

Introduction

The City of Norwalk has developed this comprehensive Transportation Management Plan to assist in the evolution of the existing and limited automobile-oriented transportation system to a broader, more sustainable, multi-modal transportation system. It is clear through extensive outreach and public input that the community realizes that transportation and quality of life within the City of Norwalk are inextricably linked. This connection is largely influenced by the role that highways, streets, and sidewalks play in the day-to-day lives of the residents, businesses, and visitors to the community. All agree, a superior transportation network is crucial to creating a healthy and vibrant City.

The City of Norwalk and its Department of Public Works (DPW), in its role as the steward of the roadways and transportation system considers a broad range of factors in maintaining and improving this system. This Transportation Management Plan (the “Plan”) is intended to provide guidance and direction for the City and provide templates for transportation resources that are planned, designed, and constructed; all with the ultimate goals of:

- ◆ Providing for the safety and convenience of all users of the roadway system including:
 - ❖ Pedestrians (including those who need assistance with mobility)
 - ❖ Bicyclists
 - ❖ Transit Users
 - ❖ Emergency Service Operators
 - ❖ Automobile Drivers
 - ❖ Commercial Vehicle Operations
- ◆ Facilitating multi-modal use of the system.
- ◆ Providing consistency with transportation plans and policies, environmental regulations, the community, the region, the state, and the Federal government.
- ◆ Being cost effective for the fiscally constrained realities of the current times we live in and for setting the groundwork for prioritizing future capital spending.

The City of Norwalk is committed to caring for the built and natural environment by promoting sustainable development practices that minimize negative impacts on natural resources, historic, scenic, and other community values, while also recognizing that transportation improvements have a significant potential to contribute to local, regional, and statewide quality of life and economic development.



It is for this reason that the Plan has been developed to provide and promote sufficient flexibility to allow application of appropriate transportation and roadway elements and dimensions to different physical and cultural situations within the City. The Plan reflects the different role of roadway infrastructure in these distinct settings.

1.1 Purpose of the Plan

Well-designed transportation infrastructure that is responsive to its context is the product of thoughtful planning. By bringing together transportation professionals, local residents, and interest groups, transportation planning can produce public facilities and programs that support community goals, provide safe and efficient transportation for individuals and goods, enhance the economy, and protect the natural environment.

The purpose of the Transportation Management Plan is twofold:

First, to provide designers and decision-makers with a framework for incorporating into the design of transportation facilities multi-modal elements and context sensitive design practices. The emphasis is to ensure that investments in transportation infrastructure encourages projects that consider the local context while meeting the needs of the city and the people that they serve.

Second, to identify specific intersections, corridors, and actions within the city that are in need of correction or adjustment. The emphasis is not so much about minor or isolated actions, but broader adjustments that would benefit the transportation system throughout the city or address well documented barriers to growth and improvement within the City.

1.2 Guiding Principles of the Plan

The following are the Guiding Principles for development of this Plan:

- ◆ **Multimodal Consideration** — to ensure that the safety and mobility of all users of the transportation system (pedestrians, bicyclists and drivers) are considered equally through all phases of a project so that even the most vulnerable (e.g., children and the elderly) can feel and be safe within the public right of way. This includes a commitment to full compliance with state and federal accessibility standards for people with disabilities.
- ◆ **Context Sensitive Design** — to incorporate, throughout project planning, design, and construction, the overarching principles of Context Sensitive Design (a collaborative, interdisciplinary approach that involves all constituents to develop a transportation facility that fits its physical setting and preserves scenic, aesthetic, historic and environmental resources, while maintaining safety and mobility for all users).

- ◆ **A Clear Project Development Process** — to establish a clear and transparent project development and design process that can be administered consistently through the City processes. One that realizes that the constantly constrained economic realities of the world we live in. While it would be desirable to address every issue and concern, allocation of capital resources need to be prioritized in a fair and consistent manner.

1.2.1 Multimodal Consideration

A guiding principle of the Plan is that the roadway system of the City should safely accommodate all users of the public right-of-way including:

- ◆ Pedestrians, including people requiring mobility aids (canes, service animals, wheelchairs, walkers, and scooters)
- ◆ Bicyclists
- ◆ Drivers and Passengers
 - ❖ Transit vehicles
 - ❖ Trucks
 - ❖ Automobiles and Motorcycles
- Emergency Services

Historically, transportation plans have been focused ensuring safe operation of motor vehicles. This Plan does not diminish the importance of providing a safe operating environment for motor vehicles -- rather the Plan provides balanced guidance on public right-of-way design objectives to serve both non-motorized (i.e., bicycles and pedestrians) and motorized travel.

This Plan takes the approach that non-motorized transportation modes are fundamental considerations in the design process. As such, pedestrian and bicycle design requirements within a shared right-of-way are integrated throughout the design elements of this Plan.

It is the policy of the City of Norwalk as well as the Connecticut Department of Transportation to encourage designers and decision-makers to consider these modes of transportation throughout the planning, design, and construction phases of a transportation improvement project. Ultimately, thoughtful consideration and evaluation of all modes should result in a robust, multimodal transportation system for the City that accommodates all users safely and efficiently within the public right-of-way.

1.2.2 Context Sensitive Design

A second guiding principle of the Plan is that roadway projects should be planned and designed in a context-sensitive manner. This Plan has been developed to ensure that



projects intended to improve the roadway network in the City are implemented in such a way that the character of the project area, the values of the community, and the needs of all roadway users are fully considered.

An important concept in planning and design is that every project is unique. Whether the project is a modest safety improvement, or a four-mile upgrade of an arterial street, there are no generic solutions. Each project requires designers to address the needed roadway improvements while safely integrating the design into the surrounding natural and built environment. Several characteristics of context-sensitive projects have been identified through Federal Highway Administration (FHWA) research and workshops. Among these concepts, the following are adopted by this Plan:

- ◆ The project satisfies its purpose and needs as accepted by a wide range of constituents. This agreement is forged in the earliest phase of the project and amended as warranted as the project develops.
- ◆ The project is a safe facility for users of all ages and abilities as well as for the surrounding community.
- ◆ The project meets minimum design standards for accessibility for people with disabilities and gives attention to universal design principles.
- ◆ The project is in harmony with the community and preserves environmental, scenic, aesthetic, historic, and built and natural resources of the area.
- ◆ The project is well managed and involves efficient and effective use of the resources (time, budget, community) of all involved.
- ◆ The project is designed and built with the least possible disruption to the community.
- ◆ The project is seen as having added lasting value to the community.

The Plan draws from the state-of-the-art in roadway design. Design guidelines are consistent with those described in the 2011 Edition of *A Policy on the Geometric Design of Highways and Streets* by the American Association of State Highway and Transportation Officials (AASHTO), also known as the “Green Book.” The Plan also incorporates the additional guidance contained in AASHTO’s *A Guide for Achieving Flexibility in Highway Design* (2004), *Guide for the Planning and Design of Pedestrian Facilities* (2004), and *Guide for the Development of Bicycle Facilities* (2012), and the Federal Access Board’s *Draft Guidelines for Accessible Right-of-Way* (2005).

In addition, research conducted under the auspices of the *Transportation Research Board* (TRB) and other organizations was considered and incorporated into the Plan, as appropriate. Finally, best-practices found in the manuals of other states and communities, as well as design guidance formulated specifically for this Plan, are included throughout.

1.2.2.1 A Clear Project Development Process

A third guiding principle of the Plan is to present a clear project development process that can be easily understood by project proponents and constituents and simply and consistently administered by those agencies overseeing the transportation system of Norwalk.

Often, the process through which a project is developed is as important as the design standards employed. The project development process outlined in this Plan defines the need for early identification of issues and alternatives, open and continuous involvement with project constituents, and a clear prioritization process. This process should ensure that community values, natural, historic, and cultural resources, and transportation needs are fully considered throughout the planning, design, and construction phases of a project.

A clear and consistent project development process is important for a number of reasons. The most significant are:

- ◆ To encourage early planning and evaluation so that project needs, goals and objectives, issues, and impacts can be identified before significant resources are expended.
- ◆ To ensure context sensitivity through an open, consensus-building dialog with project constituents.
- ◆ To achieve consistent expectations and understanding between project proponents and those entities who evaluate and prioritize projects.
- ◆ To facilitate efficient allocation of resources based on pre-established project selection criteria and consistency with local, regional, and statewide priorities.

An effective process helps achieve projects that respect the values of the community and the natural and built environment, while meeting the transportation needs. The FHWA and AASHTO clearly establish the importance of a sound project development process for achieving context-sensitive highway solutions in their *Flexibility in Highway Design* and *A Guide to Achieving Flexibility in Highway Design* publications.

1.2.2.2 Objective, Coordinated, Transparent, and Inclusive Transportation Decision-making

The transportation decisions made today will affect the City for many years to come. While transportation improvements can generate increased mobility and allow economic growth, they also profoundly affect the nature of our communities and our environment. For these reasons, it is vital that the City have an objective and inclusive transportation planning and project-development process, in which all of the effects of transportation proposals can be understood and considered.

Communication about, administration of, and understanding of the process through which potential projects are evaluated can improve the efficiency of the allocation of



transportation resources. If project proponents and reviewers share a continuing dialog about project issues, review procedures, and evaluation criteria, then proponents are likely to focus their energy on projects that have strong support and avoid spending scarce resources to advance projects that will ultimately be rejected.

Decisions should be made in a coordinated manner, with decision-makers considering the needs of all affected citizens and ensuring that services are delivered in the most efficient and orderly way. Decisions should also be made in as transparent a way as possible, with public knowledge not only of the final decisions but of the process used to reach those decisions. And lastly, all decisions should be made in an inclusive manner, with the active participation of individuals, businesses, interest groups, and affected constituencies.

1.3 Use of this Plan

The Plan outlines the design guidelines applicable to projects with the City of Norwalk involvement. It is expected that this guidance will also be valuable to adjacent communities, authorities, and other entities involved in the design and development of highways and streets, and other transportation facilities.

This Plan should be followed if one or more of the following situations exist:

- ◆ When the City of Norwalk is the proponent; or
- ◆ When the City of Norwalk is responsible for project funding; or
- ◆ When the City of Norwalk controls the infrastructure.

This may include projects that are privately funded or projects that are funded by other regional, state, or Federal sources. If the City is pursuing a project on a local roadway with funds provided by alternative sources that require adherence to a certain set of design principles and/or standards, the procedures and guidance in this Plan remain useful, but do not need to be strictly adhered to. The Project proponent should always check with the City, State, and funding sources to ensure compliance with the requirements of the specific funding program.

The second part of this plan identifies those specific issues and actions that have been identified as part of an extensive outreach effort within the City. These issues and actions have been documented, reviewed, and prioritized using elements of this plan and should be addressed and acted upon when resources become available.

1.3.1 Engaging the Public in the Development of the Plan

During the development of the Plan, public involvement has been a key element of its success. A Transportation Advisory Group (TAG) was developed that consisted of members of the City staff, elected officials, and transportation professionals. The TAG provided

oversight to the development of the Plan and provided key input to the project team during its development. A list of TAG Committee members is included in the Appendix to this section. In addition, the public was encouraged to participate in the Plan development throughout the processes. The mechanisms utilized to solicit broad public input included:

- ◆ **Public Informational Meetings** at key stages of the Plan development to update and engage the public on Plan goals and objectives, initial Plan findings, and unveiling of the draft Plan.
- ◆ Hosting of a dedicated **website** (www.vhb.com/norwalktmp.com) with updated project information posted and links to an on-line questionnaire for interested parties to provide detailed feedback on.
- ◆ A dedicated **social media** page (www.facebook.com/norwalk-transportation-management-plan) where those comfortable with this form of outreach could read about the project, provide input, and keep up to date with the program.
- ◆ Targeted **stakeholder interviews** with members of the neighborhood organizations, business communities, city officials, and transportation providers/advocates.
- ◆ **Written/oral communication** provided to the project team through e-mails, voice-mails, and on-street impromptu interactions with consultant team members.

A summary of the public input is provided in an Appendix to this section.

1.4 Structure of the Plan – Section 1: Design and Toolbox Elements

All projects being conducted in the City of Norwalk will incorporate applicable elements from *A Policy on Geometric Design of Highways and Streets* (2004) by the American Association of State Highway and Transportation Officials (AASHTO), as reflected in this Plan. An outline of the various chapters of the Plan follows:

Basic Design Chapters (Chapters 2 to 4)

The Basic Design chapters describe guidelines which are the basis for how pedestrians, bicyclists, and drivers of motor vehicles will share roads safely. These include:

- ◆ **Chapter 2, Basic Design Controls** — provides important guidance on roadway and area type (context), the design values for facility user groups, level-of-service criteria, and target design speed.
- ◆ **Chapter 3, Cross-Section and Roadside Elements** — discusses the spatial requirements and options for allocating roadway right-of-way among the various facility users (pedestrians, bicycles, and vehicles).



- ◆ **Chapter 4, Intersections** — addresses the proper treatment of intersections of streets, highways, and pedestrian facilities.

Toolbox (Chapters 5 and 6)

The Toolbox chapters deal with special design elements and traffic management strategies to address special and unique circumstances. These include:

- ◆ **Chapter 5, Transportation Demand Management** — provides a primer on transportation demand management strategies and their applicability. Overviews the State and local responsibilities and strategies for managing access along highways.
- ◆ **Chapter 6, Traffic Calming** — provides a primer on traffic calming strategies and their applicability to City streets.

1.5 Structure of the Plan – Section 2: Actions of the Plan

Knowing the basic design controls of the City’s Plan and implementing the Plan are two different efforts. An outline of the various chapters of the second section of the Plan, the Actions of the Plan, follows:

- ◆ **Chapter 1, Project Development** – provides important background on how the various projects and policies are prioritized by the City and how reprioritizing elements on an annual basis can be accomplished.
- ◆ **Chapter 2, Travel Demand Management Implementation Strategies** – provides strategies to aid developers, institutions and businesses in implementing effective TDM programs that are aligned with the long-term goals of the City.
- ◆ **Chapter 3, Recommended Policies and Strategies** – discusses strategies and policies, representing best practices in transportation system development, to help ensure that future capital investments will provide the expected benefits in the City.
- ◆ **Chapter 4, Traffic Calming Program Implementation** – discusses how a traffic calming request is brought before the City, how it is evaluated, ranked, tested, and implemented. This will be used in conjunction with a Traffic Calming web-based application.
- ◆ **Chapter 5, Transportation Impact & Access Study Guidelines** – presents the best practices for developing effective TIAS guidelines and includes recommendations to help the City upgrade and strengthen the set of TIAS guidelines currently in place.

1.6 Structure of the Plan – Section 3: Demonstration Locations

Prior sections reviewed design guidelines and implementation of the Plan. These efforts, combined with an extensive outreach effort, led to the development of a series of “Demonstration” projects that are representative of many of the common issues and challenges facing the City. An outline of the various chapters of the third section of the Plan, Demonstration Locations, follows:

- ◆ **Chapter 1, Selection and Advancement** – discusses how the various demonstration projects were selected and walks the user through an evaluation process for each of the individual locations.
- ◆ **Chapter 2, Active Transportation Discussion** – discusses the condition existing “active transportation” throughout the city and presents opportunities to enhance the experience for pedestrians and bicyclists.