



▶ NETWORK



▶ POLICIES & SUPPORTING INFRASTRUCTURE



▶ SAFETY

Pedestrian

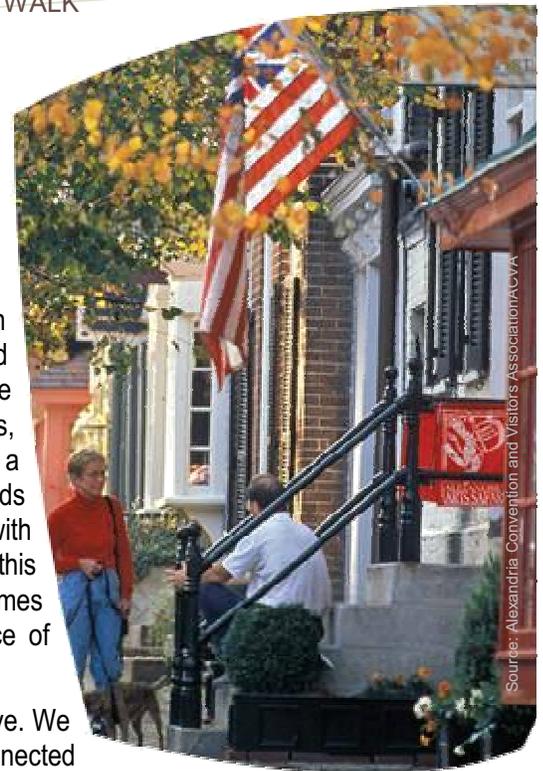
THE CITY WILL MAKE WALKING A PART OF PEOPLE'S EVERYDAY LIVES BY PROVIDING PLEASANT, SAFE AND ACCESSIBLE CONNECTIONS THAT ENCOURAGE AND REWARD THE CHOICE TO WALK

Introduction

"Pedestrians are the lost measure of a community; they set the scale for both center and edge of our neighborhoods."

This oft-used quote by architect Pete Calthorpe is particularly appropriate in Alexandria, where we have a history of creating both walkable places and auto-dependent development. Walking was a central consideration in the street layout of Old Town where a natural inclination toward small blocks, street trees and a blend of building types helped this seaport grow into a thriving city and, today, a popular tourist destination. Nearby neighborhoods including Rosemont and Del Ray also have narrow, tree-lined streets with sidewalks that help encourage community engagement and diversity. But this pattern was not replicated everywhere in Alexandria and, today, we sometimes bemoan this missing ingredient without truly understanding the importance of walkability.

The most important elements of walkability are easily defined but often elusive. We obviously need places to walk within walking distance. Also vital are well-connected streets with pleasant sidewalks or paths, attractive landscaping and easy-to-cross intersections. The character of traffic is arguably most important: If our streets are too wide or is traffic is too heavy or fast, people will not walk.



What's Different about this Plan for Pedestrians?

- ◆ Focus on a holistic approach to improving walkability across Alexandria with measurable goals in engineering, enforcement, encouragement, education and safety
- ◆ It concentrates on improving walkability within the walkshed around key transit stops
- ◆ Improved coordination between transportation and land use planning to encourage and reward walking in areas of residential density and mixed uses
- ◆ Encourages people to integrate walking into their daily routines by providing safe routes to school and transit access



Issue:

Alexandria has qualities of both an auto-oriented suburb and an urban historic seaport. As it continues to grow, we must seek new ways to improve pedestrian mobility that build community and encourage safety.

Solution:

Safe and pleasant accommodation of pedestrian travel on every road, across every intersection and to every destination in Alexandria.

By making Alexandria more pedestrian friendly, we will take a huge step toward making our neighborhoods more livable and improving our overall quality of life. In many ways, walking is the most critical element of this Transportation Master Plan because it touches upon so many aspects of community development: economic growth, urban design, engineering and civic engagement. It is both intensely personal – involving questions of personal safety or aesthetics – and critical to the public realm.

This transportation oriented chapter takes a policy approach to improving walkability in Alexandria. It builds on the City's existing small area plans, urban design plans and landscape guidelines. Where those documents provide specific, context-sensitive standards related to walking, a similar approach here would be too prescriptive. A future Pedestrian Design Guide will augment this master plan and accomplish many of those goals.

Most importantly, the document recognizes that walking is a key mode of transportation. In Alexandria, pedestrians have long been valued for their contribution to urban vitality but walking has not, until recently, been considered a serious component of the modern transportation system.¹ This document articulates a bold new vision for our city in which walking should be simply the safest, most convenient and enjoyable way to get around.

This plan outlines a systematic strategy for designing, building, maintaining and improving the pedestrian network citywide. The City Council's 2004 Strategic Plan includes laudable principles of walkability and many of Alexandria's small area plans incorporate initiatives that support and actively encourage walking. This transportation-oriented chapter will augment our existing plans by linking transportation and land-use concerns, providing context and setting a new vision for pedestrian travel where we also persuade an increased percentage of residents to use transit.

One final note: The term 'pedestrian' is used throughout this plan to include people who walk, sit or stand in public spaces or use a wheelchair or other mobility assistance device.² Pedestrians may be people with disabilities, children, shoppers, dog walkers or businesspeople. The principles of universal access work to the benefit of everyone.

What Do Alexandrians Say? Key Pedestrian Workshop Findings



Community Meeting—July 3 & 4, 2003

- ◆ Consistent sidewalk structure and placement, better crosswalk signage, fix crossing lights
- ◆ Countdown to all signals (give pedestrians more time)
- ◆ Clear, wide sidewalks, attractive medians
- ◆ More sidewalks on the West End
- ◆ Create pedestrian-friendly King Street Metro area
- ◆ More pedestrian connectivity through dead-end streets
- ◆ Consider pedestrian access in future developments
- ◆ Introduce ground floor retail, streetscape, public art and sidewalks around Metro stations

Pedestrian Concept Plan

*“Streets and their sidewalks... the main public places of a city are its most vital organs.”
– Jane Jacobs, “The Death and Life of Great American Cities”*



Overarching Goal:
Walking will be the safest, most convenient and enjoyable way to get around in Alexandria.

The purpose of the Pedestrian chapter in the Transportation Master Plan is to establish the framework for new policies and improvements that will make Alexandria more pedestrian friendly and increase the likelihood that our residents will choose walking as a mode of transportation.

The plan includes a series of policy level goals related to Engineering, Encouragement,

Education and Safety. It also outlines a process for evaluating the City's progress with measurable benchmarks and a series of Actions & Strategies. Many of these strategies build upon the City Council-adopted Community Pathways initiative.

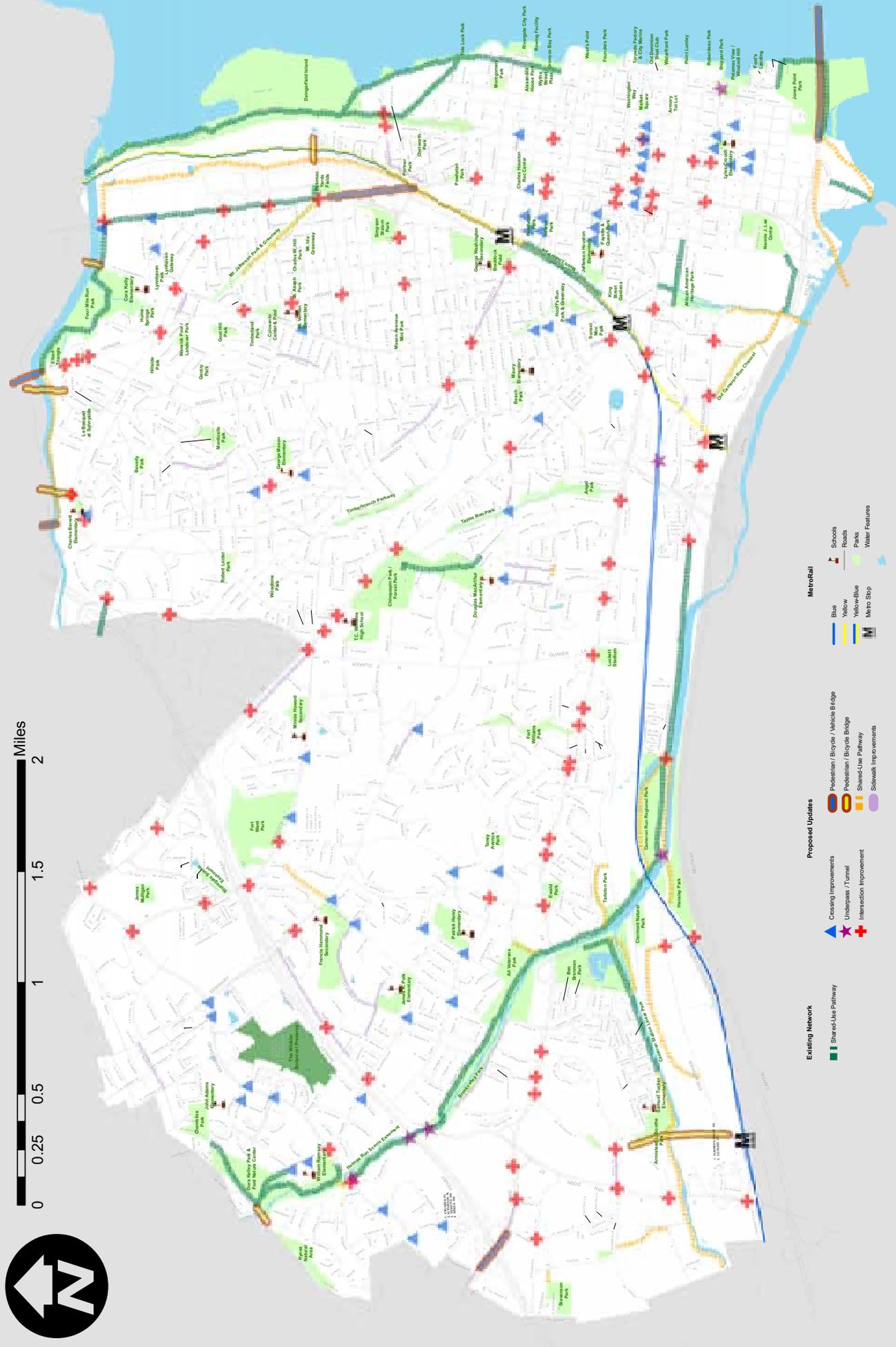
The accompanying “City of Alexandria Proposed Pedestrian Network & Infrastructure” map is a macro-level view at the many updates needed to make Alexandria more walkable. Key projects on this map include nearly 80 intersections in need of safety enhancements, nearly two dozen sidewalk projects, nine miles of new shared use trails, four new bridges for pedestrians and bicyclists only, and five underpass or tunnel improvement projects.

A citywide Pedestrian and Bicycle Mobility Plan underway in 2007 will provide a blueprint for 5-10 years worth of infrastructure improvements that will improve access for persons with disabilities, older adults, pedestrians and bicyclists. This plan to be published later in 2007 will provide a more fine-grained roadmap and allow the City to prioritize the limited funding available for such improvements.

Pedestrian Concept Goals

- 1. Engineering:** The City will provide a continuous, connected and accessible network that enables pedestrians – particularly children, older adults and those with mobility impairments – to move safely and comfortably between places and destinations and encourages walking.
- 2. Encouragement:** The City will encourage mobility for all pedestrians by removing barriers to accessibility and promoting walking as a means of improving health and active lifestyles.
- 3. Education:** The City will develop Safe Routes to School Programs and awareness initiatives that address pedestrian safety, rights and responsibilities.
- 4. Safety:** The City will create a safe pedestrian environment through effective law enforcement detailed crash analysis and implementation of safety countermeasures.

City of Alexandria: Proposed Pedestrian Facilities Updates



- Existing Network**
- Shared-Use Pathway
- Proposed Updates**
- Crossing Improvements
 - Underpass/Tunnel
 - Intersection Improvement
 - Pedestrian/Bicycles/Vehicle Bridge
 - Pedestrian/Bicycle Bridge
 - Shared-Use Pathway
 - Sidewalk Improvements
- MetroRail**
- Blue
 - Yellow
 - Yellow-Blue
 - Metro Stop
 - Schools
 - Roads
 - Parks
 - Water Features

Benchmarks & Evaluation

Quantitative benchmarks make it possible to carry out a continuous assessment and annual evaluation. These benchmarks will be listed as Performance Measures in the Pedestrian Element of the Transportation Master Plan and will be submitted in an annual report to City Council.

- ◆ The proportion of people walking to work in Alexandria shall increase from 3% to 5% by 2011.
- ◆ Working with the Alexandria City Public Schools, the City will establish a system for counting the number of children who walk to school and the number shall increase 5% every year by 2011.
- ◆ The number and percentage of people who walk to access Alexandria's four Metrorail stops will increase (at Eisenhower Ave 1,370 people or 75% walked to the station). Other modes of access include bus and connecting rail, drop-offs or drove and parked. King Street (5,260 people; 62%), Braddock Road (2,700 people; 61%), Van Dorn (580 people, 15%)³ to a level that is consistent with adjacent development and new transit options.
- ◆ The number of pedestrian-motor vehicle crashes (66 in 2004, 87 in 2005 and 36 through Oct. 1, 2006) will hold constant or decrease through 2011.
- ◆ The proposed sidewalk and shared-use path network will be 50% complete by 2011.
- ◆ Improved maintenance will result in a decrease in requests by 50% in 2011.
- ◆ Bi-annual special events in spring and fall will encourage active living and promotion walking as a means of transportation and recreation.
- ◆ More than 50 percent of elementary aged school children will receive pedestrian safety education by 2010.



What Do Alexandrians Say? Key Pedestrian & Bicycle Workshop Findings



Community Meeting—July 3 & 4, 2003

At the bicycle & pedestrian community meeting, citizens “voted” for where they thought City money would be best spent.

- ◆ **Infrastructure: 61.7%**
- ◆ **Safety: 28.8%**
- ◆ **Promotion: 9.5%**

Goals

Goal 1. Engineering

The City will provide a continuous, connected and accessible network that enables pedestrians – particularly children and those with mobility impairments – to move safely and comfortably between places and destinations

The city will seek to establish and maintain a system of Community Pathways to serve all types of pedestrian trips, particularly those with a transportation function. Key projects outlined in the pedestrian element include intersections in need of pedestrian safety enhancements, high-priority crosswalks, sidewalk projects related to Metrorail and proposed Smart Shelters and, finally, pedestrian improvements that will encourage walking to school. Pedestrian initiatives also include new multiuse trails, pedestrian bridges and underpass/tunnel improvement projects.

Engineering improvements must also incorporate proposed passenger amenities proposed in the transit chapter of the Transportation Master Plan. In addition to improving safety, pedestrian amenities such as benches, information kiosks and traveler information systems will enhance the pedestrian experience and reward the choice to travel using the City's pedestrian and transit systems.

The objectives below outline general policy recommendations for improvements that will make Alexandria more pedestrian friendly. The accompanying "Levels of Service" graphic and table on the following page outline in graphic format the key issues related to walkability.



Objectives

1. Use the prioritized recommendations from the city's Pedestrian and Bicycle Mobility Plan (www.AlexRide.org) to improve locations citywide where core pedestrian design issues are compromised. This should include:
 - a. Providing a continuous, connected, inviting and accessible sidewalk network. The minimum unobstructed clear width of new sidewalks will be context sensitive but should be 14 feet or more in urban areas and never less than five feet even in the most restrictive environments. Added priority will be given to filling gaps in the sidewalk network on arterial and collector roadways.
 - b. Ensuring that accessible curb ramps exist at all pedestrian crossings
 - c. Improving pedestrian safety and providing better service at street crossings by providing countdown timers, accessible pedestrian signals and reducing vehicular phases to provide pedestrian intervals long enough for children, older adults and persons with disabilities. Pedestrian safety features shall be used at all signals to provide a better separation between vehicles and pedestrians.
 - d. Providing pedestrian scale lighting that encourages safe, pleasant walking and provides for necessary visibility at designated street crossings
 - e. Improving safety and accessibility at bridges, overpasses, underpasses, tunnels and associated access and exit areas
 - f. Ensuring that street furniture, dining areas, landscaping and utilities are compatible and complementary to adjacent sidewalks. The City will actively work with property owners to maintain accessible, unobstructed sidewalks.
2. Working across city departments, the City will produce a Pedestrian Design Guide issued by the City Engineer in 2009.

CITY OF ALEXANDRIA TRANSPORTATION MASTER PLAN
WALKING – LEVELS OF QUALITY

EXEMPLARY

EXCELLENT

GOOD

FAIR

POOR

Sidewalks

Walkability increases with added width (five feet is a minimum). Greater width is needed when street furniture, utilities, dining areas or signs intrude on the “clear” space. Sidewalks should have clean edges and buffers to the street – either vegetation or parked cars. They should not pass long, blank walls without breaks or details. Sidewalk material should be firm, stable and slip resistant with no interruptions in grade. Conditions improve as the number of driveways is reduced. Curbs should be non-mountable.



Crossings

Crossings should occur at well-marked crosswalks, with pedestrian signals if appropriate. Short signal cycles provide clear pedestrian priority. ADA accessible curb ramps are essential – preferably two per corner and oriented at perpendicular crosswalks. Tight curb radii (15 to 20’) forces traffic to slow. Curb extensions may be appropriate, particularly mid-block. Stop bars can be set back and enhanced signing or lighting can be used selectively for added attention. On multi-lane roads, refuge islands are essential.



Main Streets

Walkways along “main” streets should be wide and clear, particularly in shopping areas. Front doors should open to the street, not parking lots. Blocks should be short – a typically 300 feet with a 1,200 foot perimeter – so that people may cross frequently. Most people will walk 150 feet to get to locations rewarding their travel. Context-sensitive lighting and street furniture are essential. Street trees provide shade and street character.



Local Streets

Local streets should be narrow and well-landscaped with on-street parking to act as additional sidewalk buffer. Driving speeds of 15-20 mph are best and 20-25 mph is acceptable. Homes should be near the street. Lanes should be narrow and new local streets should be designed to encourage slow vehicular movement. Traffic calming may slow traffic and encourage pedestrian activity.



Avenue/Boulevard

Sidewalks along arterials should be wide and well buffered since these streets provide key transit access. Planter strips and bicycle lanes create essential separation from vehicles. Street trees, other landscaping and medians help slow motorists. Longer pedestrian crossings should be broken into separate threats. Median crossings or refuges (4’ minimum, 8-10’ preferred) can be angled forcing people to look at motorists before stepping into their path.



Goals

Goal 2. Encouragement

The City will encourage mobility for all pedestrians, regardless of age or ability, by promoting walking as a means of improving health and increasing transit usage.

Increasing transit usage and enabling transit to compete effectively with automobiles is one of the overall goals of the Transportation Master Plan. To do this, creating a pedestrian friendly environment going to and from transit stops is an essential goal of the entire pedestrian element.

Current estimates suggest that by the year 2030 there will be more than 36,000 daily transit trips from Alexandria to Washington, DC and some 17,647 within the city limits of Alexandria.⁴ Increasingly, Alexandrians are turning to mass transit to provide a dependable and convenient way to work. A recent market study for the City of Alexandria revealed that 62 percent of survey respondents who used mass transit walked less than five minutes to a DASH stop and many said that better pedestrian connections would encourage them to use transit more often.⁵



Similarly, a recent Health Survey emphasized the need for Alexandria to be a healthier city and specifically focused on the problems of childhood obesity.⁶ City sponsored outreach and events that educate the public regarding the health benefits of walking are a crucial component of any transportation master plan.

Objectives

1. Coordinate across city departments and with non-profit partners to educate the public regarding the health benefits of walking so that people can better integrate walking into their daily lives.
2. Support events and activities that promote walking and multi-modal transportation initiatives.
3. Provide formal and informal activity-oriented programs such as community workshops and educational programs, specifically those that encourage the relationship between walking and public health or walking and transit usage.
4. Work with the Alexandria Health Department to monitor current health trends and identify sources of private funding that may be directed to local initiatives.
5. Work with DASH and WMATA to continually encourage walking as a safe and convenient means of accessing transit stops.

Goals

Goal 3. Education

The City will develop Safe Routes to School Programs and awareness initiatives that address pedestrian safety, rights and responsibilities.

The City of Alexandria should seek to educate school-aged youth, community organizations, business groups, civic associations and others on the safety, health and civic benefits of walkable communities. The city's pedestrian initiatives such as the Community Pathways effort and a new Safe Routes to School program seek to promote safe and courteous walking and driving through targeted outreach programs. To date, examples of successful programs include the Street Smart initiative and Walk to School Day.

Driver education tends not to stress pedestrian prerogatives and the City has only recently begun to provide pedestrian education. Conveying the message to non-English speaking residents is also proving increasingly important. Because Hispanics are three times as likely as Whites to be hospitalized for a pedestrian injury, the City must effectively target its education programs to reach this group. Our most dangerous areas for walking tend to have similar characteristics: high-speed roads, heavy traffic, poor pedestrian facilities, and dense populations of people who lack automobiles.



Objectives

1. Provide resources to support creation of programs that encourage walking and promote pedestrian safety such as walking commute campaigns.
2. Use the Safe Routes to School program to educate school children about safe walking practices.
3. Broaden the scope and reach of the Metropolitan Washington Council of Governments "Street Smart" pedestrian education program, especially with respect to provision of outreach to non-English speaking audiences.
4. Publicize the pedestrian network (particularly trails, shared-use paths and amenities such as the Alexandria Heritage Trail) via the internet and using maps, brochures and booklets.
5. Work with residents, community groups, businesses, civic associations and all property owners to expand the network of walkways on existing public rights-of-way and in new acquisitions of open space.
6. Work with the Alexandria Commission of Persons with Disabilities to provide wayfinding orientation for persons with visual impairments and improve education about the City's audible pedestrian signal network.
7. Solicit public input on pedestrian problems via annual reports to City Council, through the city's website, public access television and commercial media. Additionally, the City should regularly publicize listings that enable and encourage citizens to contact the City with pedestrian problems.

Goals

Goal 4. Safety

The City will create a safe pedestrian environment through effective law enforcement and implementation of pedestrian safety countermeasures.

The overall intent of the policies related to Safety is to create a street environment that ensures pedestrian safety. The Alexandria Police Department (APD) has reported approximately 75 pedestrian accidents each year since 2004,⁷ with many near-misses and minor incidents unreported. By reviewing accident data for the last three years, the City is beginning to isolate where accidents are taking place and which demographic groups are at greatest risk.

According to the Metropolitan Washington Council of Governments, regional data indicates several themes⁸:

- ◆ Drivers were cited for a violation in about half of crashes.
- ◆ Pedestrian crashes are most likely to occur at the evening rush (5 to 7 pm) with morning (6 to 9 am) the second most likely. (Preliminary data in Alexandria correlates with this statistic where 18 of 47 pedestrian crashes in 2006 occurred in periods of low light or darkness.)
- ◆ Other things equal, the pedestrian crash rate tends to fall as the number of pedestrians at a location increases. There is safety in numbers. Doubling the number of pedestrians at an intersection already crowded with pedestrians will usually result in little, if any increase in pedestrian crashes
- ◆ Experience shows that it is possible to reduce pedestrian fatalities while increasing walking.

Our most dangerous areas for walking have high-speed roads and poor pedestrian facilities, together with people who lack automobiles. In the near future, the City will outline a process for the designation of "Priority Pedestrian Districts" – typically compact areas of intense pedestrian use where walking is intended to be the primary mode of travel. These areas are typically near key transit stops, schools or institutional buildings and may be given priority for public investment in pedestrian infrastructure.



Objectives

1. Traffic signals and their associated features should be used to improve pedestrian safety at intersections, especially those with a record of collisions. Standards for timing devices should be provided to allow older pedestrians and persons with disabilities sufficient time to cross safely.
2. Maintain the pedestrian network by removing obstacles including vegetation, keeping walks smooth and level, repairing curb ramps and maintaining safety at transit hubs.
3. Partner with the APD to monitor areas of pedestrian concern and ensure that officers understand pedestrian issues as well as pedestrian rights and responsibilities.
4. Focus efforts on safety violations by pedestrians, including jaywalking and proceeding against DON'T WALK signals
5. Seek to continually reduce conflict among pedestrians and bicyclists by designating separated bicycle lanes where appropriate.

Funding

A full summary of funding sources available for the implementation of pedestrian and bicycle programs and infrastructure is included in the Bicycle Section of the Transportation Master Plan.

Actions & Strategies

In recent years, the Alexandria City Council has made it a point to improve the pedestrian experience citywide. After several years of work, the Council on February 9, 2006 adopted a resolution in support of a Community Pathways initiative. At its most basic level, the Community Pathways program is an effort to help Alexandria become a more healthy community that provides safe and convenient choices for people to walk, bicycle and be physically active on a daily basis. “Our efforts to address these issues and transform Alexandria into a nationally recognized pedestrian- and bicycle-friendly City require a comprehensive plan and framework,” the memo said. “Instead of a focus on cars, this program will focus on people, neighborhoods, parks, schools, recreation areas and trails.”

The Community Pathways program and subsequent work sessions by the council-appointed Ad Hoc Transportation Task Force helped solidify a set of clear goals, timelines and a consolidated plan. The Pedestrian and Bicycle Mobility Plan currently underway will provide a blueprint for 5-10 years worth of infrastructure improvements and drastically improve access for persons with disabilities, pedestrians and bicyclists. This plan to be published later in 2007 will provide a fine-grained roadmap to accompany these Actions & Strategies. More importantly, it will allow the City to prioritize the limited funding available for such improvements

P1. Enforcement and Safety Action Items

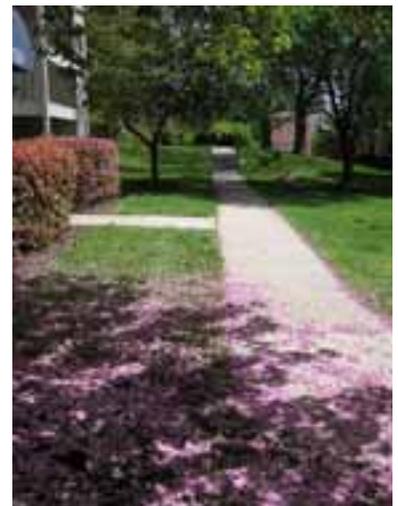
- P1.A. Beginning in 2007, schedule quarterly pedestrian enforcement campaigns in areas where safety is of greatest concern, such as Duke Street and in Alexandria
- P1.B. Continue working with schools, Metro and DASH to identify high-priority crosswalk and intersection improvement projects

P2. Engineering Action Items

- P2.A. Working across city departments, develop a *Pedestrian Design Guide* to be issued by the City Engineer in 2009
- P2.B. Using data gathered in a citywide study of the pedestrian and bicycle network implemented plan:
 - P2.B.i. Infrastructure accessibility improvements for those with mobility impairments
 - P2.B.ii. Improvements to the pedestrian network that promote access to transit
- P2.C. Implement planned Safe Routes to School improvements that will have the strongest likelihood of reducing morning traffic and improving pedestrian safety

P3. Encouragement Action Items

- P3.A. In FY 2007-2008, the City will introduce a stipend – similar to its transit subsidy – for employees who bicycle or walk to work at least four times per week
- P3.B. A checklist-style system that encourages connectivity and universal access in all new developments will be available for use in all development site review plans



Actions & Strategies

P4. Education Action Items

- P4.A. Ensure that the planned Safe Routes to School program takes a holistic approach by including an educational component
- P4.B. Planned 2007 updates to the City Bicycle Trail and Recreation Facility Map will also focus on walking and public transportation routes
- P4.C. Reformat the alternative transportation website (www.AlexRide.org) to emphasize walking and include regular updates and feedback options for citizens

P5. Evaluation Action Items

- P5.A. An annual Benchmark report will be presented to City Council with metrics provided by staff that outline the City's progress in: Reducing Maintenance Requests, Pedestrian Safety, Infrastructure Improvements, Education and Encouragement
- P5.B. The City will seek input from citizens via web-based surveys and e-mail reports regarding its progress and areas of potential improvement



Endnotes

1. Portland Pedestrian Master Plan, p. 1.
2. City of San Diego, "Pedestrian Design," p. 63.
3. WMATA faregate data collected in April 2005, "Guidelines for Station Site and Access Planning," p. C-1.
4. Data from Baker Inc. map, "City of Alexandria: Year 2030 Daily Transit Trips" and based on Metropolitan Washington Council of Governments Round 6.4 Demographic Projections.
5. Survey Progress Report, City of Alexandria, June 19, 2006, Plus 2
6. "Alexandria Community Pathways" Memorandum, March 17, 2005.
7. City of Alexandria PRISM accident data, 2004-06
8. Metropolitan Washington Council of Governments, "Bicycle and Pedestrian Plan for the National Capital Region," Section 3-5, July 2006.

"More than transportation channels, streets are places suited for pedestrian interaction, where people choose to pause and socialize."

– Michael Southworth and Eran Ben-Joseph



Pedestrians Make Places . . .