0
Animal shelters	May be permitted for County Institutions only.
Athletic fields, facilities	May be permitted for facilities that do not qualify for supplemental signing, and community wayfinder signing is not available.
Aviation Flight School	
Cabins, Cottages	For rental periods less than 30 days
Camps, religious or youth	
Campgrounds, RV Parks	Privately owned with rental periods less than 30 days.
Churches	
Condominiums	Only if part of a resort, for rental periods less than 30 days
Convention Center	May be permitted for facilities that do not qualify for supplemental signing, and community wayfinder signing is not available.
Country Clubs	Only when open to the public
County Healthcare Facilities	
Cruises, Boat	
Environmental Center	
Exhibition, Exposition Center	May be permitted for facilities that do not qualify for supplemental signing, and community wayfinder signing is not available.
Golf Courses	Only when open to the public
Horseback Riding	Only when open to the public
Hotel, Motel, Bed & Breakfast	May be permitted as a substitute for "Lodging" category where SIS or TODS is not permitted.
Humane Society Shelter	May be permitted for County Institutions only.
Libraries	
Marinas	
Museums and historic sites	May be permitted for facilities that do not qualify for supplemental signing, and community wayfinder signing is not available.
Recreational facilities	Facilities open to the public for recreational activities including ATV parks;

	amusement parks; archery ranges; boat, kayak or canoe launches, tours or rental facilities; bowling alleys; casinos; caves; concert venues; curling venues; disc golf courses, fishing piers; go-cart tracks, hanggliding; horseshoe facilities; ice skating rinks; paintball facilities; playgrounds; riding stables; rock climbing; shooting ranges; skate parks; skydiving facilities; sledding hills; splash parks; swimming pools; tour providers (airplane helicopter, tram, boat, walking); volleyball courts; waterski or wake board shows; waterparks.
Religious Worship Facilities	
Research Facilities	
Resorts	For rental periods less than 30 days
Restaurants, Supper Clubs	May be permitted as a substitute for "Food" category where SIS or TODS is not permitted.
Schools	
Scientific Experiments	
Seminaries	Only if it contains a public place of worship.
Shooting Ranges, Gun Clubs	Gun clubs shall be open to the public as shooting ranges. See types of shooting ranges under Qualifying Considerations for Recreational Facilities.
Theaters	Live entertainment only
Trails - Recreation, Nature, Skiing, Biking, Hiking, Snowshoeing, Snowmobiling, ATV or other vehicle trails	Directing to trailhead access with parking.
Train rides	May be permitted as a substitute for "Attractions" category where SIS or TODS is not permitted.
Wildlife Refuges	To instructional centers only
Zoo	May be permitted for facilities that do not qualify for supplemental signing, and community wayfinder signing is not available.

The following table provides a list of facilities which are **not eligible** for a White Arrow Board permit. As a general class, all retail or wholesale sales or service establishments **shall not** be approved for White Arrow Board.

NOT ELIGIBLE

Agricultural Farms	Berry Patches	Cranberry Marshes	Tree Farms	
	Tree, Plant Nurseries	Produce Stands Greenhouses		
Air Traffic Control				
Animal Hospitals				
Animal Ranches	Game Farms			
Apartments	Buildings	Complexes		
Artists	Art Dealers	Artist Studios		
Auto Repair	Auto Body Repair			
Barber, Beauty Shops	T		T	
Builders, Contractors	Carpenters	Electricians	Landscapers	
	Painters	Plumbers	Tree Service	
Bus Terminals				
Cemeteries		(see <u>TEOpS 2-15-3</u> & <u>2-15-20</u>		
- CII - C		re: Veterans Cemeteries)		
Clinics				
Crafts supplies, outlets				
Dance Halls				
Factories				
Freight Terminals Government Offices				
Halfway Houses Health Clubs				
Highway Departments Maintenance Facilities				
Historic Neighborhoods				
Hospitals				
Jails				
Kennels				
Lakes	Landings			
Malls, Shopping Centers				
Mental Health Facilities (except County)				
Mobile Home Parks				

Movie Theaters			
Nursing Homes, Assisted Living, Private			
Office Buildings			
Pharmacies			
Post Offices			
Power Plants Utilities			
Private Clubs			
Realtors			
Recycling Station			
Rehabilitation Centers (exc	cept County)		
Residences			
Retirement Facilities (except County)			
Sales, Retail or Wholesale		Antique Dealers	Auto Dealerships
	Bait & Tackle Shops	Grocery Stores	Hardware Stores
	Home Furnishings	Home Improvements	Liquor Stores
	Lumber Dealers	Materials Suppliers	Mobile Home Sales
Storage Units	Storage Units		
Subdivisions			
Taverns	Bars	Pubs	Taps
Taxidermists			
TV & Radio Stations			
UW Extension Offices			
Veterans Memorials			·

POLICY

White Arrow Boards are intended for use in rural or outlying urban areas. They *should not* be installed in dense urban areas due to sidewalks, terraces, and right of way constraints.

In addition, the following DOT qualifying considerations shall be met.

- 1. The facility **shall** be open to the public.
- 2. Lodging facilities **shall** have three or more units that **shall** be available for less than 30-day rental periods.
- 3. Signs may only be permitted on the state highway(s) nearest the facility.
 - a. Directing to its entrance from the state highway, or
 - b. Directing to its entrance on a local road.

Signs directing to facilities beyond other state, US, or Interstate highways shall not be permitted.

- Guidance signing shall not be permitted on the right of way at the entrance to a facility if there is sufficient sight distance in which to identify the activity, facility or other type of signing at the entrance. This applies both to businesses that front the roadway and also to those not fronting the roadway, but are visible from the roadway. Minimum visibility distances, based on the posted speed, are found in the following table from MUTCD Section <u>2C.36</u>.
- 2. Businesses shall have the appropriate operating licenses to receive, maintain, or renew a permit.
- 3. Name changes ${\bf shall}$ require cancellation of the old and issuance of a new permit.
- Only the name of the facility shall be allowed for guidance. Additional sign features, such as vacancy, hours of operation or products offered shall not be allowed on the sign or on an attached plaque or board.

Posted Speed	Minimum Visibility Distance		
25 mph	280 ft		
30 mph	335 ft		
35 mph	390 ft		
40 mph	445 ft		
45 mph	500 ft		
50 mph	555 ft		
55 mph	610 ft		
60 mph	665 ft		
65 mph	720 ft		

5. If a conventional highway facility qualifies for signs in more than one category (TODS, SIS, White Arrow

Boards or Supplemental Guide sign), only one category will be allowed. In this case, the White Arrow Boards *should* be discouraged because it is not retroreflective.

- 6. If outdoor advertising signs for the facility are within 1,000 feet of the intersection or entrance, guidance signs **shall not** be permitted.
- 7. No more than one arrow board for a facility **shall** be permitted on a state highway in each direction.
- 8. Guidance sign assemblies shall be limited to a maximum of six arrow boards.
- 9. There *may* be a maximum of two guidance sign assemblies per intersection approach in the same direction

As shown on Figure 1 of the DT1903 form, the sign message **shall** consist of $4\frac{1}{2}$ -inch black block lettering on a non-reflective white background. Letter sizes and spacing **shall** conform to the standards in the FHWA Standard Highway Signs manual. Overall sign sizes used **shall** conform to the dimensions as shown on Figure 1 of the DT1903 form

The WisDOT Region office reserves the right to remove non-conforming signs from the highway right-of-way. The owner *may* contact the WisDOT Region office to pick up any signs that have been removed. Upon pickup of the removed signs, the sign owner **shall** be responsible for sign removal costs.

Upon approval as a qualifying facility, the region *may* issue the permit Form DT1903, "AUTHORITY TO ERECT DIRECTIONAL SIGNS ON THE STATE HIGHWAY SYSTEM APPLICATION". There is no permit fee.

Installation **shall** be by the requestor's choice of a WisDOT approved signing contractor or county signing crew in accordance with Department signing standards as detailed on Figure 2 of the DT1903 form. All costs of sign manufacturing, installation, maintenance, and modification of assemblies **shall** be the responsibility of the requestor(s).

Installation of White Arrow Board Signing by Counties

- 1. If the sign is fabricated by the County, all charges **shall** be charged to the business. Installation costs **shall** be charged to project ID 0080-02-63.
- New installation of the sign shall be \$250 per sign with 4 x 6 treated posts. For removal and/or installation of 1 sign on existing posts the cost will be \$100 per sign.
- Requestor shall make checks payable to the Wisconsin Department of Transportation, attn: Jeannie Silver, 3609 Pierstorff St. Madison, WI 53703.
- 4. The county *should* only repair damaged white arrow boards when directed to do so by the sign owner.
- 5. All county costs for white arrow board sign repairs **shall** be charged to the 0080-02-63 project ID and appropriate invoicing **shall** be submitted to the requestor as outlined in items 2 and 3 above.

AUTHORITY TO ERECT DIRECTIONAL SIGNS ON THE STATE HIGHWAY SYSTEM APPLICATION Wisconsin Department of Transportation (WisDOT) DT1903 9/2015 (Replaces ET602) Submit completed applications to Wisconsin Department of Transportation Regional Office Business/Service/Activity Name for which White Arrow Board sign is Requested Street ZIP Code Email Address Phone Number Proposed Sign Location Instructions Label the intersecting roads. Place an arrow in the circle pointing to the North. Check (x) in the boxes corresponding to the proposed sign location. Write the name of the county in the lower left corner. Road Name Road Name County Proposed Sign Wording Number of Signs (select one): Fill in the name of the business. Limit the name to one character or space per box. Signs shall contain 4.5" black, block lettering on white background. C 1 Sign C 2 Signs Sign placed on (select one): New Posts C Existing Posts I apply for authority to erect and maintain guidance signs at the locations listed on this application. I certify and agree that these signs will conform to the approved design of the Wisconsin Department of Transportation and that I will comply with all the regulations under which authority these signs may be erected. I also certify that I will comply with the attached figures Applicant Signature X WisDOT Region Signature Date

AUTHORITY TO ERECT DIRECTIONAL SIGNS ON THE STATE HIGHWAY SYSTEM APP (continued)

Wisconsin Department of Transportation DT1903

Sign Erection Regulations

Extracted from Chapter Trans 200, Wisconsin Administrative Code

Trans 200.02 Authority for the erection of signs.

- 1. The Department of Transportation or its authorized representatives in the case of the marked routes of state trunk highways, and local authorities with respect to highways under their exclusive jurisdiction, may place and maintain such traffic signs and signals as they deem necessary to warn, guide, inform, and regulate traffic, and also such signs and signals as are expressly permitted or required by the statutes or by these regulations, subject, however, to such limitations and restrictions as are contained in the statutes and these regulations.
- 2. The Department of Transportation with respect to the state trunk highway system, and local authorities with respect to highways under their jurisdiction, may erect or permit any department of the federal, state or local government to erect such standard signs as the Department of Transportation or local authorities deem necessary to inform and warn the public of federal or state laws, local ordinances and lawful regulations by any such department.

Trans 200.03 Guidance signs for resorts, hotels, county institutions, etc.

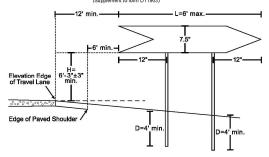
- Any person or persons conducting a summer or winter resort, hotel, or any place of public entertainment or instruction, or any place of religious worship, or persons having charge of any county institution or of any scientific experiment for the furtherance of agriculture or other science or at may be permitted to erect guidance signs of a type approved by the Department subject to the conditions contained in this section.
- 2. No guidance sign may be permitted on freeways, including the national system of interstate highways.
- Only where such institution or business location is removed from the state trunk highway system may such guidance signs
 he exected
- Such guidance signs may be erected at only two intersections of the state trunk highway system with county highways or town
 roads, and at such intersections of county or town highways as are deemed necessary by the local authorities having jurisdiction
 over those highways.
- 5. One sign of an approved size and shape may be erected at the entrance to any of the enumerated institutions or businesses
- 6. No person may be permitted to erect or maintain a guidance sign on a highway if that person has any advertising in the vicinity of the intersection where the guidance sign is proposed to be erected or has a business sign under 200.06 on the same highway
- All guidance signs erected on any public highway shall be of a type and design approved by the Department. No flashing, illuminated, or reflecting signs or installation shall be permitted.
- 8. No guidance sign may be erected upon state trunk highway right of way at an intersection with the state trunk highway system until the location and manner of erection of the have the written approval of the Department. No guidance sign may be erected on the right of way of a country and town highway until the location and manner of erection of the sign have the written approval of the local authorities having jurisdiction over the said highway.
- All guidance signs and their supports shall be maintained in good condition. <u>Signs or installations not satisfactorily maintained</u> shall be removed by the officers in charge of the maintenance of the highway.

Trans 200.04 Prohibited signs and signals.

- No person may erect, cause to be erected, permit to be erected or maintain any advertising, warning, route, guide, information, or regulatory sign or signal within the limits of any highway except as authorized in sections 200.02, 200.03, 200.05 or 200.06.
- No person may place or maintain nor may any public authority permit upon any highway any official traffic control device bearing thereon any commercial advertising except as authorized in 200.06.

AUTHORITY TO ERECT DIRECTIONAL SIGNS ON THE STATE HIGHWAY SYSTEM APP (continued)

Figure 2. Typical Installation Detail for Arrow Board Signs (Supplement to form DT1903)

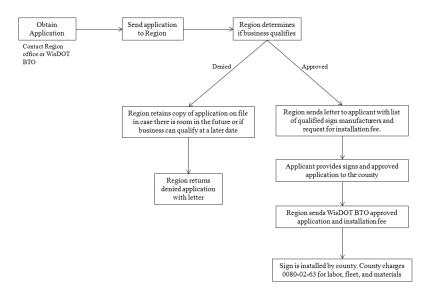


Sign Installation Requirements:

- The Requestor shall contact the county highway department or WisDOT approved Signing Contractor for installation of the signs. Counties should charge all installation and repair costs to ID 0080-02-63. Counties will invoice charges to the requestor. Payment shall be made to: Wisconsin Department of Transportation, Attn: Jeannie Dammen, 3609 Pierstoff Street, Madison, WI 53704.
- Signs are to be mounted per dimensions shown above.
- Sign posts are to be treated wood 4 x 4's or 4 x 6's suitable for ground contact.
- Signs less than 4 feet in length may be mounted on a single post, all other dimensions shown above apply.
 Signs are to be mounted to project approximately 1 inch above the top of the post.
- 6. If multiple signs are "stacked" on the same posts, all signs are to be the same length. In this case, the minimum mounting height shall be 5' 3" for rural areas.
- Sign assemblies shall be limited to a maximum of six signs per side.
- There may be a maximum of two guidance sign assemblies per intersection approach in the same direction
 Contact Diggers Hotline prior to any excavation (800) 242-3500.
- 10. 7-Ply Highway Grade High Density Overlay Plywood (5/8") should be used for the sign base material.

The flow chart below describes the application process for a White Arrow Board.

White Arrow Board Process



2-15-61 Signing and Marking Maintenance of Roadside Facilities

February 2017

PURPOSE

In addition to the roadways maintained by the Department, there are several types of ancillary facilities that are either constructed or maintained by the Department. This includes rest areas, SWEFs, waysides, park & ride lots, etc. These facilities *may* be maintained either by the Department, or by county or municipal forces via signed agreements. In the past, the maintenance of signs and pavement markings for these facilities has been inconsistent, due to lack of guidance as to how they *should* be maintained. This policy will clarify which signs and pavement markings are to be maintained by the Department, and how this maintenance **shall** be funded.

POLICY

Rest Areas

All rest area signing and pavement marking **shall** be maintained by the Department. All signs along the mainline highway **shall** be paid for either under the standard county RMA Project ID (00XX-01-65) or the appropriate improvement project. In addition, all signing along the exit ramp, up to and including the R8-74 (Cars, Trucks, Trailers, etc.) sign, and all signs along the entrance ramp beginning with the R1-2 (Yield) sign, **shall** also be paid for either under the standard county RMA Project ID or the appropriate improvement project. These signs **shall** be replaced as part of the normal sign replacement cycle.

All sign and pavement marking replacement within the rest area, between the R8-74 sign and the R1-2 sign, **shall** be paid for under the Rest Area maintenance Project ID, which will be provided by the Bureau of Highway Maintenance. These signs and pavement markings **shall** be maintained by the department, and *should* be replaced on the normal replacement cycle. The Region **shall** coordinate with BHM before replacing any signs or pavement markings within rest areas.

Waysides

All wayside signing and pavement marking **shall** be maintained by the Department. All signs along the mainline highway **shall** be paid for either under the standard county RMA Project ID or the appropriate improvement project. This includes any regulatory signs (R1-1, R5-1, R6-2, etc.) located at the wayside driveway. These signs **shall** be replaced as part of the normal sign replacement cycle.

All sign and pavement marking replacement within the wayside shall be paid for under the Wayside maintenance Project ID, which will be provided by the Bureau of Highway Maintenance. These signs and pavement markings shall be maintained by the department, and should be replaced on the normal replacement cycle. The Region shall coordinate with BHM before replacing any signs or pavement markings.

SWEFs (Safety and Weight Enforcement Facilities)

All SWEF signing **shall** be maintained by the Department. All signs and pavement markings along the mainline highway **shall** be paid for either under the standard county RMA Project ID or appropriate improvement project. The signs and pavement markings **shall** be replaced as part of the normal replacement cycle.

All sign and pavement marking replacement within the SWEF **shall** be paid for under the appropriate maintenance Project ID for that SWEF, which will be provided by the Bureau of Highway Maintenance. These signs **shall** be maintained by the department, and *should* be replaced on the normal replacement cycle. The Region **shall** coordinate with BHM before replacing any signs or pavement markings.

Park & Rides

The Department has several Park & Ride lots that were constructed under WisDOT LET projects, but that are maintained by either the county or municipality via signed agreement. The Region *should* read these agreements to verify which signs the Department is responsible for. This *may* include off-system directional (D4-series) signs. These signs **shall** be paid for either under the standard county RMA Project ID or the appropriate improvement project, and **shall** be replaced as part of the normal sign replacement cycle.

The Department also has several Park & Ride lots that do not have any such maintenance agreements. For these lots, all signs and pavement markings **shall** be maintained by the Department. These signs and pavement markings **shall** be paid for under the standard county RMA Project ID, and **shall** be replaced as part of the normal replacement cycle.



3-2-1 Longline Marking

November 2016September 2018

GENERAL

The purpose of this policy is to provide specific guidance for the uniform application of long line markings on State Highways under DOT jurisdiction. The MUTCD Section 3B contains further guidance on longline markings.

Centerline Markings

Centerline markings shall be a 4" wide yellow line. Dashed lines shall be 12.5' long with a 37.5' gap.

Centerlines markings shall be marked on:

- All highways under DOT jurisdiction
- Through all intersections with local roads on two-lane state highways.
- On undivided multilane highway with a double yellow line

Centerline markings **shall not** be marked through:

- Intersections where the state highway is more than two lanes
- Intersections where Interstate, US, or State Highways intersect
- · Signalized intersections
- All way stop
- Intersections with opposing left turn lanes.
- · Stop lines or marked crosswalks.

Further information on centerline markings are located in Section 3B.01 of the MUTCD.

Edge line Markings

The MUTCD Section <u>3B.06</u>, describes edge line markings in more detail. Edge line markings **shall** be a 4" white line on the edge of the roadway except the left most edge line on a divided highway **shall** be yellow.

Edge line markings **shall:**

- Continue through all driveways (commercial or private) except major commercial driveways (big box stores, etc.) with a full width turn lane.
- Be used on freeways and expressways
- Be used on rural arterial roads with a traveling width of at least 20 feet and an ADT > 6,000 vehicles per day
- Urban areas with a travel lane of 16 ft. or greater.

Edge line markings **shall not** continue through:

- Intersectingens roadways with more than two lanes
- Intersections where Interstate, US, or State Highways intersect
- Intersections with opposing left turn lanes
- Signalized intersections
- Stop controlled intersections
- Commercial driveways meeting intersection design standards with full width paved turn lanes.

Edge lines *should* be used in urban areas or semi urban areas that do not have curb and gutter as required in MUTCD Section <u>3B.07</u>. <u>Edge lines *should* be used in urban areas where a single paved width is 16 ft or greater.</u>

Edge Lines Adjacent To Urban Curb & Gutter Sections

POSTED SPEED	IS THERE CONTINUOUS LIGHTING?		
POSTED SPEED	YES	NO	
≤ 30 mph	No	Optional	
35 mph or 40 mph	Optional	Recommended	
≥ 45 mph	Recommended	Required	

Lane Line Markings

Lane lines **shall** be marked to delineate traffic traveling in the same direction. Lane lines **shall** be a 4" wide white line that is 12.5'_foot long with a 37.5-foot' gap between lines. Lane lines **shall** be marked on all state highways

under DOT jurisdiction. Lane lines **shall** be marked through minor intersections and major T-intersections on the state highways, see SDD 15C8 sheets b and c.

Dotted Lane Lines

According to the MUTCD Section <u>3B.04</u>, a dotted line (3' line, 9' gap) *maybe* used as a substitute lane line. This line **shall** be 4" wide and **shall** be used to separate a through lane that continues beyond an intersection or interchange from an adjacent lane under the following conditions:

- A deceleration or acceleration lane
- A through lane that becomes a mandatory turn or exit lane (<u>SDD 15C8-sheet e, SDD 15C28 SDD 15C31 sheet b</u>)
- Auxiliary lane
- Tapered Exit Ramps (SDD 15C31 sheets a, b, and d)
- Parallel Exit (Deceleration) Ramps (<u>SDD 15C 31 sheet eb</u>)

Dotted Extension Lines

Dotted extensions **shall** be added to provide guidance past exits or *may* be added through intersections on curves where the edge of the traveled lane is unclear. A dotted extension line *may* be continued through an uncontrolled movement of a state highway intersection with another highway. If these lines are used through an intersection hey **shall** be 2' lines with a 6' gap and the same width as the line that is being extended see in <u>SDD 15C8-17</u> sheet ec.

Channelizing Lines

Channelizing lines shall be white and 8" in width. Channelizing lines shall be used in the following locations:

- In advance of an exit ramps or intersections to distinguish a lane. (3 foot line with a 9 foot gap) SDD 15C8-17 sheet eb.
- In advance of freeway route splits with dedicated lanes.
- To separate a through lane that continues beyond an intersection from an adjacent auxiliary lane between two intersections SDD 15C8 sheet -17b
- Exit gore markings shall extend fifty feet past the unpaved neutral area and 300 feet to begin the gore line, as shown on <u>SDD_15C_8_13g and SDD 15C31 sheet b.</u>
- Entrance gore marking shall follow SDD 15C31 sheet 3 1a

Channelizing markings shall not be marked through:

- · Signalized intersections.
- Intersections at a 4 way stop.
- Stop lines or marked crosswalks.

Bike Lane

If bike lanes are marked, they-it are typically shall be at least 5 ft wide, and a minimum of 4 feet from a longitudinal joint. Use a 5 foot width at 45 mph or higher, with 4 ft of continuous, pavement, wide. Refer to SDD 15C29-6a in the FDM. The words "BIKE LANE" or the bike symbol maybe used to delineate the bike lane. Signing may also be used to supplement the marking. The DT2500 form shall be completed to permit locals to install/maintain bike lanes and the DT2137 form shall be completed to permit the locals to install/maintain Shared Lane Markings.

The usage of green pavement marking for bike lanes or bike boxes **shall not** be allowed on state maintained roadways.

3-2-2 No-Passing Zone Standards

February 2017

GENERAL

No-passing zones are marked and signed on state maintained highways to indicate where a driver cannot safely complete a passing maneuver under normal light and weather conditions. In addition to the zones required by inadequate sight distance, certain other conditions warrant short zones or no-passing zone extensions which are marked by no-passing barrier lines. Although sufficient sight distance *may* be present at these locations, the passing operation is not appropriate under state law or for safety reasons as documented in an engineering study.

Formatted: Default Paragraph Font, Font: (Default) Courier

Unmarked zones (where passing is allowed) allow the driver to make a decision based on rules of the road and circumstances, such as oncoming traffic, reduced visibility due to fog, low light, rain or smoke, turning traffic, or vehicles entering from side roads or driveways. **No-passing zones** should not be marked to eliminate all possible conflicts.

<u>Wisconsin Statute 346.10</u> allows passing another vehicle in a rural (non-business regional, non-residential regional) intersection, unless the intersection is designated by signals, stop signs, yield signs, or warning signs. Routinely marking zones through minor intersections and/or driveways would significantly reduce legal passing areas available to the driver, increasing non-compliance and unsafe passing in less favorable locations where adequate sight distance *may not* be available.

NO-PASSING ZONE CRITERIA

No-passing zones **shall** be marked at all locations on the State Highway system that have insufficient sight distance for a vehicle to safely complete a passing maneuver under normal light and weather conditions. **The establishment of these zones shall be based exclusively on the sight distance required for the posted speed and the highway characteristics.**

The following criteria **shall** be used to mark no-passing zones:

SIGHT DISTANCE

Each Region has either a No-Passing Zone Sight Distance Map or spreadsheet listing the sight distance criteria on The State Trunk Highways. Either is available from your Regional Traffic Section. Typical sight distances are shown in the following table, but other criteria such as ADT or geometrics *may* change or alter those requirements.

Posted Speed Limit	No-Passing Zone Sight Distance		Minimum Distance Between Zones	
(MPH)	(mile)	(feet)	(mile)	(feet)
25-30	0.10	528	0.10	528
35-40	0.13	686	0.10	528
45-50	0.16	845	0.13	686
55	0.21*	1,110*	0.15	792

^{*} When authorized by the designated Regional Signing/Marking Engineer, the 55 MPH No-Passing Zone, sight distance *may* be increased from 0.21 to 0.26 miles on certain higher volume highway segments, due to higher frequency of crashes and/or a demonstrated history of excessive speeding above the posted limit.

The specific characteristics and factors leading to the increase or decrease of the No-Passing Zone sight distance from the DOT 55 MPH standard of 0.21 mile, *should* be documented in the Region.

For 55 mph posted speed roadways, during the project design process, the designer **shall** contact the Region Signing/Marking Engineer to determine the correct No Passing Zone Sight Distance to be used. STSP 648-005 **shall** be inserted into the Special Provisions with the correct No Passing Zone Sight Distance for 55 mph posted speed roadways.

REQUIRED EQUIPMENT

- Use two vehicles that provide a target on the lead vehicle 42 inches above the roadway. The observer's
 eye in the trailing vehicle shall be 42 inches above the roadway. Whatever type of target is used, it
 shall have a sharp cutoff when it disappears and appears.
- A Distance Measuring Instrument (DMI) shall be used and shall have an accuracy of at least 10 feet per mile. The DMI shall decrease the measured distance when the vehicle backs up.
- 3. Two-Way communication equipment is required for the two vehicles.
- At a minimum, a full-width flashing yellow light bar with 360 degree visibility shall be used. Additional signs and flashing lights on the vehicles are recommended.

PROCEDURE FOR LOCATING AND MARKING NO PASSING ZONES

- 1. LOCATING NO PASSING ZONES
 - Prior to beginning work on locating no passing zones, the project engineer or Region Signing/Marking Engineer shall be contacted to determine if there are any special no-passing zones to mark under the contract.
 - The No Passing Zone sight distance shown in the table in part B shall be followed.
 - The termini of no-passing zones **shall** be established to an accuracy of +/- 50 feet (0.01 mile).

- When the distance between two successive no-passing zones is less than the minimum distance shown
 in the table in part B, the two zones shall be connected.
- For roadways with speed limit changes, the proper no-passing zone sight distance in the table in part B shall be maintained. For locations where the posted speed limit is increasing, when the lead vehicle reaches the increased speed sign, the trail vehicle would back up until the appropriate no-passing zone sight distance is achieved. For locations where the posted speed limit is decreasing, once the trail vehicle reaches the first decreased speed regulatory sign, the lead vehicle would back up until the appropriate no-passing zone sight distance is achieved.
- On horizontal curves, no part of the line of sight shall extend outside the shoulder (see Figure 1). No
 passing zones shall be located and marked on the inside radius of horizontal curves. If the horizontal
 curve requires a No Passing Zone, the starts and ends of the zones shall be recorded in the cardinal
 direction.

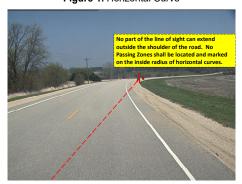


Figure 1. Horizontal Curve

On vertical curves, whenever the target light disappears from sight, the crew shall check for blind spots.
For a crest vertical curve, if the target light on the lead vehicle goes out of sight, the trail vehicle parks at
the base of the hill. The lead vehicle shall back up to reveal a full silhouette of the rear of the car (from
the bottom of the bumper up). Once the trail vehicle sees the full silhouette of the lead vehicle, the trail
vehicle shall back up to establish the sight distance between the 2 vehicles before marking the roadway
(see Figure 2).



Figure 2. Crest Vertical Curve

For sag vertical curves, if the target on the lead vehicle goes out, the lead vehicle shall stop at the base
of the hill or in the sag. The trail vehicle shall pull forward until they see a full silhouette of the lead
vehicle. Once the trail vehicle sees the full silhouette of the lead vehicle, the lead vehicle shall pull

forward to establish the sight distance between the 2 vehicles before marking the roadway (see Figure 3)

Lead car stops at base of the Hill
Position I. Trail car pulls forward and stops
when a full silhouette is seen from the
bottom of bumper up. The trail car radios
his DMI reading to the front car.

Figure 3. Sag Vertical Curve

- If the no passing zone is less than 500 feet in length, the zone shall be extended to 500 feet by lengthening
 the zone at its beginning in each traffic direction.
- The correctness of no-passing zones leading into and out of the project limits shall be checked. Ensure
 that the minimum distance between zones and the sight distance are checked.

MARKING MATERIAL

- The beginning and end of all no-passing zones **shall** be marked on the roadway by the marking of T's and dots with white spray paint (for asphalt) and black spray paint (for concrete).
- T's **shall** be 12" X 12" and 2" stroke. Dots **shall** be 3" 4" in diameter.
- The paint material used to mark the road **shall** be durable enough to be readily visible for one year after application.

RECORDING OF NO PASSING ZONES

The WisDOT Standard No Passing Zone Log (form <u>DT2124</u>) **shall** be used to record the No Passing Zones (see Figure 4). Include the following data on the No Passing Zone Log Sheets:

- Date of survey on each sheet.
- County and Route on each sheet.
- The cardinal direction of travel (for east west roads, record in the easterly direction, for north south roads, record in the northerly direction).
- All starts and ends are logged in miles to the nearest 1/100th of a mile.
- The beginning and ending of each no-passing zone line in both directions.
- The sight distance and speed criteria for each zone.
- The location of landmarks (intersecting U.S., State and County trunk highways, bypass lanes, truck climbing lanes, passing lanes, county boundary lines, railroad crossings, starts and ends of bridges and regional boundaries).

NO-PASSING BARRIER LINE CRITERIA

- No-passing barrier lines, 500 feet in length, shall be marked on an undivided STH approach in the following intersection situations:
 - The STH traffic is controlled by a stop sign.
 - The intersection with the STH is controlled by a signal.
 - The intersection with the STH is controlled by a roundabout.
 - At a T-intersection with a standard bypass lane that allows vehicles proceeding straight to pass to the
 right of a left turning vehicle without leaving the paved portion of the highway as per <u>SDD 15C8-b</u>, a 500foot barrier line **shall** be installed prior to the start of the bypass taper.
- 2. A no-passing barrier line **shall** be marked in the following non-intersection situations:

- In advance of a divided highway. The marking configuration shall extend a barrier line 500 feet in
 advance of the island or median nose so passing is prohibited entering into the divided highway. This is
 illustrated on the Standard Detail Drawing titled "Signing and Marking For Two Lane to Four Lane
 Divided Transitions", located in the Facilities Development Manual. (SDD 15C21)
- In advance of a painted median island. The marking configuration shall extend a barrier line 500 feet in advance of the separation of the double yellow center line. This is illustrated on the Standard Detail Drawing titled "Median Island Marking", located in the Facilities Development Manual. (SDD 15C18)
- Bridges having a width less than 24 feet. The marking shall include a 500 foot barrier in advance of the
 actual structure as shown on the Standard Detail Drawing titled "Traffic Control Devices for Two-Lane
 Bridges", located in the Facilities Development Manual. (SDD 15C6)
- Railroad grade crossings. The barrier line shall be placed 500 feet prior to each approach (unless
 markings are not required, as provided in the MUTCD). The configuration of the marking is shown on
 the Standard Detail Drawing titled "Pavement Marking Details for Railroad-Highway Grade Crossings"
 and located in the Facilities Development Manual. (SDD 15C9)
- Passing Lanes. The pavement marking configuration shall extend a barrier line 500 feet in advance of
 the beginning of the taper. This is illustrated on the <u>SDD 15C8-c</u> and <u>SDD 15C8-d</u>, "Pavement Marking
 (Climbing Lane & Passing Lane)", located in the Facilities Development Manual. A bypass lane for an
 intersection is not considered a passing lane under this guideline.
- Truck Climbing Lanes. The pavement marking configuration shall extend a barrier line 500 feet in advance of the beginning of the taper. This is illustrated on the <u>SDD 15C8-c</u> and <u>SDD 15C8-d</u>, "Pavement Marking (Climbing Lane & Passing Lane)", located in the Facilities Development Manual.
- Undivided 4 lane roadways. Any stretch of roadway with this configuration shall have the opposing lanes
 designated by a barrier line for its entire length and shall have barrier lines of 500 feet in length on the
 approaches to this section.

SPECIAL NO PASSING BARRIER LINES

No-passing barrier lines **shall** be marked with the approval of the designated Regional Signing/Marking Engineer in the following situations. When marked, they *should* be documented in the Region.

- At any intersection when justified by an engineering study. Appropriate reasons include a crash history
 related to passing maneuvers or demonstrated operational problems. The 500-foot barrier line would end
 at the near edge line of intersecting road and *may* be placed in only one direction based on operational
 need. This is illustrated on the SDD 15C8-13b, "Pavement Marking (Intersections)", located in the
 Facilities Development Manual.
- In low speed urban areas, double yellow barrier lines may be placed when justified by an engineering study. Criteria for the engineering study include curb and gutter, reduced speed, parking allowed, poor stopping sight distance, closely spaced driveways or intersections, and high pedestrian volumes. The double yellow lines should be installed from the start of the curb and gutter to the end of curb and gutter through the urban area. When urban double yellow lines are used, 500-foot barrier lines shall be placed on the approaches to this special layout, unless a longer no-passing zone takes precedence.
- At a T-intersection with roadway pavement that allows vehicles proceeding ahead to legally pass to the
 right of a left turning vehicle without leaving the paved portion of the roadway, a 500-foot barrier line prior
 to the start of the bypass taper will be optional based on engineering judgment.

MARKING NO-PASSING BARRIER LINES

Barrier lines, as designated above, shall have a minimum length of 500 feet.

On State Trunk Highway approaches with stop or signal control, the barrier line would end at the stop line, theoretical stopping point or marked crosswalk. Each approach on the State Trunk Highway *should* be considered separately.

Barrier lines **shall** be connected into adjacent no-passing zones when there is less than minimum distance between zones, as described in the NO-PASSING ZONE CRITERIA section of this policy.

Where allowable barrier lines are justified, the traffic engineer **shall** give the crew locating no-passing zones specific directions as to where barrier lines are to be placed.

SIGNING

A No-Passing Zone pennant sign (W14-3) **shall** be installed as required in <u>TEOpS 2-3-38</u>, supplementing zones established under this guideline. This sign **shall** be placed no more than 50 feet from the start of the no-passing barrier line unless it's impossible due to location on a bridge deck or other exception.

Sign quantities for moving the existing W14-3 sign **shall** be paid for separately and listed in the Permanent Signing Miscellaneous Quantities Sheet in the plan. If moved, the sign location **shall** be based on placement of the beginning of the revised no passing zone.

3-2-3 Special Marking July 2018

GENERAL

Special pavement markings consist of arrows, symbols, words, stop lines, crosswalks, diagonals, and aerial/vascar enforcement markings. These markings *may* be used to supplement signing. When used, they **shall** conform to the requirements in Section <u>3B</u> of the MUTCD, and the following guidelines.

POLICY

All special markings shall be white and reflective.

Arrows

In general, arrows are used to supplement signing. There are 3 main types of arrows that WisDOT uses:

- 1. Lane Control Arrows
 - To supplement signing for complicated lane assignments and turn lanes. For mandatory turn lanes, the installation of arrows are required, per SDD 15C8 sheet-47b
- 2. Wrong Way Arrows (Type 4)
 - On any freeway off-ramp with high crash rates or unusual or poor geometrics.
 - Intersections or ramps with demonstrated problems of wrong way driving.
- 3. Lane Drop Arrows (Type 5)
 - On any lane drop with high crash rates.

Use SDD 15C7 sheet c and d for the size and shapes of these markings.

Words

Words currently allowed by WisDOT can be found ion SDD 15C7 sheets a and 12b and SDD 15C29 sheet e and f for the size and shape of these words. All words should be used at a site with a documented safety problem and discussed with the regional traffic engineer.

- The word, "ONLY", may only be used with singular Type 1 or Type 2 lane use arrows. The word, "ONLY", shall not be used in a two-way left turn lane.
- The word, "SCHOOL", either single or dual lane marking, shall only be used when one of the following criteria applies:
 - o In advance of a marked crosswalk, which is typically monitored by a school crossing guard.
 - At a mid-block or uncontrolled intersection. The requestor shall be responsible for maintenance of the "SCHOOL" marking in combination with the crosswalk marking. This shall be documented on the application/permit form, DT2136 and the crosswalks policy under the "Type of Crosswalk Marking, Other". The required detail shall comply with SDD 15C7.
 - o Should not be installed in a parking lane.
- "BIKE LANE" **shall** only be used with a signed bike lane.
- "YIELD" shall only be used at roundabouts.
- The word, "OK", shall not be used on any state maintained highways.

Symbols

Symbols shall conform to the SDD15C7 sheet a and shall only be used when the following criteria applies:

Field Code Changed

- At a site with a documented safety problem.
- Supplement to regulatory signage.
- At the discretion of the regional traffic engineer.

Chevron/Diagonal Markings

Chevron/Diagonal markings provide added emphasis to the neutral area of the gore. Chevron markings *may* be applied at gores. Refer to the FDM SDD 15C 31 sheet a and b SDD 15C8-13g, h, and i.

Stop Lines

Stop lines indicate where vehicles are required to stop at intersections. Stop lines are not required at all intersections, but *may* be desired if:

- An approach to a signalized intersection where detection is installed and stopping at a certain point
 may enhance the operation.
- Intersection approaches with unusual geometrics such as large skew angles or non-symmetric
 approaches.
- · Complex multilane approaches.
- An approach to an intersection with the STOP sign installed well in advance of the desired stopping
 point because of curb radii.
- In advance of a marked or unmarked crosswalk with significant pedestrian volumes.

For placement of stop lines refer to <u>SDD 15C33</u>. If the stop lines are required by the department, the Department will maintain the markings. All other stop lines and crosswalks *may* be marked by contract at the request of the municipality with the understanding that the local agency assumes responsibility for the maintenance

Crosswalks

Crosswalks mark the path at which pedestrians *should* cross the roadway by delineating paths on approaches to and within signalized intersections, and on approaches to other intersections where traffic stops. As a secondary purpose, crosswalk markings *may* also serve to alert drivers of a pedestrian crossing point without signal or stop control. At non-intersection locations, crosswalk markings legally establish the crosswalk

The Department policy for installation of crosswalks is as follows:

- Crosswalk markings should be installed at signalized intersections where pedestrian signal
 indications are present and at locations where there is a signed school crossing.
- Crosswalk markings should not be installed at non-intersection, mid-block locations or urban
 locations where posted speed limits are 45 MPH or more, unless traffic controls (all-way stop,
 signal, roundabout) or crossing enhancements (curb bump outs, median divider island, etc.) are
 present.
- Non intersection crosswalk markings shall not be permitted at rural locations with a posted speed limit of 45 MPH or more. Exceptions may include trail crossings where advance warning signs are present.
- A permit for crosswalk markings should not be approved if a sidewalk or trail approach and/or ADA-compliant curb ramps (where there is curb) do not currently exist or are planned outside the roadway limits on both sides of the crosswalk approach. Per approval of the Region Traffic Engineer, the local government may be permitted to maintain existing crosswalk markings without sidewalk and/or ADA-compliant curb ramps as long as the local unit of government agrees to become compliant with the next highway project (regardless of sidewalk or curb work) or local sidewalk project.
- A permit for crosswalk markings shall not be approved unless parking is prohibited within 15 feet of the near limits of the crosswalk, as referenced in Wisconsin State Statute 346.53(5).

Crosswalk Type Selection

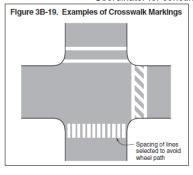
There are 2 types of crosswalks that WisDOT allows as shown in Figure 3B-19 of the MUTCD

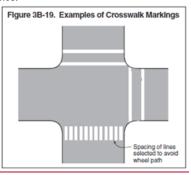
- <u>Two 6Two 6</u>" Transverse Lines (<u>at all intersections</u>, <u>excluding roundabouts</u>)
 - Preferred method due to:
 - Reduced mMaintenance cost
 - Less marking area to become slippery and cause problems
 - Reserve Save ladder bar for the areas with safety issues
- 24" Ladder Pattern
 - o (Only for mMidblock crossings

Roundabouts

Two 6" Transverse Lines for single and multi-lane roundabouts.

The 24" Ladder Pattern may be utilized for Mmulti-lane roundabouts where there is a high presence of pedestrians during peak hours or a demoenstrated operational or safety issue. Consult the Region Traffic Engineer and Bike/Ped Coordinator for concurrence.





Crosswalk markings *should* be placed as nearly perpendicular as possible to the direction of travel on the roadway. The following form needs to be completed to permit a municipality to install and maintain a crosswalk DT2136. A signed copy of the permit **shall** be sent to the local unit of government and a copy **shall** be filed in the Region office.

Special Marking Treatments for Crosswalks

FHWA has published an official MUTCD Ruling, dated August 15, 2013 that allows subdued-colored aesthetic pavement treatments between legally marked transverse crosswalk lines. However, the following criteria **shall** apply:

- The colored pavement treatment **shall not** be made of retroreflective material.
- Transverse crosswalk lines shall delineate the edges of the crosswalk and shall be 2-6" white transverse lines.
- Examples of acceptable aesthetic pavement treatments include brick lattice patterns, paving bricks, paving stones, cobbles or other types of paving. All treatments cannot impede wheelchair pedestrians.
- Examples of acceptable colors for aesthetic pavement treatments are red, rust, brown, burgundy, clay, tan or similar earth tone equivalents.

Aerial Enforcement and Vascar Enforcement Bars

Aerial and Vascar Enforcement Bars are transverse markings placed on the roadway to assist law enforcement agencies in the enforcement of speed regulations. These markings are a series of two to five bars with a center-to-center spacing of 660 ft. and **shall** conform to the <u>SDD15C14</u>.

- Aerial –These lines are utilized by airplane to determine vehicle speeds from the air.
- VASCAR (Visual Average Speed Computer and Recorder) These lines are utilized at ground locations for speed monitoring and verification of distance traveled.

Wisconsin State Patrol is the authority on these markings in cooperation with the Division of Transportation

Formatted
Formatted: Font: (Default) Arial

Formatted

Formatted: Font: (Default) Arial

Formatted: Indent: Left: 0.5", Space Before: 0 pt

Formatted: Font: (Default) Arial

Formatted: Bulleted + Level: 2 + Aligned at: 1.78" +

Indent at: 2.03"

Formatted: Font: (Default) Arial

Formatted: Font: (Default) Arial

System Development to determine the quantity and locations of these markings for the use on state trunk system. Wisconsin State Patrol will notify the Regional traffic office for new locations that are needed or those that need to be remarked. Actual marking of the lines will be done by the Special Marking Contractor as the work schedule permits. A representative of State Patrol shall mark the locations of the lines with a small paint stripe prior to placing markings. A car can be provided by State Patrol for Traffic Control during the marking process, if the project engineer deems it necessary.

Parking Restrictions

Yellow curb markings may be installed on state highways to restrict parking. Yellow curb markings shall be accompanied by No Parking Signs or covered in State Statute 346. WisDOT will not pay for or maintain these markings.

Formatted: Indent: First line: 0.2"

Formatted: Font: Italic

November 2016

March 2017

3-2-4 Island Marking

PURPOSE

This policy explains the concept of how islands shall be marked consistent with MUTCD Section 3B.23

POLICY

Channelizing lines **shall** be placed upstream and adjacent to islands. The color of the pavement marking adjacent to the island **shall** be indicative of the function of the island

- If an island separates traffic flowing in the same direction, such as a right or left turn island, the pavement
 markings along the island shall be white.
- If an island separates opposing traffic, such as a median island, the pavement markings shall be yellow.

Channelizing lines may be extended to address a demonstrated problem.

Refer to SDD 15C188 (e) and 15C27 for details on how to mark a Turn Lane Island, Median, and Corrugated Median

Field Code Changed

3-2-11 Raised Pavement Markers

PURPOSE

Raised pavement markers are used to either supplement or substitute longitudinal pavement markings. These retroreflective units are either placed on top of or embedded into the pavement. Section <u>3B.11 to 3B.14</u> of the MUTCD covers the installation of raised pavement markers, and Section <u>6F.79</u> covers temporary raised pavement markers. This policy will clarify application of raised pavement markers on WisDOT maintained roadways.

POLICY

The color of the raised pavement markers shall match the color of the line that they supplement or substitute.

Plowable raised pavement markers **shall not** be used on state-maintained roadways. Existing plowable raised pavement markers **shall not** be covered over during a resurface project and **shall** be removed, prior to resurfacing the roadway.

Temporary Raised Pavement Markers, Type I (Pucks)

Temporary Raised Pavement Markers Type I *may* be used in construction zones to supplement pavement marking through shifting tapers. If used in shifting tapers within construction zones, temporary raised pavement markers **shall** remain in place until the traffic staging changes. They **shall** be placed every 50 feet.

Temporary Raised Pavement Markers, Type II (Tabs)

Temporary Raised Pavement Markers Type II **shall** be used to substitute pavement markings which are completely covered. Permanent markings **shall** be installed within 14 days of the marking being obliterated.

On undivided roadways, W8-12 "NO CENTER LINE" signs **shall** be used to warn motorists of a roadway without any centerline until temporary or permanent markings are installed. These signs **shall** be placed at the beginning of the project, at two-mile intervals throughout the project, and at locations where traffic enters the project area from intersections with state trunk and county trunk highways.

On undivided roadways, prior to the existing marking being obliterated, the locations of the existing pavement

markings, including no passing zones, **shall** be documented. In addition, prior to the existing marking being obliterated, the R4-1 DO NOT PASS sign **shall** be installed at the beginning of the no passing zones. Additional R4-1 DO NOT PASS signs **shall** be installed within any no-passing zone that continues beyond an intersection with a state or county trunk highway or that exceeds one mile in length. The R4-2 PASS WITH CARE sign **shall** be installed at the downstream end of the no passing zones. Once the permanent pavement marking has been re-established, the R4-1 and R4-2 signs **shall** be removed.

If the above signs are in place for less than seven continuous days and nights, rollup signs and stands *may* be used in lieu of post mounted signs.

Same-day pavement marking may be used in lieu of using Temporary Raised Pavement Markers, Type II.

The standard application of Temporary Raised Pavement Markers, Type II **shall** be installed as shown on Standard Detail Drawing 15C34-3.

Same Day Pavement Marking or if Roadway is Detoured During Construction

If temporary same day pavement marking is being installed or if the roadway is detoured during construction, a reduced amount of temporary raised pavement markers may be used to locate the centerline and channelizing lines. At a minimum, the following spacing requirements shall be used for Temporary Raised Pavement Markers, Type II for same day pavement marking operations:

- Centerline, Lane Line, and Edge Line Marking: Place temporary pavement markers at 100' spacing.
- Place temporary pavement markers at beginning and ends of barrier lines.
- Beginning of 8 " channel line: Place two temporary pavement markers side by
- Dotted 8" Line: Place 1 temporary raised pavement marker at the beginning of the segment of dotted line.
- If the roadway is detoured during construction, the R4-1 DO NOT PASS, R4-2 PASS WITH CARE and W8-12 NO CENTER LINE signs may be omitted, provided a liquid marking is installed before the roadway is reopened to traffic.

Formatted: Font: (Default) Arial, Underline

Formatted: Left, Space Before: 0 pt, Widow/Orphan control, Tab stops: Not at -0.75" + -0.5" + 0" + 0.31" + 0.63" + 1" + 1.31" + 1.63" + 2" + 3"