Northeast Georgia Plan for Bicycling and Walking

Adopted by resolution of the Council of the Northeast Georgia Regional Commission, August 19, 2010

NEGRC
Northeast Georgia Regional Commission

Serving the City and County Governments of Barrow, Clarke, Elbert, Greene, Jackson, Jasper, Madison, Morgan, Newton, Oconee, Oglethorpe, and Walton Counties.

Acknowledgements

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About the Northeast Georgia Regional Commission

The Northeast Georgia Regional Commission (NEGRC) was created in 1963 to be a resource for the 12 counties and 54 municipalities in Northeast Georgia in a variety of areas, including planning, economic development, workforce development, and aging services.

The NEGRC Planning Division provides local governments with assistance in land use planning, comprehensive planning, Geographic Information Systems (GIS) and data maintenance, ordinance codification, transportation planning, and grant-writing.

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Funded by the Georgia Department of Transportation

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Executive Summary

In July 2009, the Georgia Department of Transportation contracted with the Northeast Georgia Regional Commission to develop the Northeast Georgia Plan for Bicycling and Walking. Preliminary steps included assembling a Regional Bicycle and Pedestrian Task Force (p. i) and compiling, creating, mapping, and analyzing data (4-11). The Task Force then created a regional vision, goals, and objectives (1, 2) to establish a foundation for building and developing the plan's many components (3). Finally, the planning team, including staff and Task Force members, developed an implementation program composed of a proposed network of facilities (12-14); planning tools, policies, and programs to make Northeast Georgia more conducive to safe walking and bicycling (15-17); and a strategy for funding and adoption (18).

NEGRC presents this document in a format intended to be compact, concise, and most importantly, easy to use. Please see the Appendix for more technical information, detailed maps, model documents, and other resources.

Plan Vision

The Northeast Georgia Plan for Bicycling and Walking guides local decision-makers in developing infrastructure and policy solutions to increase the safety and prevalence of walking and bicycling and to enhance connectivity between homes and regionally important destinations throughout Northeast Georgia.

Goals & Objectives

MULTI-MODAL REGION

Provide active transportation and recreation options for all residents and visitors by developing facilities and policies that will encourage walking and bicycling in Northeast Georgia

PLANNING

Encourage development patterns that are oriented to pedestrians and cyclists

POLICY

Pursue policies that facilitate walking and bicycling

INFRASTRUCTURE

Include bicycle and pedestrian facilities as basic infrastructure in new development and redevelopment projects

EQUITY

Ensure that bicycle and pedestrian facilities and programs serve transportation-disadvantaged individuals

SAFETY

Generate confidence and security for people walking and bicycling throughout the region, and create safer communities through increased surveillance and activity in public spaces

ROAD USERS

Ensure that motorists, cyclists, and pedestrians exercise respect for one another and that traffic laws are enforced universally

COMMUNITY

Promote the community policing aspects of cycling and walking in neighborhoods for crime prevention

CHILDREN, ELDERLY, DISABLED

Evaluate existing and future bicycle and pedestrian facilities with respect to the needs of children, the elderly, and people with disabilities

EDUCATION

Incorporate age-appropriate bicycle and pedestrian educational materials and activities for citizens and public safety officials into community events

CONNECTIVITY

Transform communities in Northeast Georgia to support bicycling and walking trips between neighborhoods and regionally important destinations

ORIGINS & DESTINATIONS

Prioritize bicycle and pedestrian infrastructure projects that connect residential neighborhoods to popular destinations

PUBLIC TRANSPORTATION

Provide bicycle and pedestrian infrastructure surrounding locations used officially or unofficially as public transportation stops

QUALITY OF LIFE

Enhance the way people experience Northeast Georgia by fostering active lifestyles, promoting community-based commerce, and reducing the environmental impacts of motorized transportation

HEALTH

Create public spaces for people of all ages to walk and bicycle for fitness, transportation, and recreation

ECONOMIC DEVELOPMENT

Enhance local commerce and culture by increasing accessibility by foot or bicycle to small businesses and commercial districts

TOURISM

Cultivate and market new opportunities for bicycle and pedestrian tourism

PLACEMAKING

Foster civic pride by creating unique destination environments for walking and bicycling

Plan Philosophy

The NEGRC's work on the *Northeast Georgia Plan for Bicycling and Walking* was funded by the Georgia Department of Transportation (GDOT). For this reason, transportation-related bicycle and pedestrian travel was the focus of the planning process. However, NEGRC recognizes that recreation and transportation corridors may often be one and the same, particularly in many of the rural areas across Northeast Georgia, and that recreation can play a critical role in local and regional economic development. Additionally, GDOT has advised NEGRC and the Regional Bicycle & Pedestrian Task Force that bicycling facilities identified for state routes in a local or regional plan will be included in any major construction project (excluding road re-surfacing). This information contributed to the selection process for recommended on-road bicycle facilities within this plan.

Pedestrians at a Regional Scale

Most cities and towns in the 12-county Northeast Georgia region are dispersed throughout rural and suburban areas at distances too wide to be considered walkable on a regular basis, especially for transportation purposes. To build upon the *Northeast Georgia Plan for Bicycling and Walking* efforts, community-level plans are recommended for more detailed analyses of local pedestrian environments.

A Shift in National Bicycle and Pedestrian Policy

"The DOT policy is to incorporate safe and convenient walking and bicycling facilities into transportation projects. Every transportation agency, including DOT, has the responsibility to improve conditions and opportunities for walking and bicycling and to integrate walking and bicycling into their transportation systems. Because of the numerous individual and community benefits that walking and bicycling provide — including health, safety, environmental, transportation, and quality of life — transportation agencies are encouraged to go beyond minimum standards to provide safe and convenient facilities for these modes."

~Ray LaHood, U.S. Secretary of Transportation (March 2010)

From September-October 2009, NEGRC conducted a web-based survey of Northeast Georgia residents focusing on walking and bicycling behaviors. A total of 245 responses were obtained. Throughout this plan, supporting information derived from this survey will be presented in dialogue bubbles such as this.

Bicycling and Walking for…

Transportation

In 1994, as part of the National Bicycling and Walking Study, the U.S. Department of Transportation adopted a policy to increase the share of non-motorized transportation to at least 15 percent of all trips. According to the 2001 National Household Travel Survey, 48% of all trips made (motorized and non-motorized) were three miles or less. Preliminary analysis of the recently-released 2009 National Household Travel Survey shows an increase in these short trips to 50%. In 2001, U.S. residents made just over four trips per person per day. While the percentage of adults making these four trips per day by walking (usually one mile or less) increased from 16.7 in 1995 to 21.2% in 2001, residents in Southern, rural, and small town areas (in addition to males aged 65 years or older) were shown to be the least apt to walk for transportation. This is likely due in large part to the distance between origin points and destinations in rural areas and small towns, as well as the relative lack of connective pedestrian infrastructure. Walking for transportation can be most effectively encouraged within a 1-mile to 1.5-mile radius of residential neighborhoods and commercial areas. According to the data released thus far from the 2009 NHTS, 87% of all walking trips are one mile or less, and 97% are 2 miles or less. A more reasonable expectation for non-motorized transportation within and between rural communities is travel by bicycle. In 2001, bicycling accounted for less than one percent (0.8%) of all daily trips across the country. Preliminary analysis of the 2009 NHTS shows a 25% increase (to one percent) in daily trips made by bicycle. A three-mile bicycle trip at a leisurely pace takes approximately 20 minutes, and is a feasible endeavor for most people, regardless of age or fitness level. 2009 survey data show that 85% of all bicycle trips are 3 miles or less.

32% of survey respondents reported regularly walking and/or regularly bicycling for transportation. 46% regularly walk for exercise or leisure, while 55% regularly bike for the same purpose.

Recreation

The Centers for Disease Control and Prevention (CDC) recommends that every adult obtain at least 30 minutes of moderately intense physical activity most days of the week. For children and adolescents, the recommended amount of physical activity is 60 minutes every day. Physical education programs in schools may provide opportunities for children and adolescents to reach a portion of the recommended amount of physical activity. However, rural communities often lack amenities such as membership-based gym facilities or health clubs, motivating residents to seek opportunities for engagement in physical activity at home or outdoors on neighborhood sidewalks, paths, trails, streets, and in parks. According to Active Living Research, a program of the Robert Wood Johnson Foundation, those with the best access to these types of community facilities have been shown to be 43 percent more likely to reach the 30-minute physical activity goal on most days than those with poor access.

Making the Case for Bicycle and Pedestrian Planning

HEALTH

Over one-third of the United States' adult population and 16% of U.S. children are obese, according to the Centers for Disease Control and Prevention. Health consequences of obesity can include high cholesterol, high blood pressure, and abnormal glucose tolerance, which can lead to Type 2 diabetes and/or cardiovascular disease. **Rural children are 25% more likely to be overweight or obese**, largely due to the challenges they face in incorporating regular physical activity into their daily routine.

SAFETY

The provision of adequate infrastructure ensures the safety of pedestrians and cyclists, whether for transportation or recreation purposes, by **clearly identifying areas in which walking and/or bicycling should be expected**. The American Association of State Highway and Transportation Officials (AASHTO) has developed planning and design standards and guidelines for these facilities for the purpose of increasing the safety of and fostering a sense of well-being for pedestrians and cyclists across the country. In addition, community pedestrian and bicycle facilities are considered public spaces, much the same as parks and town plazas. When designed properly, public spaces can deter criminal activity by enhancing visibility and creating opportunities for positive interactions with others.

EQUITY

As walking and bicycling facilities are enhanced, children, the elderly, and lower-income individuals are presented with **more opportunities to participate in the local economy** and utilize their fair share of public resources.

PLACEMAKING

According to the Project for Public Spaces, an organization whose mission it is to improve all types of major public spaces across the country, *placemaking* is defined as a "… process that fosters the creation of vital public destinations: the kind of places where **people feel a strong stake in their communities** and a commitment to make things better… [It] capitalizes on a local community's assets, inspiration, and potential, ultimately creating good public spaces that promote people's health, happiness, and well being."

ENVIRONMENT

Non-motorized transportation modes **minimize negative impacts** on wildlife and plant habitats within or near transportation corridors, and do not contribute to poor air quality conditions.

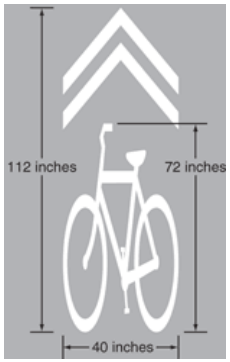
COMMUNITY & ECONOMIC DEVELOPMENT

Non-motorized transportation facilities often lead to **positive impacts on nearby retail and employment centers**. Through targeted marketing and promotion strategies, facilities such as shared-use trails can lead to opportunities for increasing tourism to large and small communities alike.

Best Practices: Bicycling

BIKE LANES should be a minimum of 4 feet wide, with a recommended width of 5 feet from the curb or roadway edge to the bike lane stripe. Wider bike lanes should especially be installed in areas of high speed traffic, in order to accommodate cyclists' tendency to ride roughly 3 feet from the curb. In areas where on-street parking is permitted, the bike lane should be located between the parking area and the motorized travel lane, and be at least 5 feet in width. A 5-foot width is also recommended in urban areas (curb and gutter), while 4 feet is acceptable in other, rural areas. Signage should include standard pavement symbols such as the words "BIKE LANE" and a directional arrow. Symbols should be white with reflective properties, and should, at minimum, be painted on the far side of each intersection.

SHARROWS, or shared-lane markings, were included for the first time in the 2009 edition of the Manual on Uniform Traffic Control Devices (MUTCD). In addition to alerting motorists of the possible presence of cyclists on the road, sharrows are supposed to guide cyclists to the preferred lateral position within the lane. This is especially true for roads with on-street parking and those that are too narrow for a motor vehicle and bicycle to travel side by side. Sharrows are not to be used on roads with speed limits above 35 miles per hour, nor on shoulders or in bike lanes. When used, they should be placed immediately after intersections and at no greater than 250-foot intervals thereafter.



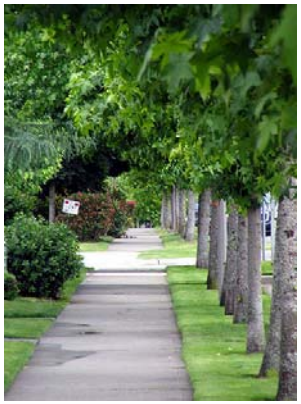
PAVED SHOULDERS, or wide curb lanes, accommodate bicyclists in rural areas. Recommended widths are the same as for bike lanes, and in areas with high motorized vehicle speeds, increased widths may be necessary. In areas with rumble strips, a minimum 4-foot width should be provided between the outer edge of the rumble strip and the edge of the paved shoulder. Roadways without a striped shoulder should be at least 12 feet wide in order to accommodate motor vehicles and bicycles; the recommended shoulder width in areas with "Share the Road" signage is 14 feet.

Summary of Georgia Bicycle Laws

Laws pertaining to the operation of bicycles can be found within Title 40 of the Georgia Code, titled Motor Vehicles and Traffic, under Chapter 6, "Uniform Rules of the Road." Most bicycle-related laws are listed in Article 13, "Special Provisions for Certain Vehicles." Bicycles are identified as vehicles in Part 1 of this Article, and it is noted that all traffic laws shall be applicable to bicycles. (§ 40-6-291. Traffic laws applicable to bicycles) Carrying another person on the handlebars is prohibited, and acceptable methods of transporting children are identified. (§ 40-6-292. Manner of riding bicycles; carrying more than one person) Bicycles should be driven as close to the right side of the road as possible. In addition, local governments have the authority to require cyclists to use a separate path designated solely for bicycles, provided that the path is provided adjacent to the roadway, meets AASHTO planning, design, operation, and maintenance guidelines, and provides access to the same destinations as the roadway. (§ 40-6-294. Riding on roadways and bicycle paths) Finally, the Georgia Code identifies personal safety measures that must be taken while riding bicycles. Helmets are required for persons under the age of 16, and a front-mounted light and rear reflector are required for nighttime riding. (§ 40-6-296. Lights and other equipment on bicycles) In June 2009, the law was clarified, prohibiting all persons over the age of 12 from driving a bicycle on sidewalks, and allowing those under the age of 12 to do so only when the local government resolves to allow it. (§ 40-6-144. Emerging from alley, driveway, or building)

This information was obtained from various sources, including the 1999 American Association of State Highway Officials (AASHTO) Bike Guide, the 2009 Manual on Uniform Traffic Control Devices (MUTCD), and the Pedestrian and Bicycle Information Center website (www.pedbikeinfo.org).

Best Practices: Walking



SIDEWALKS are typically made of concrete, though asphalt or crushed stone may be suitable in some rural areas. A minimum width of 5 feet allows two people to pass by one another comfortably, but sidewalks should be wider near schools, surrounding transit stops, in downtown areas, and other destinations with high volumes of pedestrians. Local guidelines for the location and installation of sidewalks should comply with the Americans with Disabilities Act of 1990 (ADA) requirements, and be based on land use, roadway functional classification, and building density. For a list of sidewalk recommendations compiled by the Federal Highway Administration (FHWA) for both new and existing streets, please refer to the Appendix.

CROSSWALKS occur at intersections that connect the lateral lines of sidewalks present on both sides of the street. These crosswalks could be marked or unmarked. Some communities also have mid-block crosswalks, which must be marked to be considered a crosswalk. For marked crosswalks, ladder, or "zebra" markings painted perpendicular to the pedestrian path are preferred for their visibility. Ideally, these lines should be 12-24 inches wide and spaced 12-24 inches apart to help reduce wear from motor vehicle tires. Raised bump strips should be installed at crosswalk entry points to aide the visually impaired in safely crossing the road.

Sufficient **LIGHTING** should be provided along both sides of arterial streets at regular intervals in such a manner as to avoid light pollution that may distract motorists and bicyclists. Pedestrian-scale lighting is most common in high-volume and commercial areas, where visibility is also enhanced by adjacent building lights. Downtown areas and in-town neighborhoods are often identified by specialty lighting in order to unify the district and provide comfort and security for pedestrians. Many communities across the country have realized cost savings through the use of energy-efficient LED light bulbs in these fixtures.

Summary of Georgia Pedestrian Laws

Laws pertaining to the operation of pedestrians can be found within Title 40 of the Georgia Code, titled Motor Vehicles and Traffic, under Chapter 6, "Uniform Rules of the Road," in Article 5, "Rights and Duties of Pedestrians." Pedestrians are required to obey instructions of all official traffic-control devices, unless otherwise directed by a police officer. (§ 40-6-90. Obedience to traffic-control devices and traffic regulations) Pedestrians have the right of way in crosswalks, and drivers are required to stop to allow them to cross when the pedestrian is within one lane of the half of the roadway on which the vehicle is traveling. Pedestrians are not allowed to walk or run directly into the path of a vehicle that is so close it is impracticable for the driver to yield. When a vehicle is stopped to allow a pedestrian to cross, drivers of any other vehicle are prohibited from passing the stopped vehicle. (§ 40-6-91. Right of way in crosswalks) When crossing at any point other than a marked or unmarked crosswalk at an intersection, pedestrians are required to yield the right of way to all vehicles. Pedestrians are prohibited from crossing between intersections unless on a marked "mid-block" crosswalk. (§ 40-6-92. Crossing roadway elsewhere than at crosswalk) Where a sidewalk or shoulder is provided adjacent to the roadway, pedestrians are prohibited from standing or striding along and upon the roadway itself, unless avoiding hazards on the sidewalk. Where neither a sidewalk nor a shoulder is provided, pedestrians shall stand or stride as near as possible to the edge of the roadway. On two-lane roadways, pedestrians shall stand or stride on the left side. (§ 40-6-96. Pedestrians on or along roadway)

This information was obtained from various sources, including the 2004 AASHTO Pedestrian Guide, the Institute of Transportation Engineers' Pedestrian Facilities Guidelines, the 2009 Manual on Uniform Traffic Control Devices (MUTCD), and the Pedestrian and Bicycle Information Center website (www.pedbikeinfo.org).

Best Practices: Shared-Use

DESIGN CRITERIA Shared-use paths should be at least 10 feet wide, with a minimum of 2 feet of graded area on either side. For areas with high volumes of users, a width of 12-14 feet may be required. Surfacing materials may vary, depending on the target user group. Shared-use paths are usually paved with either asphalt or concrete, accommodating pedestrians and cyclists alike. Crushed aggregate may be used, though it is generally more difficult to traverse for road cyclists and those in wheelchairs, and more frequent maintenance would be necessary. Additionally, as with sidewalks, adequate lighting is an important safety measure for inclusion in the design of shared-use paths that are open to the public after dusk.

The **LOCATION** of shared-use paths may be within road right of way, on abandoned rail corridors, adjacent to active rail corridors, and within floodplain areas along rivers or lakes, among other places. In all situations, these facilities and their amenities should be designed for access by all users, including those with physical disabilities.

AMENITIES may vary depending on the community through which a shared-use path traverses. Rest areas containing picnic tables, benches, and bicycle parking are fairly common, and some communities install restrooms in these areas. Access points, or trail heads, with parking lots might be appropriate in suburban and rural locations where the path is not connected to a community sidewalk network. One of the more important elements for shared-use paths is adequate and detailed signage. Depending on path location, it may be helpful to include wayfinding signs to nearby destinations, signs bearing the path name and length, elevation changes, permitted users, and type of surface. In many cases, those agencies, organizations, and companies that contributed to the construction of the facility may also be recognized on signs.

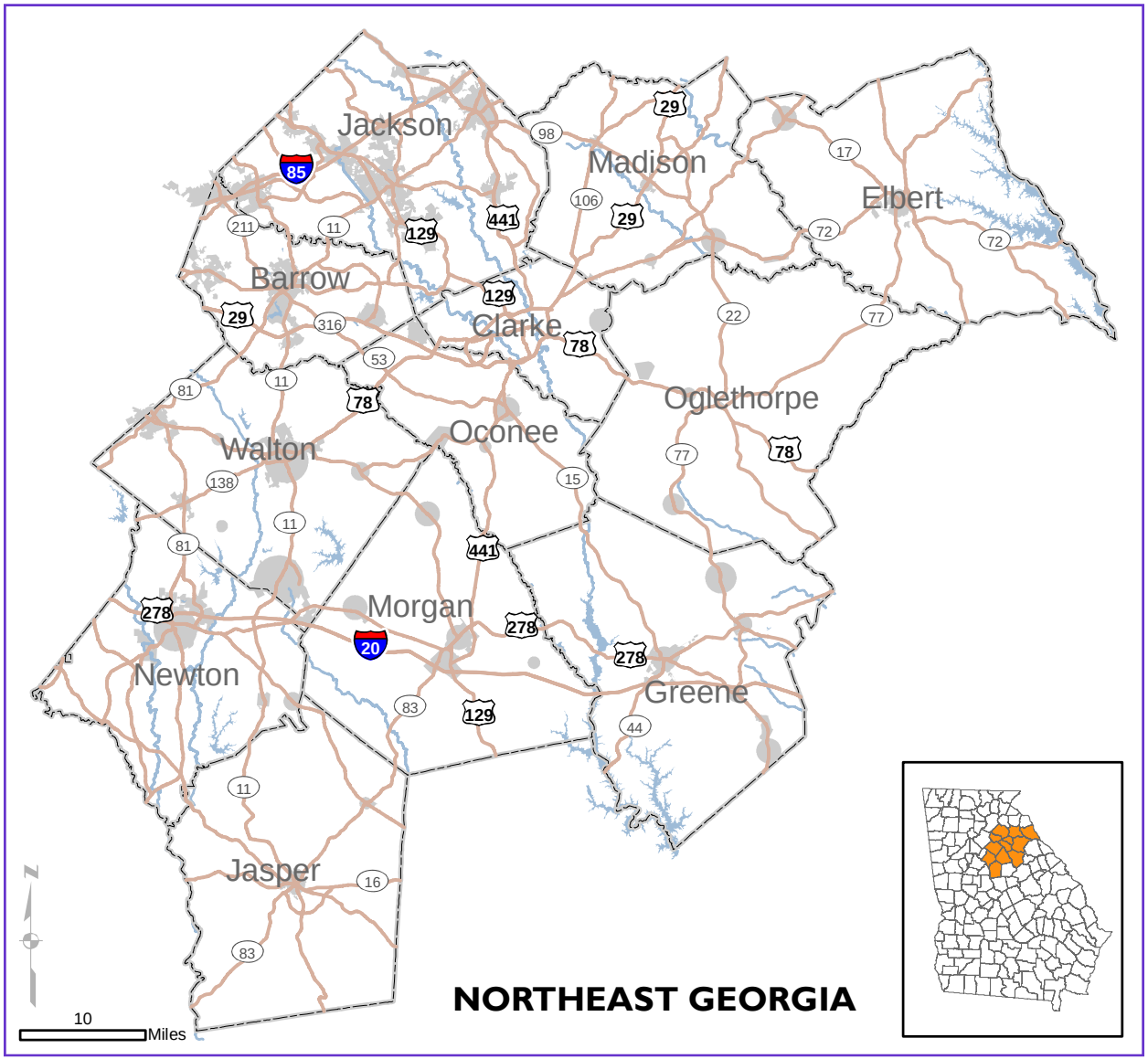
Safe Practices

Shared-use trails or paths are defined by AASHTO as being physically separated from motorized vehicular traffic by an open space or other barrier, and may be used by pedestrians, bicyclists, and other non-motorized users. Greenways, river walks, and rail-trails are all types of shared-use paths. Many communities post trail rules or guidelines for users. These generally include the following:

- Keep right except to pass
- When on a bicycle, announce your presence before passing pedestrians on the left
- Pets must be on a leash
- Clean up after pets
- Place trash into appropriate receptacles
- Motorized vehicles are prohibited

This information was obtained from various sources, including the 1999 American Association of State Highway Officials (AASHTO) Bike Guide, the 2004 AASHTO Pedestrian Guide, the Institute of Transportation Engineers' Pedestrian Facilities Guidelines, the 2009 Manual on Uniform Traffic Control Devices (MUTCD), and the Pedestrian and Bicycle Information Center website (www.pedbikeinfo.org).

Bicycling and Walking in Northeast Georgia



The Northeast Georgia region is comprised of roughly 3,260 square miles with an estimated population of 438,300. With Athens-Clarke County, home of the University of Georgia, at its center, the diverse Northeast Georgia region is comprised of many historic downtowns, rural areas to the East, and suburbanizing communities to the West due to proximity to the Atlanta metropolitan region.

Bicycle and Pedestrian Law Enforcement in NE Georgia

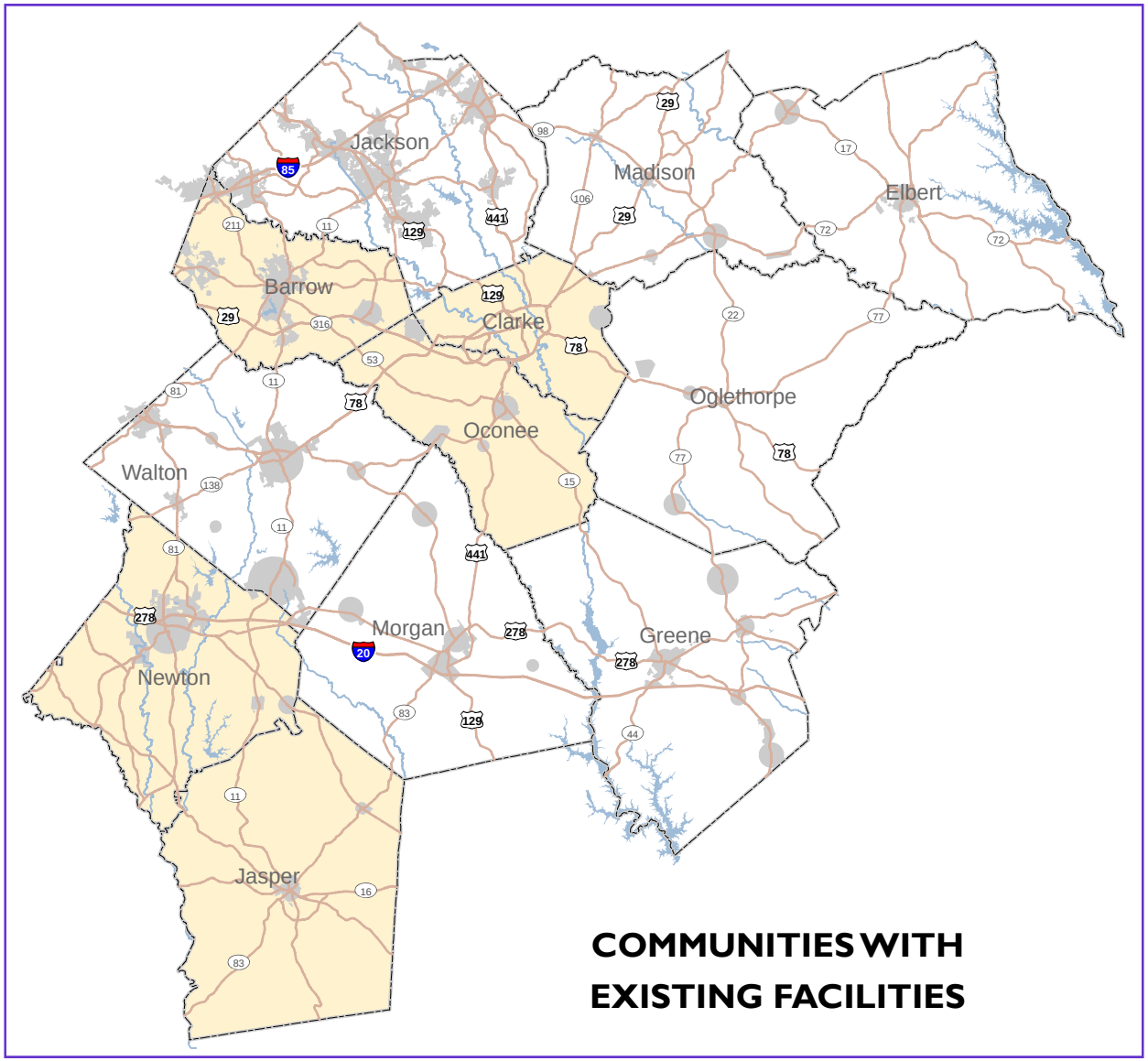
During January and February 2010, informal telephone interviews were conducted with representatives from various police departments throughout Northeast Georgia. Questions focused around departmental strategies for enforcing bicycle and pedestrian laws, and barriers faced in enforcing them. Recurring themes included a lack of police department education and training on and awareness of bicycle and pedestrian laws. Several departments also expressed interest in establishing bicycle patrols, even if only for special events. Recommendations for law enforcement are included in implementation measures found within this plan.

43% of survey respondents live within a "bikeable" distance to a grocery store.

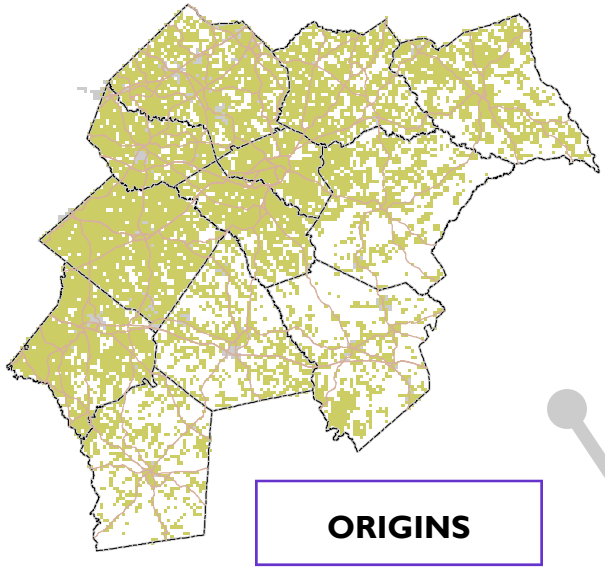
Existing Bicycle Facilities

The five highlighted counties in this map represent those communities in Northeast Georgia which currently have bicycle and pedestrian facilities. These include shared-use paths, bike lanes, sharrows, and "share the road" signage. (See the Appendix for a more detailed map.)

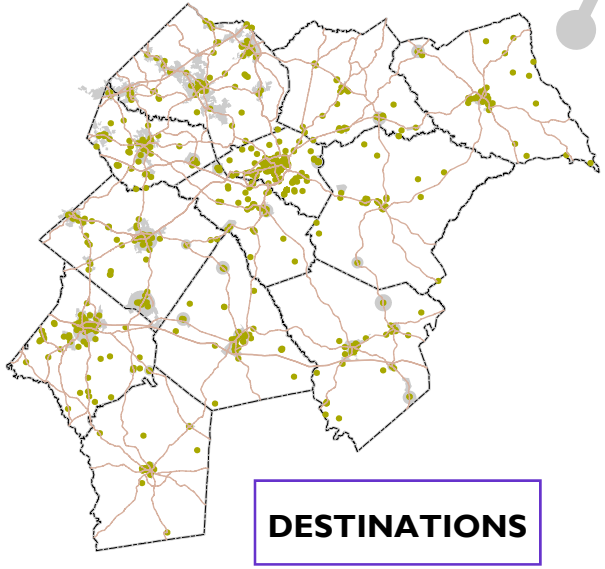
When asked what would encourage them to walk and/ or bicycle for transportation or recreation more often in Northeast Georgia, a majority of survey respondents selected "On-street bicycle lanes or wide, paved shoulders" (82%) and "Development of shared-use paths" (81%).



Regional Analysis

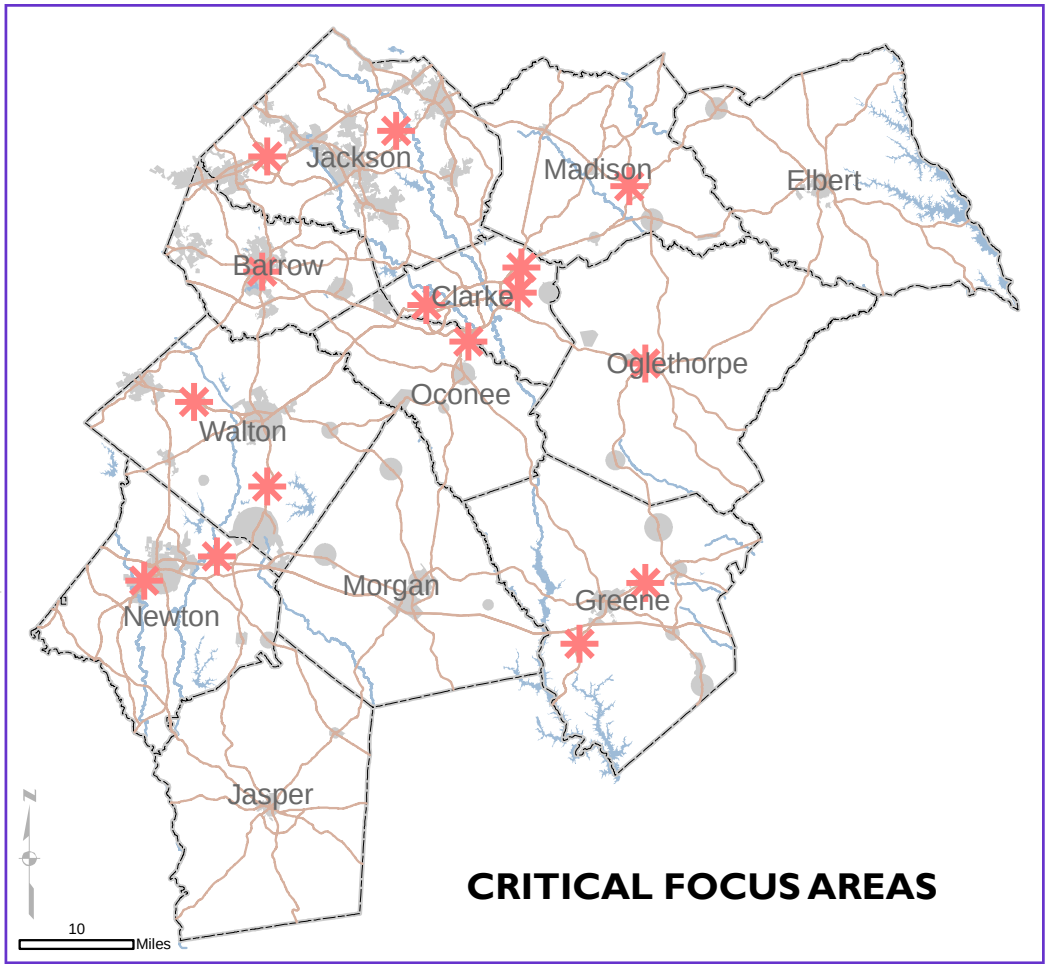


ORIGINS



DESTINATIONS

See the Appendix for a list of Critical Focus Areas and a comprehensive collection of detailed maps used during the analysis process.



In order to determine where demand for bicycle and pedestrian facilities may exist in the region, NEGRC first mapped all residences (from an address update conducted in 2007 for the U.S. Census Bureau), referred to here as Origins, and a variety of Destinations, including schools, major employers, grocery stores, and community facilities such as libraries and city halls. Staff then utilized a geographic information system (GIS) to capture those residential addresses that lay within a one-mile "walkshed" and three-mile "bikeshed" surrounding each mapped destination, to account for what is widely considered to be walkable and bikeable distances. This map was then evaluated through the lens of land use patterns, information obtained from survey respondents, and guidance from the Regional Bicycle and Pedestrian Task Force in order to identify the 15 Critical Focus Areas depicted above with an asterisk.

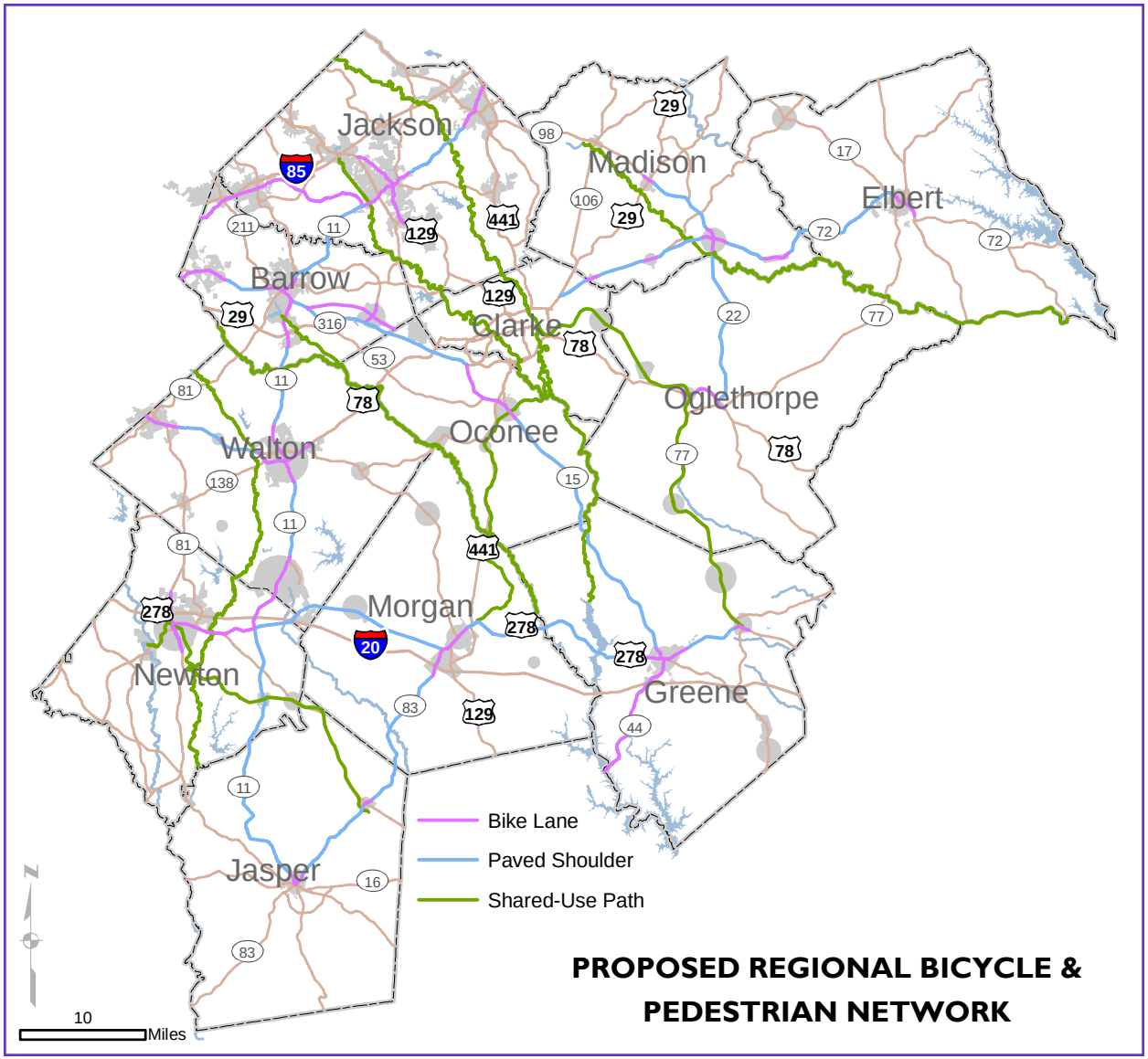
Proposed Network

The proposed Bicycle and Pedestrian Network was developed through a 4-step process, utilizing relevant previous work, aerial imagery, recently obtained field data on the presence of rumble strips on state roads, local knowledge, and information from community bicycle- and/or pedestrian-related planning documents.

STEP 1 Address bicycle and pedestrian connectivity within the Critical Focus Areas, as facilities in these areas show the greatest transportation potential.

STEP 2 Identify connectors between Critical Focus Areas to begin forming a regional network.

STEP 3 Identify corridors not previously selected that present recreational opportunities based on their connectivity to various destinations or the scenic or experience-based amenities of the corridor itself.



STEP 4 A workgroup of the Regional Bicycle and Pedestrian Task Force was formed to guide the assignment of facility types to each corridor identified in the network. Three types of facilities were assigned: bike lanes, paved shoulders, and shared-use paths. In most cases, bike lanes (124.99 miles) were restricted to Critical Focus Areas or within city limits. Paved shoulders (199.5 miles) were assigned to rural corridors, as they may also serve as pedestrian walkways where sidewalks do not exist. Shared-use paths (371.3 miles) were relegated to proposed off-road corridors such as greenways and rail-trails. (See the Appendix for a more detailed map.)

	Corridor Name	Location Description	Facility Type	Length (Miles)
1	SR 10	City of Loganville	Bike Lane	2.80
2	SR 11	Winder-Bethlehem	Bike Lane	5.81
3	SR 11	Covington-Social Circle	Bike Lane	6.76
4	SR 11	City of Jefferson	Bike Lane	6.91
5	SR 11	City of Monroe	Bike Lane	5.03
6	SR 11	City of Monticello	Bike Lane	1.01
7	SR 11	Jackson-Barrow-Walton-Newton-Jasper	Paved Shoulder	44.13
8	SR 124	Braselton-Jackson-Jefferson	Bike Lane	15.23
9	SR 15	City of Commerce	Bike Lane	3.88
10	SR 15	City of Watkinsville	Bike Lane	1.31
11	SR 15	City of Greensboro	Bike Lane	0.90
12	SR 15	Jefferson-Arcade	Bike Lane	4.89
13	SR 15	Oconee-Greene	Paved Shoulder	22.82
14	SR 15	Jackson	Paved Shoulder	5.82
15	SR 17	City of Elberton	Bike Lane	2.75
16	SR 211	City of Statham	Bike Lane	1.84
17	SR 22	City of Comer	Bike Lane	1.24
18	SR 22	Oglethorpe	Paved Shoulder	12.80
19	SR 36	City of Covington	Bike Lane	2.59
20	SR 44	Greensboro-Lake Oconee	Bike Lane	11.34
21	SR 53/Local	Watkinsville-Oconee Co.	Bike Lane	4.99
22	SR 72	City of Comer	Bike Lane	2.07
23	SR 72	City of Carlton	Bike Lane	2.14
24	SR 72	City of Colbert	Bike Lane	1.01
25	SR 72	City of Hull	Bike Lane	0.79
26	SR 72	Clarke-Madison-Elbert	Paved Shoulder	24.60
27	SR 8	City of Winder	Bike Lane	2.41
28	SR 8	Auburn-Carl	Bike Lane	3.91

See the Appendix for corresponding End Points for each identified on-road facility.

	Corridor Name	Location Description	Facility Type	Length (Miles)
29	SR 8	Barrow-Oconee	Paved Shoulder	18.88
30	SR 8 (Former)	Barrow	Bike Lane	7.55
31	SR 81	Oxford-Covington	Bike Lane	2.,94
32	SR 83	City of Shady Dale	Bike Lane	0.93
33	SR 83	City of Monticello	Bike Lane	1.15
34	SR 83	City of Madison	Bike Lane	2.26
35	SR 83	Jasper-Morgan	Paved Shoulder	19.70
36	SR 98	City of Comer	Bike Lane	0.93
37	SR 98	City of Danielsville	Bike Lane	0.80
38	SR 98	Madison	Paved Shoulder	6.27
39	US 278	City of Madison	Bike Lane	2.68
40	US 278	City of Greensboro	Bike Lane	3.53
41	US 278	Covington-Social Circle	Bike Lane	7.16
42	US 278	City of Union Point	Bike Lane	1.27
43	US 278	Newton-Walton-Morgan-Greene	Paved Shoulder	37.50
44	US 78	Crawford-Lexington	Bike Lane	4.31
45	US 78	City of Monroe	Bike Lane	5.41
46	US 78	Walton	Paved Shoulder	6.97
47	(Railroad)	Porterdale-Covington	Rail-Trail	3.25
48	(Railroad)	Newton-Jasper	Rail-Trail	26.26
49	Alcovy River	Walton-Newton	Greenway	46.42
50	Apalachee River	Barrow-Walton-Oconee-Morgan-Greene	Greenway	57.77
51	Athens Line	Clarke-Oconee-Morgan	Rail-Trail	26.43
52	Broad River	Madison-Elbert-Oglethorpe	Greenway	27.23
53	Firefly Trail	Clarke-Oglethorpe-Greene	Rail-Trail	39.31
54	Middle Oconee River	Jackson-Clarke-Oconee	Greenway	38.06
55	North Oconee River	Jackson-Clarke	Greenway	51.81
56	Oconee River	Clarke-Oconee-Oglethorpe-Greene	Greenway	22.46
57	S. Fork, Broad River	Madison-Elbert	Greenway	32.30

Planning Tools

FORM-BASED ZONING

Instead of regulating by land use, form- or design-based zoning codes regulate development by building type, location, transect, or a combination of these. These codes focus on the relationship between buildings and the street, enhancing the pedestrian– and bicycle-friendliness of a community. Graphics are often used to depict building scale, proportion, location within the site, and location of parking.

PEDESTRIAN OVERLAY DISTRICTS

The identification of pedestrian overlay districts within incorporated areas can help promote a mixture of elements that enhance walkability and bikeability. Pedestrian-oriented design standards for buildings, streetscapes, and town squares may guide development within the district. The reuse of existing buildings may be encouraged, contributing to residents' and visitors' interpretation of the community's history.

PUBLIC SIDEWALK AND BIKE LANE DEDICATION

In order to ensure safe pedestrian travel within new residential and commercial developments, many communities are requiring that public sidewalks be provided by the developer. Required pedestrian components may differ among roads. Similarly, when new roads are constructed or when existing roads are altered, communities are increasingly requiring the inclusion of bike lanes.

HEALTH IMPACT ASSESSMENT (HIA)

HIAs are used to objectively evaluate the potential health effects of a new project or policy before it is built or enacted. According to the CDC, the HIA process is similar to the environmental impact assessment required for federal agencies under the National Environmental Policy Act. HIA focuses on health outcomes such as obesity, physical inactivity, asthma, injuries, and social equity, all of which may be addressed through additional bicycle and/or pedestrian facilities. (See the Appendix for an HIA fact sheet.)

TRAFFIC CALMING AND ROAD DIETS

'Road diet' refers to the reduction in the number of traffic lanes on a roadway for the purpose of calming traffic. Typically, road diets involve the conversion of a 4-lane roadway into a 3-lane section with one travel lane in each direction, a two-way turn lane in the middle, and bike lanes on either side. A local example of this practice is Baxter Street in Athens.

INCENTIVE ZONING

This regulatory tool is a reward-based system designed to provide tradeoffs for developments in order to address a community's planning goals. This can result in the allowance of increased densities or building heights in exchange for additional pedestrian or bicycle amenities or facilities. Alternatively, impact fees or fees in lieu of dedication may be used to secure funding for pedestrian and bicycle infrastructure. (See the Appendix for more information about incentive zoning.)

STREET CONNECTIVITY REGULATIONS

Many communities throughout the U.S. are adopting street connectivity regulations to be incorporated into their zoning and subdivision ordinances. These regulations focus on creating a transportation system in which multiple routes serve the same origins and destinations for maximum efficiency and the enhancement of bicycle and pedestrian travel. (See the Appendix for street connectivity guidance and a model ordinance.)

ON-SITE ACCESS, PARKING & CIRCULATION ORDINANCE

In order for pedestrians and bicyclists to safely access new developments, local governments are integrating bicycle and pedestrian access and circulation requirements into the site review process. The emphasis of this type of ordinance is on getting pedestrians and cyclists safely from on-road facilities to the front door.

IMPLEMENTATION RESOURCES

1999 AASHTO Guide for the Development of Bicycle Facilities
www.sccrtc.org/bikes AASHTO_1999_BikeBook.pdf

2005 GDOT Pedestrian & Streetscape Guide
2006 Georgia Guidebook for Pedestrian Planning
www.dot.state.ga.us/travelingingeorgia/bikepedestrian

2009 Manual on Uniform Traffic Control Devices (MUTCD)
mutcd.fhwa.dot.gov/kno_2009.htm

Policy Recommendations

COMPLETE STREETS

According to the National Complete Streets Coalition, a street can be said to be "complete" when pedestrians, bicyclists, motorists, and transit riders of all abilities are able to move safely along and across the corridor. The Coalition encourages communities to adopt policies to guide the transportation planning process at the state and local levels. An ideal complete streets policy consists of a vision, specifies that 'all users' includes pedestrians, bicyclists, and transit riders, encourages street connectivity, applies to both new and retrofit projects, directs the use of the latest and best design standards, recommends solutions to complement the context of the community, establishes performance standards, and identifies implementation steps.

CONCURRENCY, or ADEQUATE PUBLIC FACILITIES

A concurrency or adequate public facilities plan or policy links the timing of new growth to the ability for infrastructure to handle that growth. The terms 'public facilities' and 'infrastructure' can and should include bicycle and pedestrian facilities. Communities can require developers to pay for infrastructure costs if projects are identified in a capital improvement program.

REGIONAL COORDINATION

Representatives from each county and municipal government in Northeast Georgia should participate in Regional Bicycle and Pedestrian Task Force meetings to ensure successful implementation of this plan. In addition, regular attendance is encouraged at other relevant meetings, such as MACORTS, the NEGRC Council, and the NEGRC Planning Advisory Committee.

NEW SCHOOL SITING

At present, the minimum acreage requirements of the Georgia State Board of Education for new school construction are:

- Elementary School: 5 acres plus one acre for each 100 children in full-time equivalent (FTE)
- Middle School: 12 acres plus one acre for each 100 children in FTE
- High School: 20 acres plus one acre for each 100 students in FTE

The State Board of Education has determined that deviations may be made from the minimum acreage requirements for new school site selection in developed areas, so long as the reduced acreage is "considered appropriate" by the site approval committee. The Board has also stated that the facility site "should contribute positively to the health, safety, and social aspects of a child's life at school." This enables local governments and school districts to work together in the development of a policy to site new schools in areas where children are able to walk and bicycle to school.

IMPLEMENTATION RESOURCES

National Complete Streets Coalition
www.completestreets.org

Georgia Board of Education, "A Guide to Facility Site Selection"
(See Appendix for a copy of this document.)

Program Recommendations

BIKE TO WORK DAY/CAR-FREE DAY

Every year during the month of May, the League of American Bicyclists promotes Bike Month; the third Friday of every May is designated as Bike to Work Day. Each year, NEGRC partners with local organizations in Athens-Clarke County to host the Athens Bike to Work Day. This is encouraged throughout Northeast Georgia, where practical. In many communities in the region, however, the concept of bicycling to work is not as feasible as it may be for Athens residents. In these cases, communities may choose to hold a "Car-Free Day," perhaps on a weekend, and schedule various events in celebration of bicycling and walking as transportation.

HISTORICAL & CULTURAL WALKING/BICYCLING TOURS

Many of the small towns and cities throughout Northeast Georgia contain valuable historical and cultural assets that should be celebrated. An innovative method of educating residents and visitors about the community is the organization of walking and bicycling tours. Safety measures should be made priority on these excursions, and cooperation between multiple organizations, agencies, and institutions is encouraged for maximum exposure and participation.

SAFETY EDUCATION & LAW ENFORCEMENT

Police departments, community agencies and organizations, and bicycle and pedestrian advocacy groups are encouraged to develop and execute community safety demonstrations surrounding walking and bicycling. In addition, NEGRC is interested in working with local police departments to develop bicycle- and pedestrian-specific training materials for use in law enforcement strategies.

SAFE ROUTES TO SCHOOL (SRTS)

SRTS generally refers to programs that promote walking and bicycling to school to achieve a wide range of benefits for students, families, and communities. These benefits include reduced traffic in the vicinity of schools, improved pedestrian and bicyclist access, and safety and increased physical activity among students, contributing to healthy lifestyles and greater independence. In 2005, the U.S Congress passed federal legislation that established a national Safe Routes to School program, dedicating a total of $612 million toward the initiative from 2005-2009. The State of Georgia received just over $17 million, and this funding is administered by the Georgia Department of Transportation in two ways. Infrastructure projects are funded through a competitive process to increase the safety of children walking and bicycling to school. In addition, the Georgia Safe Routes to School Resource Center was established to aid local communities in developing educational and encouragement programs for students, faculty, and parents. NEGRC partners with the Resource Center regularly to assist local communities in the development of SRTS plans.

IMPLEMENTATION RESOURCES

League of American Bicyclists' Bike Month Program
www.bikeleague.org/programs/bikemonth/

Georgia Safe Routes to School Resource Center
www.saferoutesga.org

Safe Routes to School National Partnership
www.saferoutespartnership.org

Implementation Strategy

FUNDING RESOURCES

Much of the public-sector funding for facilities such as bike lanes and shared-used paths is allocated through federal transportation legislation. The most recent transportation bill was the Safe, Accountable, Flexible, and Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU), which expired in September 2009. Since then, SAFETEA-LU has simply been extended by Congress to continue providing funding for programs such as **Transportation Enhancements,** the **Congestion Mitigation and Air Quality Improvement Program (CMAQ),** and **Safe Routes to School.** In Georgia, these funding streams are administered by the Georgia Department of Transportation (GDOT), and calls for proposals are announced online at www.dot..state.ga.us. Changes to these programs and the addition of new programs may be included in the next full transportation bill.

The following are other identified sources of funding for bicycle and pedestrian facilities and programs:

- **Bikes Belong Coalition** www.bikesbelong.org
- **Robert Wood Johnson Foundation** www.rwjf.org
- **Captain Planet Foundation** captainplanetfoundation.org

In addition to seeking outside funding, Northeast Georgia communities should consider the inclusion of the recommended facility projects in Special Purpose Local Option Sales Tax (SPLOST) referenda, as well as in special district (e.g. Downtown Development Authority, Business Improvement District) plans.

PLAN ADOPTION APPROACH

With guidance from the Regional Bicycle and Pedestrian Task Force, NEGRC has outlined an approach for presenting this plan to county and municipal governments, regional bodies, school districts, and other stakeholders for either adoption or endorsement (depending on the comfort level of each organization). Planning staff presented the plan's progress, receiving positive feedback, to the NEGRC Council in April 2010. Three public meetings were held in May 2010 in Athens-Clarke County, the City of Danielsville, and the City of Madison, and the final draft was presented to the NEGRC Council for formal adoption during the summer of 2010. Planning staff continues working with the Regional Bicycle and Pedestrian Task Force in adopting and implementing the plan with individual communities. (See the Appendix for a sample adoption/endorsement resolution)

This plan should be a guide to local governments in a variety of planning processes. NEGRC recommends that the adoption or endorsement of this plan be a starting point from which communities are encouraged to develop county, municipal, and neighborhood bicycle and pedestrian plans to address specific local issues. NEGRC can serve as a resource in this process by offering a range of services from technical assistance to full plan development. Contact the Planning Division for more details.