

CHAPTER 15: Environmental Justice Analysis

The *Connections 2030* environmental justice chapter:

- » Provides a general overview of the location of Wisconsin’s minority, low-income, age 65 years and older, and zero-vehicle household populations
- » Evaluates the relationship of the system-level plan recommendations to the state’s minority, low-income, age 65 years and older, and zero-vehicle household populations
- » Supplements Chapter 14, *System-plan Environmental Evaluation*
- » Identifies areas for potential consideration by the department during planning and project-level activities

Connections 2030 is a policy-based plan developed to be flexible and responsive to budget fluctuations and shifts in investment priorities. While the plan’s policies provide the framework for department decision making and for prioritizing investments, plan recommendations may be implemented as proposed, modified as the department responds to changing transportation needs, or delayed due to insufficient resources (staff and funding) or changing priorities. As a result, analysis of transportation decisions and investments that may disproportionately affect minority populations, low-income populations, persons age 65 and older, and households with no vehicles is limited at the system level. Efforts to identify potential implementation impacts on communities and neighborhoods depend on location-specific design and alignment decisions that are evaluated and addressed during the project planning and delivery phases.

In *Connections 2030*, WisDOT states that its policy is to “incorporate environmental justice in all planning, programming and project decisions.” This chapter is one action in achieving WisDOT’s commitment to environmental justice. Additional actions are identified in the environmental justice policy in Chapter 10, *Preserve Wisconsin’s Quality of Life*. Those actions include working to avoid, minimize or mitigate

disproportionate impacts resulting from WisDOT plans or activities when possible; and using public participation techniques that encourage participation by minority, low-income, age 65 years and older, and disabled populations.

The analysis presented in this chapter:

- » Focuses on the recommendations described in the plan and potential disproportionate impacts on minority, low-income, age 65 years and older, and zero-vehicle household populations at the regional and state levels
- » Is a state-level, systems analysis and is not intended to replace project-level analyses
- » Represents the department’s first step in its system-level consideration of potential impacts to the state’s minority, low-income, age 65 and older, and zero-vehicle household populations
- » Will be built upon by the WisDOT transportation region staff as they continue planning, programming and project development activities at the region level

This chapter also supplements Chapter 14, *System-Plan Environmental Evaluation*. Chapter 14 presents the system-plan environmental evaluation, which

Policy-based plans

- > Describe overarching strategies to accomplish future results
- > Include official policies for solving problems, typically based on legislation and implemented through programs
- > Identify means to accomplish these policies through investments, strategies or programs



discusses the potential environmental and community impacts of implementing *Connections 2030*. The environmental justice analysis also supplements the system-plan environmental evaluation.

The chapter has five sections:

- » Environmental justice overview
- » Summary of Wisconsin’s minority, low-income, age 65 and older, and zero-vehicle households
- » *Connections 2030* public involvement activities and resulting plan recommendations
- » *Connections 2030* and the state’s minority, low-income population, age 65 and older, and zero-vehicle households
- » Next steps

Environmental justice overview

Presidential Executive Order 12898, Federal Actions to Address Environmental Justice in Minority Populations and Low-income Populations, issued in 1994, directed each federal agency to “make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies and activities on minority and low-income populations.” The order reinforced Title VI of the Civil Rights Act of 1964, which prohibits discrimination on the basis of race, color or national origin and provides protection to low-income groups.

Executive Order 12898 defined four minority groups for the purposes of environmental justice:

- » Black – a person having origins in any of the black racial groups of Africa
- » American Indian or Alaskan Native – a person having origins in any of the original people of North America and who maintains cultural identification through tribal affiliation or community recognition

- » Asian American – a person having origins in any of the original peoples of the Far East, Southeast Asia, the Indian subcontinent, or the Pacific Islands
- » Hispanic – a person of Mexican, Puerto Rican, Cuban, Central or South American, or other Spanish culture or origin, regardless of race

The order also defines low-income populations as persons whose household income is at or below the U.S. Department of Health and Human Services poverty guidelines.

Subsequent orders and guidelines issued by the U.S. DOT summarize and clarify the executive order and describe processes for incorporating environmental justice principles into U.S. DOT programs, policies and activities. In addition, the U.S. DOT identified three fundamental principles that guide environmental justice:

- » To avoid, minimize or mitigate disproportionately high and adverse human health and environmental effects, including social and economic effects, on minority and low-income populations
- » To ensure the full and fair participation by all potentially affected communities in the transportation decision-making process
- » To prevent the denial of, reduction in, or significant delay in the receipt of benefits by minority and low-income populations

WisDOT also analyzed the location of those age 65 and older and households with no vehicles. While not specifically addressed by either the Executive Order or Title VI, other federal laws and regulations do protect persons age 65 and older. For example, the Age Discrimination Act of 1975 prohibits discrimination based on age in programs or activities receiving federal financial assistance. As discussed in Chapter 3, *Trends*, Wisconsin’s age 65 and older population is expected to increase by more than 90 percent by 2030. Due to this forecast growth, and the possible changes in transportation needs, WisDOT included this population in the

environmental justice analysis to better understand its statewide distribution and the possible impacts on this group resulting from plan implementation. (Refer to Chapter 3, *Trends*, for additional information regarding this population group.)

In addition, understanding the distribution of zero-vehicle households allows WisDOT to consider whether the transportation choice policies identified in the plan address areas with high concentrations of zero-vehicle households. Again, WisDOT included these households even though they are not specifically protected by any federal or state legislation.

Summary of Wisconsin's minority, low-income, age 65 and older, and zero-vehicle household populations

According to the U.S. Census Bureau, Wisconsin's population was 5.36 million persons in 2000. Table 15-1 depicts Wisconsin's year 2000 population based on race, ethnicity, age, income, and zero-vehicle households. As noted in the table:

- » 89 percent of Wisconsin's population is white
- » Persons age 65 and older account for 13 percent of the state's population
- » Wisconsin's black population is the largest minority group in the state, accounting for 6 percent of the state's population
- » 8 percent of the state's population is below the poverty line
- » 8 percent of the state's households have no vehicle available

A state-level geospatial analysis was used to determine the location and density of Wisconsin's minority and low-income populations. Since populations targeted by environmental justice efforts are not evenly distributed across the state, WisDOT identified these populations by using the department's five Transportation Regions (Map 15-1).

Table 15-1: Wisconsin demographics, 2000

Population group	Number of persons	Percent of total state population
State of Wisconsin	5,363,675	100
White	4,769,857	89
Black	304,360	6
American Indian	47,228	1
Asian (including Hawaiians and Pacific Islanders)	90,393	2
Hispanic	192,921	4
Age 65 and older	702,553	13
Persons in poverty	451,538	8
Zero-vehicle households ¹	163,969	8

The analysis included two steps:

- » Step 1: Establish appropriate thresholds to determine concentrations of minority, low-income, age 65 and older, and zero-vehicle household populations for each WisDOT transportation region
- » Step 2: Identify U.S. Census block groups above and below the thresholds for each WisDOT region

Step 1: Establishing thresholds

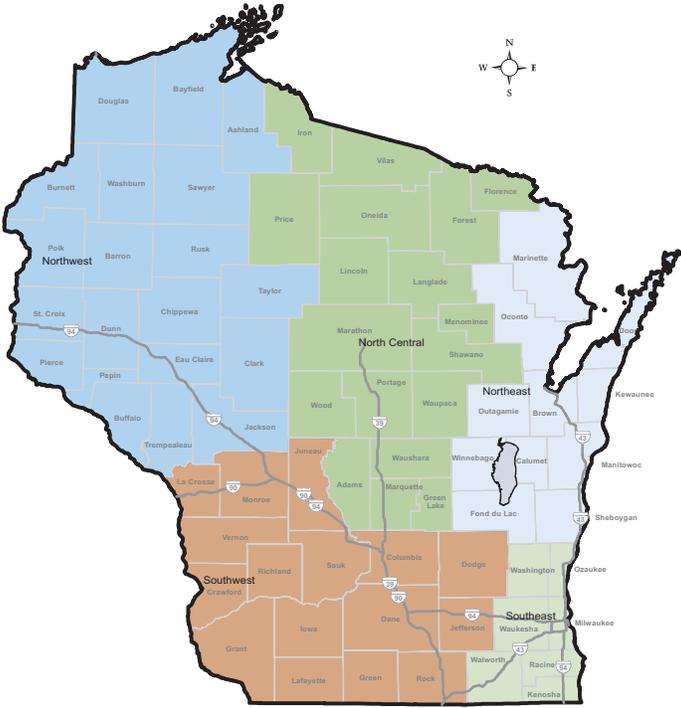
Using 2000 U.S. Census Bureau data, thresholds for each environmental justice demographic group were calculated by dividing the specified population within a WisDOT transportation region by the total population in that same WisDOT region.

The calculated thresholds are shown in the "Percent of Region Population" column in Table 15-2. Table 15-2 depicts Wisconsin's population demographics by WisDOT Transportation Region and demonstrates that Wisconsin's various populations are not distributed equally across the state. For example:

- » The Southeast Region has the:

¹ Wisconsin had 2,084,544 households in 2000.





▲ Map 15-1: WisDOT transportation region offices

Example step one calculation

North Central Region

- > 12,018 American Indians reside in the region
- > Region’s total population is 588,247

Total population in that region ÷ total population for population group in region = threshold

$$(588,247 \div 12,018) \times 100\% = 2\%$$

(calculated threshold)

- Largest concentration of the state’s population
- Largest minority populations for all groups except American Indian (the North Central Region has the largest American Indian population)
- Greatest concentration of black, Hispanic, persons in poverty and zero-vehicle household populations

» American Indian, Asian and age 65 and older populations are more equally distributed across the state

In addition, Maps 15-2 through 15-9 depict the Census Block Groups for each population above the threshold statewide.

Step 2: Identify U.S. Census block groups above and below the thresholds for each WisDOT region

To determine whether a U.S. Census block group within a WisDOT transportation region was above or below the calculated threshold for a specified population, the specified population within that Census block group was divided by the total Census block group population. If the calculated percentage is greater than the established threshold, the Census block group was considered atypical for the region and may indicate a higher presence of the specified population and require greater consideration of potential disproportionate impacts of transportation decisions. If the percentage is equal to or less than the threshold, it is considered typical for the region or has a lower concentration of specified population within that Census block group.

Case study: Wisconsin’s black population

In 2000, over 86 percent of the state’s black population resided in southeast Wisconsin. Of that number, 76 percent resided in Milwaukee County. Another 6.1 percent of the state’s black population resided in Dane County. 92.1 percent of the state’s black population resides in either Dane County or southeastern Wisconsin. In comparison, southeastern Wisconsin accounts for 36 percent of the state’s total population. With the addition of Dane County, the area accounts for 44 percent of the state’s total population.

Table 15-2: Wisconsin demographics by WisDOT Region, 2000

Population	NORTH CENTRAL REGION		NORTHEAST REGION		NORTHWEST REGION		SOUTHEAST REGION		SOUTHWEST REGION	
	Total region population	Percent of region population	Total region population	Percent of region population	Total region population	Percent of region population	Total region population	Percent of region population	Total region population	Percent of region population
Total	588,247	100%	1,005,138	100%	633,219	100%	1,932,908	100%	1,204,163	100%
White	557,791	95%	947,990	95%	607,447	96%	1,534,464	79%	1,122,165	93%
Black	2,096	0%	7,965	1%	2,165	0%	263,200	14%	29,034	2%
American Indian	12,018	2%	10,393	1%	10,789	2%	9,510	0%	4,518	0%
Asian	9,537	2%	18,800	2%	5,451	1%	35,154	2%	21,451	2%
Hispanic	6,959	1%	23,509	2%	5,402	1%	126,394	7%	30,657	3%
Persons in poverty	45,552	8%	58,906	6%	57,410	9%	189,548	10%	100,122	9%
Age 65 and older	93,807	16%	129,836	13%	89,780	14%	241,024	12%	148,106	12%
Zero-vehicle households	13,088	6%	22,725	6%	14,471	6%	81,325	11%	32,360	7%

Example 1:

- » The Southwest Region has a calculated 3 percent threshold for Hispanics
- » Census Block Group A in that region has a total population of 100 persons
- » 5 percent of the Census block group’s population is Hispanic

Example 1 Analysis: Census Block Group A exceeds the 3 percent threshold and is atypical for the Southwest Region.

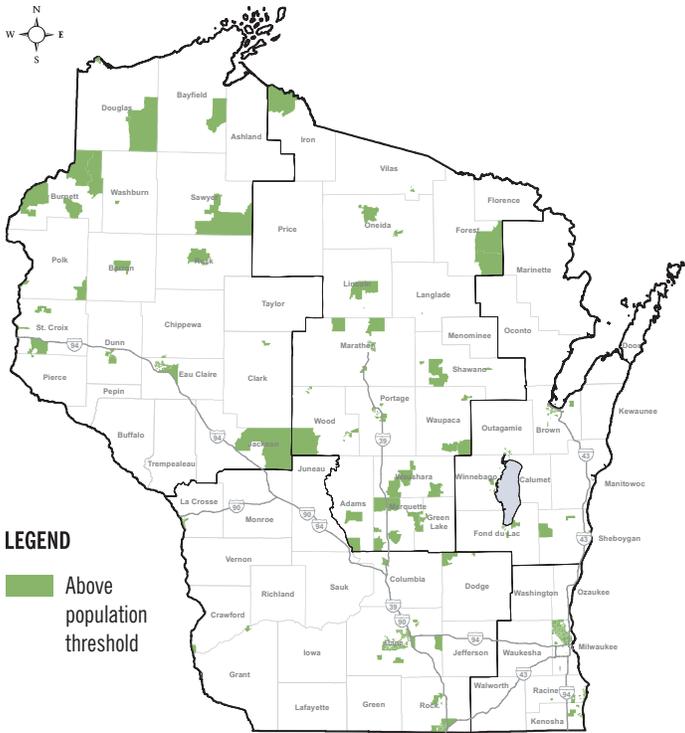
Example 2:

- » The Southwest Region has a calculated 3 percent threshold for Hispanics
- » Census Block Group B in that region has a population of 100 persons
- » 2 percent of the population is Hispanic

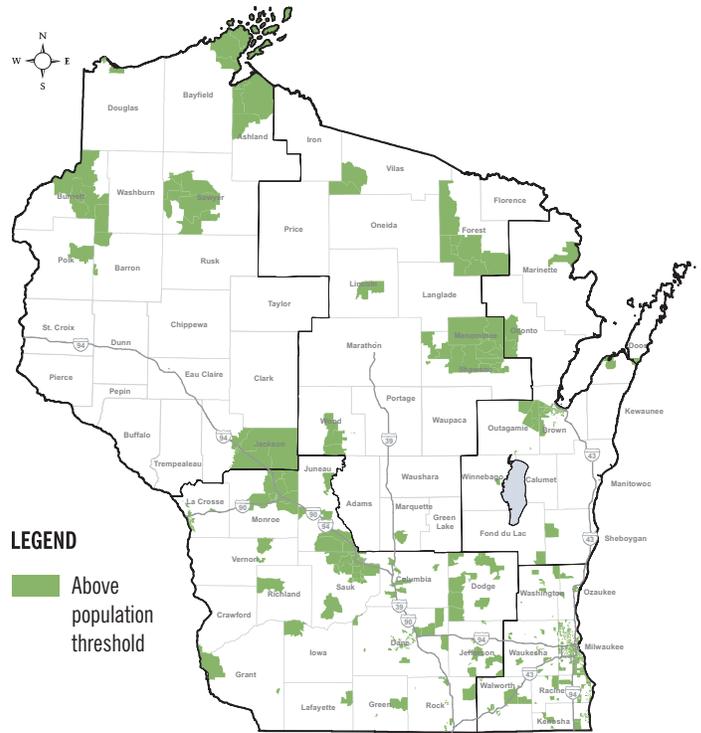
Example 2 Analysis: Census Block Group B would be considered typical of the Southwest Region. Maps 15-2 through 15-9 identify the Census block groups that exceed the established thresholds. The maps show:

- » Census block groups exceeding the thresholds vary in distribution across the state.
- » For the Black population, the largest concentration is located in the Southeast Region. Over 233,000 blacks live in Census block groups that exceed the established threshold. The smallest populations are located in the Northwest and North Central regions.
- » The number of American Indians living in Census block groups exceeding the established thresholds is fairly consistent across all WisDOT regions except the Southwest Region, which has the fewest. The largest population is located in the North Central Region.
- » The number of Asian Americans living in Census block groups exceeding the established thresholds is highest in the Southeast Region. The smallest population is located in the Northwest Region.
- » For the Hispanic population, the largest concentration is located in the Southeast Region. Over 84,000 Hispanics live in Census block groups that exceed the established threshold. The smallest populations are located in the Northwest and North Central regions.

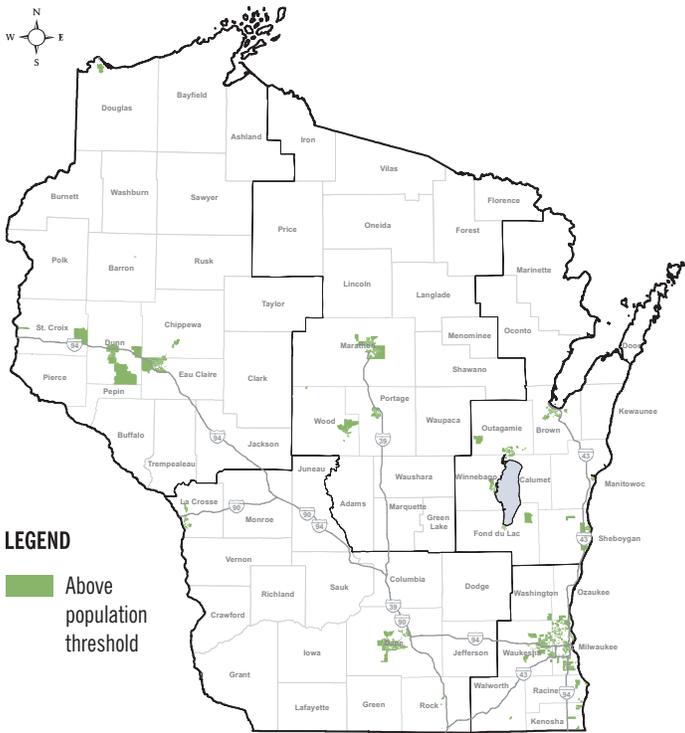




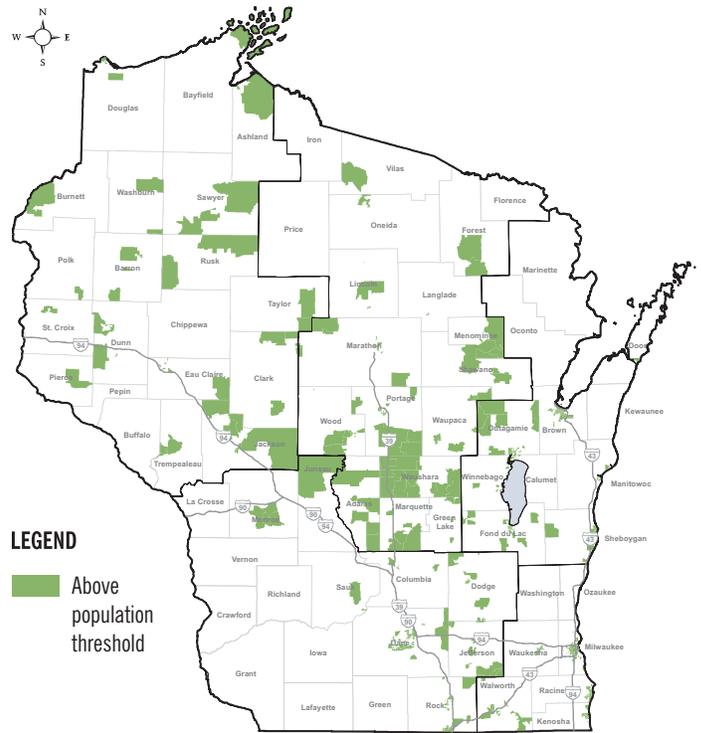
▲ Map 15-2: Census block groups with **black population** above region threshold



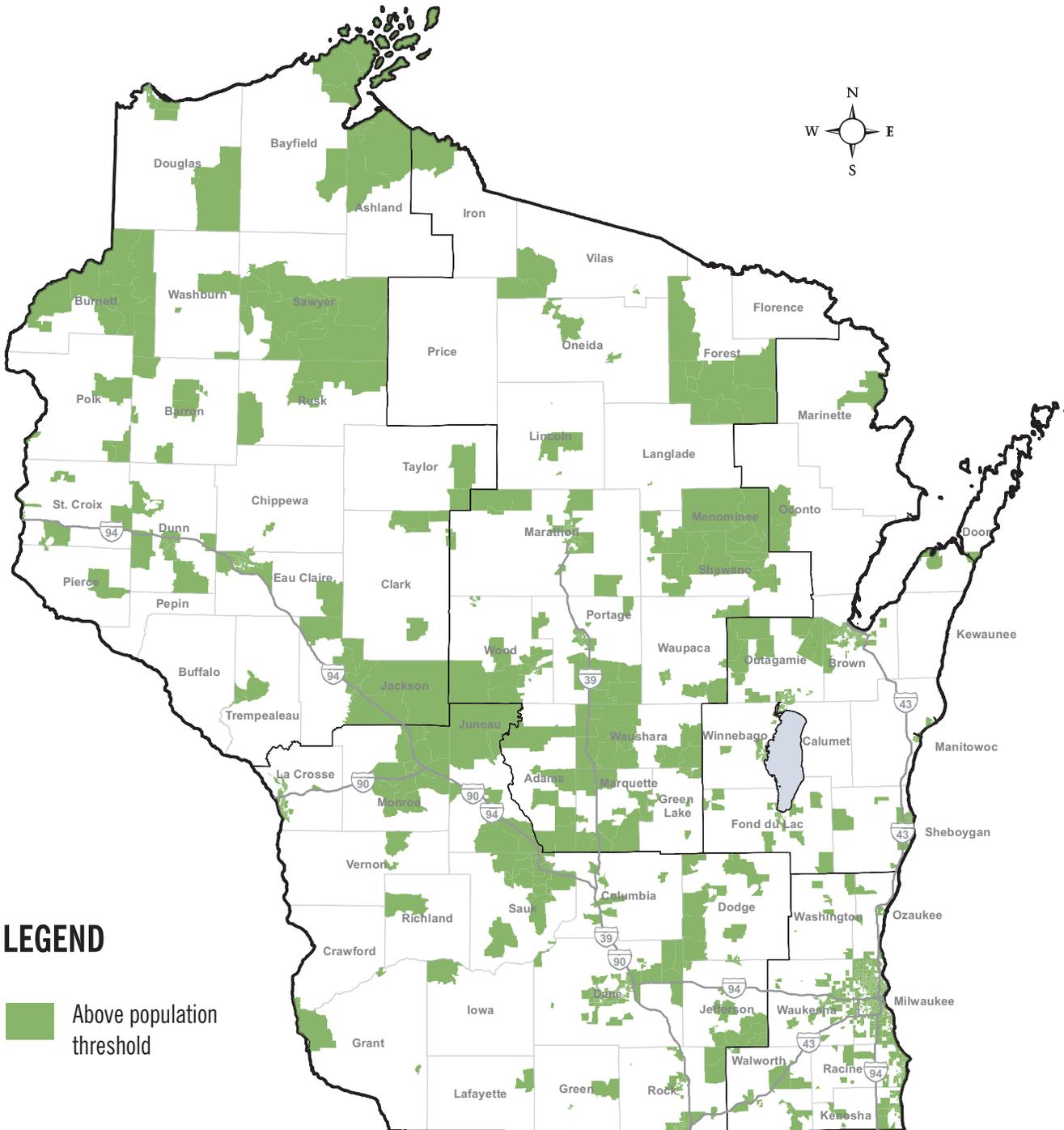
▲ Map 15-3: Census block groups with **American Indian population** above region threshold



▲ Map 15-4: Census block groups with **Asian American population** above region threshold

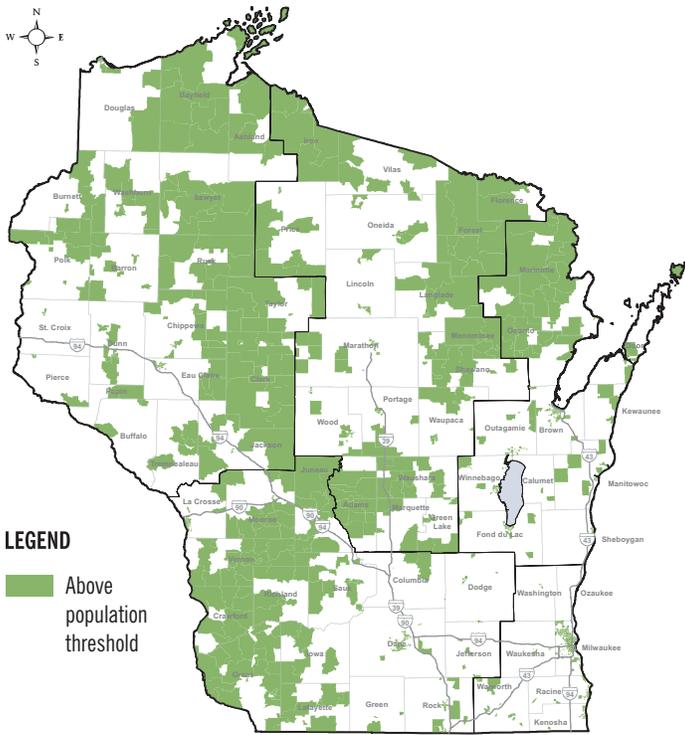


▲ Map 15-5: Census block groups with **Hispanic population** above region threshold

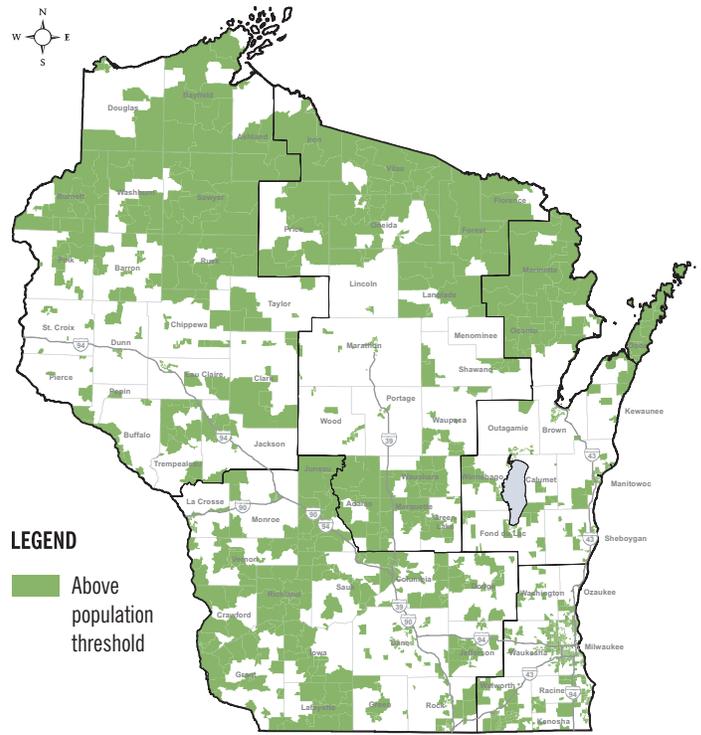


▲ Map 15-6: Census block groups with any **minority population** above region threshold
 NOTE: Any census block groups that exceeded a population threshold for black, American Indian, Asian American or Hispanic (as shown on Maps 15-2 through 15-5) are shown on this map.

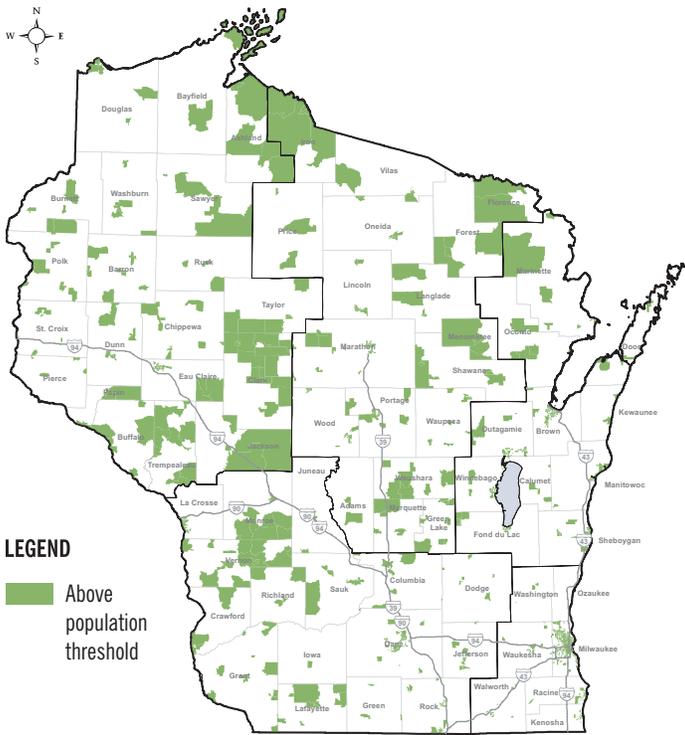




▲ Map 15-7: Census block groups with **persons in poverty** above region threshold



▲ Map 15-8: Census block groups with **age 65 and older population** above region threshold



▲ Map 15-9: Census block groups with **zero-vehicle households** above region threshold

- » The greatest number of persons in poverty living in Census block groups exceeding the threshold live in the Southeast Region. The number of persons in poverty is fairly equal across the three northern regions.
- » For persons age 65 and older living in Census block groups exceeding the established threshold, the largest concentration is located in the Southeast Region. The smallest populations are located in the North Central and Northwestern regions.
- » The greatest number of households with no vehicles located in Census block groups above the threshold in the Southeast Region. The smallest number is located in the North Central and Northwest regions.

Census block group transportation region threshold analysis limitations

The analysis described above has some limitations for determining where specified populations are located:

- » The analysis used 2000 U.S. Census Bureau data. While the data is outdated, it is the only readily available statewide data that includes information for all of the categories analyzed.
- » The thresholds are based on what is “typical” for each WisDOT transportation region. In some of the less populous areas of the state, Census block groups that exceed the threshold may only have a few persons of the specified population residing in that area. On the other hand, in more populous parts of the state, like the Southeast and Southwest regions, some Census block groups may be below the threshold but have relatively high numbers of persons of the specified population, compared to the less populous regions.
- » Population projections are not available for race, ethnicity, income or number of household vehicles. For this reason, the analysis does not account for changes in environmental justice populations over the *Connections 2030* timeframe. These changes may result in fewer Census block groups identified that exceed an established threshold. In addition, while projections are available based on age, the projections are not available at the Census block group level.

While there are limitations, the analysis provides a basis for evaluating the plan’s recommendations and their relationship to minority and low-income populations, as well as persons age 65 and older and zero-vehicle households. As a system-level plan, the threshold methodology locates concentrations of the specified group based on population density. This method is appropriate for a state-level plan like *Connections 2030*. However, as stated previously, the analysis conducted for the long-range plan is not intended to replace more detailed analyses completed when individual projects are undertaken.

Connections 2030 public outreach activities

WisDOT implemented an inclusive and comprehensive outreach effort to ensure that

Wisconsin residents had an opportunity to participate in the early development of *Connections 2030*. Early public involvement activities included focused outreach to minority and low-income groups to encourage participation, receive feedback and identify opportunities to integrate comments into the plan development effort.

The vision and policies presented in *Connections 2030* reflect the issues and concerns identified during early public outreach activities. These activities included stakeholder meetings, stakeholder interviews and a statewide telephone survey. Meetings were held with Wisconsin’s Native American Tribes and the Wisconsin Minority Business Opportunities Committee. Interviews were conducted with the Ho-Chunk Nation and Milwaukee Urban League. The statewide telephone survey used two techniques to ensure that minority populations were included: 1) oversampling in counties with higher than average minority populations, and 2) ‘name-based target sampling’ to identify persons of Asian or Hispanic descent. For additional information, refer to Chapter 4, *Public Involvement*.

For the fall 2008 release of the draft *Connections 2030* for public comment, WisDOT developed an environmental justice outreach plan that identified additional methods to provide opportunities to encourage minority and low-income populations to participate in the *Connections 2030* draft plan outreach. Specifically, WisDOT:

- » Translated the plan’s fact sheets and executive summary into Spanish
- » Held 10 outreach meetings across the state specifically targeted to minority and low-income populations
- » Placed meeting notices in minority newspapers

WisDOT used the input from these targeted meetings, as well as input received from other public outreach activities, to update the plan as appropriate. See Chapter 4, *Public Involvement*, for more information.



Connections 2030 recommendations

The policies presented in *Connections 2030* are organized under seven themes:

- » Preserve and maintain Wisconsin’s transportation system
- » Promote transportation safety
- » Foster Wisconsin’s economic growth
- » Provide mobility and transportation choice
- » Promote transportation efficiencies
- » Preserve Wisconsin’s quality of life
- » Promote transportation security

These themes provide the framework upon which the plan’s policies were written and organized. Each policy identifies specific issues and describes actions WisDOT either is currently taking or will undertake to achieve the policy.

Preserve and maintain Wisconsin’s transportation system

System maintenance and preservation are critical to ensure that the state’s transportation system continues to operate and function at a satisfactory level and meets user expectations. System preservation is also critical to ensuring the continued availability of transportation services, such as intercity bus and public transit service. Continued availability of these services enhances Wisconsin’s quality of life and economic well being.

Policy recommendations include:

- » Continue to improve the high quality two- and multi-lane highways to further connect intercity, economic and other high traffic generating centers to each other and areas outside of the state
- » Continue support of airport needs statewide
- » Prioritize investment strategies supported by state-of-the-art processes and best practices

Benefits

- » Transportation system investments are maximized to help defer more costly repairs
- » Safety is addressed
- » Mobility is enhanced
- » The state’s quality transportation system is maintained
- » Local and state economic growth activities are supported by a quality transportation network

Promote transportation safety

Safety is a fundamental mission for WisDOT and will continue to be one of the department’s top priorities. WisDOT will continue emphasizing the four “E’s”: education, enforcement, engineering and emergency response.

Policy recommendations include:

- » Education – continue outreach and education through media, grant and safety programs such as Safe Routes to School, and work-zone management
- » Enforcement – continue to emphasize and address driver behavior, and support non-biased enforcement efforts through additional resources such as staff and equipment
- » Engineering – continue to design, construct and maintain transportation facilities to be safe
- » Emergency response – improved response to clear accidents or incidents and minimize secondary crashes

Benefits

- » Continued emphasis on system safety to reduce crashes and fatalities, which also helps address the high costs associated with property loss or damage
- » Ensuring that the system is safe and able to respond to incidents and providing system redundancies which allows businesses and individuals to avoid major disruptions or delays

- » Continued interagency coordination with the Department of Public Instruction to revise driver education program materials

Foster Wisconsin's economic growth

A growing economy requires a multimodal transportation system that connects people to jobs and supports the safe and efficient movement of goods and people across the state. *Connections 2030* supports the state's economic growth by ensuring that the transportation system can effectively and efficiently respond to changing economic needs and allow the state's business community to actively participate in regional, national and international markets.

Policy recommendations include:

- » Maintain and increase freight support
- » Assist airports in maintaining and expanding their competitiveness
- » Promote tourism
- » Address energy and sustainability
- » Promote transportation job opportunities for individuals and disadvantaged business enterprises
- » Preserve the local road and bridge system
- » Continue the Major Highway Development Program

Benefits

- » Promotion of transportation sector job growth and increased training opportunities through programs and techniques that target and support minority and women-owned businesses
- » Preservation of the local road and bridge network, which is critical to serving individuals and businesses – supports mobility, job growth, economic competitiveness, safety, security
- » Enhanced safety

- » Enhancement and management of the state's highway network to link communities and regions
- » Support of tourism to benefit local and state economies through job growth
- » Tracking and response to transportation energy use

Provide mobility and transportation choice

Mobility is critical to Wisconsin's economic vitality and quality of life. Providing safe, convenient and affordable access to jobs, health care, financial and social services, education facilities and leisure activities is a critical function of any transportation system. Many Wisconsin residents have limited transportation options, due to either a lack of choices other than the automobile, or inconvenient schedules or connections.

Policy recommendations include:

- » Support public, specialized, human services and fixed-guideway transit
- » Improve intercity passenger rail and intercity bus service
- » Advocate improved direct air service
- » Support bicycle and pedestrian accommodations
- » Support transportation demand management strategies like ridesharing and park and ride facilities
- » Facilitate intermodal passenger connections

Benefits

- » Improved transportation options within and between cities through expanded transportation choices such as transit, intercity bus or ridesharing
- » Support of enabling legislation that provides local governments with revenue-raising authority to support transit costs
- » Continued integration of bike and pedestrian accommodations into roadway projects



- » Improved connections between transportation modes
- » Improved accessibility

Promote transportation efficiencies

Transportation efficiencies can improve safety and reduce travel delays for freight and people. An efficient transportation system is reliable, resilient and provides seamless connections between different transportation modes. Transportation efficiencies can be gained through actions such as increasing aircraft or transit bus sizes, improving traffic signal timing, expanding the number highway miles, and providing reliable and convenient service.

Policy recommendations include:

- » Identify and address traffic bottlenecks
- » Monitor, detect and respond to highway operations needs, such as coordinating with law enforcement to clear highway incidents and help keep traffic moving
- » Improve and expand the use of technology for other modes, such as web-based route assistance for transit riders, loop detectors designed to detect bicyclists, and positive train control

Benefits

- » Increased safety through improved incident response time and work zone management
- » Enhanced mobility through improved connections between transportation modes
- » Reduced transportation costs for individuals and businesses through improved system reliability
- » Improved air quality due to better traffic flow through actions like improved incident response, design standards, and access management

Preserve Wisconsin's quality of life

Keeping Wisconsin's communities and natural resources sustainable provides a strong foundation for continued economic growth. As the agency responsible for the

state's mobility, WisDOT is focused on maintaining critical transportation functions (safety, security and efficiency) while balancing responses to stakeholder issues and addressing potential environmental impacts.

Policy recommendations include:

- » Identify opportunities to streamline and improve environmental review processes
- » Emphasize air quality through monitoring, compliance, and voluntary actions
- » Integrate land use and transportation decisions through coordinated planning and decision-making
- » Incorporate environmental justice considerations into decision-making
- » Improve coordination and collaboration between WisDOT and other government agencies to identify and address potential environmental impacts

Benefits

- » Commitments to decrease overall emissions through recommendations related to transportation demand management strategies, as well as transportation preservation and efficiency activities
- » Continued support of, and participation in, programs that address air quality
- » Commitment to preserving protected resources such as historical and archaeological sites and wetlands
- » Informed decisions regarding transportation projects and possible direct, indirect and cumulative effects of actions and decisions on the surrounding landscape
- » Continued efforts to integrate transportation projects into the surrounding community through community sensitive solutions
- » Continued coordination and communication across agencies and tribes

Promote transportation security

Transportation security is a growing concern around the world. The plan recommends reducing the vulnerability of the transportation system and improving emergency response to minimize secondary crashes and maintain system integrity.

Policy recommendations include:

- » Reduce state transportation infrastructure vulnerability
- » Improve emergency response to allow the transportation system to return to normal operation after an incident

Benefits

- » Improved coordination between government entities and agencies, and operators, as well as improved communication with law enforcement, the media and the public
- » Continued creation of system redundancy and alternate routes to ensure continued transportation system operation during an incident

Connections 2030 and the state's minority, low-income, age 65 and older, and zero-vehicle household populations

The 37 policies presented in the theme chapters could have either positive or negative impacts on minority, low-income, age 65 years and older, and zero-vehicle household populations. This environmental justice analysis focuses on whether implementation of *Connections 2030* results in disproportionate impacts on minority or low-income populations.

To assess the potential impacts of this comprehensive, multimodal plan, the analysis is divided into five areas:

- » Highways
- » Intercity passenger transportation
- » Public transit

- » Intermodal connections
- » Economic opportunities

In addition to individually mapping the recommendations with each group (as noted below), Maps 15-10 through 15-17 provide a comprehensive view of the plan recommendations for the five areas in relation to the locations of minority, low income, age 65 years and older, and zero-vehicle household populations. The maps identify areas where these population subgroups may be present, and provide a system-level tool for corridor level project sponsors to identify whether additional public outreach activities or measures should be considered to address the interests of the populations present. Furthermore, the plan's policies provide the framework for continued implementation of any additional strategies through community sensitive solutions, as well as environmental justice.

Highways

Connections 2030 identifies several policies that affect highway-related activities. Together, these policies aim to increase the safety, efficiency, traffic movement and capacity of the state's highway network. In terms of environmental justice, the highway-related activities with the greatest potential to impact minority, low-income, age 65 years and older and zero-vehicle household populations are:

- » Capacity projects
- » Bypasses and bypass studies

Maps 15-10 through 15-17 show the location of recommended highway-related activities and Census block groups that exceed a threshold for minority populations, low-income populations, persons age 65 and older, and zero-vehicle households. Recommended highway-related activities include capacity projects, which add lanes, change alignment or upgrade the highway to an expressway or freeway; bypasses and bypass studies; and existing and recommended park and ride facilities.



Proposed capacity projects and bypasses will occur in all WisDOT transportation regions. These projects typically undergo a greater level of environmental review than preservation projects such as resurfacing or reconstructing a roadway. Bypass studies are planned in all regions except the Northwest. In most instances, the bypass studies are located near urban areas. Proposed capacity projects and bypasses may:

- » Require additional land, resulting in the potential displacement of households, businesses or workers
- » Increase noise levels and change the visual aesthetics of an area, which may impact social and family interactions, comfort or health
- » Result in land use changes that could cause land values to either increase or decrease, or result in incompatible development decisions
- » Create barriers that hinder bicycle and pedestrian movements

Additional potential impacts related to proposed capacity projects and bypasses are discussed in Chapter 14, *System-Plan Environmental Evaluation*.

New park and ride facilities are proposed across the state under the plan. Currently, the Southeast region has the greatest number of park and ride facilities. *Connections 2030* recommends significant expansion of park and ride facilities across the state, particularly in the Southwest and North Central regions. Park and ride facilities offer opportunities for individuals to carpool. Some facilities also offer opportunities to connect to transit or intercity bus services.

Intercity passenger transportation

Wisconsin's metropolitan areas have intercity transportation that serves many of the populations specified in this chapter. However, current service frequency and limited destinations do not provide comprehensive statewide service. In addition, certain groups in less populous areas of the state have few

transportation choices due to a lack of intercity services. *Connections 2030* emphasizes multimodal transportation policies to improve intercity travel for the population as a whole, as well as specified groups. Improved intercity bus service and the development of an intercity passenger rail network will enhance service for specified populations and generally provide improved mobility choices for underserved populations.

Intercity bus

Several private bus companies provide intercity bus service in Wisconsin. In recent years, the level of service has decreased due to financial constraints and low ridership numbers experienced by the private bus companies. As a result, many Wisconsin communities have lost intercity bus service.

Connections 2030 proposes several new intercity bus stops and routes that will improve intercity bus service. Maps 15-10 through 15-17 show the location of recommended bus stops and Census block groups that exceed a threshold for a specified population. As discussed in Chapter 8, *Provide Mobility and Transportation Choice*, the plan supports development of intercity bus funding assistance programs to improve intercity bus connections between metropolitan areas, and non-metropolitan areas, and feeder service to some intercity passenger rail stations.

The recommended intercity bus stops will increase available service for certain population groups, and the state's population in general. The North Central and Southwest regions will experience the greatest level of service expansion due to the recommended number of new stops - nine new stops in each region. The Southwest region will also experience a higher level of service expansion. While fewer new stops are recommended for the Southeast region, many of the recommended routes already connect to Milwaukee either directly or indirectly. Overall, development of a statewide intercity bus network will significantly increase mobility options for individuals, particularly low-income and zero-vehicle households, in areas already served by intercity bus, such as Madison and Milwaukee.

Intercity passenger rail

Amtrak currently provides the state's only intercity passenger rail service. The *Hiawatha Service* provides seven daily round-trips (six on Sundays) between Chicago and Milwaukee, with stops in Sturtevant and at the General Mitchell International Airport. The *Empire Builder* service provides one daily round-trip between Chicago and Seattle/Portland, with stops in Milwaukee, Columbus, Portage, Wisconsin Dells, Tomah and La Crosse.

Connections 2030 recommends implementing the Wisconsin component of the Midwest Regional Rail System. Maps 15-10 through 15-17 show the locations of recommended intercity passenger rail stations and Census block groups that exceed a threshold for a specified population. Under this system, intercity passenger rail service could potentially be expanded to include an additional 14 Wisconsin communities that currently have no intercity passenger rail service: Hudson, Menomonie, Eau Claire, Green Bay, Appleton, Neenah, Oshkosh, Fond du Lac, West Bend, Madison, Watertown, Oconomowoc, Brookfield and Granville (northwest Milwaukee). In addition, some of the recommended intercity bus service is designed to directly connect to selected intercity passenger rail stations.

The Northeast region will experience the greatest level of service expansion since five new stations are recommended. The intercity passenger rail recommendations also expand service to the state's second largest metropolitan area – Madison. As with the intercity bus service, the Milwaukee area will also experience expanded intercity passenger rail service due to a wider range of travel options.

Public transit

Wisconsin's public transit system comprises 71 transit systems that include 23 fixed-route urban bus systems, six rural fixed route systems, 43 shared-ride taxi systems and four commuter bus systems. In addition, Wisconsin has two fixed-guideway systems – Kenosha streetcar and Metra commuter rail service – both located in Kenosha.

Connections 2030 recommends continued support for public, specialized, human services and fixed-guideway transit. The plan also recommends actions aimed at improving transit program and planning efficiencies for owners and operators, as well as supporting legislation that enables local governments to raise revenues to support transit costs, allowing local transit systems to expand their service. The plan also notes the importance of coordinating service between different transit providers, which can improve service efficiency, improve access to jobs and expand the area accessible by transit, including areas on the urban fringe.

The *Connections 2030* recommendations will significantly increase mobility options for critical transportation trips needed by individuals who cannot or choose not to drive. These recommendations:

- » Increase the level of transit service in urban and rural areas
- » Allow transit to be a reasonable travel choice
- » Increase access to jobs, health care and shopping

Intermodal connections

A challenge facing transportation in Wisconsin is the adequacy of intermodal connections. For the purpose of this chapter, intermodal connections allow people to easily travel between different modes of transportation, such as taking public transit to an intercity passenger rail station. In some Wisconsin communities, connections are lacking or schedules do not coordinate. For example, public transit may not serve the intercity bus stop, or the intercity bus schedule many require individuals to wait several hours before boarding an intercity passenger train. This lack of connectivity and poor schedule coordination may discourage individuals from using these forms of transportation.

Connections 2030 continues WisDOT's efforts to work with transportation providers to identify opportunities to connect transportation modes and provide technical assistance to encourage ticket and schedule coordination between intercity bus and intercity passenger rail providers. In addition,



the plan recommends funding intermodal facilities, including transit, intercity bus and intercity passenger rail, and intermodal stations at airports.

Economic opportunities

Historically, minority and low-income populations have been underrepresented in the transportation industry. This may result from a lack of awareness of job availability, the inability to access transportation-related jobs due to a lack of transportation, or limited skill levels or training. As discussed in Chapter 7, *Foster Wisconsin's Economic Growth*, WisDOT will continue to encourage and provide for disadvantaged business enterprise participation in the transportation workforce. It will also provide training to individuals and businesses for possible entry into the transportation workforce. Specifically, WisDOT will:

- » Create partnerships with minority and low-income communities to build stronger relationships
- » Support and enhance ongoing efforts such as the Disadvantaged Business Enterprise program
- » Continue efforts to build a diverse, skilled and professional transportation workforce through programs such as Transportation Alliance for New Solutions, National Summer Transportation Institute and the Career Awareness Summer Program
- » Target the distribution of information to economically disadvantaged businesses

Next steps

The analysis presented in this chapter is at the system-level and is only one step in WisDOT's commitment to ensuring that its plans and projects do not result in disproportionate impacts. The analysis demonstrates that minority and low-income populations, as well as persons age 65 and older and zero-vehicle households, are found in all WisDOT regions and often within close proximity to existing and recommended transportation projects.

Additional environmental justice analyses will occur at the project level to analyze whether proposed activities may result in disproportionate impacts.

As shown in the preceding discussion, *Connections 2030* promotes an efficient and well-integrated multimodal transportation system that improves transportation access for all Wisconsin residents. As the framework for decision-making and prioritizing investments, *Connections 2030* sets the direction for the department to meet needs and challenges through 2030. At the system-level, the policy recommendations outlined in *Connections 2030* offer a balanced framework for multimodal investment strategies and do not include any inherent disproportionate impacts on minority or low-income populations.

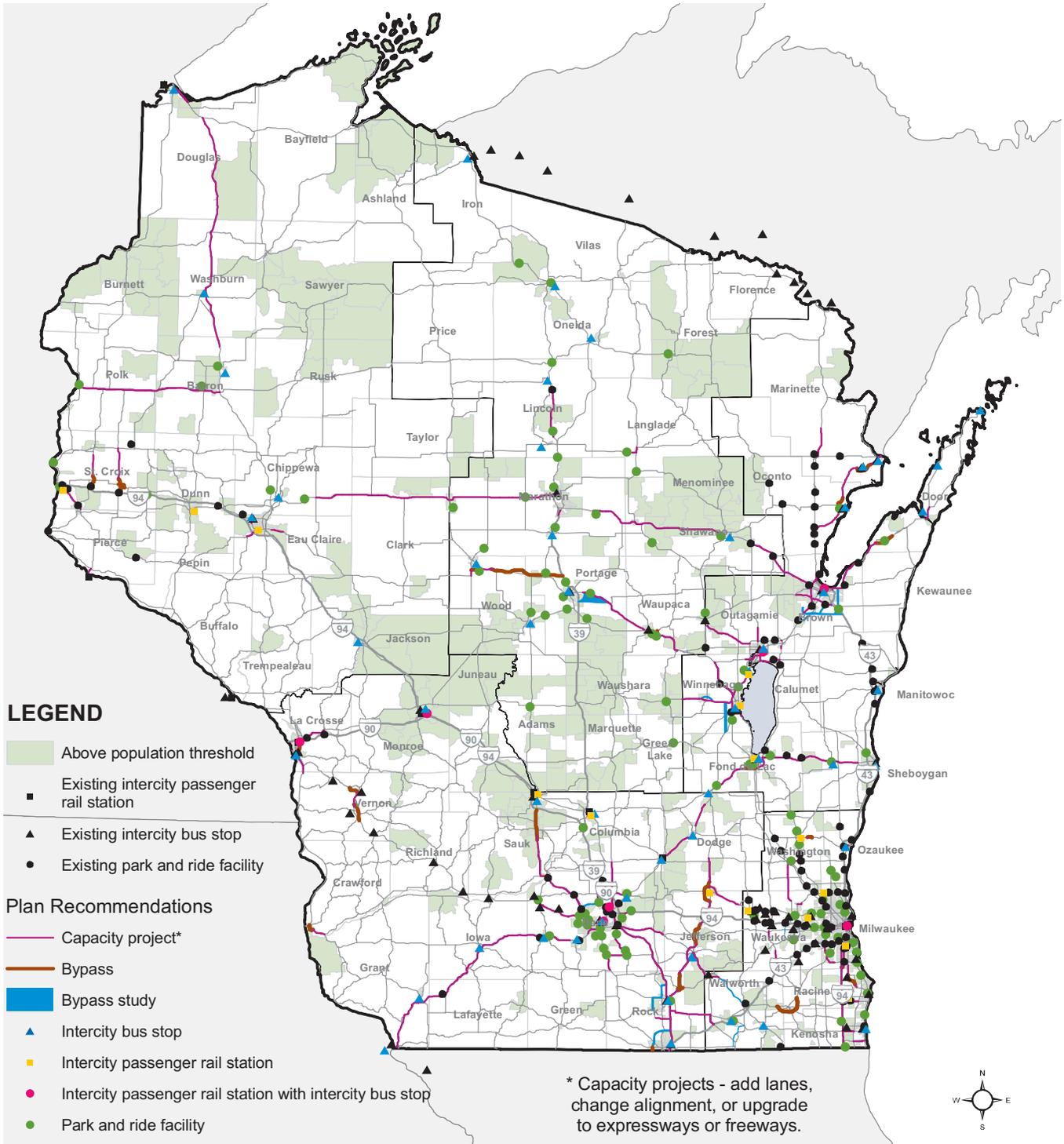
In drafting the policies, WisDOT considered the concerns and needs of minority, low-income, age 65 and older, and zero-vehicle household populations. Implementing the individual actions identified in *Connections 2030* may impact the environment and communities (see Chapter 14, *System-Plan Environmental Evaluation* for more information). In some instances, there will unavoidable impacts. However, for all projects under WisDOT authority, the department will work to avoid, minimize and mitigate impacts.

WisDOT is responsible for evaluating the potential environmental and environmental justice impacts of transportation projects occurring on the National Highway System or state trunk highway system in Wisconsin. WisDOT is also required to review environmental documents for any local transportation project using federal funds. Responsibility for evaluating potential environmental and environmental justice impacts on all other transportation projects belongs to the project sponsor. Decisions regarding the nature and amount of transit services provided by a community rest with the owners and operators.

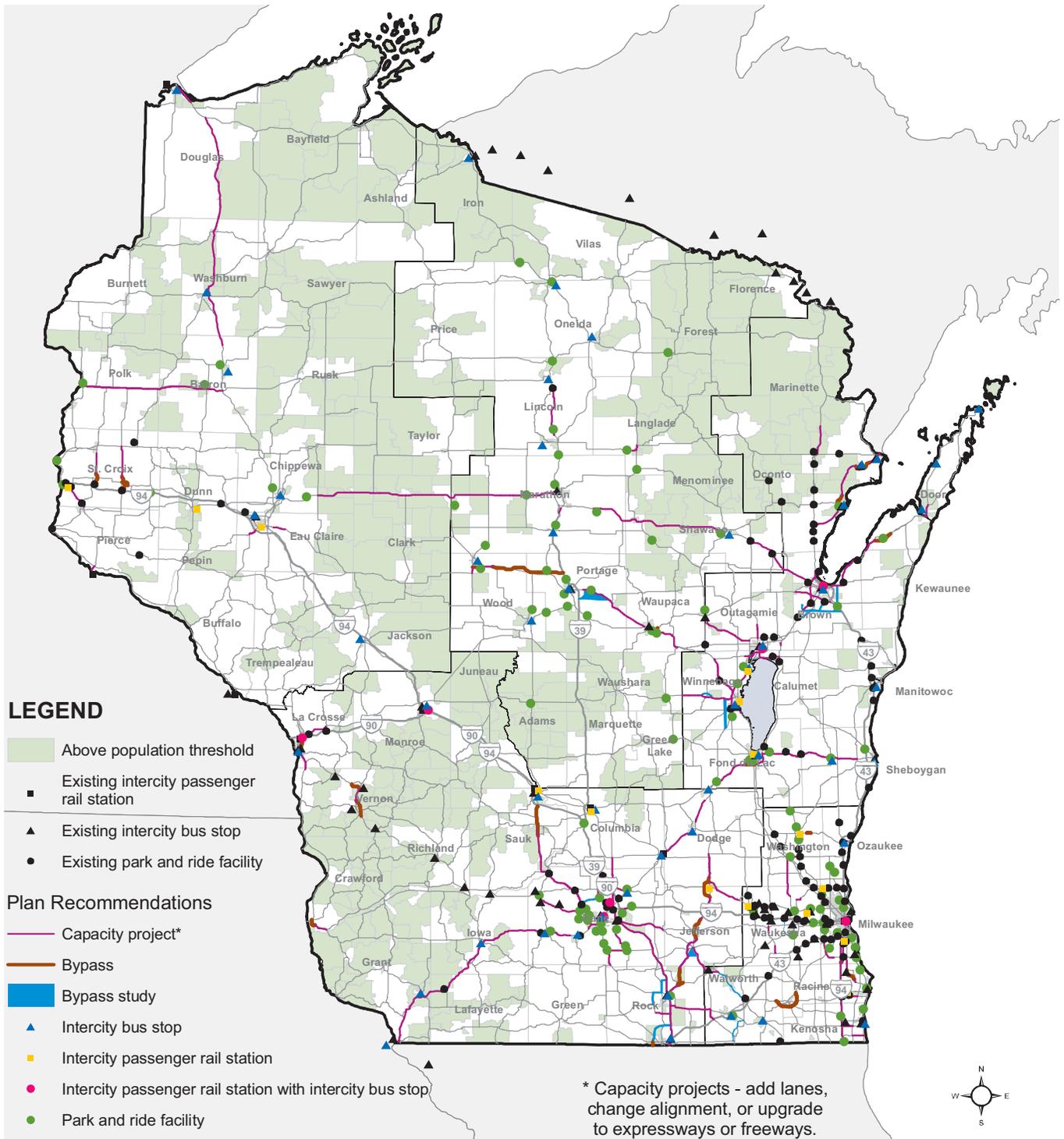
Connections 2030 identifies numerous policies and actions to mitigate potential impacts. For example, the draft plan identifies department policies and specific implementation strategies to address air quality,

protection of sensitive resources, wetland banking, congestion management, coordination, data sharing to improve communication and analyses, and actions related to the effects of transportation decisions on surrounding land uses. Many of these mitigation strategies are discussed in Chapter 10, *Preserve Wisconsin's Quality of Life*; however, other actions are mentioned throughout the plan. The environmental resource agency and tribal consultation processes identified additional mitigation strategies to minimize the potential impacts of implementing *Connections 2030* (see Appendix B, *Summary of Consultation and Plan Comparison Activities*, for more information).



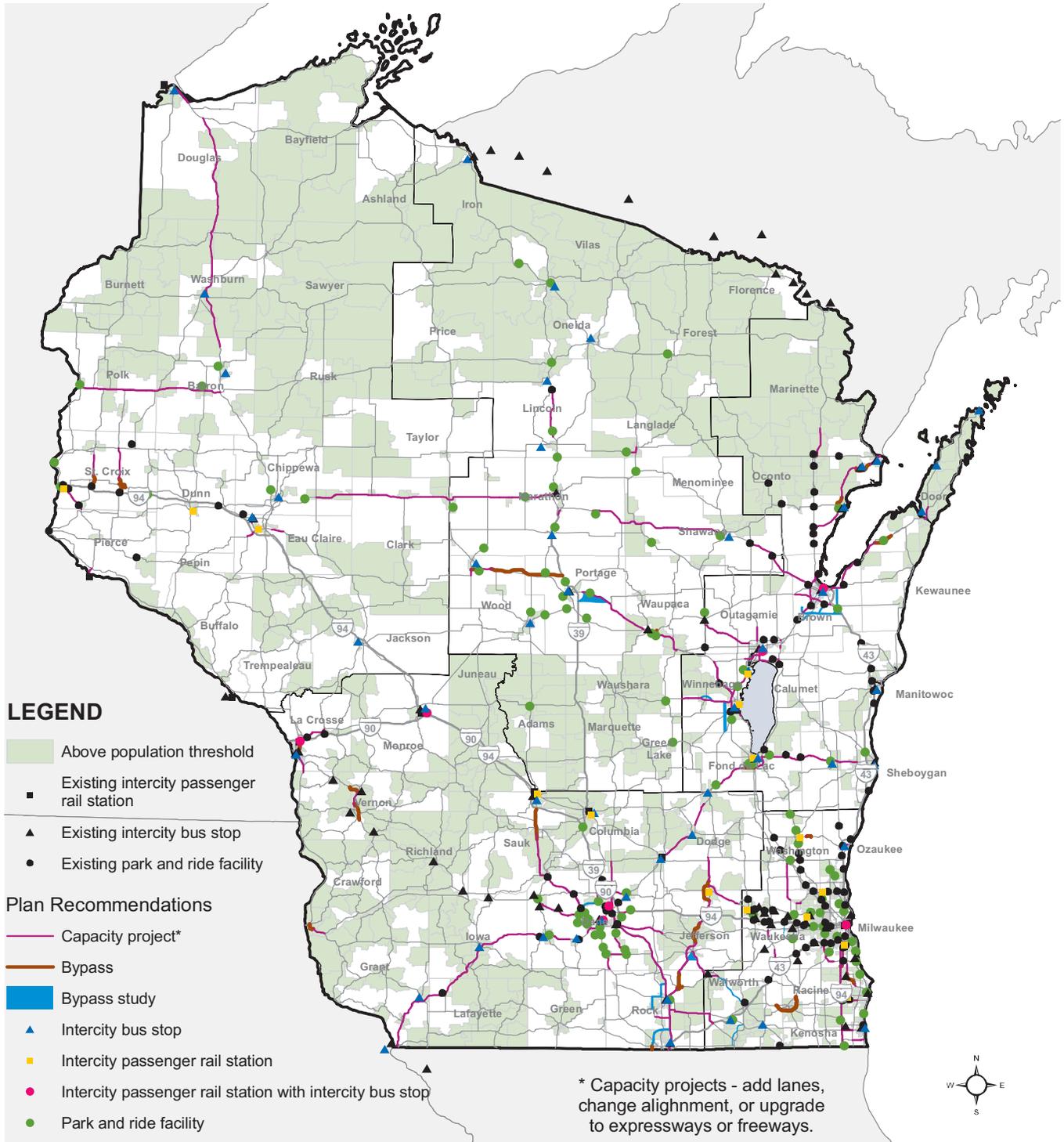


▲ Map 15-10: Census block groups with minority population above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.

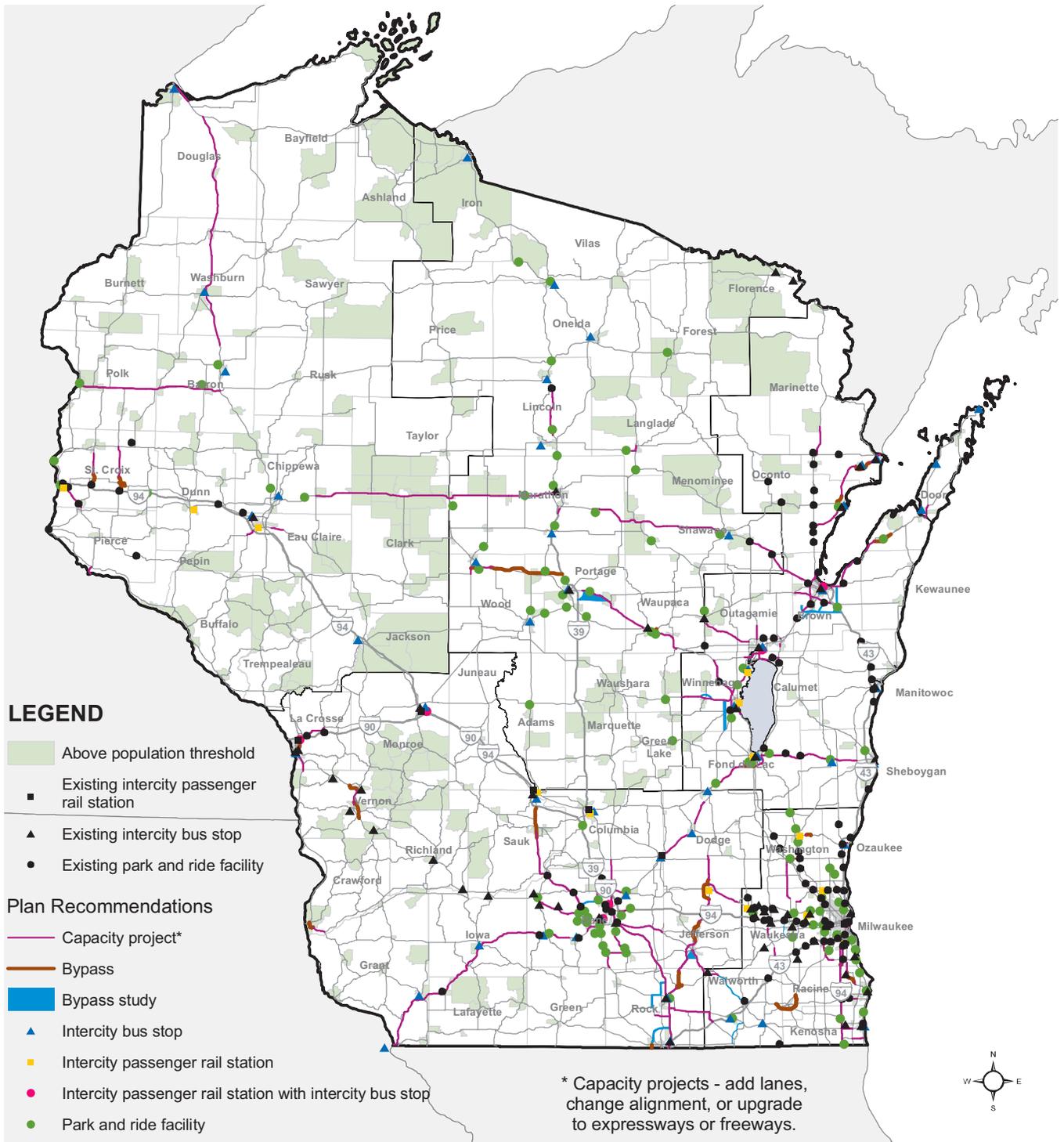


▲ Map 15-11: Census block groups with **persons in poverty** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.



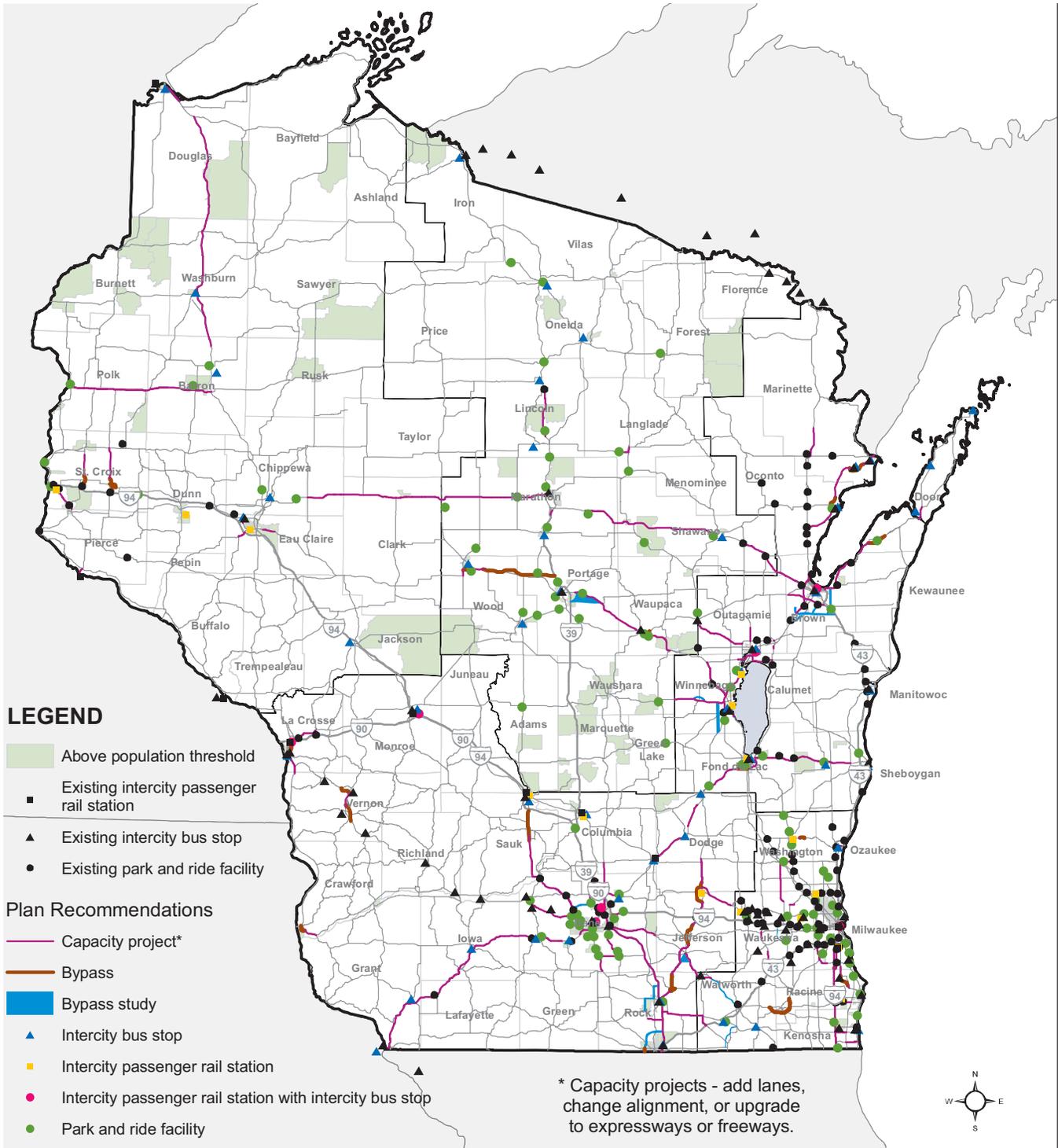


▲ *Map 15-12: Census block groups with **age 65 and older population** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations*
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.

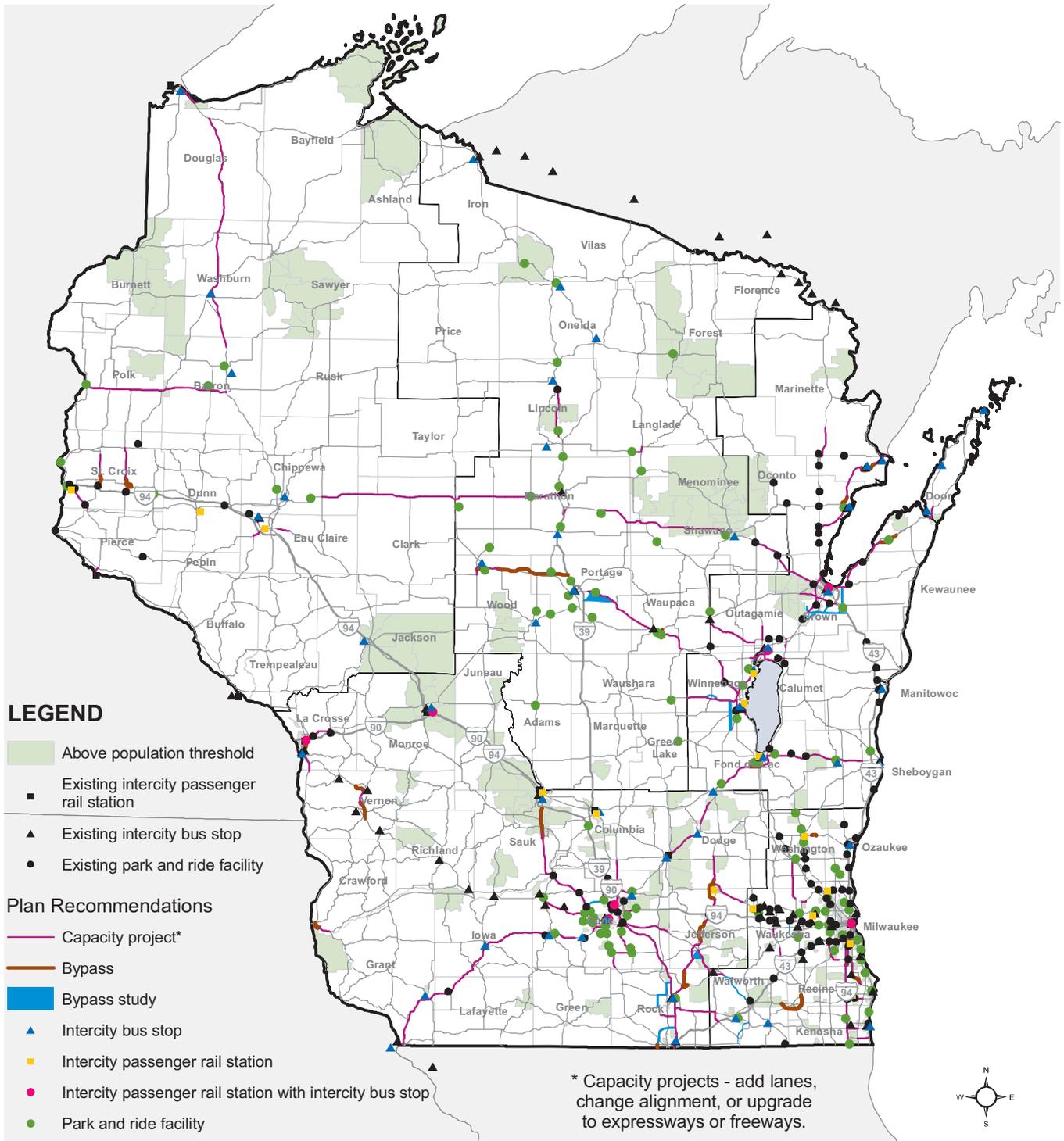


▲ Map 15-13: Census block groups with **zero-vehicle households** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities



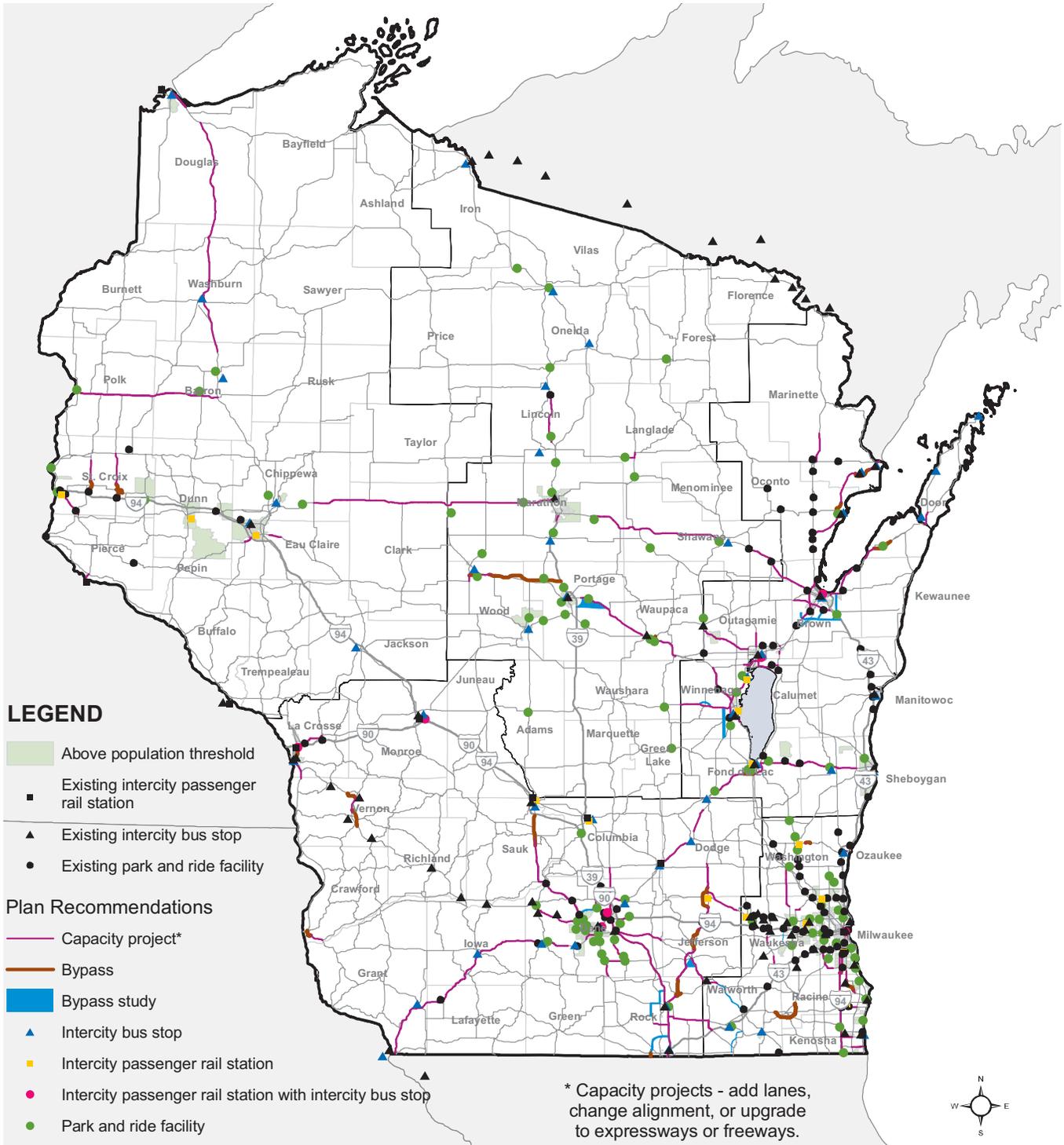


▲ Map 15-14: Census block groups with **black population** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.

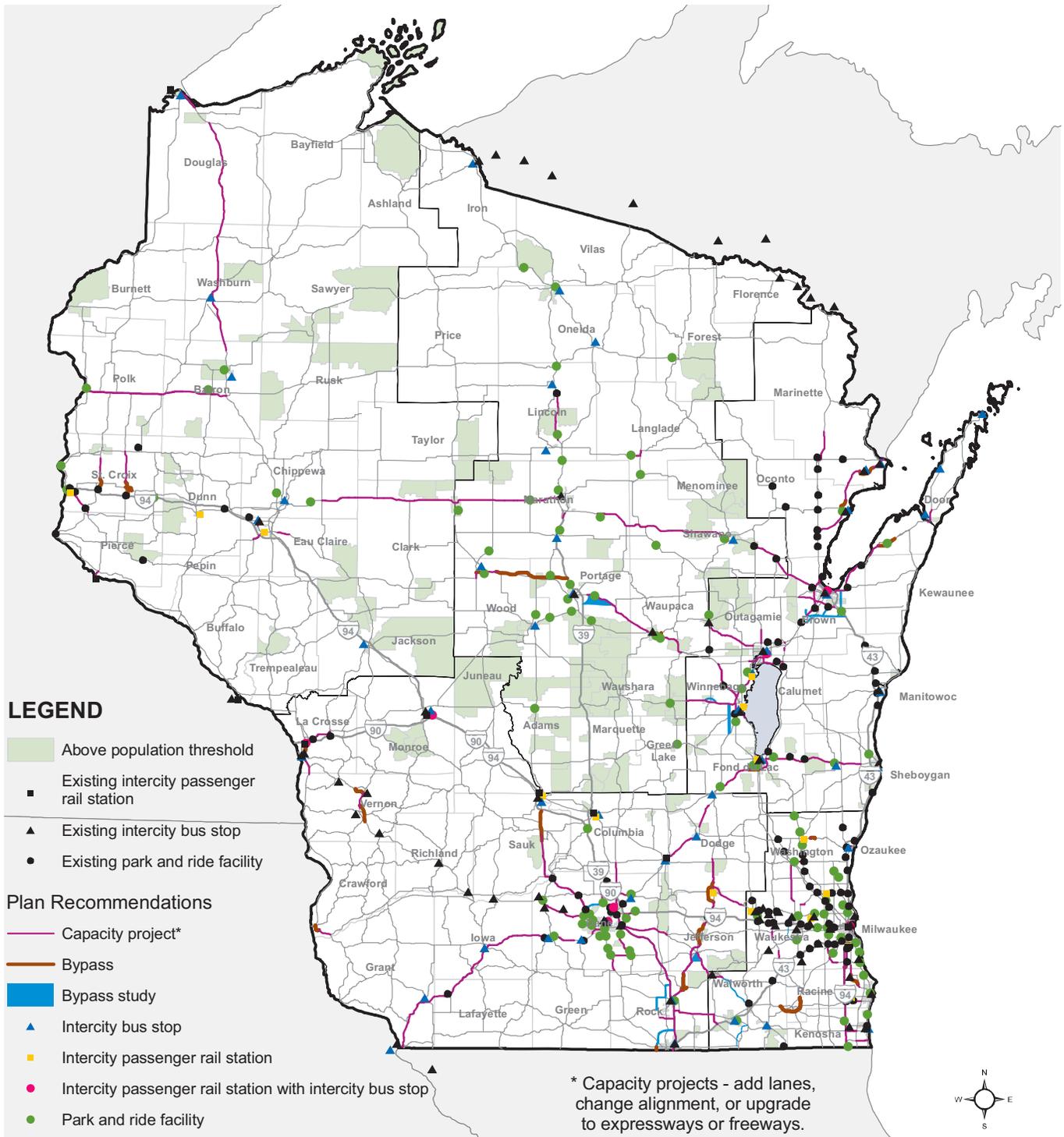


▲ Map 15-15: Census block groups with **American Indian population** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.





▲ Map 15-16: Census block groups with **Asian American population** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.



▲ Map 15-17: Census block groups with **Hispanic population** above region threshold with recommended highway-related activities and existing and recommended intercity bus stops and passenger rail stations
 NOTE: Project alternatives are chosen after consideration of environmental and community impacts, and may be influenced by decisions of the Transportation Projects Commission, the Legislature or the Governor, and through coordination with local units of government, with public involvement opportunities.

