INTRODUCTION

Following the 2010 U.S. Census,70 the Milwaukee urbanized area boundary extends beyond the Southeastern Wisconsin Region across the boundary line between Waukesha and Jefferson Counties, comprising a 2.7 square mile area immediately west of the City of Oconomowoc. The year 2010 census and adjusted boundary of the Jefferson County portion of the Milwaukee urbanized area is shown on Map M.1. Being designated an urbanized area brings with it Federal requirements for metropolitan, or areawide, transportation planning and programming for the urbanized area, including preparation of a long-range regional transportation plan (RTP) and short-range regional transportation improvement program (TIP). These requirements must be met for Federal highway and transit funds to continue to be used for local, County, and State transportation improvement projects within the urbanized area. Since the Commission currently serves as the areawide, or metropolitan, transportation planning organization for the Milwaukee urbanized area and four other urbanized areas within the seven-county Southeastern Wisconsin Region (the Kenosha, Racine, Wisconsin portion of the Round Lake Beach, and West Bend urbanized areas), the Commission and Jefferson County entered into a cooperative agreement to provide the necessary transportation planning and programming services for the County’s portion of the Milwaukee urbanized area, including the inclusion of this area in the RTP. This appendix summarizes the existing transportation systems of regional significance and transportation-related recommendations within the portion of Jefferson County in the Milwaukee urbanized area in VISION 2050.

EXISTING TRANSPORTATION FACILITIES

This section describes the transportation system of the Jefferson County portion of the Milwaukee urbanized area in 2016, including streets and highways, public transit, and bicycle facilities. This inventory provides the base year conditions for use in the development of the transportation-related recommendations under VISION 2050 for the Jefferson County portion of the urbanized area.

70 After each decennial U.S. Census, the U.S. Census Bureau delineates the urbanized areas of the nation. The U.S. Census Bureau defines an urbanized area as an inner core of census blocks or tracts that have a total land area of less than three square miles and minimum population density of 1,000 persons per square mile surrounded by contiguous, densely settled census tracts and blocks having a minimum population density of 500 persons per square mile, along with adjacent non-contiguous densely settled blocks and block groups that together encompass a population of at least 50,000.
Map M.1
Jefferson County Portion of the Milwaukee Urbanized Area

Source: U.S. Bureau of the Census and SEWRPC
**Arterial Streets and Highways**

Arterial streets and highways are that portion of the total street and highway system principally intended to provide travel mobility, serving the through movement of traffic and providing transportation service between major subareas of a region and also through the region. Access to abutting property may be a secondary function of some types of arterial streets and highways, but the primary function of arterial streets and highways is traffic movement. The definition of arterials has been determined by an evaluation of four major factors: 1) traffic characteristics—traffic volume and type, operating speeds, and average trip length; 2) physical characteristics—horizontal and vertical alignment, pavement width, and pavement type; 3) system integration—system continuity and facility spacing; and 4) land use service—the areawide significance of the land use activities served. Based on these considerations, the existing arterial street and highway system for the Jefferson County portion of the Milwaukee urbanized area was identified, as shown on Map M.2. The existing arterial street and highway system for the Jefferson County portion of the urbanized area totals 5.9 route-miles.

Streets and highways may also be classified according to jurisdiction. Jurisdictional classification establishes which level of government—State, county, or local—has responsibility for the design, construction, maintenance, and operation of each segment of the total street and highway system. Of the 5.9 total route-miles, the facilities under State jurisdiction (shown as red lines on Map M.2) in 2016 consist of 4.5 route-miles (or 76 percent), the facilities under County jurisdiction consist of 1.0 route-mile (or 17 percent), and the facilities under local jurisdiction consist of 0.4 route-miles (or 7 percent).

**Transit Service**

Commuter bus service was provided in 2016 between the City of Oconomowoc in Waukesha County and the City of Milwaukee central business district in Milwaukee County. This service operates primarily over the freeway system and is operated for Waukesha County by Wisconsin Coach Lines, Inc. The service has a stop at the Collins Street Parking Lot in the City of Oconomowoc, just east of the Jefferson County portion of the Milwaukee urbanized area. Local fixed-route transit service is currently not provided in the Jefferson County portion of the Milwaukee urbanized area.

**Bicycle Facilities**

On arterial streets and highways with a rural cross-section, bicycles may be accommodated with a four-foot paved shoulder and six-foot gravel shoulder on a two-traffic-lane facility, and with an eight-foot paved shoulder on a four-traffic-lane facility. On arterial streets with an urban cross-section, bicycles may be accommodated with bicycle lanes five to six feet in width, or with a widened outside lane of 14 feet. Accommodations may also be provided on urban and rural arterials with parallel, physically separate paths of eight to 12 feet in width (five to six feet for one-way paths) and ten feet of separation from the travel lanes. Map M.3 identifies the 0.5 miles of arterial streets and highways that provided accommodation through paved shoulders in 2016.

In addition, bicycle accommodations can be provided on separate off-street bicycle paths. As part of VISION 2050, these paths are envisioned, upon completion, to connect the Region’s major urban centers—Milwaukee, Racine, Kenosha, and Waukesha—and the Region’s urban communities. These paths—intended for seasonal use—provide particularly safe and aesthetically attractive routes with separation from motor vehicle traffic. Currently, there are no existing off-street bicycle facilities within the Jefferson County portion of the Milwaukee urbanized area.
Map M.2
Existing Arterial Street and Highway System in the Jefferson County Portion of the Milwaukee Urbanized Area: 2016

ARTERIAL STREET OR HIGHWAY

- **STATE TRUNK HIGHWAY**
- **COUNTY TRUNK HIGHWAY**
- **LOCAL TRUNK HIGHWAY**

4 NUMBER OF TRAFFIC LANES (2 LANES WHERE UNNUMBERED)

YEAR 2010 ADJUSTED MILWAUKEE URBANIZED AREA BOUNDARY

Source: U.S. Bureau of the Census and SEWRPC
Map M.3
Existing Bicycle Accommodations on the Arterial Streets and Highways in the Jefferson County Portion of the Milwaukee Urbanized Area

ARterial STREET or HIGHway

- PAVED SHOULDER
- ARTERIAL STREET or HIGHWAY WITHOUT BICYCLE ACCOMMODATION

YEAR 2010 ADJUSTED MILWAUKEE URBANIZED AREA BOUNDARY

Source: U.S. Bureau of the Census and SEWRPC
VISION 2050 PLAN RECOMMENDATIONS FOR THE JEFFERSON COUNTY PORTION OF THE MILWAUKEE URBANIZED AREA

This section describes the transportation-related recommendations under VISION 2050 for the Jefferson County portion of the Milwaukee urbanized area with respect to transit service, bicycle accommodations, and arterials streets and highways.

Public Transit
VISION 2050 recommends that the existing commuter bus service be replaced with a commuter rail service between the City of Oconomowoc and downtown Milwaukee. The Jefferson County portion of the Milwaukee urbanized area would be served by a station proposed to be located in the City of Oconomowoc. Transit service to the industrial areas in the Town of Ixonia from the commuter rail station could be provided through a van shuttle service. Map 1.8 in Chapter 1 of Volume III shows how the commuter rail line recommended to serve the City of Oconomowoc connects with the other components of the recommended transit element of VISION 2050.

Bicycle Element
As shown on Map M.4, VISION 2050 recommends that as the 5.9 miles of arterial streets and highways in the Jefferson County portion of the Milwaukee urbanized area are resurfaced and reconstructed segment-by-segment, bicycle accommodation be considered and implemented, if feasible, through bicycle lanes, paved shoulders, widened outside travel lanes, or enhanced bicycle facilities, such as a separate path within the road right-of-way.\(^71\)

VISION 2050 also recommends that a system of off-street bicycle paths be provided between the Kenosha, Milwaukee, Racine, Round Lake Beach, and West Bend urbanized areas. These off-street bicycle paths would be located in natural resource and utility corridors and are intended to provide reasonably direct connections between the Region’s urbanized and small urban areas on safe and aesthetically attractive routes with separation from motor vehicle traffic. While such an off-street bicycle path is not proposed within the Jefferson County portion of the Milwaukee urbanized area, the plan does recommend an interurban recreational trail south of the Jefferson County portion of the Milwaukee urbanized area that would connect the City of Oconomowoc in Waukesha County and the City of Watertown in Jefferson County. As shown on Map M.5, this interurban recreational trail would be constructed within the existing WE Energies right-of-way corridor and would connect with the existing Lake Country Trail in Waukesha County. The recommended interurban recreational trail could serve as the bicycle accommodation for the STH 16 corridor between the Cities of Watertown and Oconomowoc.

Arterial Streets and Highways Element
As shown on Map M.6, VISION 2050 recommends that the 5.9 miles of roadway within the Jefferson County portion of the Milwaukee urbanized area be resurfaced or reconstructed to provide essentially the same capacity. As the existing and future forecast year 2050 traffic volumes approach, but do not exceed, the design capacity of STH 16 between CTH F and the terminus of the STH 16 Oconomowoc Bypass, just west of Wisconsin Avenue, the only location where on-street bicycle accommodations may not be possible is along a 1.7 mile segment of STH 16 between the STH 16 interchange at Wisconsin Avenue and the Jefferson/Waukesha County line. This segment of STH 16 is part of the Oconomowoc Bypass which is a controlled access highway.
Map M.4
Bicycle Accommodations on the Arterial Streets and Highways in the Jefferson County Portion of the Milwaukee Urbanized Area: VISION 2050

Note: The only location where on-street bicycle accommodations may not be possible is along a 1.7-mile segment of STH 16 between the STH 16 interchange at Wisconsin Avenue and the Jefferson/Waukesha County line. This segment of STH 16 is part of the Oconomowoc Bypass, which is a controlled access highway.

Source: U.S. Bureau of the Census and SEWRPC
Map M.5
Recommended Interurban Trail Between the City of Oconomowoc in Waukesha County and the City of Watertown in Jefferson County

BICYCLE FACILITY

- RECOMMENDED INTERURBAN TRAIL
- EXISTING OFF-STREET BICYCLE PATH
- YEAR 2010 ADJUSTED MILWAUKEE URBANIZED AREA BOUNDARY

Source: U.S. Bureau of the Census and SEWRPC
Map M.6
Functional Improvements to the Arterial Street and Highway System in the Jefferson County Portion of the Milwaukee Urbanized Area: VISION 2050

ARTERIAL STREET OR HIGHWAY
- RESURFACING OR RECONSTRUCTION TO PROVIDE ESSENTIALLY THE SAME CAPACITY
- RESERVE RIGHT-OF-WAY TO ACCOMMODATE FUTURE IMPROVEMENT (ADDITIONAL LANES)
- NUMBER OF TRAFFIC LANES FOR NEW OR WIDENED AND/OR IMPROVED FACILITY

YEAR 2010 ADJUSTED MILWAUKEE URBANIZED AREA BOUNDARY

Source: U.S. Bureau of the Census and SEWRPC
VISION 2050 recommends the reservation of right-of-way along this section of STH 16 to accommodate possible improvement of the facility beyond the plan design year of 2050. This recommendation would be revisited as the Commission monitors traffic counts taken by the Wisconsin Department of Transportation (WisDOT) on a three-year cycle, and as the Commission reviews, updates, and amends the regional transportation plan every four years.

Additionally, it is recommended that the VISION 2050 recommendations under the arterial streets and highways element presented in Chapter 1 of Volume III be implemented in the Jefferson County portion of the Milwaukee urbanized area, if applicable, including addressing safety needs for arterial streets and highways. Safety improvements identified in the STH 16 corridor study completed by WisDOT in 2014 should be considered for implementation, as appropriate, when the segment of STH 16 within the Milwaukee urbanized area is resurfaced or reconstructed.

**FINANCIAL ANALYSIS OF EXPECTED PLAN COSTS AND REVENUES**

The costs associated with the implementation of the VISION 2050 plan recommendations within the Jefferson County portion of the Milwaukee urbanized area are included in the expected costs of the VISION 2050 transportation system, as described in Chapter 1 of Volume III. Given the existing and reasonably expected available revenues through the year 2050, the bicycle and arterial street and highway elements of the Jefferson County portion of the Milwaukee urbanized area can be funded. However, due to the expected funding gap to implement the transit element of the plan, it is expected that transit service would decline in the Region over the next 35 years, rather than be significantly expanded and improved as recommended under VISION 2050, including the recommended commuter rail service between the City of Oconomowoc and downtown Milwaukee. As Federal regulations require the Region’s transportation plan to only include projects that can be funded with existing and reasonably expected revenues, only the funded portion of VISION 2050 would be considered the “fiscally constrained” regional transportation plan by the Federal Government and is titled the Fiscally Constrained Transportation Plan (FCTP) for VISION 2050 (as further described in Chapter 2 of Volume III). Under the FCTP, there would be sufficient existing and reasonably expected revenues to continue the operation of the commuter bus service between the City of Oconomowoc and downtown Milwaukee, with the Jefferson County portion of the Milwaukee urbanized area continuing to be served by the Collins Street Parking Lot in the City of Oconomowoc.