6 BICYCLE AND PEDESTRIAN TRANSPORTATION, AND OPEN SPACE

The ability to walk or bicycle throughout the metropolitan region is achieved through the sharing of facilities with autos. The street system is the primary component of the bicycle network, and the requirement that bicycles and cars successfully share the non-expressway road system is fundamental to bicycle use regardless of the expansion of the recreational trail system.

Sidewalks serve as the primary component of the pedestrian network. Though the sidewalk physically separates pedestrians from cars, sidewalks are generally built or reconstructed in conjunction with roadway construction. Consequently, though autos and pedestrians do not share the same physical space, their facilities largely share the same capital budget and planning horizon.

Much as the auto network has been augmented with limited-access expressways, the pedestrian and bicycle transportation systems are being augmented with expanding subsystems of multi-use off-road trails (usually referred to as "bike trails"), pedestrian-only paths, designated on-road bike routes, and striped on-road bike lanes.

Figure 6.1¹ depicts the major components of the pedestrian transportation system: sidewalks, multi-use and pedestrian-only trails, open space, and rapid transit stations. The data were compiled from several different sources, including MassGIS for open space and the Massachusetts Department of Environmental Management, the Metropolitan Area Planning Council, CTPS, and MassHighway for information on trails.

The MassHighway Road Inventory file was used to identify the presence of sidewalks and other pedestrian facilities adjacent to roadways. Though all of these facilities are shown on the map, the general public cannot use a few of them. For instance, there is a set of catwalks along the walls of the Sumner and Callahan Tunnels that can only be used by MassPike employees.

Figure 6.2 shows a variety of trails and open space resources. It is increasingly common to create a facility specifically designed and optimized for nonmotorized travel in areas of high recreational value, adverse traffic conditions, or existing heavy bicycle or pedestrian activity. This map shows three classes of specialized facilities, both existing and proposed:

Bicycle trails – These off-road paths are actually multi-use and often attract large numbers of walkers, joggers, roller-bladers, and baby carriages. Even when a separate running path has been built, the paved surface is shared by a variety of nonmotorized users.

¹ Figures 6.1 and 6.2 and much of this chapter are based on information collected for *Assembly Square and Vicinity: An Inventory of Transportation-Related Data,* a report produced by the Central Transportation Planning staff for the Massachusetts Highway Department.





Pedestrian trails – These function like sidewalks but are not adjacent to a street. As with sidewalks, bicycles are either discouraged or forbidden. These paths are often built for their scenic value (such as HarborWalk) or to provide a convenient pedestrian shortcut. The locks of the new Charles River Dam are an example of a pedestrian shortcut, since bicyclists are required to dismount and walk their bikes.

On-road bicycle lanes – The place of bicycles on a roadway can also be enhanced. Bicycle lanes can be striped on a roadway to indicate a corridor not to be used for general auto travel. The bicycle lane still must be used by autos to maneuver into parking spaces or turn into driveways, but the striping formalizes the sharing of the roadway by cars and bicycles.

As shown, most of the existing trails are in the waterfront area and some are fragmentary. The proposed trails provide some connection to the existing trails and make some of the open space more accessible.