Executive Summary

January 2003

ARTS Projects Underway

Columbia County
Fury’s Ferry Road
Bicycle and Pedestrian Facilities
from River Watch Parkway to the State Line

Richmond County
Augusta Canal
Multi Use Trail
from Evans to Locks Road to 13th Street

Aiken County
SC 118
Multi Use Trail
from SC 302 to Existing SC 118

For more information please visit
www.co.richmond.ga.us/planz
or contact the following county representatives:

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803-642-1520

Tim Young – Columbia County
706-312-7178

Paul DeCamp – Richmond County
706-821-1796

The ARTS Regional Bicycle and Pedestrian Plan

Plan Purpose
ARTS addresses all modes of transportation, including bicycling and walking. A specific bikeway plan was created in 1994 and updated in 1997, but did not include a pedestrian element. During a review of the last Long Range Transportation Plan, the Federal Highway Administration (FHWA) and the Federal Transit Authority (FTA) recommended ARTS develop both a bicycle and pedestrian plan to guide future transportation investments.

ARCADIS was contracted to develop the ARTS Bicycle and Pedestrian Plan to review both bicycle and pedestrian facilities at a regional level, including identifying existing conditions and routes that are currently being used, as well as a connected network of bicycle and pedestrian facilities that link major destinations, and prioritizing future projects based on regional needs and desires.

Plan Components

- Planning Process – Provides an overview of the public involvement program which led to the development of community based goals and objectives and project evaluation criteria.
- Existing Conditions Analysis – Includes an inventory and analysis of existing conditions and plans/policies that impact the development and implementation of a regional bicycle and pedestrian network.
- Design Standards - Provides suggested minimum standards for bicycle and pedestrian facilities with unit costs associated with each of the different facilities
- Implementation Strategies - Includes a description of recommended programs and policies to further bicycle and pedestrian mobility and methods for ongoing evaluation of the regional system.
- Project Identification – Includes project descriptions, mapping and cost estimates for proposed bicycle facilities. Funding and project types are also included for pedestrian facilities.
- Appendices which include a summary of public involvement activities, project evaluation sheets, a description of local and regional planning activities, and a listing of possible funding sources.
Walking and bicycling are increasingly becoming viable and popular means of transportation and are highly valued for their recreational and health benefits. The first step therefore is ensuring that the community is informed and engaged in the study throughout the planning process through a variety of activities.

The ARTS Bicycle and Pedestrian Plan process was anchored by a public involvement program specifically tailored for the ARTS region resulting in the identification and selection of policies, programs, and bicycle and pedestrian projects that support a regional bicycle and pedestrian system.

The plan process also included an analysis of existing conditions, the development of goals and objectives, establishment of evaluation criteria, site analyses, and the creation of implementation strategies and recommended projects, as described below:

Public involvement - Included agency coordination, a regional bicycle/pedestrian steering committee, and community participation supported with a variety of community outreach materials.

Existing Conditions – Included an inventory and analysis of existing conditions and plans/policies that impact the development and implementation of a regional bicycle and pedestrian network.

Goals and Objectives – Included the development of community based goals and objectives that provide a foundation for projects, strategies, and policies.

Evaluation Criteria and Site Analysis– Included the establishment of bicycle and pedestrian project evaluation criteria and evaluation of proposed bicycle corridors to ensure that both planned projects and future projects will meet the needs of all users. As a result of this process, evaluation criteria, design standards and performance measures were created.

Strategies and Projects – Included the development of recommended programs, policies, and strategies to further bicycle and pedestrian mobility and the identification of recommended projects.

A project team, consisting of staff from ARTS, Aiken County, Columbia County and ARCADIS staff facilitated the plan process by guiding public involvement activities and providing relevant background information on the study area.
Public involvement is not only mandated by federal regulations in the use of federal funds, but is essential for the completion of a successful plan. Involving the public in the decision making process helps create a community supported vision with an understanding of the needs and constraints of the existing network. No matter how technically sound a planning document may be, without the support of the public it is destined to sit on the shelf. An interactive and comprehensive public participation plan specifically tailored for the ARTS region ensured that the community was a partner throughout the planning process. This program served as a framework for all activities and included agency coordination, public involvement activities and outreach materials.

Agency Coordination

Agency coordination provided the guidance necessary to ensure the public involvement program was tailored not only to current users in the region, but also to potential users such as the elderly and children. Local governments assisted in developing outreach tools to inform and engage the community in the public discussion of this study through a variety of existing activities and several opportunities for direct involvement of the public. Agencies involved included:

- Citizen Advisory Committee
- Policy Committee
- Technical Coordinating Committee

Community Involvement

Community involvement played instrumental role in the development of the plan by providing information related to regional issues and opportunities, goals and objectives, and evaluation criteria. Involvement activities included:

- Regional Bicycle and Pedestrian Steering Committee
- Public Meetings

Outreach Activities

Outreach activities were developed to provide timely information about the project and to engage the public in the planning process. Materials used included:

- Project Newsletter
- Web Page Updates
- Collateral Materials (posters and bookmark)
- Media Outreach
Public Involvement Highlights

The Bicycle and Pedestrian Steering Committee guided the planning process by identifying issues and opportunities within the region, refining goals and objectives for the plan, and establishing criteria and a process for the selection of projects for inclusion in the plan. The steering committee included representatives from the following organizations:

- Aiken Bicycle Club
- Aiken Parks and Recreation Department
- Aiken Running Club
- Augusta Canal Authority
- Augusta Greenspace Commission
- Augusta-Richmond Public Works
- Augusta-Richmond Recreation Department
- Augusta Running Club
- ARTS Citizen Advisory Committee/Fort Gordon
- Columbia Public Works
- Columbia Recreation Department
- Georgia DOT
- Neighborhood Alliance
- Richmond County Safe Communities Program
- South Carolina DOT
- Transit User
- North Augusta
- North Augusta Recreation

Community Meetings

Public meetings were a critical and necessary mechanism for involving the general public in the planning process. Community meetings were held at key points during the planning process to solicit valuable input. Community participants provided valuable input related to the plan included the identification of priority projects, origins and destinations, and deterrents to a regional network. These led directly to the development of goals and objectives, implementation strategies, and recommended projects.

Priority Projects Categories

- Bicycle projects,
- Pedestrian facilities,
- Multi-use locations
- Connections to
- transit facilities
- Specific geographic areas.

Origins and Destinations

- Recreation Areas
- Schools
- Restaurants
- Entertainment Venues
- Church
- Homes
- Hospitals
- Libraries
- Work Place
- Transit Stops
- Commercial Areas

Deterrents to a Regional Network

- Attitude
- Funding
- Development patterns
- Lack of existing bicycle facilities and/or sidewalks
- Safety
- Driver education
Goals and Objectives

The Regional Bicycle and Pedestrian Plan, specifically the goals and objectives, build upon existing state, regional and local bicycle and pedestrian planning efforts, as well as, identify new mechanisms to achieve a regionally coordinated and comprehensive plan. The following goals and objectives were refined through the public involvement process. They provide a foundation for the selection of projects and identification of strategies and performance measures, and guidelines for long-range plans that will assist in the achievement of a unified vision for a regionally coordinated and connected multimodal transportation system that provides educational, environmental and economic benefits for all users.

Goal One: Provide for a bicycle and pedestrian transportation network to serve local, community, and regional needs.

Objectives:
• Overcome physical barriers through governmental coordination and identification of critical linkages/connections.
• Overcome policy level barriers by facilitating changes in local development ordinances and guidelines.
• Integrate and connect to transit facilities to create regional connections for both bicyclists and pedestrians.
• Provide bicycle and pedestrian infrastructure in activity and town centers, where appropriate.
• Retrofit existing developed areas for ADA accessibility.
• Encourage local and state bicycle and pedestrian planning that complements and supports regional bicycle and pedestrian objectives.

Goal Two: Promote the viability of walking and biking as a safe and healthy transportation option throughout the region for all potential users.

Objectives:
• Support regional education, safety, and marketing programs that increase awareness and use of facilities for all users.
• Provide for ongoing regional bicycle and pedestrian coordination through a task force and dedicated staff time.
• Establish regionally consistent design standards for bicycle and pedestrian facilities for all users.
• Provide incentives to local employers and developers to promote bicycle and pedestrian use.

Goal Three: Identify appropriate and adequate funding for the development and maintenance of regional and local bicycle and pedestrian systems.

Objectives:
• Ensure flexibility in federal funding to include bicycle and pedestrian projects.
• Prioritize regional projects and strategies to develop a bicycle and pedestrian network based on need and regional significance.
• Promote low cost, easy to implement projects at the local and state level (i.e. restriping, signage, bicycle racks).
• Establish requirements and standards for long-term maintenance of bicycle and pedestrian facilities.
Existing Conditions

An initial task in developing the regional bicycle and pedestrian plan was to review relevant socioeconomic data and to gather, review, and inventory existing local, regional and state policies, plans, ordinances, and programs related to bicycle and pedestrian facilities, including the 1994 Bicycle Plan and the ARTS Long Range Plan. Not only was this information critical to the development of relevant policies and strategies, it also identified projects to be reviewed for inclusion into the plan.

Traffic generators, demographic characteristics and activity centers are the predominate conditions that can affect the demand for nonmotorized transport. Traffic generators attract the traveling public due to their high employment populations and/or general interest of the public and include educational campuses, employment centers, medical centers, recreation centers, and parks. Demographics also impact nonmotorized needs. Young people (ages 10 to 20), elderly, and low-income people tend to rely more on walking for transport. Young and low-income people tend to rely on cycling for transport. Activity centers tend to be areas with higher population and/or employment numbers and more intense and mixed land uses. A higher density usually translates into buildings that are closer together and perhaps less available parking and makes walking and bicycling more practical than driving. Activity centers may include commercial districts, government centers, and town centers. Within the study area most activity centers were concentrated in town center areas.

Evaluation Criteria

There are many types of cyclists, ranging from experienced riders who use the bicycle as their primary form of transportation and want the most direct route to their destination to casual riders who prefer the safest route to their destination. The development of project evaluation criteria ensures that both planned projects and future projects will meet the needs of all users. The existing conditions analysis, coupled with input from the public meetings led to the creation of evaluation criteria for selection of possible projects. This criteria was further refined by the Steering Committee resulting in an worksheet to evaluate both bicycle and pedestrian facilities for inclusion into the ARTS Short Term Work Program. These evaluation sheets use a weighted scale based on the publically accepted criteria. Tier one criteria receive higher scores than tier two and three, and tier two criteria receive higher scores than tier three.

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<thead>
<tr>
<th>Tier One Criteria</th>
<th>Tier Two Criteria</th>
<th>Tier Three Criteria</th>
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<tbody>
<tr>
<td>Inter-jurisdictional connectivity</td>
<td>Accessibility to transit facilities</td>
<td>Roadway profile issues</td>
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<tr>
<td>Accessibility to and within activity centers</td>
<td>Lack of existing facility</td>
<td>Right-of-way or construction easement needs</td>
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<tr>
<td>Accessibility to and within traffic generators</td>
<td>Included within a local, state, or federal plan</td>
<td>Number of accidents</td>
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<td>Adjacency to high traffic volumes</td>
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ARTS Study Area Recommended Bicycle Projects

Legend

- Proposed Projects
- Art Region Bicycle Facility
- Existing Bike Lanes
- Existing Multi-Use Paths
- Existing Sidewalks
- Fire Protection Roadway
- Waterways
- Taxation
- 68/68 Extension
- Right of Way Construction
- Other Generation
- ARTS Inter-jurisdictional Boundary
- County Boundary
- State Boundary
- National Forest

North
Site Analysis

Once project evaluation criteria were developed, proposed projects were mapped with a GIS system using base mapping data and demographic information provided by the MPO. Site visits were used as a tool to further evaluate the corridors regarding right-of-way constraints, pavement width and conditions, location of bridges and railroad tracks and other topographic characteristics that may affect the feasibility of a bicycle route. After the proposed corridors were reviewed, a draft list of projects with funding years was created and presented for review and comment to local governments, the Steering Committee and at the final public meetings. Every effort was made to ensure that proposed bicycle facilities, on road and off road, as well as pedestrian facilities were coordinated with existing and planned greenways, pedestrian corridors and the transit system.

Design Guidelines

Minimum design standards for bicycle and pedestrian safety were also developed for the ARTS study area based on an analysis of existing standards, public input and the site analysis. The design standards included in the plan for pedestrian, bicycle, and multiuse facilities, represent recommended minimum guidelines that can be used throughout the region to direct the consistent design of bicycle and pedestrian facilities and to assist with the development of cost estimates.

Pedestrian Facilities

It is recommended to have as much separation from vehicular traffic as possible and for the sidewalk to be at least five feet in width. In more urban areas a wider sidewalk may be more desirable as heavy foot traffic is expected. As pedestrians are not insulated from weather, amenities such as shade trees and pedestrian shelters desirable were also recommended whenever possible. Safety should be enhanced with pedestrian lighting. Typical sections for sidewalk construction are included in the plan.

Bicycle Facilities

Bicycle facility standards were provided for Share the Road, Restriping, Urban Bike Lanes and Rural Bike Lanes. In a **share the road** facility, a bicyclist shares the lane with motorized vehicles, therefore, a relatively low traffic volume is also desired to minimize the potential for conflicts between cyclists and motorists. This facility offers a relatively inexpensive method for providing routes for cyclists. Another low cost option for bicycle routes is to **restripe** a road where pavement width allows. Four feet of additional useable pavement width is optimal along straight, relatively flat stretches of road. A **rural bike lane** is an appropriate facility along routes in rural areas and includes striping and rumble strips to provide protection for the bicyclist. An **urban bike lane** is recommended in areas where curb and gutter are present.

Multiuse Facilities

Multi use facilities contain wide pavement so bicyclists and pedestrians can pass one another comfortably. This type of facility can provide short-cuts through residential neighborhoods by connecting cul-de-sac streets, act as connections between major destinations, such as schools and neighborhoods, and can serve as a regional off-road corridor linking pedestrian and bicycle networks in towns and cities, forming a safer and more comprehensive regional network. Ideally shared use paths do not share the right-of-way with vehicular traffic and will cross streets at grade separations.

Implementation Strategies, cont.

**Design and Maintenance**

- Request that local governments use consistent design standards in regional projects.
- Request that local governments submit maintenance plans with all projects requesting federal funding.
- Establish a telephone “hotline” or web page comment section to provide cyclists and pedestrians with the opportunity to suggest improvements. This could later be developed into a “Spot Improvement Program” at the local level.

**Multimodal Connections**

- Review possible installation of bicycle racks on all transit vehicles.
- Provide pedestrian shelters at heavily used transit stops.
- Allow for the reduction of parking spaces when installing bicycle racks.
- Initiate a program whereby local residents can call and recommend bicycle parking locations on public land.

**Land Use Policy**

- Request that local governments adopt appropriate goals and objectives in long-range plans that promote safe and increased bicycle and pedestrian use.
- Request that local governments review zoning regulations for methods to promote pedestrian and bicyclist trips with activity and/or town centers.
- Request local jurisdictions adopt a site plan review policy that allows land use planners and transportation engineers to review plans concurrently.
- Request local jurisdictions amend subdivision regulations to include “skinny” street standards and shared driveway requirements.
- Conduct Walkable Communities Workshops in activity and/or town centers.
- Encourage schools to prepare access management plans with state funding.
Implementation Strategies

The Augusta-Richmond metropolitan region offers numerous possibilities for bicycle and pedestrian travel. Existing pavement on many roadways can be restriped for bike lanes; existing town centers have sidewalks that can be expanded; and natural waterways and abandoned rail corridors provide multiuse trail opportunities. In addition, the community is excited about improving conditions for bicycle and pedestrian travel. However, the full potential and safe use of the bicycle and pedestrian system will not be realized with facilities alone. Increased awareness and education of the viability and safety of these modes of travel are critical, for both users of the system and for drivers. In addition, continued maintenance, funding, land use policies, and ongoing evaluation of the system will be critical to the long-term success of this plan and the bicycle and pedestrian system.

The following are recommended implementation strategies for specific actions to accomplish the goals and objectives of the Bicycle and Pedestrian Plan. Most of these are short-term strategies that can be initiated over the next five years and will lay a foundation for future success and future plans.

Funding

- Fund approximately $500,000 to $1 million in federal funding, per year, exclusively for regional bicycle projects.
- Require SCDOT, GDOT, and local governments to incorporate identified regional bicycle projects into planned road improvements.
- Set aside approximately $250,000 in federal funding, per year, exclusively for sidewalk projects.
- Require SCDOT, GDOT, and local governments to consider pedestrian facilities in all road improvements.
- Request that local governments amend local development regulations so that pedestrian and bicycle facilities are required during construction of new development.

Evaluation of Network

- Maintain a current GIS database of bicycle and new pedestrian facilities to facilitate data collection needs.
- Evaluate bicycle and pedestrian network based on performance standards provided in plan.

Education

- Update the bicycle and pedestrian web page with highlights of the benefits associated with walking and bicycling, including health, fitness, economic, and environmental; maps of existing bicycling facilities; and web page links to local advocacy groups, national bicycling and walking organizations, and local government bicycle and pedestrian activities. The ARTS transportation planner should continuously update this web page with information on new bicycle and pedestrian facilities.
- Contact both the GDOT and SCDOT bicycle and pedestrian coordinators for Share the Road bumper stickers to distribute throughout the region. These bumper stickers can be provided to local bicycle shops, outdoor shops, and local government offices.
- Provide NHSTA, GDOT, and SCDOT safety publications to all schools in the region.

Safety

- Contact the GDOT bicycle and pedestrian coordinator to research possibility of initiating the SR2S program in Richmond and Columbia counties.
- Contact the SCDOT bicycle and pedestrian coordinator about the possibility of initiating a SR2S pilot program for South Carolina in Aiken County.
- Contact neighborhood associations and educate them on the Pedestrian Road Show.
- Coordinate future safety programs with the Augusta Safe Kids Coalition (i.e. Collaborative Helmet Initiative).

Enforcement

- Enforce traffic laws to help prevent conflicts and collisions and help encourage traffic safety habits in younger people
- Enact police-sponsored safety workshops aimed at increasing driver awareness of bicyclists and pedestrians
- Conduct Pedestrian Sting operations to raise awareness of pedestrian rights and to reduce dangers for pedestrians.

Agency Coordination

- Redesign TIP project application form to request bicycle- and pedestrian-related information.
- Support a Bicycle and Pedestrian Steering Committee through staff time and an official resolution.