PUBLIC NOTICE

The Boston Redevelopment Authority ("BRA"), pursuant to Article 80 of the Boston Zoning Code, hereby gives notice that an Expanded Project Notification Form for Large Project Review ("PNF") was filed by SSG Development, LLC and New Boston Ventures, LLC (the "Proponent") on Friday, August 22, 2011 for 3521-3529 Washington Street (the "Proposed Project").

The Proposed Project includes the construction of five buildings: an approximately 42,600 square foot residential building, two triplexes, 130,000 square foot self storage building, and 28,000 square foot retail building adjacent to the McBride Street and Washington Street intersection in the Jamaica Plain neighborhood of Boston.

Approvals are requested of the BRA pursuant to Article 80 for the issuance of a Certificate of Compliance by the Director of the BRA. The BRA in the Scoping Determination for such PNF may waive further review pursuant to Section 80B-5.3(d), if, after reviewing public comments, the BRA finds that such PNF adequately describes the Proposed Project's impacts.

The PNF may be reviewed in the office of the Secretary of the BRA, Room 910, Boston City Hall, Boston, MA 02201, between 9:00 AM and 5:00 PM, Monday through Friday, except legal holidays. Public comments on the PNF should be transmitted to John Fitzgerald, BRA, at the address stated above by September 27, 2011.

BOSTON REDEVELOPMENT AUTHORITY
Brian Golden, Executive Director / Secretary

EXPANDED PROJECT NOTIFICATION FORM

3521-3529 Washington Street

Submitted to:

Boston Redevelopment Authority
One City Hall Square
Boston, Massachusetts 02201

Prepared by:

Epsilon Associates, Inc.
3 Clock Tower Place, Suite 250
Maynard, Massachusetts 01754

Submitted by:

SSG Development LLC
651 Washington Street, Suite 200
Brookline, Massachusetts 02446

New Boston Ventures, LLC
540 Tremont Street, Suite 8
Boston, Massachusetts 02116

In Association With:

BL Companies
Studio 3.0
99Cambridge Architecture + Interiors
Goody Clancy
Goulston & Storrs
Exclusive Real Estate Co.
Howard/Stein-Hudson Associates, Inc.
Kyle Zick Landscape Architecture, Inc.

August 22, 2011

Epsilon
ASSOCIATES INC.

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August 22, 2011

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Chapter 1.0
General Information and Project Description

1.0 GENERAL INFORMATION AND PROJECT DESCRIPTION

1.1 Introduction

The 3521-3529 Washington Street project (the Project) is proposed by SSG Development, LLC and New Boston Ventures, LLC (the Proponent). The Project site is located in the Jamaica Plain neighborhood of Boston, southwest of the intersection of Washington and McBride Streets and adjacent to the Massachusetts Bay Transportation Authority's (MBTA) Orange Line right-of-way. The existing site includes warehouse buildings, some vacant and some occupied by a used car dealership, as well as hardscape. This underutilized site will be transformed by the proposed mixed-use Project that will create new, attractive housing to expand the existing Burnett Street residential area, as well as new commercial activity, including a retail component that will bring pedestrian activity to the corner of Washington and McBride Streets. The Project includes the construction of five buildings in total: three residential buildings, a retail building, and a self storage building. These buildings will be enveloped by new landscaping around and through the Project site, further improving the visual appeal of the area. Bookending the site will be an outdoor plaza associated with the retail building and a new green space on the southern side of the site that will provide an area of natural respite for the future residents. The Project will provide a number of public benefits, including new homebuyer residences, affordable residences for first-time homebuyers, improved aesthetics, and new tax revenues for the city.

This Expanded Project Notification Form (PNF) is being submitted to the Boston Redevelopment Authority (BRA) to initiate review of the Project under Article 80B, Large Project Review, of the Boston Zoning Code.

1.2 Project Identification and Team

Project Name:	3521-3529 Washington Street
Location:	Jamaica Plain neighborhood of Boston approximately bounded by Washington Street, McBride Street, Burnett Street and the MBTA Orange Line.

Proponent:	SSG Development, LLC 651 Washington Street, Suite 200 Brookline, MA 02446 (617) 938-6478 Gerald Cohen David Fulton New Boston Ventures, LLC 540 Tremont Street, Suite 8 Boston, MA 02116 (617) 542-3500 Dennis Kanin David Goldman
Retail and Self Storage Architect and Civil, MEP and Structural Engineer:	BL Companies 355 Research Parkway Meriden, CT 06450 (203) 630-1406 Andrew Graves Geoff Fitzgerald
Residential Architects:	Studio 3.0 4 Marlborough Street, Suite 4F Boston, MA 02116 (857) 277-0291 Joshua Slater 99Cambridge Architecture + Interiors 6 Edgerly Place Boston, MA 02116 (617) 571-4902 Dartagnan Brown
Urban Planner:	Goody Clancy 420 Boylston Street Boston, MA 02116 (627) 262-2760 Susan Hollister

Landscape Architect:	Kyle Zick Landscape Architecture, Inc. 300 A Street Boston, MA 02210 (617) 456-2252 Kyle Zick
Legal Counsel:	Goulston & Storrs 400 Atlantic Avenue Boston, MA 02110 (617) 574-6597 Matthew J. Kiefer Michael A. Glover
Permitting Consultant:	Epsilon Associates, Inc. 3 Clock Tower Place, Suite 250 Maynard, MA 01754 (978) 897-7100 Cindy Schlessinger Geoff Starsiak
Development Consultant:	Exclusive Real Estate Co. 10 Derne Street Boston, MA 02114 (617) 263-1157 Harry Collings
Transportation Consultant:	Howard/Stein-Hudson Associates, Inc. 38 Chauncy Street, 9th Floor Boston, MA 02111 (617) 482-7080 Guy Busa Joe SanClemente

1.3 Project Description

1.3.1 Existing Site and Area Context

The approximately 3.39-acre site is an L-shaped site located in the Jamaica Plain neighborhood of Boston and is bound by McBride Street to the north, Washington and Burnett Streets to the east, MBTA right-of-way to the west, and an empty lot (57 Burnett Street) to the south (see Figure 1-1). The site is currently occupied by the Flanagan &

G:\Projects2\MA\Boston\3132\aerial.mxd

3521-3529 Washington Street Boston, MA

Epsilon Associates Inc.

Figure 1-1
Aerial Locus

Seaton Motor Car Company, a used automobile dealership. The site has a number of older, one- and two-story metal clad warehouse buildings, most of which are vacant or in limited use. Most of the open space on the site is paved and the perimeter is secured with a chain-link type fence.

Immediately adjacent to the site is a residential neighborhood bordered by Washington Street and Burnett Street. The area around the site generally includes commercial properties, except for English High School located north of the site and the MBTA bus facility east of the site. West of the MBTA right-of-way is a large residential neighborhood, as well as Southwest Corridor Park which extends from Forest Hills to Ruggles Station and beyond.

1.3.2 Proposed Development Program

The proposed Project includes the development of the five buildings described in Table 1-1 below (all dimensions are calculated according to the Boston Zoning Code).

Table 1-1 Proposed Program

Project Element	Approximate Dimension
Residential	
Primary Building	
Gross Floor Area	42,600 sf
Height	51 feet / 3 stories above one level parking deck
Triplex Buildings (total of two)	
Gross Floor Area	7,400 sf
Height	41 feet / 3 stories
Total Residential Use	**50,000 sf / 42 units**
Storage Facility	
Storage, accessory office, and retail Gross Floor Area	130,000 sf
Height	47 feet/4 stories

Table 1-1 Proposed Program (Continued)

Project Element	Approximate Dimension
Retail	
Gross Floor Area	28,000 sf
Height	29 feet / 2 stories

Total Project	**208,000 sf**
Parking Spaces:	**42 residential / 73 retail and storage**

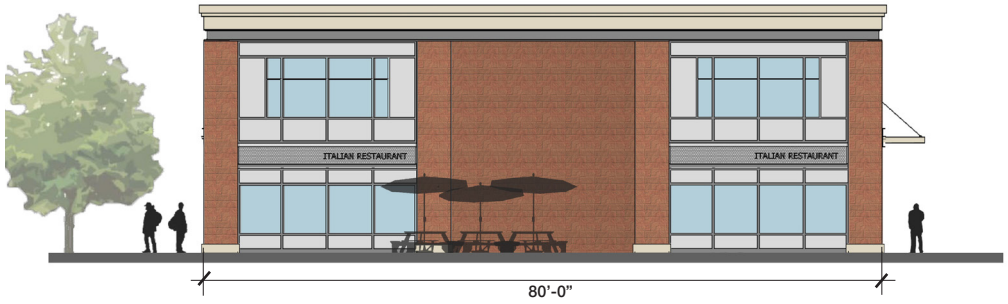
The residential portion of the Project is located on the southern portion of the site between the MBTA right-of-way and Burnett Street. South of the self storage building is a surface parking lot with six spaces for residents of the two triplexes, which are south of the surface lot. The triplexes include one unit per floor. South of the triplexes is a three-story residential building with approximately 36 units. A partially below-grade parking garage with approximately 36 spaces is beneath the building. Access and egress for the garage is from both the north and south sides of the building.

The self storage building, located on the northwestern portion of the site, is four stories tall with a small portion that is five stories at the main entrance on McBride Street. The majority of the space includes circulation and the storage areas, while a small office for leasing and the sale of related materials (such as boxes, tape, etc.) is located on the first floor. There are approximately 1,233 storage units. A loading dock is located on the north side of the building.

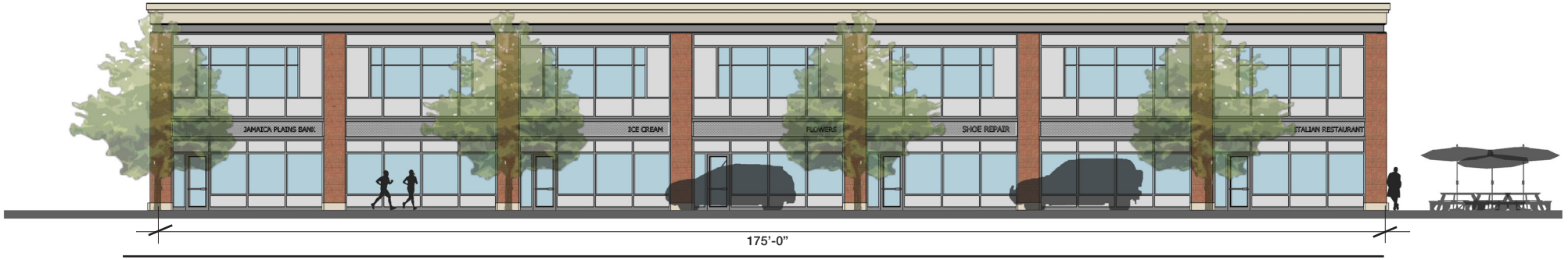
The two-story retail building is located at the corner of Washington and McBride Streets on the northeastern portion of the site. The building is currently envisioned as a multi-tenant retail building with entrances on multiple sides of the building. On the north side of the building, an outdoor seating area is proposed.

Between the self storage and retail buildings is a surface parking lot with approximately 74 spaces. Access and egress to the parking lot is from McBride Street and Burnett Street.

Figures 1-2 to 1-10 show elevations, floor plans, and perspectives of the Project.



North Elevation



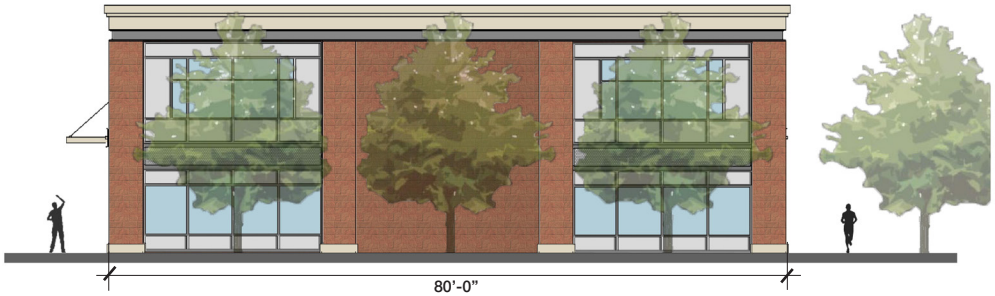
East Elevation

3521–3529 Washington Street Boston, MA

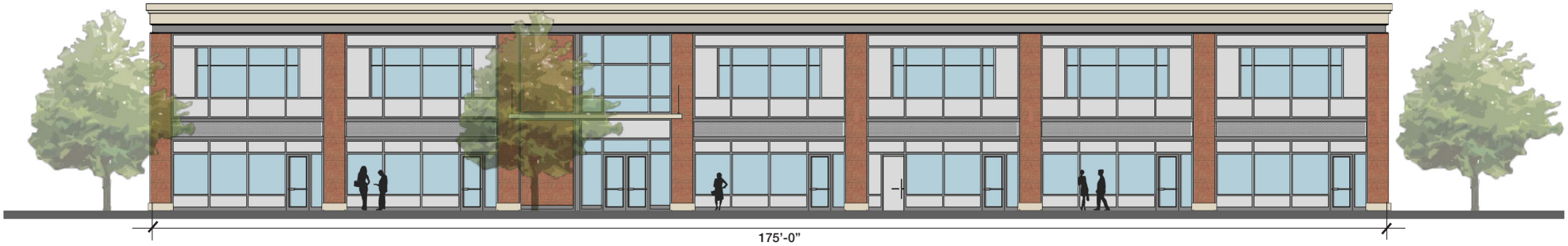
GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 1-2

Retail Elevations



South Elevation



West Elevation

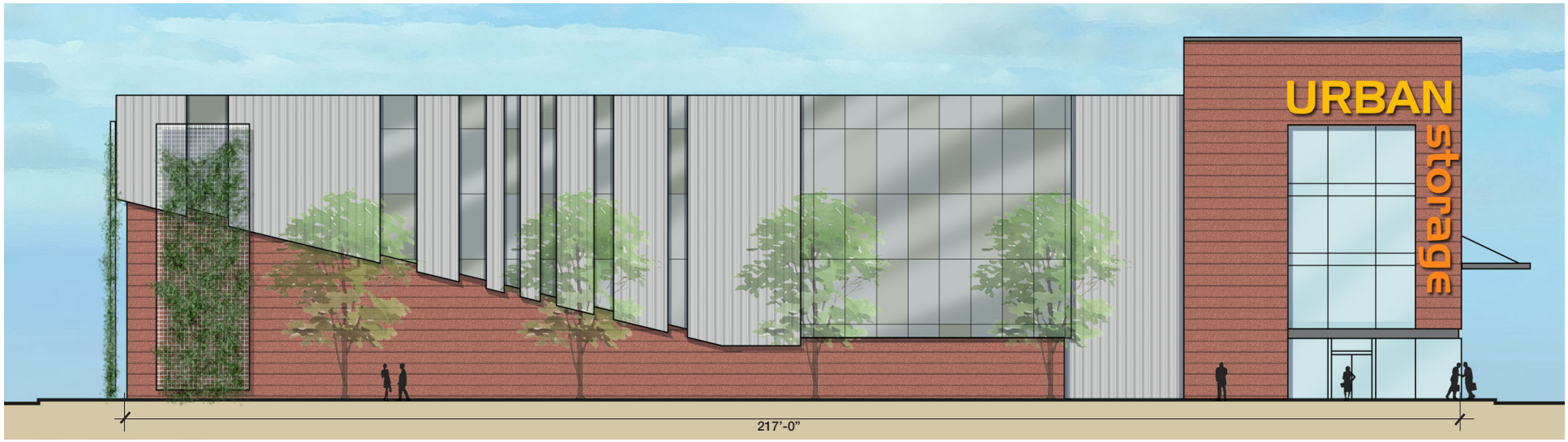
3521–3529 Washington Street Boston, MA

GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 1-3

Retail Elevations

South Elevation



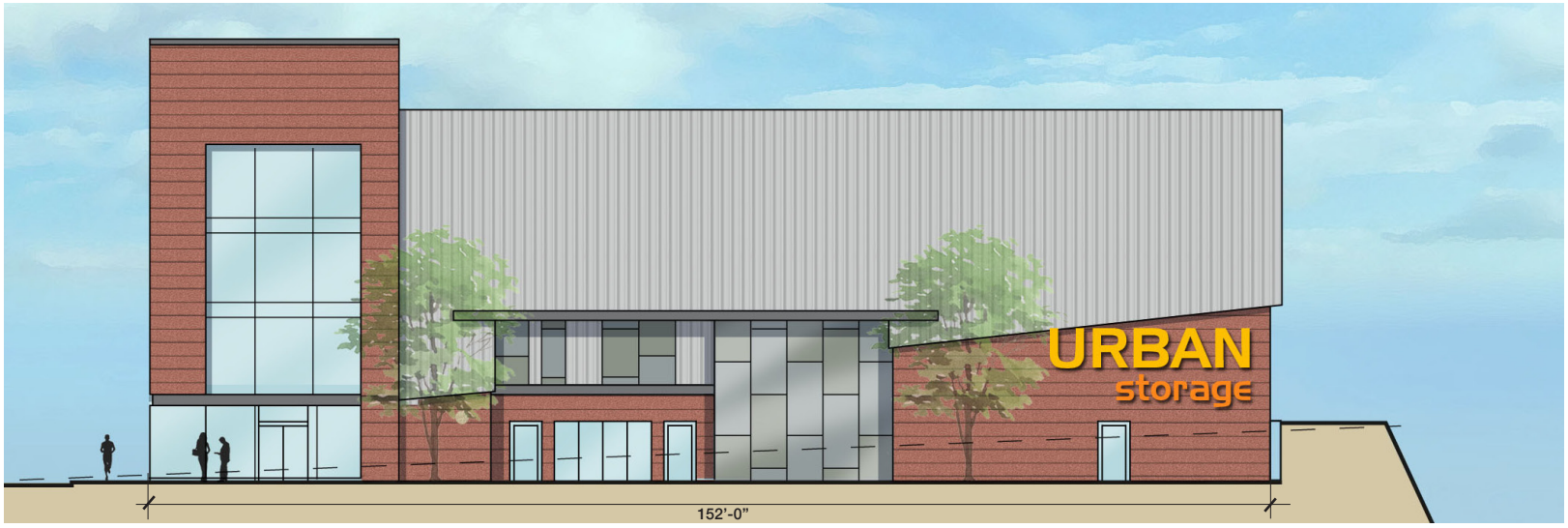
East Elevation

3521–3529 Washington Street Boston, MA

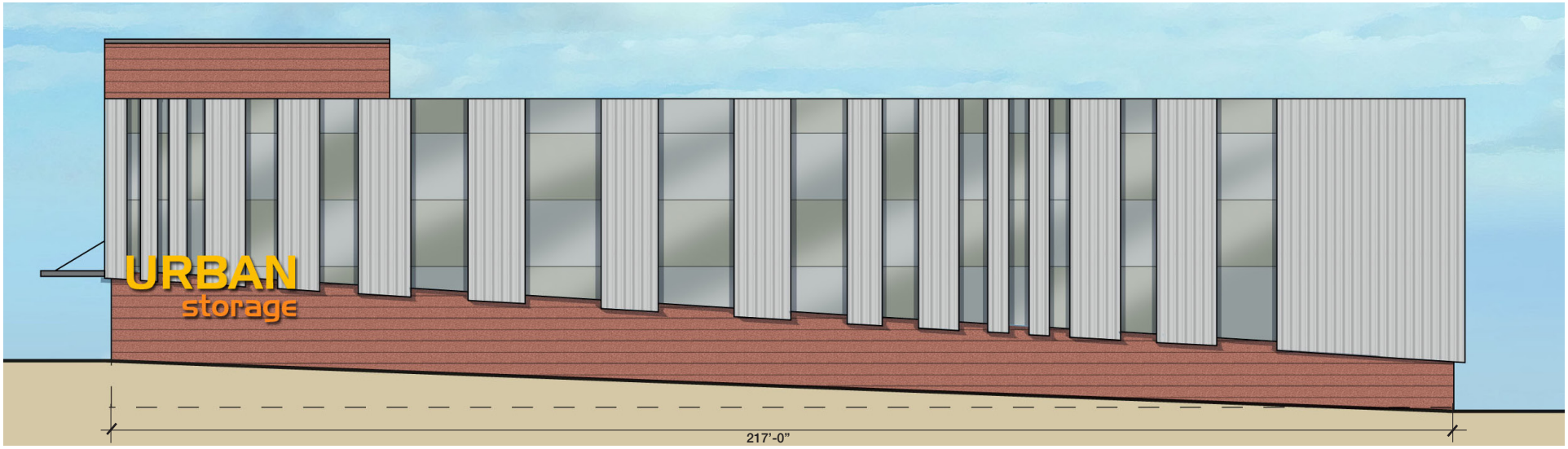
GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 1-4

Storage Elevations



North Elevation



West Elevation

3521–3529 Washington Street Boston, MA

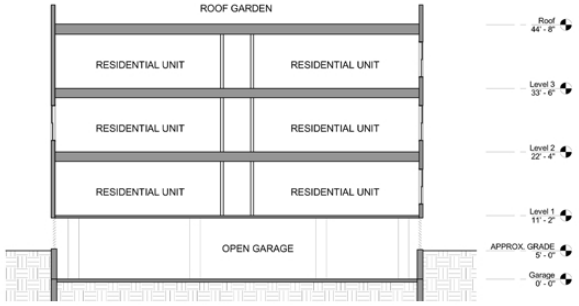
GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 1-5

Storage Elevations

BURNETT STREET (EAST) ELEVATION
SCALE: 1:30

SOUTH ELEVATION
SCALE: 1:30



BUILDING SECTION
SCALE: 1:30

3521-3529 Washington Street Boston, MA

Studio 3.0
99cambridge

Figure 1-6
36-Unit Building Elevations and Section

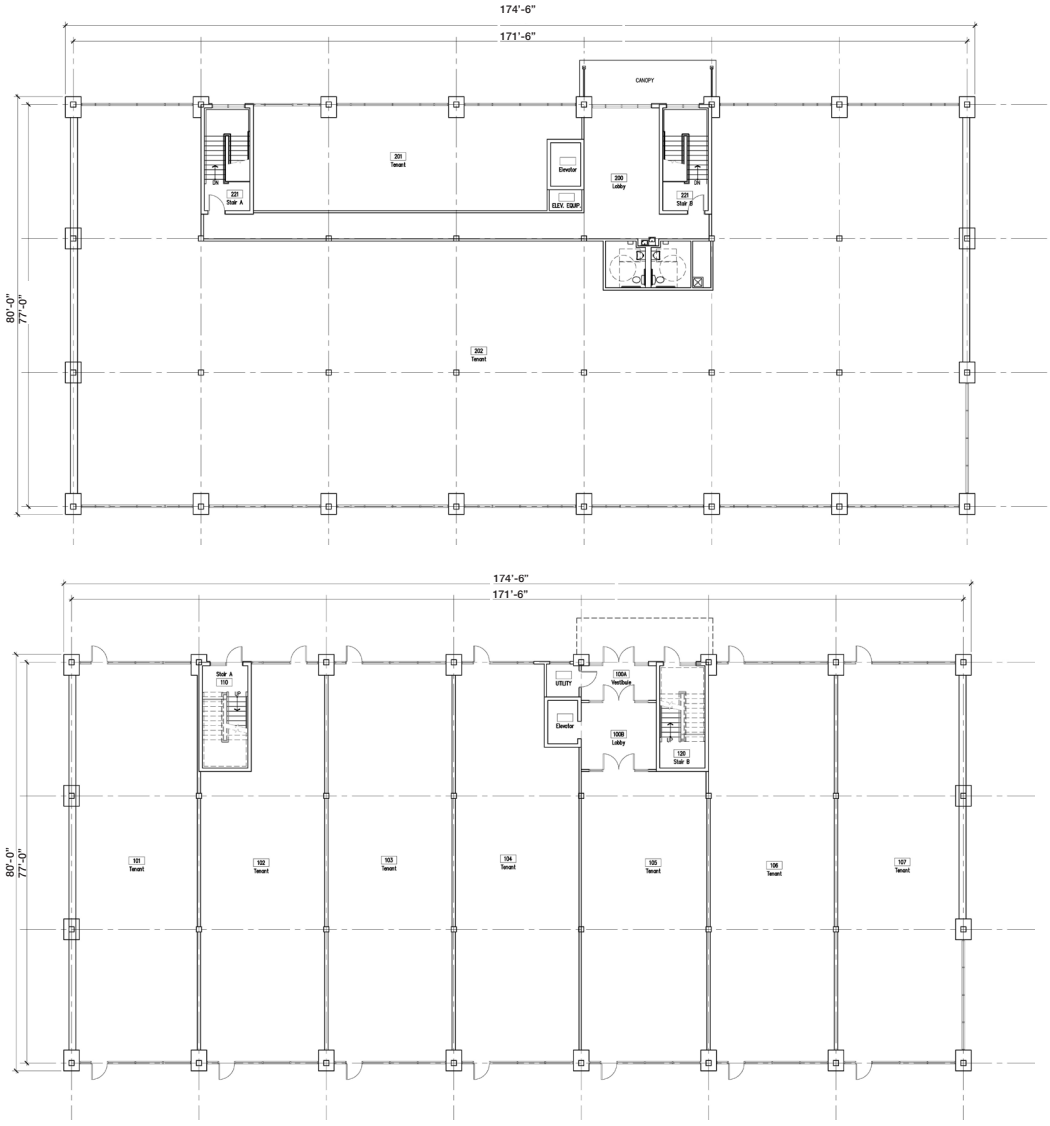
EAST ELEVATION
SCALE: 1:30

NORTH ELEVATION
SCALE: 1:30

SOUTH ELEVATION
SCALE: 1:30

WEST ELEVATION
SCALE: 1:30

Figure 1-7
Triplex Building Elevations



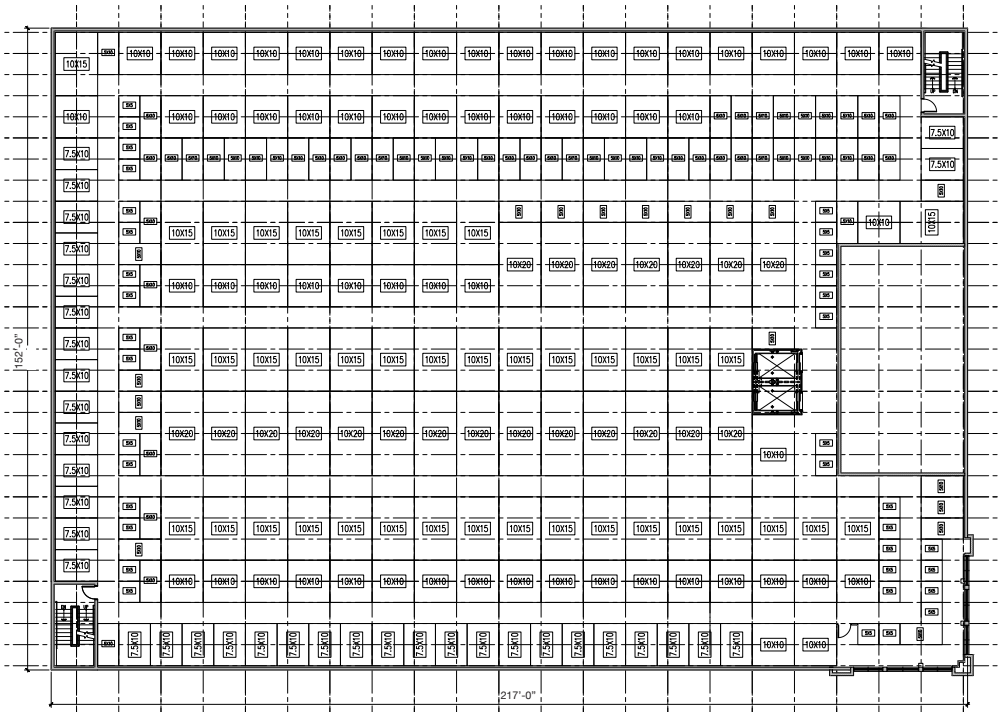
First Floor Plan

3521–3529 Washington Street Boston, MA

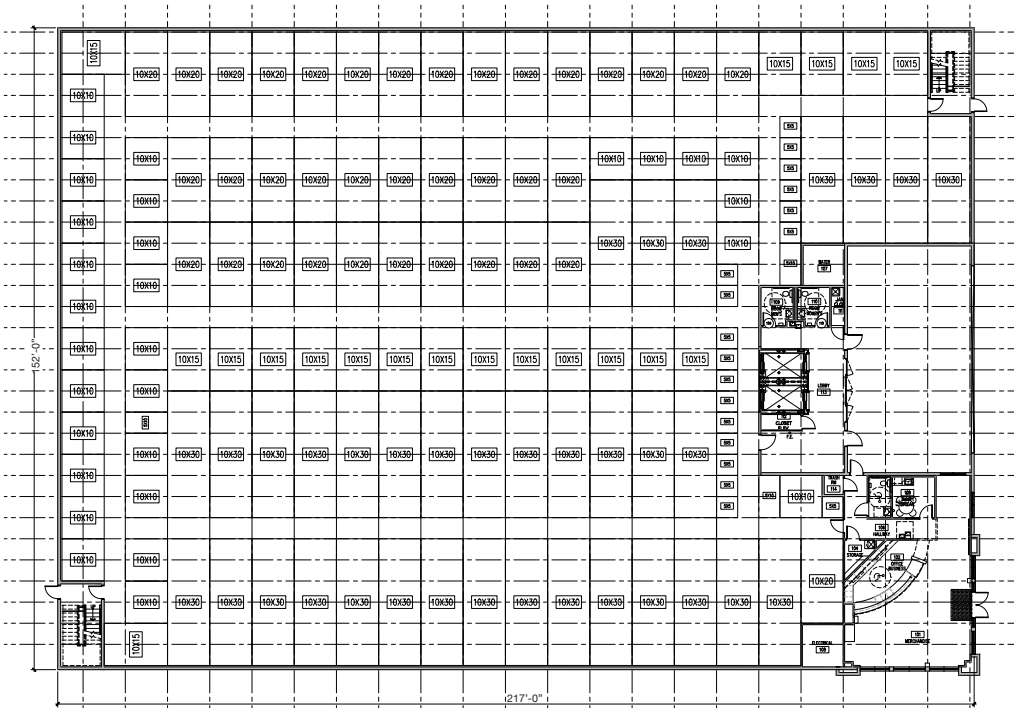
BL Companies

Figure 1-8

Retail Building Floor Plans



Second Floor Plan



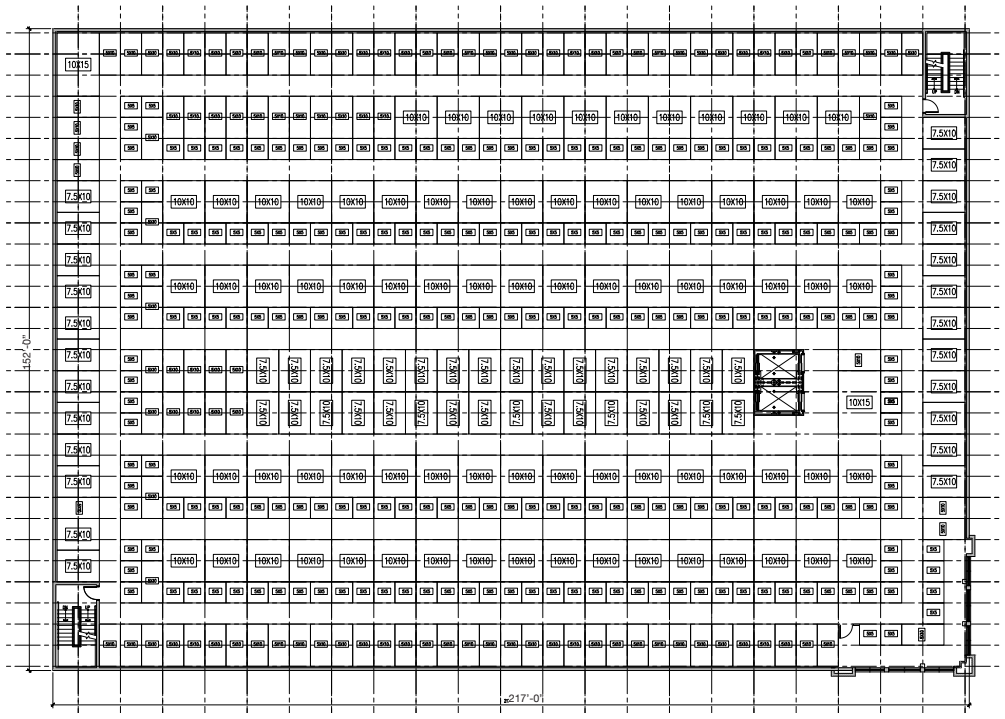
First Floor Plan

3521–3529 Washington Street Boston, MA

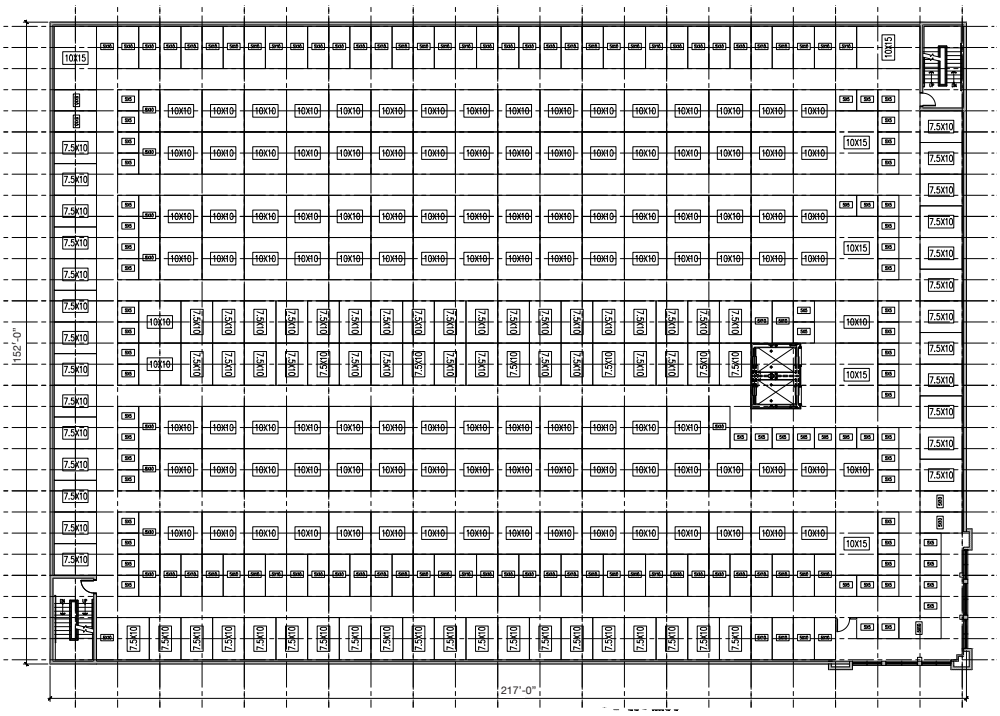
BL Companies

Figure 1-9

Storage Building Floor Plans



Fourth Floor Plan



Third Floor Plan

3521–3529 Washington Street Boston, MA

BL Companies

Figure 1-10

Storage Building Floor Plans

1.3.3 Planning Context

1.3.3.1 Forest Hills Improvement Initiative

The Forest Hills Improvement Initiative is an initiative to plan growth on parcels along Washington Street. The proposed Project site is across Washington Street from a portion of the area included in the plan, while the majority of the plan is located south of the Casey Overpass. The Initiative envisions growth that provides for improved traffic patterns, mixed uses, community orientation, sustainable development, and green space. The Project provides growth that meets the intentions of this Initiative, as described below.

- The mixed use Project includes housing and retail that provide activity during the day, evening, and weekends.
- The retail space will serve area residents who can also seek to lease space in the retail area for their businesses.
- The buildings will be Leadership in Energy and Environmental Design (LEED) certifiable, and will include a number of sustainable features, as described further in Section 3.6.
- The Project includes a new open space on the southern portion of the site, as well as landscaping across the site.

1.3.4 Evolution of Design

Based on input from abutters, members of the community, and the BRA during preliminary design review sessions, the Project has evolved to the design as currently proposed. The initial layout has remained consistent with a residential component along the west leg of Burnett Street to help bolster the existing residential neighborhood, a storage facility located adjacent to the MBTA right-of-way on the northwest portion of the site, and a linear retail piece located along the commercial corridor of Washington Street.

The storage facility initially had the loading dock component located partially under the building at grade and on the south side of the building adjacent to the residential area. Based on comments, the loading dock was relocated away from the residential area to the McBride Street side of the building where it can also be tucked into the grade to minimize its appearance and to provide enhanced security for the users. Green screen panels that support climbing plant material have been used on the south elevation to reduce solar gain and to buffer the appearance of the storage façade adjacent to residential uses. The office portion of the storage building, which has been moved to the north end of the building, has been developed into a slightly taller and more defined element that can easily be seen from the McBride/Washington Street intersection. This taller element also provides a more articulated massing and transition to the adjacent five-story high school building across McBride Street.

The conceptual design of the retail component originally included a drive-through component on the south side of the building, more parking along the south side of the site, a curb cut on Washington Street, smaller, deeper retail, and a green space at the important intersection of McBride and Washington Streets. In response to comments received from the community and the BRA, the drive-through was eliminated, the parking reorganized to create fewer spaces adjacent to Burnett Street, an enlarged landscaped space was added south of the retail building to act as a buffer between residential and commercial activities, and the retail building footprint was revised to extend further along the length of Washington Street. The green space at the northwest corner of the site has been incorporated into the retail use with an increased hardscape element that will be managed and activated by the retail uses. Parking has been rearranged and compacted to the interior of the site between the storage and retail buildings. In response to neighborhood requests, a "street" has been created to facilitate movement across the site from Burnett Street to McBride Street that alleviates the necessity of accessing Washington Street. Additional changes include curb bump outs on Washington and McBride Streets for on-street parking adjacent to the retail building, improved depth of sidewalks to encourage hardy tree growth, and a low site wall along Washington Street and west up Burnett Street to help screen headlights leaving the parking area. Crosswalks and internal sidewalks have been added to facilitate pedestrian movement.

While there were a number of early conceptual designs for the residential portion of the development along Burnett Street, the Proponent sought input from neighborhood groups and residents as well as the design staff at the BRA before arriving at a fixed residential design. After extensive neighborhood input through a series of meetings with local Burnett Street residents, the Stony Brook Neighborhood Association and representatives of the Jamaica Plain Neighborhood Council, the design evolved into a 36-unit residential building located in the center of the residential portion of the larger development site along Burnett Street. The design incorporates some of the architectural elements of other residences on the street and the partially buried parking is screened from the streetscape. Neighborhood suggestions for an elevator that would afford opportunities for local elderly residents to stay in the neighborhood, for a variety of unit sizes and configurations, and for a building that encompassed as many green and sustainable elements as possible have been incorporated into the current design.

Locating the building in the center of the residential site created open space on either side of the building for tenants. In response to feedback from the BRA and some neighborhood residents about the need for greater building density and concerns about the maintenance and upkeep of the large amount of potentially unmanaged public open space, the Project further evolved with the addition of two triplexes buildings on the northern portion of the residential site that replaced part of the unused open space. Consequently, the 36-unit building shifted south to allow for these additional, more modest triplexes and created a more proportional scale to the green space. An additional advantage of the 36-unit building and its location (first suggested by one of the members of the Jamaica Plain Neighborhood

Council), is that it creates additional acoustical separation between the existing residential abutters on Burnett Street and the adjacent MBTA tracks.

An interest in green-building initiatives was expressed by the community throughout the design process. In response, the Proponent has proposed numerous green building design features such as the use of Energy Star Compliant windows, a light colored roofing system to reflect sunlight and reduce heat gain, along with the addition of green space on the roof and indigenous plant materials around the perimeter of the building and open space. Additional information about green building initiatives related to the Project is included in Section 3.6.

1.4 Public Participation

The Proponent has met with a number of local groups and interested parties, including: Executive Committee of Stony Brook Neighborhood Association, Washington Street Business Association, Jamaica Plain Neighborhood Council, City Councilor Matt O'Malley, Mayor's Office of Neighborhood Services, Burnett Street Residents, Impact Advisory Group (IAG), Massachusetts Bay Transportation Authority, and Boston Redevelopment Authority. The Proponent looks forward to working with the city, neighbors, and others as the design and review process moves forward.

1.5 Public Benefits

The Project will have a number of community benefits, from improving an underused, unattractive site, to providing tax revenue to the City of Boston. The Project's public benefits include:

- The residential portion of the Project will encompass 42 new homebuyer residences that will help transform a parcel dominated by an unsightly metal warehouse into an attractive, welcoming and lively streetscape. With a variety of unit sizes and a mix of families and empty nesters, the development will help revitalize this area of Washington Street in Jamaica Plain, enhancing the neighborhood's residential character and generating new nearby residents to support local businesses.

- Six new affordable residences will be created for first-time homebuying families that will help meet the neighborhood demand for affordable housing.

- The development will include one of the few new buildings in this area of Jamaica Plain to feature an elevator (as requested in meetings with the neighborhood), specifically designed to create new housing opportunities for the area's growing elderly population to both downsize and remain in the neighborhood.

- New landscaping, including street trees and grass areas that act as buffers between the sidewalk and the site, will improve the streetscape along Washington, McBride and Burnett Streets.

- A new landscaped open space on the southern portion of the site will add to the attractiveness of the streetscape, as well as provide an open space for the tenants of the residential building.

- The new retail space will bring life to the sidewalks and the site, which is currently underused and unwelcoming.

- In addition to generating new local consumers for area businesses, the Project will add revenues of approximately $400,000 in new property taxes annually to the City of Boston.

- The Project will create approximately 70 full-time jobs.

- It is estimated that the Project will create approximately 250 construction jobs over the course of the development.

- The Proponent is in discussions to include space for a Zipcar, a bike share hub, and electric car charging stations.

- The self storage building is an energy efficient and inherently sustainable building type that uses little energy, has very limited traffic, and is an ideal revenue-generating buffer between the residential neighborhood and the commercial zone of Washington Street.

1.6 Legal Information

1.6.1 Legal Judgments Adverse to the Proposed Project

The Proponent is not aware of any legal judgments in effect or legal actions pending with respect to the Project.

1.6.2 History of Tax Arrears on Property

Neither SSG Development, LLC nor New Boston Ventures, LLC is in tax arrears on any property owned within the City of Boston.

1.6.3 Evidence of Site Control/Nature of Public Easements

The Proponent has entered into an agreement with Burnett Realty Co., Inc. to acquire the Project site. The agreement permits the Proponent to seek public approvals for the Project.

Based on the title report and survey for the Project site, the following public easements affect the Project site:

1. Rights in common with others regarding the use of Burnett Street as set forth in a deed dated July 9, 1915 recorded with the Suffolk County Registry of Deeds (the "Registry") in Book 3891, Page 601;

2. Taking for the widening of Burnett Street as set forth in an instrument dated January 8, 1976 recorded with the Registry in Book 8859, Page 398; and

3. An 1898 taking by the City of Boston described in an instrument recorded with the Registry in Book 2508, Page 475 affects a strip of land on the northeast corner of the Project Site along the Massachusetts Bay Transportation Authority (the "MBTA") Southwest Corridor right-of-way. The easement prohibits construction of structures in the easement area without express permission, but allows the owner to use the surface of the land. We have been informed that the sewer line to which the easement relates was relocated during Southwest Corridor construction and the proponent has approached the Boston Water and Sewer Commission about abandoning the easement. In any case, the Project as proposed can be built without locating any permanent improvements in the easement area.

The Project site is currently a single lot, and the Proponent plans to construct the Project as a comprehensively planned and coordinated endeavor. In order to facilitate separate ownership and financing of each Project component, the Proponent plans to subdivide the property so that each building in the Project and its supporting facilities is located on a separate lot, with cross-easements as necessary.

The Project site was formerly an industrial use, and an area near the MBTA right-of-way has evidence of the past release of oil or hazardous materials in excess of state standards. This condition will be addressed appropriately as part of the Project through a combination of testing, remediation and/or deed restrictions.

1.7 City of Boston Zoning

1.7.1 Zoning Districts and Subdistricts

The entire Project Site is located within the Local Industrial Subdistrict ("LI Subdistrict") of the Jamaica Plain Neighborhood District governed by Article 55 of the City of Boston Zoning Code (the "Code"). An approximately 20 – 30 foot strip of the Property along the westerly lot line abutting the MBTA right-of-way is located within a Greenbelt Protection Overlay District. The Project has been designed generally to comply with the requirements of the Code, although certain zoning relief from the Board of Appeal will be required as described below.

1.7.2 Use Regulations

As described in more detail above, the Project is anticipated to include (a) an approximately 130,000 square foot self-storage facility (the "Self-Storage Facility"), (b) a building containing 28,000 square feet of retail space (the "Retail Component"), (c) a residential building containing 36 units of housing and 36 covered parking spaces (the "Primary Residential Component"), and (d) two (2) three-unit residential buildings (six (6) units total) and six (6) surface parking spaces (the "Secondary Residential Component"). Seventy-three (73) surface parking spaces located on the portions of the Project site containing the Self-Storage Facility and the Retail Component will be divided between the two uses.

The Self-Storage Facility constitutes a "warehousing" use which is a permitted use in the LI Subdistrict. "Local retail businesses"[1] and many service uses are permitted in the LI Subdistrict as of right. Some retail and services uses, such as health clubs and take out restaurants, are conditional uses in the LI Subdistrict. If any such conditional use or any retail or service use that is forbidden in the LI Subdistrict is proposed for the Project, then zoning relief will be required for such use. Residential uses are forbidden in the LI District and will require zoning relief, in the form of variances.

Additionally, zoning relief may be required for any component of the Project greater than 5,000 square feet located on the portion of the Project Site affected by the Greenbelt Protection Overlay District.

1.7.3 Dimensional Regulations

The Local Industrial Subdistrict has a maximum building height of 35 feet, a maximum floor area ratio ("FAR") of 1.0, a minimum usable open space per dwelling unit requirement of 50 feet, and a minimum rear yard requirement of 20 feet. There are no other dimensional requirements in the Local Industrial Subdistrict. It is anticipated that the Self-Storage Facility, the Retail Component, the Primary Residential Component and the Secondary Residential Component will be treated as four (4) separate projects, each on its own lot, for purposes of zoning compliance.

The Self-Storage Facility will have a building height of approximately 47 feet and a rear yard of less than 20 feet. The Retail Component will have a building height of approximately 29 feet and a rear yard that will be greater than 20 feet. The combined FAR for these portions

[1] "Local retail business" is broadly defined in the Code as "a store primarily serving the local retail business needs of the residents of the neighborhood, but not constituting an adult bookstore or adult entertainment business, including, but not limited to, store retailing or renting one or more of the following: food, baked goods, groceries, drugs, videos, computer software, tobacco products, clothing, dry goods, books, flowers, paint, hardware, and minor household appliances, but not including a bakery or liquor store."

of the Project is approximately 1.46. (Separate FARs will be calculated once the final lot separation is determined.) Based on the foregoing, the Self-Storage Facility will require variances from the height and FAR requirements of the Code and may also require a variance from the rear yard requirements of the Code. The Retail Component will not require any relief from the dimensional requirements of the Code.

The Primary Residential Component will have a building height of approximately 45 feet, a rear yard that will be less than 20 feet, and more than 50 square feet of open space per unit. The Secondary Residential Component will have a building height of approximately 38 feet, a rear yard of more than 20 feet, and more than 50 square feet of open space per unit. The combined FAR for these components is approximately 1.27. (Separate FARs will be calculated once the final lot separation is determined.) Based on the foregoing, the Primary Residential Component will likely require variances from the height, FAR and rear yard requirements of the Code, and the Secondary Residential Component will require a variance from the height requirement of the Code.

We note that the estimated combined FAR for the entire Project Site is approximately 1.41.

1.7.4 Parking and Loading Requirements

Off-street parking and loading requirements will be determined by the BRA during Large Project Review.

1.8 Regulatory Controls and Permits

Permits and approvals that may be required for the Project are provided in Table 1-2.

Table 1-2 Anticipated Permits and Approvals

Agency	Approval
City of Boston	
Boston Redevelopment Authority	Article 80B Large Project Review
Boston Zoning Board of Appeal	Zoning Relief
Boston Civic Design Commission	Design Review
Boston Landmarks Commission	Article 85 Review (if required)
Boston Water and Sewer Commission	Site Plan Review/General Service Application/Construction Site Dewatering/Water and Sewer Connection Permits
Public Improvement Commission	Specific Repairs/Street or Sidewalk Repairs/ Street Occupancy or Opening Permit
Boston Transportation Department	Construction Management Plan/Transportation Access Plan Agreement

Table 1-2 Anticipated Permits and Approvals (Continued)

Agency	Approval
Boston Public Works Department	Curb Cut Permit(s)
Boston Parks and Recreation Department	Approval of work within 100 feet of park
Boston Committee on Licenses	Flammable Storage License
Boston Inspectional Services Department	Demolition/Building Permits
Boston Fire Department	Approval of Fire Safety Equipment

This table presents a preliminary list of permits and approvals from governmental agencies that are expected to be required for the Project, based on currently available information. It does not include self-certifications to public agencies such as a National Pollution Discharge Elimination System General Permit. It is possible that only some of these permits or actions will be required, or that additional permits or actions will be required.

1.9 Schedule

Commencement of the Project is anticipated in the first quarter of 2012. Construction will occur over approximately 12 months.

Chapter 2.0
Transportation

2.0 TRANSPORTATION

2.1 Introduction

In accordance with the City of Boston's *Transportation Access Plan Guidelines* (2001), this chapter describes roadway, pedestrian, and bicycle conditions; transportation issues; parking and loading; pedestrian and bicycle circulation; proposed mitigation; and transportation goals for the proposed 3521-3529 Washington Street Project (the Project). Although the Boston Transportation Department (BTD) has not yet issued a formal Transportation Access Plan Scope, this report adheres to the general format requested by BTD.

2.1.1 Project Description

The Project site is located at 3521-3529 Washington Street in Boston's Jamaica Plain neighborhood and is bounded by McBride Street to the north; Burnett Street to the south and east; Washington Street to the east; and the Southwest Corridor and the Massachusetts Bay Transportation Authority (MBTA) Orange and Needham Commuter Rail lines to the west. The Project site is occupied by mostly vacant two-story concrete block and metal warehouse buildings.

The proposed Project includes the demolition of the existing vacant warehouses and the construction of a new approximately 130,000 square-foot self-storage facility; a new two-story building consisting of approximately 28,000 square-feet of retail space, including 14,000 sf of ground-floor retail space and 14,000 sf of commercial space (e.g. health club, medical office, etc.) on the second level; and 42 new residential units, comprised of two triplex buildings and a primary building. The residential units will be located on the southern portion of the Project site adjacent to Burnett Street. The non-residential buildings will be located on the southwest quadrant of the Washington Street/Rossmore Road/McBride Street intersection.

Vehicular access and egress to and from the site will be afforded by a proposed full access driveway via McBride Street, approximately 225-feet west of the signalized intersection with Washington Street, and a second full access driveway via Burnett Street, approximately 175-feet west of Washington Street. Access and egress to the residential units will be afforded by entrance and exit only driveways via Burnett Street, to a subsurface parking garage below the primary residential building; a full access driveway to surface parking via Burnett Street is provided for the two triplex buildings.

2.1.2 Methodology

In accordance with BTD *Transportation Access Plan Guidelines* (2001) the study team conducted a transportation analysis for the proposed Project. The analysis is summarized in the following sections:

- The first comprises an inventory of existing transportation conditions, including roadway capacities, parking, transit, pedestrian and bicycle circulation, loading, and site conditions.

- The second evaluates future transportation conditions and assesses potential traffic impacts associated with the proposed development and other neighboring projects. Long-term impacts are evaluated for the year 2016, based on a five-year horizon from the 2011 base year. Expected roadway, parking, transit, pedestrian, and loading conditions and deficiencies are identified. This section includes the following scenarios:

  - The No-Build Scenario (2016) includes general background growth and additional vehicular traffic associated with specific proposed or planned developments and roadway changes in the vicinity of the site; and

  - The Build Scenario (2016) includes specific travel demand forecasts for the Project.

- A third section identifies appropriate measures to mitigate Project-related impacts identified in the previous phase.

- Finally, an evaluation of short-term traffic impacts associated with construction activities is also included.

2.1.3 Study Area

The Project's traffic impact study area is generally bounded by McBride Street and Rossmore Road to the north, Burnett Street to the south and west, and Washington Street to the east. As shown in Figure 2-1, the study area includes the following four intersections:

1. Washington Street/Rossmore Road/McBride Street (signalized);

2. Washington Street/Brookley Road (unsignalized);

3. Washington Street/Burnett Street (North) (unsignalized);

4. Washington Street/Burnett Street (South) (unsignalized);

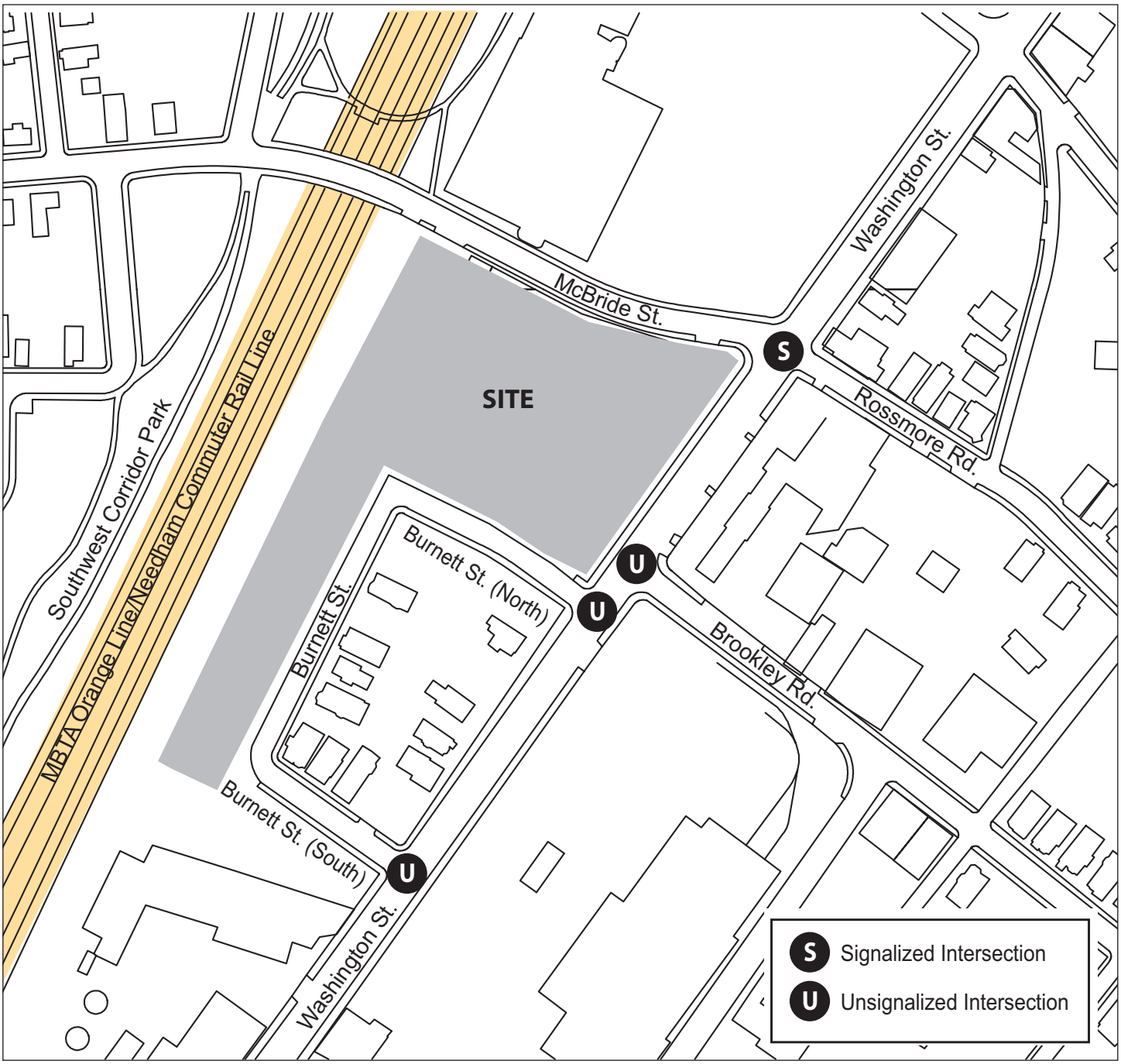


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Figure 2-1
Study Area Intersections

2.2 Existing Conditions

2.2.1 Roadway Network

The study area includes the following roadways, which are categorized according to the Massachusetts Department of Transportation Office of Transportation Planning functional classifications:

Washington Street is an urban principal arterial that generally runs north-south from downtown Boston through the South End, Roxbury, and Jamaica Plain. In the vicinity of the Project site, parking on Washington Street consists of a mix of unrestricted and two-hour parking. Parking on Washington Street is restricted adjacent to the site between McBride Street/Rossmore Road and Brookley Road. Two-hour parking is provided along the west side of the roadway, just south of Burnett Street (North). Sidewalks are located on both sides along Washington Street.

Rossmore Road is a local road that runs one-way westbound from Forest Hills Street to Washington Street. Within the study area, parking is generally unrestricted on both sides of the street and sidewalks are provided on both sides of the street. Sidewalks are provided on both sides of the roadway.

McBride Street is a local road that runs east-west from Washington Street to South Street. McBride Street is one-way eastbound between South Street and Boynton Street and is two-way between Boynton Street and Washington Street. Within the study area, parking is prohibited at any time on either side of the roadway, and sidewalks are provided on both sides.

Brookley Road is a local road that runs east-west from Washington Street and terminates at Forest Hills Street. Brookley Road is two-way between Washington Street and Stedman Street, and one-way eastbound between Stedman Street and Forest Hills Street. Within the study area, parking is prohibited at any time on both sides of the roadway. Sidewalks are provided on both sides of the roadway.

Burnett Street is a local road with no outlet. Unrestricted parking is provided on both sides of the roadway. Sidewalks are also provided on both sides of the roadway.

2.2.2 Intersection Conditions

2.2.2.1 Signalized Intersections

Washington Street/Rossmore Road/McBride Street is a signalized intersection with four approaches. The McBride Street eastbound approach consists of a shared left-turn/right-turn lane. The Rossmore Road westbound approach consists of a shared left-turn/through/right-turn lane. The Washington Street northbound approach consists of a shared left-turn/through lane; however, field observations indicate that the approach generally operates

with an exclusive left turn lane and a through lane. The Washington Street southbound approach consists of a shared through/right-turn lane. On the Rossmore Road westbound approach, parking is allowed on the north and south side. On the Washington southbound approach parking is allowed. Crosswalks and wheelchair ramps are provided across all legs of the intersection.

2.2.2.2 Unsignalized Intersections

Washington Street/Brookley Road is an unsignalized intersection with three approaches. The Brookley Street westbound approach is stop-controlled and consists of a shared left-turn/right-turn lane. The Washington Street northbound and southbound approaches have single travel lanes and are free-flowing. Parking is prohibited along all legs of the intersection, with the exception of bus stops along the Washington Street northbound and southbound approaches.

Washington Street/Burnett Street (North) is an unsignalized intersection with three approaches. The Burnett Street (South) eastbound approach is stop-controlled. The Washington Street northbound and southbound approaches have single travel lanes and are free-flowing. Parking is provided along the Burnett Street (North) eastbound approach.

Washington Street/Burnett Street (South) is an unsignalized intersection with three approaches. The Burnett Street (South) eastbound approach is stop-controlled and consists of a shared left-turn/right-turn lane. The Washington Street northbound and southbound approaches have single travel lanes and are free-flowing. Parking is provided along all legs of the intersection.

2.2.3 Traffic Conditions

Turning movement counts were based on data collected during the weekday morning (7:00 a.m. to 9:00 a.m.) and evening (4:00 p.m. to 6:00 p.m.) peak periods on Tuesday, May 24, 2011. Based on these counts, the weekday peak hours were identified as 7:45–8:45 a.m. and 4:45–5:45 p.m.

Figure 2-2 and Figure 2-3 show the existing peak-hour turning volumes for the study area intersections. Complete traffic count data are provided in Appendix B.

2.2.3.1 Traffic Operations

Traffic operations are determined through an analysis of intersection Level of Service (LOS). LOS and delay at the study area intersections were analyzed using Synchro 6 software developed by Trafficware. Synchro is based on the traffic operational analysis methodology of the Transportation Research Board's *2000 Highway Capacity Manual* (HCM). LOS and delay (in seconds) are determined based on intersection geometry, traffic control, lane usage, and available traffic data for each intersection.

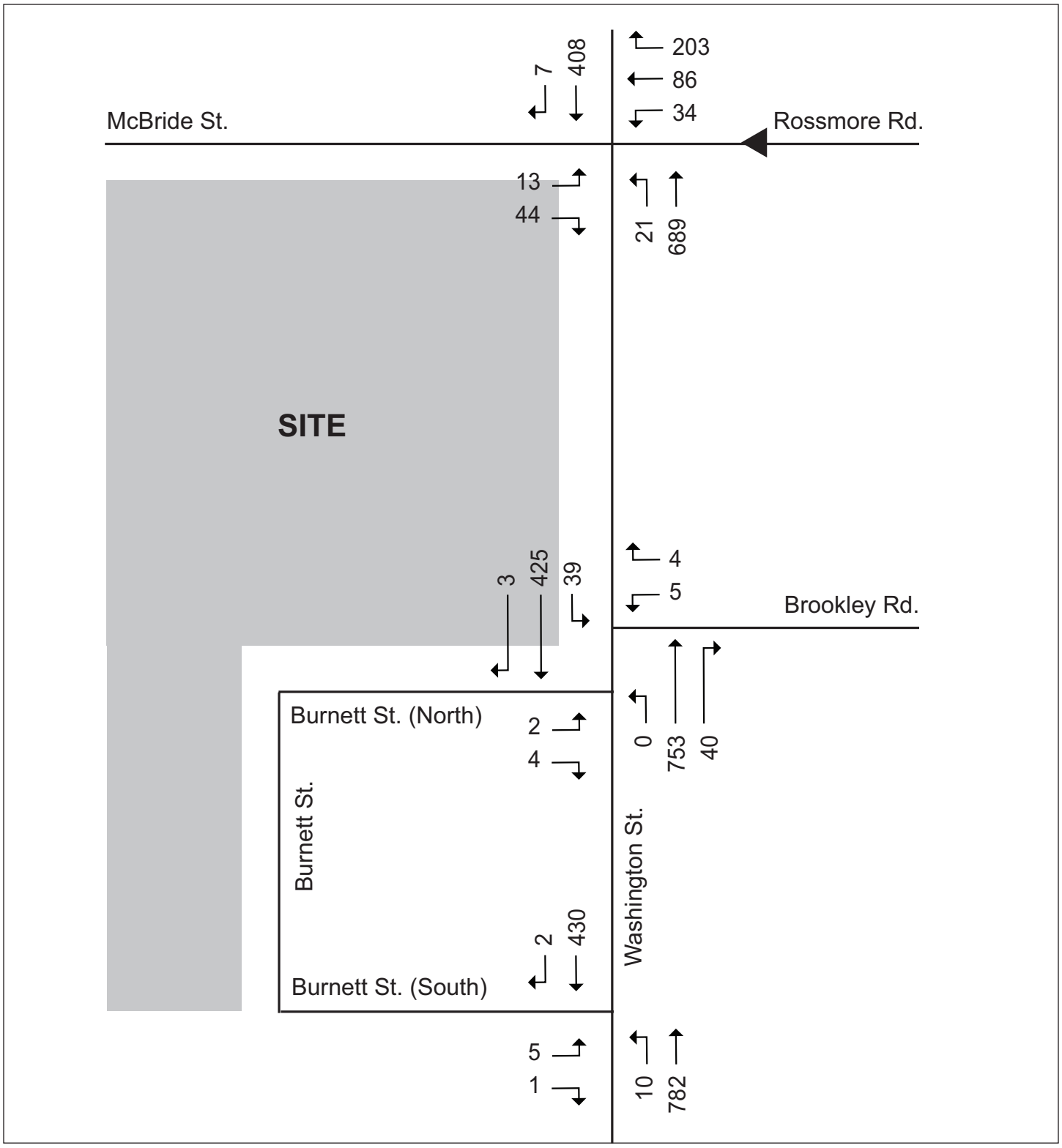

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Figure 2-2
Existing Conditions (2011) Vehicle Turning Volumes,
a.m. Peak Hour (7:45–8:45 a.m.)

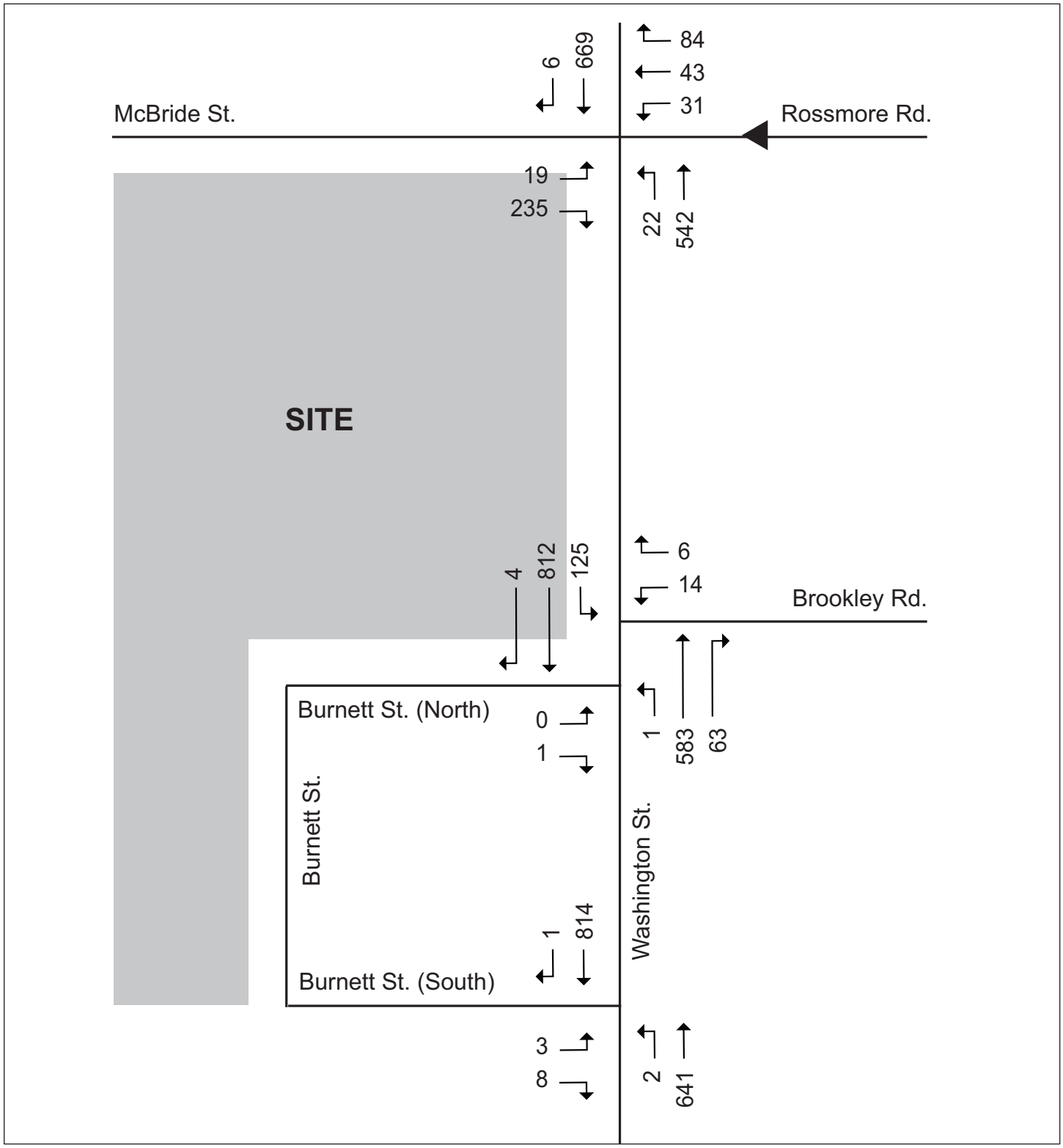

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Figure 2-3
Existing Conditions (2011) Vehicle Turning Volumes, p.m. Peak Hour (4:45–5:45 p.m.)

The Existing Conditions signal timing and phasing information for the intersection of Washington Street/Rossmore Road/McBride Street that was input into Synchro was derived from a signal re-timing study along the Washington Street corridor performed by Howard/Stein-Hudson Associates for the Boston Transportation Department (BTD).[1] The Existing Conditions model was accepted and approved by BTD.

The study team also conducted field observations at all intersection locations to verify Synchro model accuracy as well as to calibrate the model as necessary to match existing traffic conditions as closely as possible. For instance, at the intersection of Washington Street/Rossmore Road/McBride Street, left turns traveling northbound do not have their own lane, but field observations noted that vehicles often pulled forward into the intersection to wait for a gap, allowing through traffic to get by. To account for this, a 25-foot left-turn pocket was added to the northbound approach. This intersection is denoted with an asterisk in the LOS summary to identify it has a short left-turn pocket added to an approach.

Table 2-1, derived from the HCM, shows LOS criteria for signalized and unsignalized intersections. LOS A defines the most favorable condition, with minimum traffic delay. LOS F represents the worst condition (over capacity), with significant traffic delay. LOS D is generally considered acceptable in an urban environment.

Table 2-1 Level of Service Criteria (HCM Excerpt)

Level of Service	Average Stopped Delay (sec./veh.)	
	Signalized Intersection	Unsignalized Intersection
A	≤10	≤10
B	>10 and ≤20	>10 and ≤15
C	>20 and ≤35	>15 and ≤25
D	>35 and ≤55	>25 and ≤35
E	>55 and ≤80	>35 and ≤50
F	>80	>50

Source: *2000 Highway Capacity Manual,* Transportation Research Board.

Table 2-2 and Table 2-3 present LOS summaries for the Existing Conditions a.m. and p.m. peak hours.

[1] BTD City-wide Traffic Signal Optimization Study (Work Order #3), 2007

Table 2-2 Existing Conditions (2011) Level of Service Summary, a.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	**C**	**34.4**	**-**	**-**
McBride EB left/right	C	26.4	0.21	69
Rossmore WB left/thru/right	E	57.5	0.94	210
Washington NB left*	B	14.0	0.09	26
Washington NB thru	C	30.7	0.85	#792
Washington SB thru/right	C	21.6	0.56	m348
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	D	33.1	0.13	11
Washington NB thru/right	A	0.0	0.51	0
Washington SB left/thru	A	1.7	0.06	5
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	C	22.6	0.07	6
Washington NB left/thru	A	0.0	0.00	0
Washington SB thru/right	A	0.0	0.29	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	D	26.1	0.09	7
Washington NB left/thru	A	0.3	0.01	1
Washington SB thru/right	A	0.0	0.28	0

= 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.

m = Queue is metered by upstream intersections.

*25′ left-turn pocket added during calibration process

Table 2-3 Existing Conditions (2011) Level of Service Summary, p.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	**C**	**24.4**	**-**	**-**
McBride EB left/right	E	59.0	0.85	239
Rossmore WB left/thru/right	C	27.4	0.53	108
Washington NB left*	C	23.2	0.29	33
Washington NB thru	B	16.6	0.58	#517
Washington SB thru/right	B	16.0	0.72	m#557
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	F	>50	0.93	90
Washington NB thru/right	A	0.0	0.43	0
Washington SB left/thru	A	4.2	0.16	15
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	C	17.9	0.01	1
Washington NB left/thru	A	0.2	0.01	1
Washington SB thru/right	A	0.0	0.50	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	E	38.2	0.15	13
Washington NB left/thru	A	0.2	0.01	0
Washington SB thru/right	A	0.0	0.51	0

= 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.

m = Queue is metered by upstream intersections.

*25′ left-turn pocket added during calibration process

Under Existing Conditions, all intersection approaches within the study operate at an acceptable LOS during the a.m. and p.m. peak hours, with the exception of two approaches at the intersection of Washington Street/Rossmore Road/McBride Street, one approach at Washington Street/Burnett Street (South), and one approach at Washington Street/Brookley Road; specifically:

- ***Washington Street/Rossmore Road/McBride Street*** – The Rossmore Road westbound approach operates at LOS E during the morning peak hour and the McBride Street eastbound approach lane operates at LOS E in the evening peak hour. The delay is mainly attributed to the fairly heavy right-turn volumes (203 veh./hr.) at the

Rossmore Road westbound approach during the a.m. peak hour and the heavy right-turn volumes (235 veh./hr.) at the McBride Street eastbound approach during the p.m. peak hour. In addition, right-turns on red are prohibited at the McBride eastbound approach.

- ***Washington Street/Burnett Street (South)*** – The Burnett Street (South) eastbound approach lane operates at a LOS E during the evening peak hour; typical for a stop-controlled minor street intersecting a major arterial roadway. The delay is mainly attributed to vehicles exiting Burnett Street (South) waiting for a gap to turn left onto Washington Street.

- ***Washington Street/Brookley Road*** – The Brookley Road westbound approach lane operates at a LOS F during the evening peak hour; typical for a stop-controlled minor street intersecting a major arterial roadway. The delay is mainly attributed to vehicles exiting Brookley Road waiting for a gap to turn left onto Washington Street.

2.2.4 Parking

2.2.4.1 Local Curbside Inventory

Curb use regulations adjacent to the Project site include unrestricted parking, two-hour parking, and restricted parking, as shown in Figure 2-4. Parking is prohibited along McBride Street between Washington Street and the Southwest Corridor. Parking on Washington Street consists of a mix of unrestricted and two-hour parking. Parking on Washington Street is restricted adjacent to the site between McBride Street/Rossmore Road and Brookley Road, with the exception of bus stops along each side of Washington Street.

2.2.5 Public Transportation in the Study Area

The Project site is well-served by public transportation. The MBTA public transportation services are shown in Figure 2-5 and summarized in Table 2-4.

MBTA bus route #42 runs along Washington Street providing service between Forest Hills station and Dudley/Ruggles stations and stops adjacent to the Project site. Located less than one-half-mile from the Project site is the MBTA Forest Hills and Green Street Stations on the Orange Line. Forest Hills Station also provides access to the Needham Line Commuter rail, and local bus service.

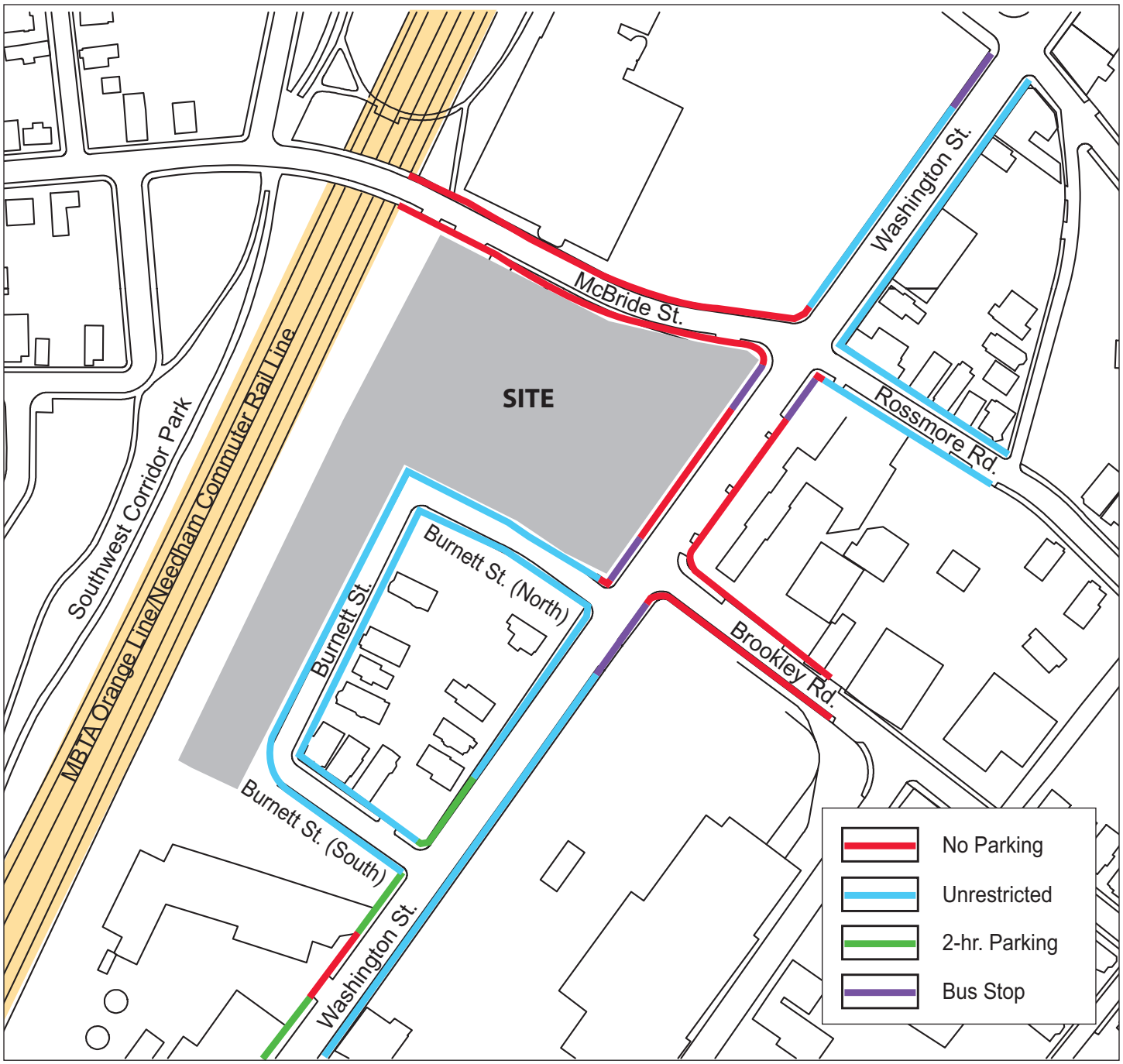

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Figure 2-4
Curbside Inventory

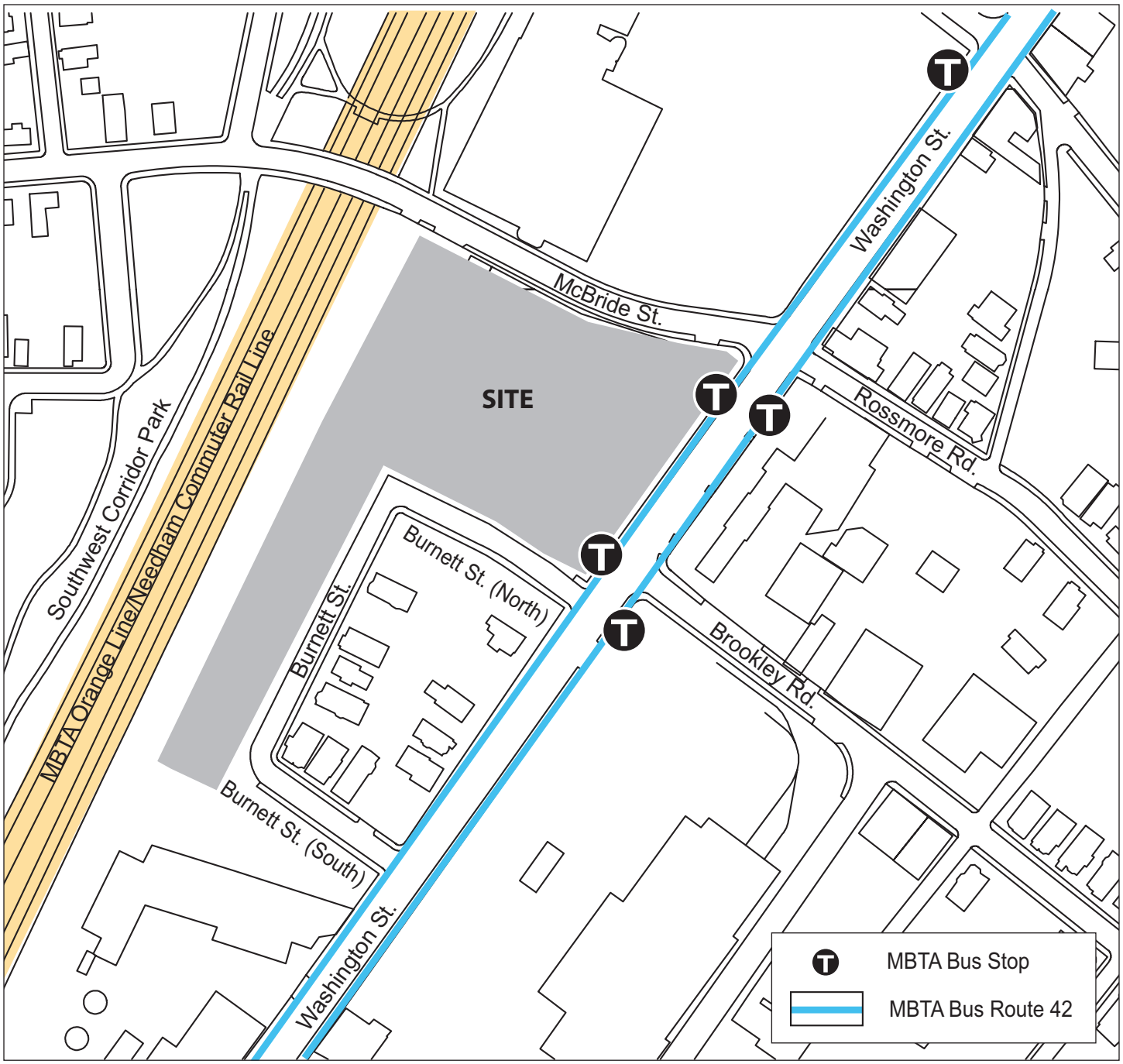

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Figure 2-5
Public Transportation in the Study Area

Table 2-4 MBTA Transit Service in the Study Area

Line/Route #	Description	Peak-hour Headway (in minutes)*
Rapid Transit Routes		
Orange Line	Forest Hills–Oak Grove	5
Local Bus Routes		
42	Forest Hills Station-Dudley or Ruggles Station via Washington Street	5-6
*Commuter Rail Routes***		
Needham	Needham – South Station	30–55

* Headway is the scheduled time between trains or buses, as applicable. Source: mbta.com, August 2011

** Commuter rail routes have irregular headways; customers typically plan trips according to schedule rather than utilizing walk-up service.

2.2.6 Pedestrian Access and Circulation

Pedestrian counts were conducted at study area intersections on Tuesday, May 24, 2011 from 7:00 to 9:00 a.m. and from 4:00 to 6:00 p.m. Existing a.m. and p.m. peak-hour pedestrian volumes appear in Figure 2-6. Detail pedestrian count data is provided in Appendix B.

Sidewalks in the study area are generally in good condition and supply more than adequate capacity. Although the study team noted in certain areas of the sidewalks along McBride Street and Burnett Street, tree roots and overgrown vegetation have created cracks and an unleveled surface. In addition, the presence of utility poles, street lights, and overgrown vegetation greatly reduce the effective width of the sidewalk along the south side of McBride Street adjacent to the Project site. Handicapped-accessible ramps and crosswalks are provided at most study area intersections.

2.2.7 Bicycle Access and Circulation

The Project site is conveniently located adjacent to the Southwest Corridor, which provides approximately six miles of biking, walking, and jogging paths between Forest Hills and Back Bay.

Currently, the roadways adjacent to the Project site have no designated bicycle lanes or markings. According to the *Bike Routes of Boston* map published by the City of Boston, Washington Street is designated as an advanced-level bike route suitable for experienced and traffic confident cyclists. McBride Street and Rossmore Road are beginner-level bike routes suitable for all types of cyclists including newer cyclists, cyclists with limited on-road experience, and/or children.

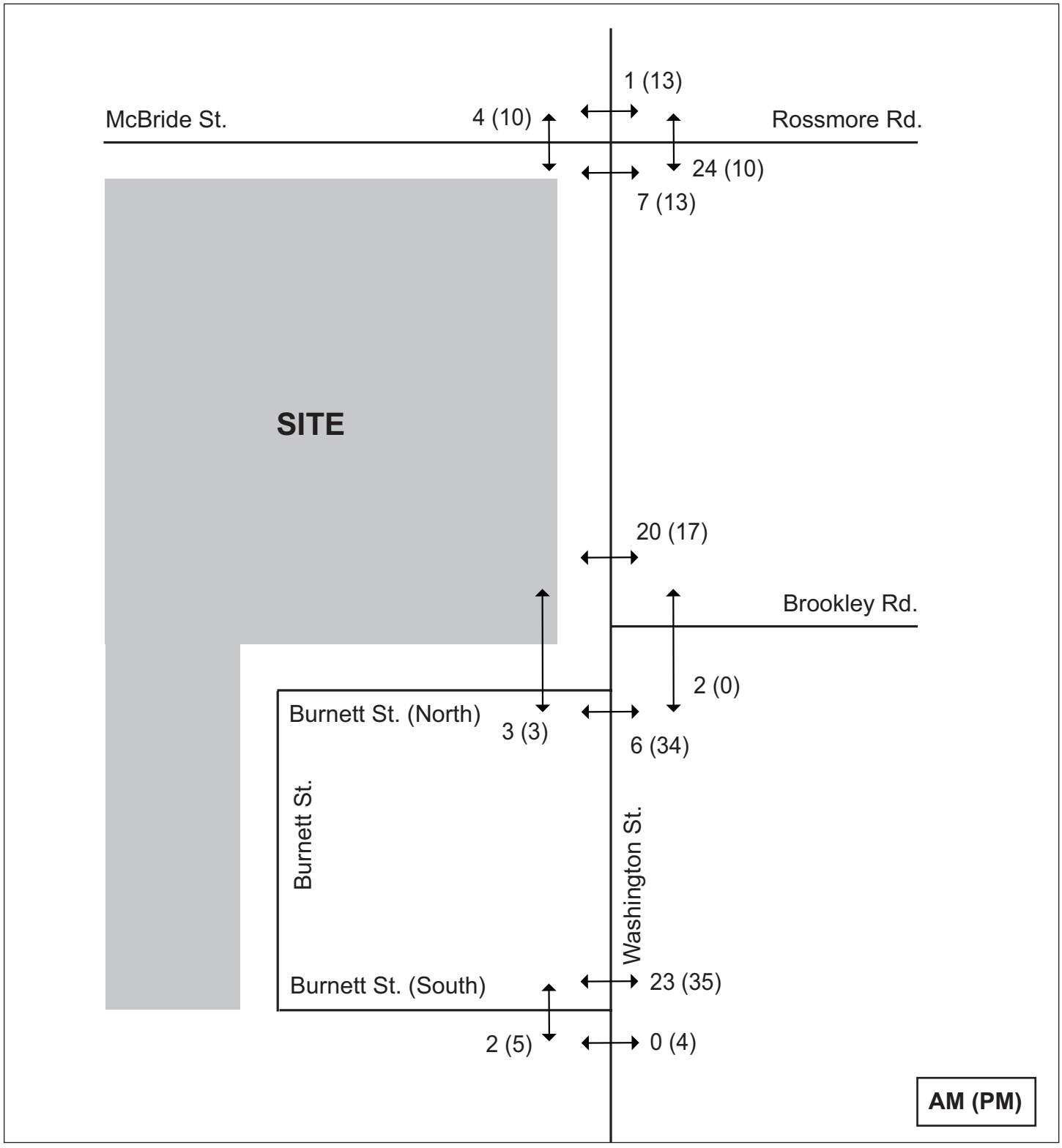

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Figure 2-6
Existing Conditions (2011) Pedestrian Volumes, a.m. and p.m. Peak Hours

No bicycle racks are currently provided on-site.

The Existing a.m. and p.m. peak-hour bicycle turning movement counts appear in Figure 2-7. Detailed bicycle counts provided in Appendix B.

2.2.8 Loading and Service

The existing site currently consists of primarily vacant warehouses. Loading and service activity on-site is generally minimal.

2.3 Evaluation of Long-term Impacts

This section describes and evaluates the projected 2016 No-Build and Build Conditions.

2.3.1 No-Build Conditions

2.3.1.1 Background Traffic Growth

No-Build traffic conditions are those that would occur independent of the proposed Project and include all existing traffic and any new traffic resulting from both general background growth and any identified development projects in the area. Two procedures are used to determine background traffic growth.

The first procedure is to estimate and distribute specific traffic volumes generated by planned new major developments and anticipated roadway changes. Within the vicinity of the Project site there are no planned new major developments.

The second method of determining background traffic growth is to apply a general growth rate to account for changes in demographics, auto usage, and ownership. Based on an assessment of traffic volume data from 2008 to 2011 along Washington Street in the vicinity of the Project site, traffic volumes have remained relatively constant in recent years. However, to provide a conservative estimate, this analysis assumes a general background growth rate of one-half percent per year. The background growth rate is also assumed to include background traffic volumes associated with the following small projects, depicted in Figure 2-8:

- ***154-160 Green Street Mixed-use Project.*** Currently under construction, a new mixed-use building consisting of 13 units, retail, and a 16-space underground parking garage with five-short-term on street parking spaces that will be created by the realignment of the sidewalk along Green Street.

- ***Jamaica Park Condominium.*** The project, located on Brookley Road adjacent to the Forest Hills Street intersection, consists of the development of 29 free standing condominium units.

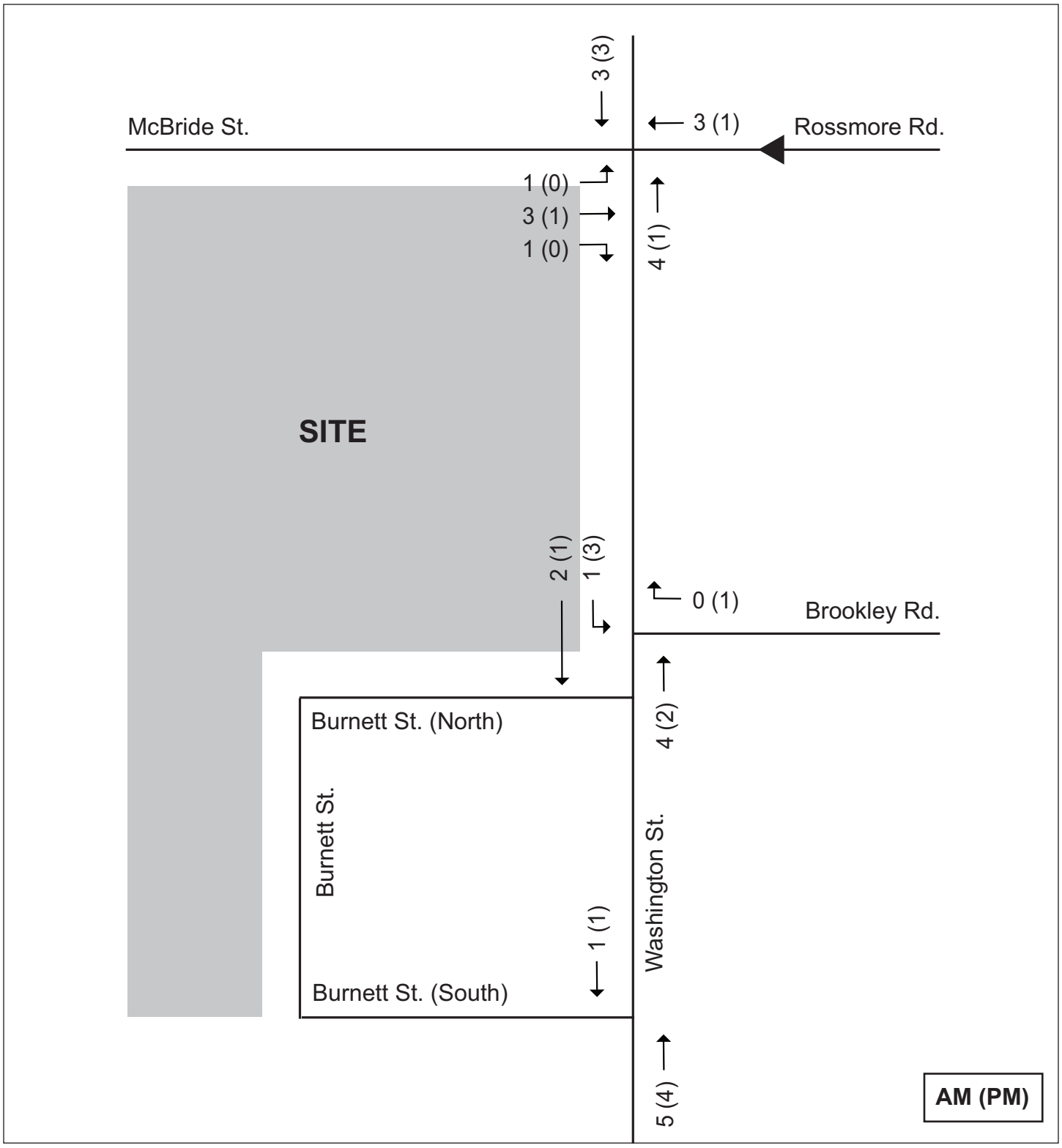

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Figure 2-7
Existing Conditions (2011) Bicycle Volumes,
a.m. and p.m. Peak Hours

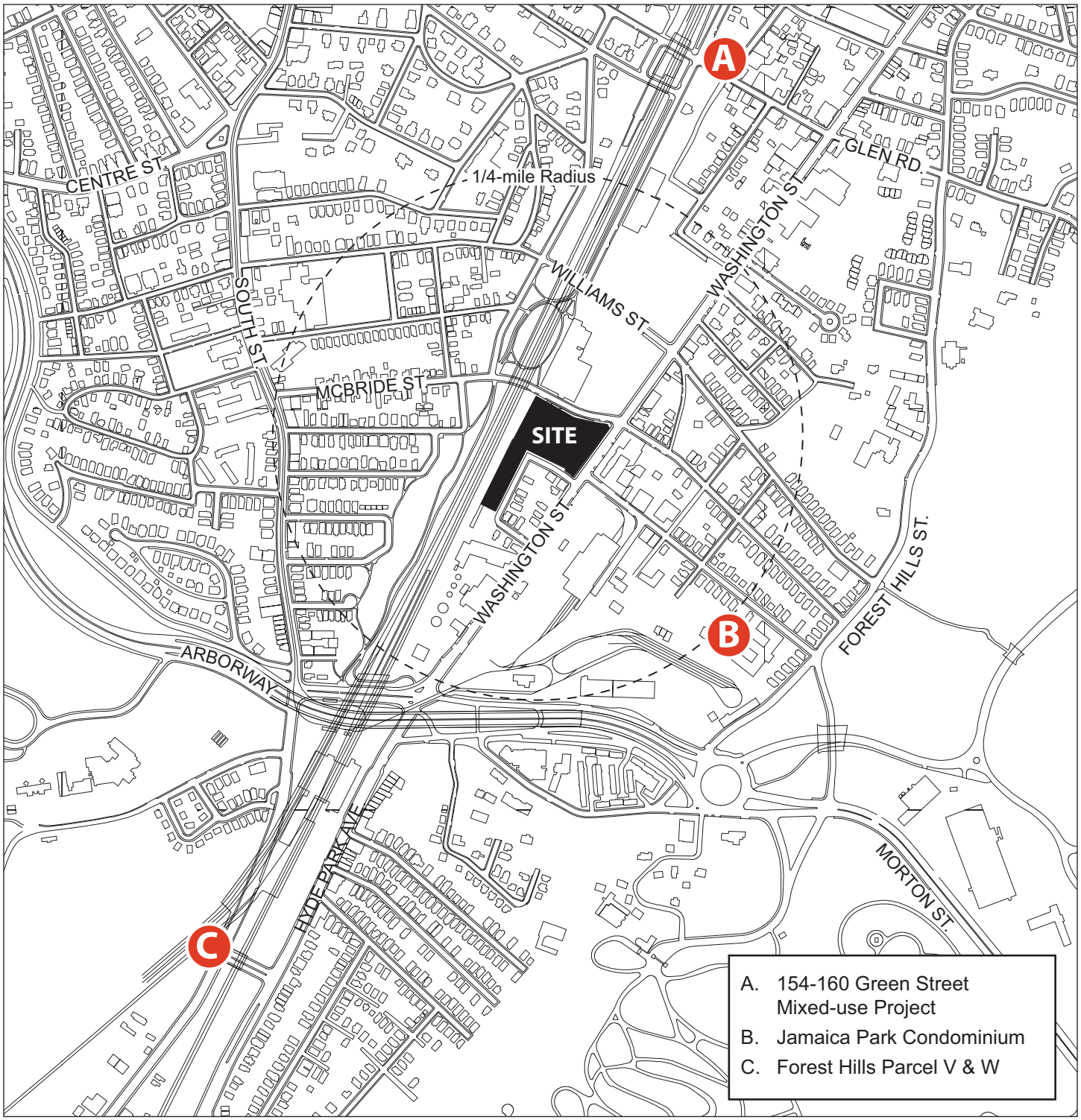

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Figure 2-8
Area Projects

- ***Forest Hills Parcel V&W.*** An approximately 44,330 square-foot commercial development including 58 off-street parking spaces and related site improvements on Massachusetts Bay Transportation Authority's Parcels V and W in the Forest Hills area of Jamaica Plain.

2.3.1.2 Background Transportation Improvements and Planning Initiatives

Boston Transportation Department As part of City-wide Traffic Signal Optimization, Work Order #3, BTD requested Howard/Stein Hudson Associates to analyze existing signal operations at 23 locations along Washington Street. The data compiled consisted of signal timing and phasing, vehicle, bicycle and pedestrian counts, crash data, and travel time studies. In the future, this information will be used to develop new signal timings to help reduce delays and travel times at different locations, also known as Phase 2 of the work order. At the time of this study, Phase 2 improvements were not yet implemented and therefore will be included in the No-Build and Build analyses.

2.3.1.3 No-Build Conditions Traffic Operations

The 2016 No-Build analysis uses the methodology described for Existing Conditions. No-Build traffic volumes are shown in Figure 2-9 and Figure 2-10. The resulting intersection operations are shown in Table 2-5 and Table 2-6. Complete Synchro reports are provided in Appendix B.

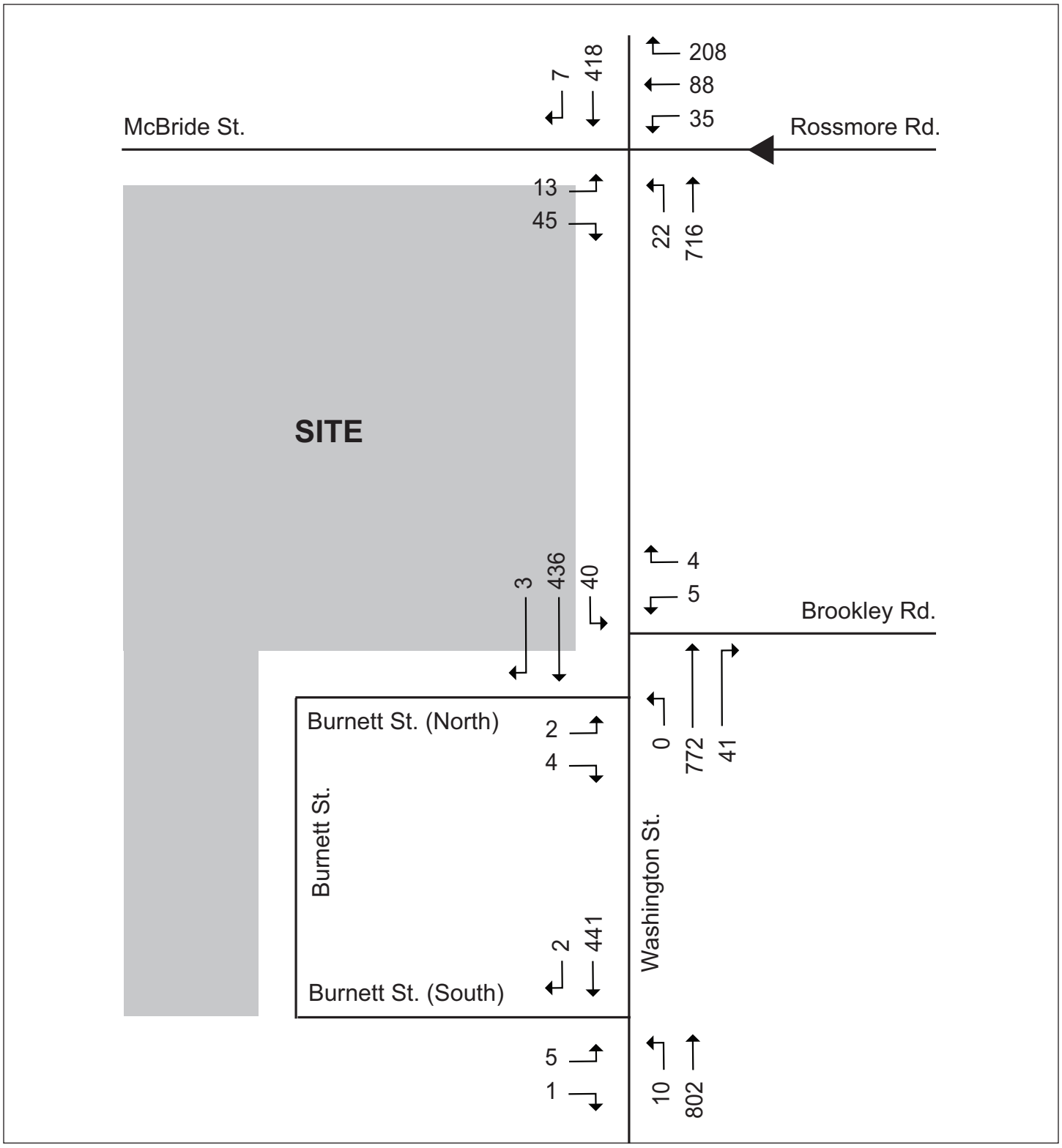

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Figure 2-9
No-Build Conditions (2016) Vehicle Turning Volumes, a.m. Peak Hour

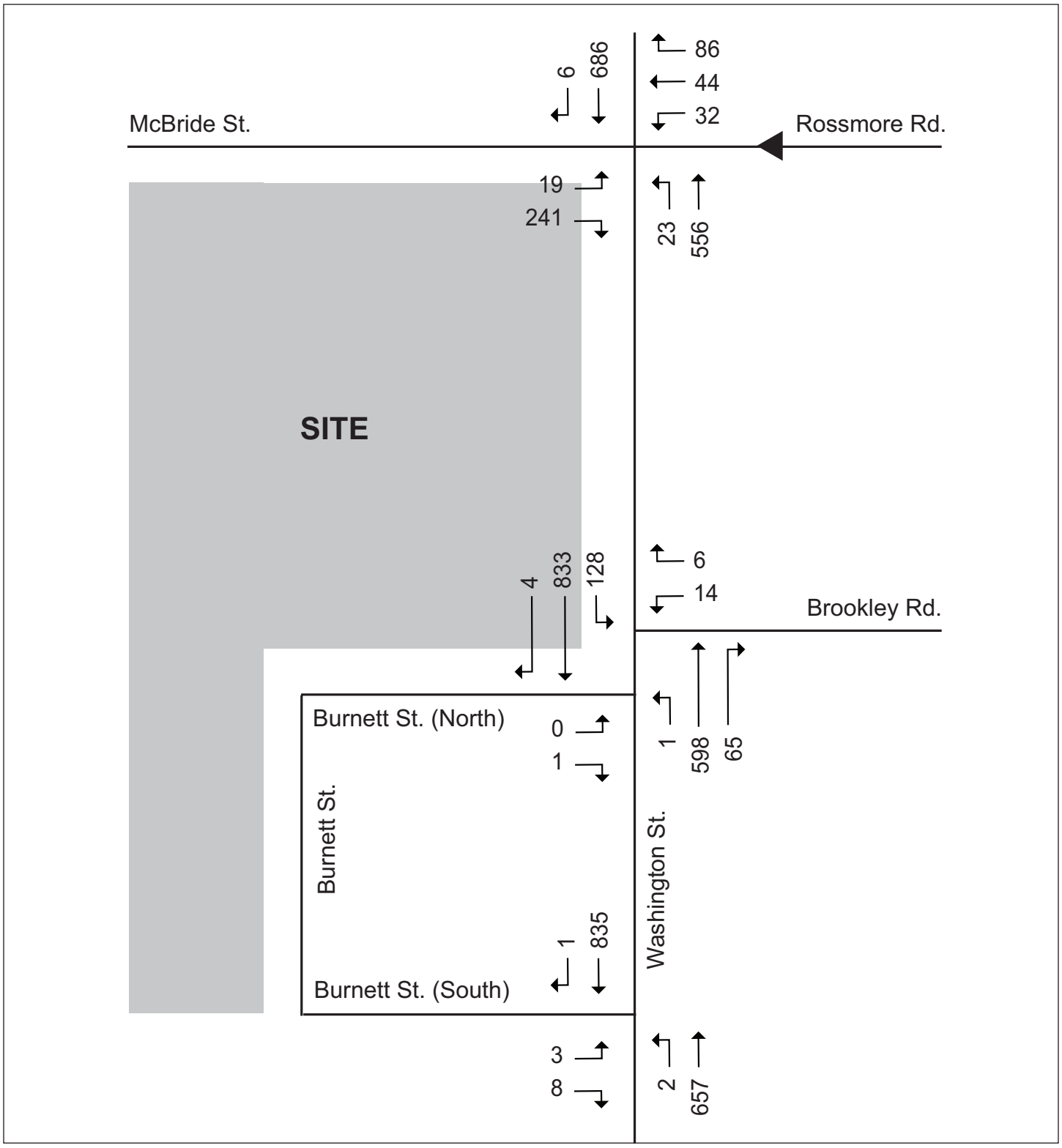

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Figure 2-10
No-Build Conditions (2016) Vehicle Turning Volumes, p.m. Peak Hour

Table 2-5 No-Build Conditions (2016) Level of Service Summary, a.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	D	35.8	-	-
McBride EB left/right	C	26.1	0.21	70
Rossmore WB left/thru/right	E	57.8	0.94	217
Washington NB left*	B	16.1	0.11	30
Washington NB thru	D	35.9	0.89	#857
Washington SB thru/right	B	18.3	0.59	m#379
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	E	37.3	0.15	13
Washington NB thru/right	A	0.0	0.53	0
Washington SB left/thru	A	1.8	0.07	5
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	C	24.6	0.08	6
Washington NB left/thru	A	0.0	0.00	0
Washington SB thru/right	A	0.0	0.29	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	D	28.7	0.10	8
Washington NB left/thru	A	0.3	0.01	1
Washington SB thru/right	A	0.0	0.29	0

= 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.

m = Queue is metered by upstream intersections.

*25′ left-turn pocket added during calibration process

Cell shading indicates that LOS has worsened from Existing Conditions

Table 2-6 No-Build Conditions (2016) Level of Service Summary, p.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	**C**	**25.6**	**-**	**-**
McBride EB left/right	D	54.6	0.85	224
Rossmore WB left/thru/right	C	23.7	0.52	99
Washington NB left*	C	24.7	0.28	35
Washington NB thru	B	19.1	0.62	#559
Washington SB thru/right	B	19.5	0.77	m#607
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	F	>50	>1.00	115
Washington NB thru/right	A	0.0	0.44	0
Washington SB left/thru	A	4.4	0.17	15
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	C	19.6	0.02	1
Washington NB left/thru	A	0.2	0.01	1
Washington SB thru/right	A	0.0	0.51	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	E	49.9	0.20	17
Washington NB left/thru	A	0.2	0.01	1
Washington SB thru/right	A	0.0	0.52	0

# = 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.
m = Queue is metered by upstream intersections.
*25′ left-turn pocket added during calibration process
Cell shading indicates that LOS has worsened from Existing Conditions

Under No Build Conditions, all intersection approaches within the study will continue to operate at an acceptable LOS during the a.m. and p.m. peak hours, or a similar LOS as the Existing Conditions, with the exception of one approach on Washington Street/Brookley Road, specifically:

- ***Washington Street/Brookley Road*** – The Brookley Road westbound approach worsens from LOS D to LOS E during the morning peak hour due to the increase in delay of approximately four seconds (two seconds over the LOS E threshold). The change in LOS is mainly attributed to the new traffic resulting from the general background growth.

2.3.2 Build Conditions

As summarized in Section 2.1.1, the Project will result in construction of a new approximately 130,000 square-foot self-storage facility; a new approximately 28,000 sf, two-story building consisting of 14,000 square-feet of ground-floor retail space and 14,000 sf of commercial space (e.g., health club, medical office, etc.) on the second level, and 42 new residential units. Parking for 115 vehicles will be provided on-site, including 42 spaces for the residential units and 73 parking spaces for the non-residential uses. The proposed site plan is illustrated in Figure 2-11. In addition, up to 11 on-street spaces will be created adjacent to the site along Washington Street and McBride Street.

2.3.2.1 Site Access and Circulation

Vehicular access and egress to and from the site will be afforded by a proposed full access driveway via McBride Street, approximately 225-feet west of the signalized intersection with Washington Street; this one access point on McBride Street would replace three existing curb cuts. A second full access driveway via Burnett Street, approximately 175-feet west of Washington Street, would be provided. Access and egress to the residential units will be afforded by an entrance and exit only driveway via Burnett Street, to a subsurface parking garage of the primary residential building; a full access driveway via Burnett Street will be provided for the two triplex buildings.

2.3.2.2 Trip Generation and Mode Split

Trip generation for the proposed land uses was derived from the Institute of Transportation Engineers' (ITE) *Trip Generation* (8th edition, 2008) using the following Land Use Codes (LUC):

- *LUC 220 – Apartment* – can be a rental dwelling unit located within the same building with at least three other dwelling units, for example, quadraplexes and all types of apartment buildings. The fitted curve equations were used to estimate person trips associated with the apartment use.

- *LUC 151 – Mini-Warehouse* – are buildings in which a number of storage units or vaults are rented for storage of goods. They are typically referred to as "self-storage" facilities. The average rates were used to estimate the person trips for the self-storage facility.

- *LUC 492 – Health Club* – are privately owned facilities that primarily focus on individual fitness or training. The average rates were used to estimate the person trips for the 14,000 sf of commercial space. While the exact use of the commercial space has yet to be determined, health club was chosen for purposes of this analysis as it will provide a conservative estimate of the person trip generation among the various uses being considered.

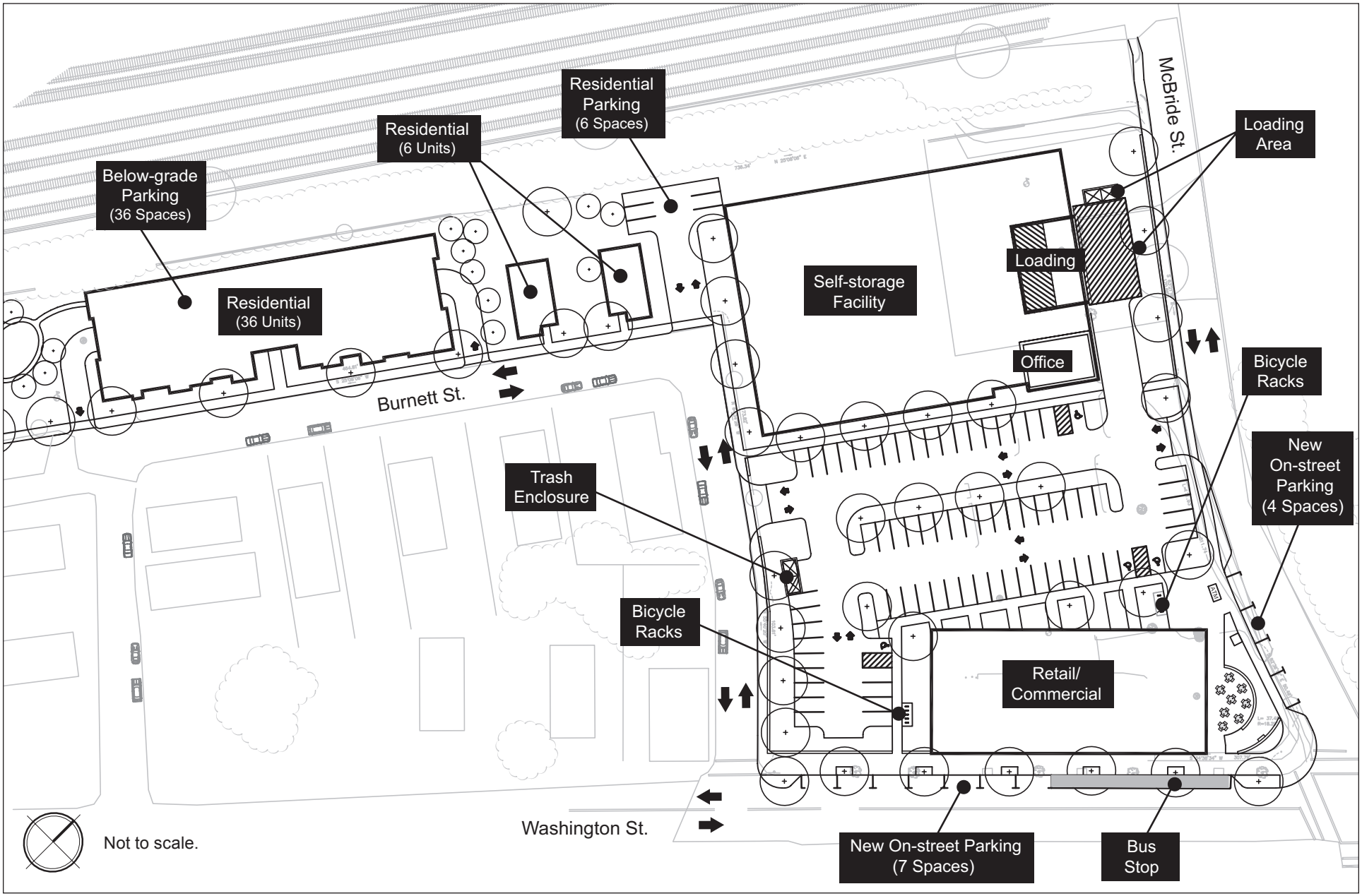

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Figure 2-11
Site Plan

- ***LUC 820 – Shopping Center –*** is an integrated group of commercial establishments that is planned, developed, owned and managed as a unit. The average rates were used to estimate the person trips associated with the 14,000 sf of ground-floor retail space.

BTD publishes vehicle, transit, and walking mode split rates for different areas of Boston; the Project is located within designated Area 6. Mode split assumptions based on BTD's Area 6 data and local vehicle occupancy rates from the *2001 National Household Travel Survey* are summarized in Table 2-7.

Table 2-7 Peak Hour Mode Split Assumptions

Land Use		Walk/Bike Share[1]	Transit Share[1]	Auto Share[1]	Local Vehicle Occupancy Rate[2]
Daily					
Residential	In	25%	14%	61%	1.7
	Out	25%	14%	61%	1.7
Retail	In	24%	15%	61%	1.8
	Out	24%	15%	61%	1.8
Health Club	In	24%	15%	61%	1.6
	Out	24%	15%	61%	1.6
Self-Storage	In	24%	15%	61%	1.8
	Out	24%	15%	61%	1.8
a.m. Peak Hour					
Residential	In	18%	26%	56%	1.7
	Out	12%	44%	44%	1.7
Retail	In	31%	15%	54%	1.8
	Out	24%	28%	48%	1.8
Health Club	In	31%	15%	54%	1.6
	Out	24%	28%	48%	1.6
Self-Storage	In	31%	15%	54%	1.8
	Out	24%	28%	48%	1.8
p.m. Peak Hour					
Residential	In	12%	44%	44%	1.7
	Out	18%	26%	56%	1.7
Retail	In	24%	28%	48%	1.8
	Out	31%	15%	54%	1.8
Health Club	In	24%	28%	48%	1.6
	Out	31%	15%	54%	1.6
Self-Storage	In	24%	28%	48%	1.8
	Out	31%	15%	54%	1.8

1.Boston Transportation Department mode share data for Area 6.

2. 2000 Census data and 2001 National Household Travel Survey.

Based on the land use trip rates, mode split assumptions, and local vehicle occupancy rates, the resulting bike/walk, transit, and auto trips were identified. The Project-generated vehicle trips are summarized in Table 2-8, with detailed trip generation information provided in Appendix B.

Table 2-8 Proposed Project Trip Generation

Land Use		Walk/Bike Trips	Transit Trips	Auto Trips
Daily				
Residential (42 units)	In	57	32	81
	Out	57	32	81
Retail (14 ksf)	In	117	73	165
	Out	117	73	165
Health Club (14 ksf)	In	66	41	105
	Out	66	41	105
Self-Storage(130 ksf)	In	47	29	66
	Out	47	29	66
Totals	**In**	**287**	**175**	**417**
	Out	**287**	**175**	**417**
a.m. Peak Hour				
Residential (42 units)	In	1	2	2
	Out	3	10	6
Retail (14 ksf)	In	4	2	4
	Out	2	2	2
Health Club (14 ksf)	In	3	2	4
	Out	3	4	4
Self-Storage(130 ksf)	In	4	2	4
	Out	2	3	2
Total	**In**	**12**	**8**	**14**
	Out	**10**	**19**	**14**
p.m. Peak Hour				
Residential (42 units)	In	4	14	8
	Out	3	4	6
Retail (14 ksf)	In	10	12	11
	Out	13	6	13
Health Club (14 ksf)	In	8	9	10
	Out	8	4	9
Self-Storage(130 ksf)	In	5	6	5
	Out	6	3	6
Total	**In**	**27**	**41**	**34**
	Out	**30**	**17**	**34**

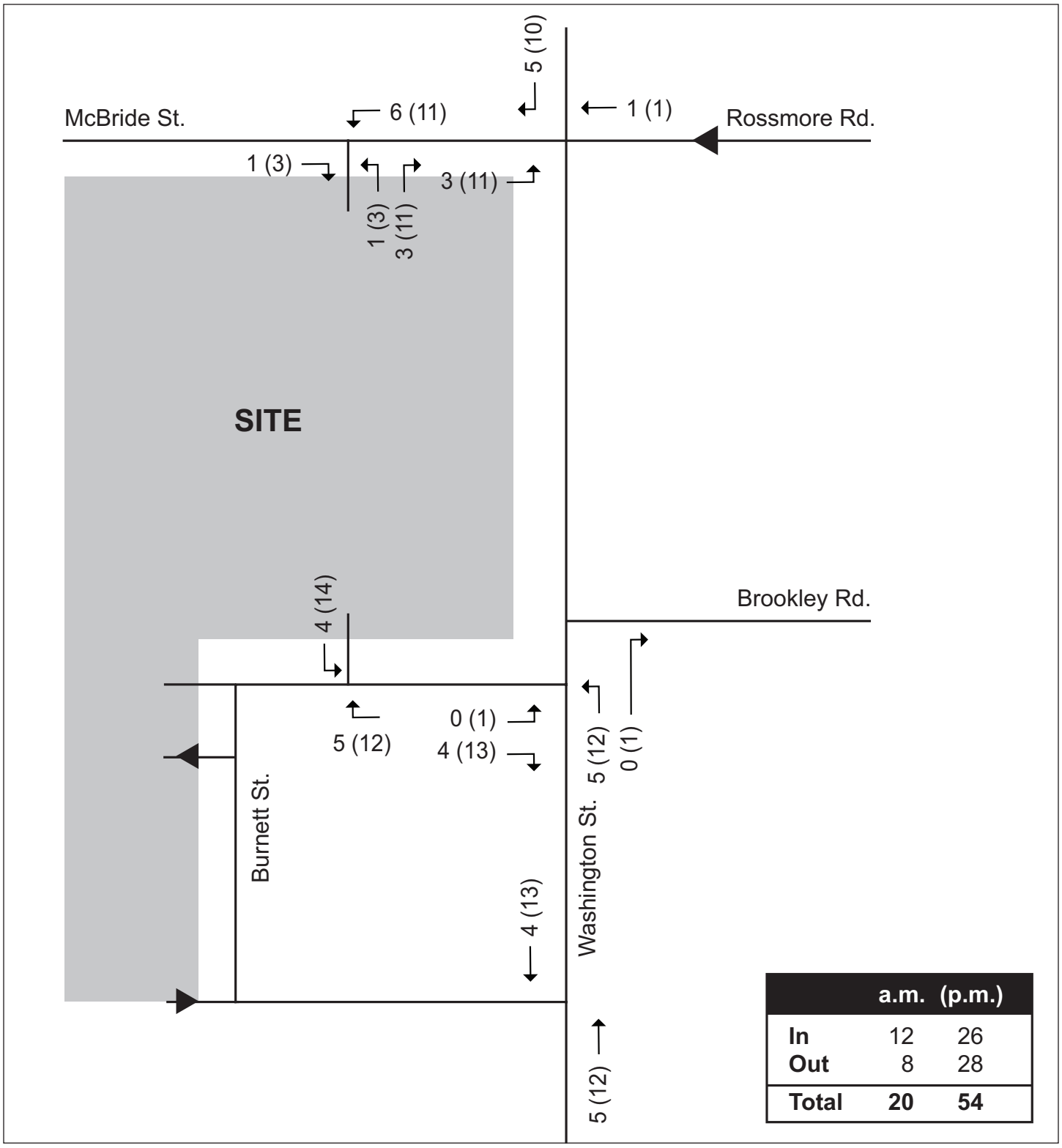
The Project is expected to generate approximately 834 new daily vehicle trips (417 trips in and 417 trips out), with 28 new vehicle trips (14 in and 14 out) during the a.m. peak hour and 68 new vehicle trips (34 in and 34 out) during the p.m. peak hour—this corresponds to an increase of only approximately one vehicle trip every one to two minutes on the adjacent roadway network during the peak periods.

2.3.2.3 Site Generated Trips

Vehicular trip distribution was developed using origin–destination data from BTD for Area 6 and knowledge of the local roadway network. Due to the different land uses, separate distributions were developed for traffic associated with the non-residential uses and residential uses. The resulting project generated trips for the non-residential and residential uses are illustrated in Figure 2-12 and Figure 2-13.

2.3.2.4 Build Conditions Traffic Operations

Figure 2-14 and Figure 2-15 show the 2016 Build morning and evening peak-hour traffic volumes, accounting for background growth rate, anticipated development by others, and Project-generated trips. The LOS analysis for Build Conditions, which was conducted using the methodology described for Existing Conditions, appears in Table 2-9 and Table 2-10.



	a.m.	(p.m.)
In	12	26
Out	8	28
Total	**20**	**54**

Not to scale.

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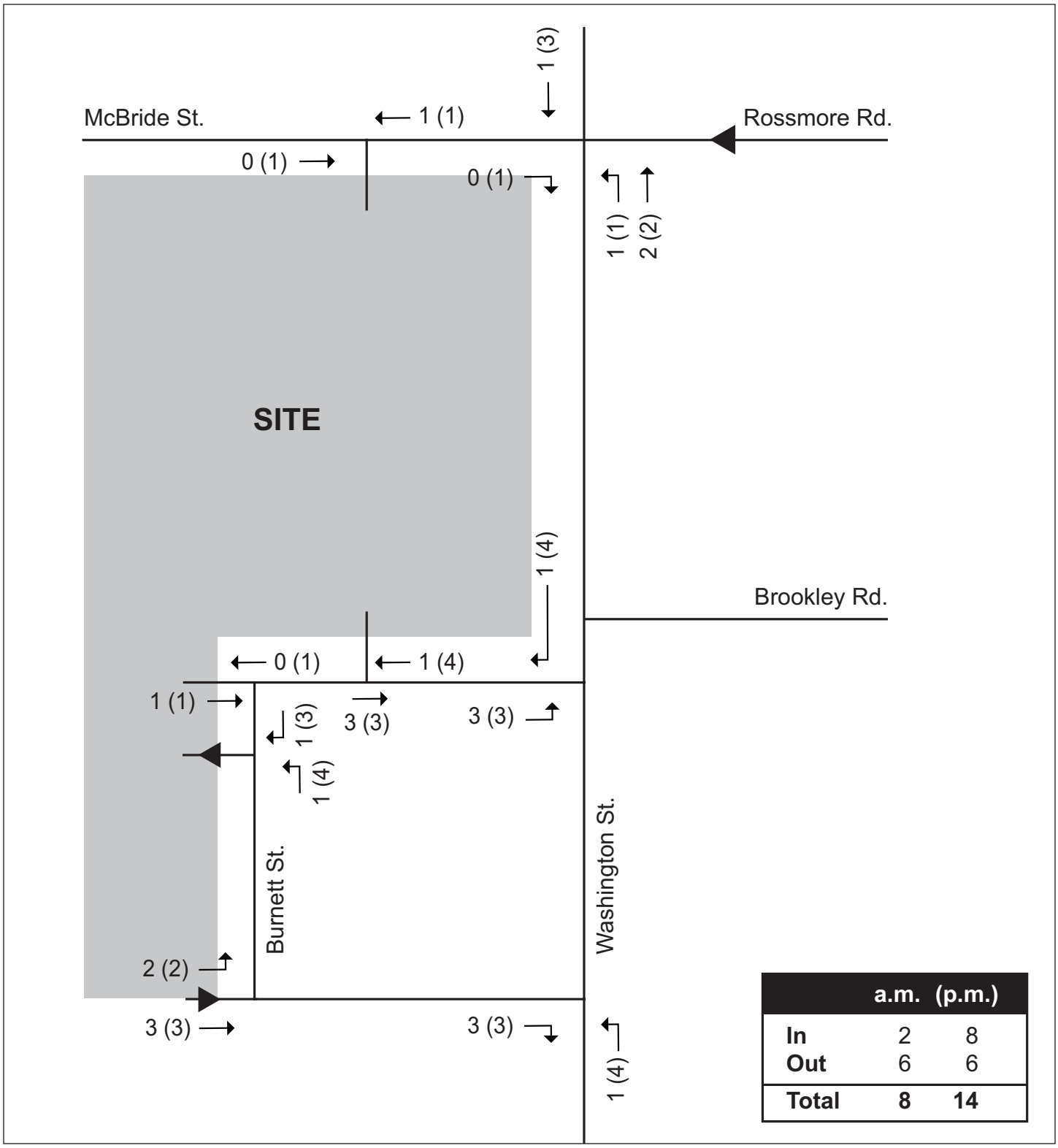
Figure 2-12
Project-generated Trips: Non-residential Uses



	a.m.	(p.m.)
In	2	8
Out	6	6
Total	**8**	**14**

Not to scale.

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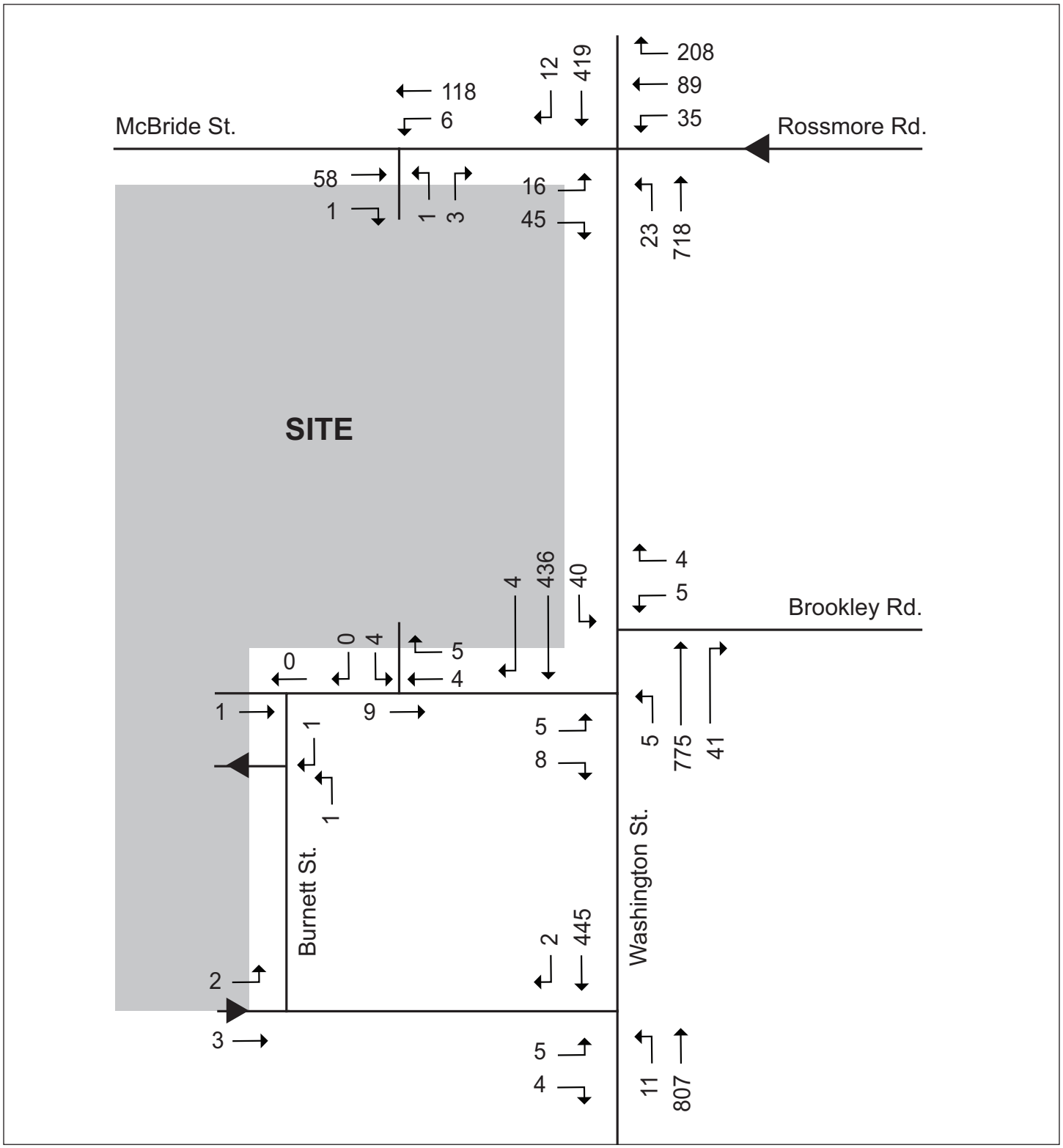

Not to scale.

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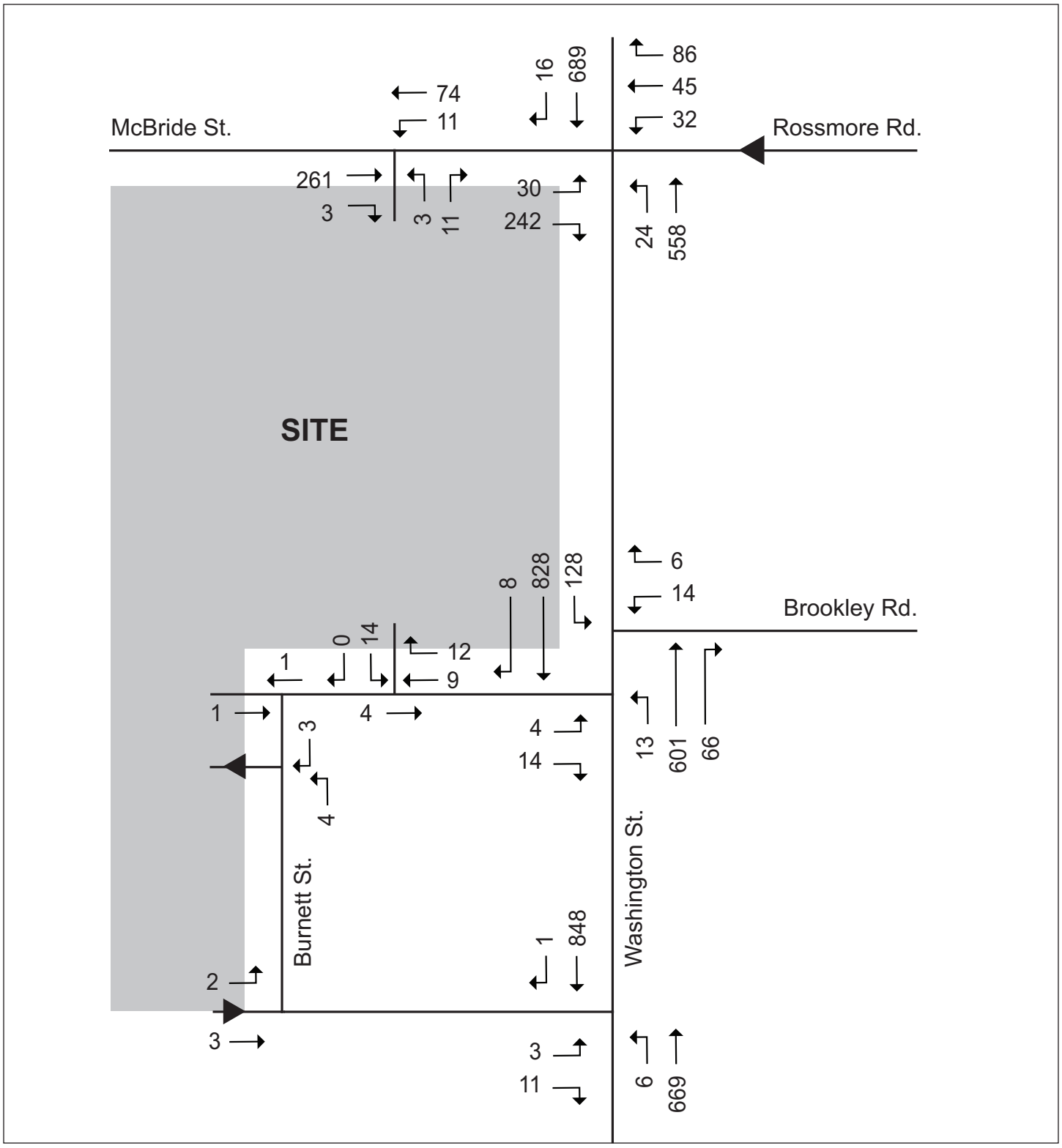
Figure 2-14
Build Conditions (2016) Vehicle Turning Volumes, a.m. Peak Hour



Not to scale.

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Figure 2-15
Build Conditions (2016) Vehicle Turning Volumes, p.m. Peak Hour

Table 2-9 Build Conditions (2016) Level of Service Summary, a.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	**D**	**36.1**	**-**	**-**
McBride EB left/right	C	26.3	0.22	73
Rossmore WB left/thru/right	E	57.7	0.94	219
Washington NB left*	B	16.3	0.12	31
Washington NB thru	D	36.6	0.90	#859
Washington SB thru/right	B	18.5	0.60	m#390
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	E	38.1	0.16	13
Washington NB thru/right	A	0.0	0.53	0
Washington SB left/thru	A	1.8	0.07	5
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	D	29.8	0.20	18
Washington NB left/thru	A	0.2	0.01	0
Washington SB thru/right	A	0.0	0.29	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	C	22.1	0.12	10
Washington NB left/thru	A	0.4	0.01	1
Washington SB thru/right	A	0.0	0.29	0
5. Burnett Street (North)/Site Drive				
Burnett EB left/thru	A	0.0	0.0	0
Burnett WB thru/right	A	0.0	0.01	0
Site Drive SB left/right	A	8.6	0.00	0
6. McBride Street/Site Drive				
McBride EB thru/right	A	0.0	0.04	0
McBride WB left/thru	A	0.4	0.0	0
Site Drive NB left/right	A	8.8	0.0	0

= 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.

m = Queue is metered by upstream intersections.

*25′ left-turn pocket added during calibration process

Cell shading indicates that LOS has worsened from Existing Conditions

Table 2-10 Build Conditions (2016) Level of Service Summary, p.m. Peak Hour

Intersection	LOS	Delay (s)	V/C Ratio	95% Queue Length (ft.)
Signalized Intersections				
1. Washington Street/Rossmore Road/ McBride Street	**C**	**27.5**	**-**	**-**
McBride EB left/right	E	57.5	0.88	241
Rossmore WB left/thru/right	C	23.1	0.51	100
Washington NB left*	C	26.2	0.30	37
Washington NB thru	B	19.8	0.64	#560
Washington SB thru/right	C	22.2	0.82	m#637
Unsignalized Intersections				
2. Washington Street/Brookley Road				
Brookley WB left/right	F	>50.0	>1.00	125
Washington NB thru/right	A	0.0	0.45	0
Washington SB left/thru	A	4.5	0.17	15
3. Washington Street/Burnett Street (North)				
Burnett EB left/right	F	>50.0	0.79	104
Washington NB left/thru	A	3.0	0.10	8
Washington SB thru/right	A	0.0	0.52	0
4. Washington Street/Burnett Street (South)				
Burnett EB left/right	F	>50.0	0.24	21
Washington NB left/thru	A	0.6	0.02	2
Washington SB thru/right	A	0.0	0.53	0
5. Burnett Street (North)/Site Drive				
Burnett EB left/thru	A	0.0	0.0	0
Burnett WB thru/right	A	0.0	0.01	0
Site Drive SB left/right	A	8.7	0.02	1
6. McBride Street/Site Drive				
McBride EB thru/right	A	0.0	0.17	0
McBride WB left/thru	A	1.1	0.01	1
Site Drive NB left/right	B	10.1	0.02	2

= 95th percentile volume exceeds capacity. Queue may be longer. Queue shown is the maximum after two cycles.

m = Queue is metered by upstream intersections.

*25′ left-turn pocket added during calibration process

Cell shading indicates that LOS has worsened from Existing Conditions

Under Build Conditions, all intersections in the study continue to operate at the same LOS during the a.m. and p.m. peak hours, with the exception of the following approaches:

- *Washington Street/Rossmore Road/McBride Street* – The McBride Street eastbound approach worsens from LOS D to LOS E during the p.m. peak hour as a result of an increase in delay of only approximately three seconds (three seconds over the LOS E threshold) and the Washington Street southbound through/right-turn approach will worsen from LOS B to LOS C as a result of an increase in delay of less than four seconds (two seconds over the threshold). The overall LOS will remain unchanged with the Project in place at an acceptable LOS D during the morning peak hour and LOS C during the evening peak hour.

- *Washington Street/Burnett Street (North)* – The stop-controlled Burnett Street (North) eastbound approach worsens from LOS C to LOS D during the morning peak hour as a result of an increase in delay of only approximately five seconds (one second over the threshold) and from LOS C to LOS F during the p.m. peak hour. This level of operation, during the evening peak hour, is typical for a stop-controlled minor approach intersecting a major arterial roadway.

- *Washington Street/Burnett Street (South)* – The stop-controlled Burnett Street (South) eastbound approach worsens from LOS E to LOS F during the p.m. peak hour due to an increase in delay of less than one second (less than one second over the LOS F threshold). This level of operation is typical for a stop-controlled minor approach interesting a major arterial roadway.

2.3.2.5 Build Conditions Parking Supply

The Project will provide parking for 115 vehicles on-site, including 42 spaces for the residential units and 73 parking spaces for the non-residential uses. In addition, the Project proposes to create 11 on-street parking spaces adjacent to the site, including seven spaces on Washington Street and four spaces on McBride Street.

Parking for the two triplex residential buildings (six-units) will be provided within a six-space surface parking lot on Burnett Street. The 36-unit residential building will be provided with a one-level, 36-space parking structure beneath the building, also on Burnett Street—this corresponds to a parking ratio of 1.0 spaces per residential unit consistent with the BTD guidelines for the area (maximum of 1.0 to 1.5 spaces per unit).

The approximately 158,000 sf of non-residential uses will be provided with parking for 73 vehicles within a surface parking lot, including 19 spaces for the self-storage facility and 40 spaces to be shared between the ground-floor retail and health club. The proposed parking supply for the non-residential uses is summarized in Table 2-11.

Table 2-11 Proposed Non-Residential Parking Supply

Land Use	Size (sf)	Spaces	Ratio (spaces/1,000 sf)
Self-Storage Facility	130,000	19	0.15
Retail	14,000	14	1.00
Health Club	14,000	40	2.86
Subtotal	*28,000*	*54*	*1.93*
Total	**158,000**	**73**	**0.46**

As shown in Table 2-11, parking for the proposed self-storage facility will be provided at a ratio of approximately 0.15 spaces per 1,000 sf, which is consistent with parking provided at other similar self-storage facilities based on data collected by the study team at six existing facilities in Boston, and the greater Boston area.

The remaining 54 spaces would be shared between the retail use and the health club, which would equate to approximately 1.00 spaces per 1,000 sf for the retail and 2.86 spaces per 1,000 sf for the health club. According to a parking demand survey conducted by Howard/Stein-Hudson Associations, Inc. at Mike's Fitness in Jamaica Plain in June 2006, peak parking demand generally occurs during the weekday evening and Saturday mid-day periods and ranged between 2.5 to 3.9 spaces per 1,000 sf. Thus, the proposed 2.86 ratio for the health club will help ensure that parking can be adequately accommodated on-site.

It should be noted that the overall non-residential parking supply of 73 spaces corresponds to a ratio of just under 0.50 spaces per 1,000 sf—well within the BTD guidelines for the area for non-residential uses (maximum of 1.0 to 1.5 spaces per 1,000 of non-residential space).

In addition, the Project proposes to add up to 11 new on-street spaces along Washington Street and McBride Street to further support the retail uses on-site and to help improve the pedestrian environment by providing a buffer between the sidewalk and the roadway. The creation of on-street parking along Washington Street will require the consolidation, or relocation, of one of two existing MBTA bus stops, which are currently only approximately 150 feet apart. The Project team will work with the MBTA and BTD on identifying the most appropriate locations for the bus stops.

2.3.2.6 Build Conditions Public Transportation

The Project will generate an estimated 350 new transit trips daily. Approximately 27 new transit trips (19 boarding and 8 alighting) will occur during the a.m. peak hour, and 58 new trips (17 boarding and 41 alighting) will occur during the p.m. peak hour. Transit trip generation is summarized in Table 2-12, with detailed trip generation data provided in Appendix B.

Table 2-12 Transit Trip Generation

Period	Direction	Residential (42 units)	Retail (14 ksf)	Health Club (14 ksf)	Self-Storage (130 ksf)	Total
Daily	In	32	73	41	29	175
	Out	32	73	41	29	175
	Total	64	146	82	58	350
a.m. Peak Hour	In	2	2	2	2	8
	Out	10	2	4	3	19
	Total	12	4	6	5	27
p.m. Peak Hour	In	14	12	9	6	41
	Out	4	6	4	3	17
	Total	18	18	13	9	58

2.3.2.7 Build Pedestrian Conditions

Pedestrian and Bicycle Trip Generation

On a daily basis, the Project will generate an estimated 574 new pedestrian and bicycle trips and an additional 350 new transit trips that will require a walk to or from the site. This results in an additional 924 new pedestrian or bicycle trips per day. Approximately 22 pedestrian or bicycle trips in and out of the site will occur during the a.m. peak hour, and 57 pedestrian or bicycle trips in and out will occur during the p.m. peak hour, plus 27 and 58 transit trips, respectively. Pedestrian and bicycle trip generation is summarized in Table 2-13, with detailed trip generation data provided in Appendix B.

Table 2-13 Pedestrian and Bicycle Trip Generation

Period	Direction	Residential (42 units)	Retail (14 ksf)	Health Club (14 ksf)	Self-Storage (130 ksf)	Total
Daily	In	57	117	66	47	287
	Out	57	117	66	47	287
	Total	114	234	132	94	574
a.m. Peak Hour	In	1	4	3	4	12
	Out	3	2	3	2	10
	Total	4	6	6	6	22
p.m. Peak Hour	In	4	10	8	5	27
	Out	3	13	8	6	30
	Total	7	23	16	11	57

2.3.2.8 Build Bicycle Accommodations

Secure bicycle storage will be made available for residents, visitors, and tenants of the Project. The design team is currently evaluating the feasibility of providing dedicated bike storage within the residential buildings, the below grade garage, and at major entrances to buildings.

All bicycle racks, signs, and parking areas will conform to BTD standards and be sited in safe, secure locations. The Proponent will work with BTD to identify the most appropriate quantity and location for bicycle racks on the Project site as part of the Transportation Access Plan Agreement (TAPA) process. The Proponent is also committed to providing the appropriate level of bicycle accommodations necessary for LEED certification.

2.3.2.9 Build Conditions Loading and Service

All recycling, trash collection, and loading activities for the Project will occur on-site where possible.

Trash and loading activities for the retail use and health club will occur within the surface parking lot. Trash will be stored within a dumpster enclosure located adjacent to Burnett Street. See Figure 2-11.

The proposed self-storage facility will be provided with a dedicated on-site loading area located along the north side of the building adjacent to McBride Street. The proposed loading area will be able to accommodate a vehicle as large as WB-40.

All recycling and trash collection for the proposed residential apartment buildings will occur inside the buildings and then wheeled/carried out to Burnett Street for curb-side pick-up. Most residential deliveries are made in smaller vehicles—cars, vans, or small panel trucks. Deliveries in this size of vehicle will be made curbside of Burnett Street outside the apartment buildings. Building management will coordinate all residential move-in and move-out activity and schedule this activity during off-peak hours, where possible. Move-in and move-out activity is generally infrequent once the building is fully occupied.

2.4 Transportation Mitigation Measures

Table 2-14 and Table 2-15 compare Existing, No-Build, and Build Conditions for the a.m. and p.m. peak hours, respectively. The changes in LOS at study area intersection are very small as a result of the Project. In addition, BTD is planning to complete Phase 2 of the Washington Street corridor re-timing study, which involves new signal timings to help reduce the delays and travel times throughout the corridor. Due to the recent Phase 1 re-timings of traffic control signals, implemented by the BTD, the study area signalized intersections continue to operate at an acceptable overall LOS (LOS D or better).

Table 2-14 Level of Service Summary, Comparison Table, a.m. Peak Hour

Intersection	Existing	No-Build	Build
Signalized Intersections			
1. Washington Street/Rossmore Road/ McBride Street	**C**	**D**	**D**
McBride EB left/right	C	C	C
Rossmore WB left/thru/right	E	E	E
Washington NB left*	B	B	B
Washington NB thru	C	D	D
Washington SB thru/right	C	B	B
Unsignalized Intersections			
2. Washington Street/Brookley Road			
Brookley WB left/right	D	E	E
Washington NB thru/right	A	A	A
Washington SB left/thru	A	A	A
3. Washington Street/Burnett Street (North)			
Burnett EB left/right	C	C	D
Washington NB left/thru	A	A	A
Washington SB thru/right	A	A	A
4. Washington Street/Burnett Street (South)			
Burnett EB left/right	D	D	C
Washington NB left/thru	A	A	A
Washington SB thru/right	A	A	A
5. Burnett Street (North)/Site Drive			
Burnett EB left/thru	-	-	A
Burnett WB thru/right	-	-	A
Site Drive SB left/right	-	-	A
6. McBride Street/Site Drive			
McBride EB thru/right	-	-	A
McBride WB left/thru	-	-	A
Site Drive NB left/right	-	-	A

Cell shading indicates that LOS worsens from prior condition.

Table 2-15 Level of Service Summary, Comparison Table, p.m. Peak Hour

Intersection	Existing	No-Build	Build
Signalized Intersections			
1. Washington Street/Rossmore Road/ McBride Street	C	C	C
McBride EB left/right	E	D	E
Rossmore WB left/thru/right	C	C	C
Washington NB left*	C	C	C
Washington NB thru	B	B	B
Washington SB thru/right	B	B	C
Unsignalized Intersections			
2. Washington Street/Brookley Road			
Brookley WB left/right	F	F	F
Washington NB thru/right	A	A	A
Washington SB left/thru	A	A	A
3. Washington Street/Burnett Street (North)			
Burnett EB left/right	C	C	F
Washington NB left/thru	A	A	A
Washington SB thru/right	A	A	A
4. Washington Street/Burnett Street (South)			
Burnett EB left/right	E	E	F
Washington NB left/thru	A	A	A
Washington SB thru/right	A	A	A
5. Burnett Street (North)/Site Drive			
Burnett EB left/thru	-	-	A
Burnett WB thru/right	-	-	A
Site Drive SB left/right	-	-	A
6. McBride Street/Site Drive			
McBride EB thru/right	-	-	A
McBride WB left/thru	-	-	A
Site Drive NB left/right	-	-	B

Cell shading indicates that LOS worsens from prior condition.

The Project is expected to generate approximately 28 new vehicle trips (14 in and 14 out) during the a.m. peak hour and 68 new vehicle trips (34 in and 34 out) during the p.m. peak hour—this corresponds to an increase of only approximately one vehicle trip every one to two minutes on the adjacent roadway network during the peak periods. Thus, the Project is expected to have a negligible impact to the adjacent roadway network and therefore no mitigation is warranted. However, the Project will result in the following improvements:

- Improved sidewalk conditions along McBride Street, Washington Street, and Burnett Street adjacent to the site; and
- Creation of new on-street parking along McBride Street and Washington Street that will support new ground-floor retail and enhance the pedestrian environment by providing a buffer between the sidewalk and the roadway.

2.5 Evaluation of Short-term Construction Impacts

Details of the overall construction schedule, working hours, number of construction workers, worker transportation and parking, number of construction vehicles, and routes will be addressed in detail in a Construction Management Plan to be filed with BTD in accordance with the City's transportation maintenance plan requirements. The CMP will also address the need for pedestrian detours, lanes closures, and/or parking restrictions, if necessary, to accommodate a safe and secure work zone.

To minimize transportation impacts during the construction period, the following measures will be incorporated into the Construction Management Plan:

- Construction workers will be encouraged to use public transportation and/or carpool;
- A subsidy for MBTA passes will be considered for full-time employees; and
- Secure spaces will be provided on-site for workers' supplies and tools so they do not have to be brought to the site each day.

Additional information on the Project's construction-period impacts is presented in Section 3.5 of this PNF.

2.6 Transportation Demand Management

The Proponent is committed to implementing Transportation Demand Management (TDM) measures that support the City's efforts to reduce dependency on the automobile by encouraging travelers to use alternatives to driving alone, especially during peak periods. TDM will be facilitated by the nature of the Project and its proximity to public transit and the Southwest Corridor.

The Proponent is prepared to take advantage of the site's convenient transit and pedestrian access to market to future residents. On-site management will provide transit information (schedules, maps, fare information) in the building lobbies for workers and visitors. On-site management will also work with new employees to raise awareness of public transportation alternatives.

Additional TDM measures may include, but are not limited to, the following:

- ***Bicycle Storage.*** The Project Proponent will provide secure bicycle storage available to residents, workers, and visitors.

- ***Bicycle Sharing.*** The Proponent is currently exploring the feasibility of providing a shared bicycle station on-site as part of the New Balance Hubway Boston bike share program.

- ***Electric Vehicle Charging Station.*** The Proponent is currently exploring the feasibility of providing up to one electric vehicle charging station on-site.

- ***Project Web Site.*** Inclusion of public transportation information for residents, workers, and visitors on the Project's Web Site.

- ***Tenant and Employee Orientation Packet.*** These packets will provide all new tenants with information concerning available TDM programs and public transportation in the area, including route maps, schedules, and fare information.

- ***Transportation Coordinator.*** The transportation coordinator will oversee transportation issues, including parking, residential move-in and move-out, and service and loading. The transportation coordinator will also work with residents and new tenants as they move in to raise awareness of public transportation alternatives.

- ***Shared Car Service.*** The proponent will explore the feasibility of providing a shared car service, (e.g. Zip Car).

Chapter 3.0
Environmental Protection Component

3.0 ENVIRONMENTAL PROTECTION COMPONENT

3.1 Solid and Hazardous Waste

3.1.1 Hazardous Waste

The Project site was formerly in industrial use, and an area near the MBTA right-of-way has evidence of the past release of oil or hazardous materials in excess of state standards. This condition will be addressed appropriately as part of the Project through a combination of testing, remediation and/or deed restrictions.

3.1.2 Operational Solid and Hazardous Waste Generation

The Project will generate solid waste typical of residential, retail and office development. Based on a generation rate of four pounds per bedroom per day and 5.5 tons per year per 1,000 sf of retail space (includes the approximately 1,200 sf retail/office portion within the self storage building), solid waste generated by the Project will be approximately 214.6 tons per year.

Solid waste will include wastepaper, cardboard, glass, bottles, food waste, and other waste typical of residential, retail and office uses. The residential buildings will include areas for trash collection and recycling collection. The self storage facility will include trash facilities at the self storage building's loading dock. A screened dumpster area for the retail component will be located at the south corner of the retail parking area. A trash collection area will also be located within the retail building.

With the exception of "household hazardous wastes" typical of these uses (e.g., cleaning fluids), hazardous wastes will not be generated.

3.1.3 Recycling

Recycling facilities will be provided on-site for paper, glass, plastic and metal. A central facility on lower floors of the building will be available for recycling efforts by building residents.

3.2 Water Quality/Stormwater Management

Please see Chapter 6 for a discussion of water quality impacts and stormwater management.

3.3 Flood Hazard Zones / Wetlands

The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map (FIRM) indicates the FEMA Flood Zone Designations for the site (City of Boston, Community-Panel Number 250286 0086 G). The map for the site shows that it is located in Zone X, "Areas determined to be outside the 0.2% annual chance (500-year) floodplain."

The site is developed and does not contain wetlands.

3.4 Geotechnical / Groundwater Impacts

3.4.1 Subsurface Conditions

Northeast Geotechnical, Inc. analyzed the soil conditions of the Project site. The general subsurface profile is generally consistent throughout the site and typically consists of urban fill material up to approximately nine feet thick overlying a natural glacial outwash sand deposit approximately three to eight feet thick. Buried natural topsoil and subsoil layers were occasionally found between the fill and the natural sand.

The urban fill is typically very loose to medium dense based on the Standard Penetration testing. The fill typically consists primarily of sand and silt mixed with debris including ash, slag, glass, asphalt, wood, brick and concrete.

The natural outwash sand is generally a medium dense to dense fine to coarse sand with variable silt and gravel content.

The outwash sand is typically underlain by an approximately seven to nine foot thick natural stratified sand and silt deposit that transitions into a natural clay and silt deposit approximately 24 to 44 feet thick. A relatively thick natural glacial till deposit is below the clay and silt.

The natural stratified sand and silt is consistently in a very loose to loose condition and typically varies from fine sand with little silt to silt with trace fine sand.

The natural clay and silt typically varies in consistency from very soft to stiff, and from silty clay to clayey silt.

The natural glacial till is generally medium dense to dense and typically consists of sand, silt and gravel of varying proportions.

Groundwater is generally encountered between approximately 8.5 to 10 feet below existing ground surface. Groundwater levels will fluctuate due to variations in temperature, precipitation and other factors. Therefore, groundwater levels at any time could be different than those reported herein. Long-term groundwater impacts are not anticipated since permanent dewatering is not expected to be required. Short-term, localized construction dewatering for some underground utility installations may be required. Significant off-site groundwater impacts from the potential short-term, localized dewatering efforts are not anticipated.

3.4.2 Foundation Methodology

It is anticipated that the proposed buildings will be constructed using shallow spread footings with slabs–on-grade. Where there is insufficient room to safely slope excavations, lateral earth support will be required. Once the final building locations and loads have been established along with the proposed finish slab elevations and site grading, additional test borings and possibly test pits may be performed to gather additional subsurface information across the site. Foundation and slab design and construction will be finalized at that time. Impacts from foundation construction will be limited because deep excavations are not anticipated for foundation construction and blasting is not expected.

Although the Project is not located in the Groundwater Conservation Overlay District (GCOD), the proponent will contact the Boston GroundWater Trust.

3.5 Construction Impacts

3.5.1 Introduction

A Construction Management Plan (CMP) in compliance with the City's Construction Management Program will be submitted to the Boston Transportation Department (BTD) once final plans are developed and the construction schedule is fixed. The construction contractor will be required to comply with the details and conditions of the approved CMP.

Proper pre-planning with the City and neighborhood will be essential to the successful construction of the Project. Construction methodologies, which ensure public safety and protect nearby residences, will be employed. Techniques such as barricades, walkways, and signage will be used. The CMP will include routing plans for trucking and deliveries, plans for the protection of existing utilities, and control of noise and dust.

Periodic meetings will also be held with neighborhood representatives to describe the ongoing work and to discuss measures that will be taken to minimize impacts on the community. The Project superintendent will contact abutters and close neighbors on a regular basis during the work.

During the construction phase of the Project, the Proponent will provide the name, telephone number and address of a contact person to communicate with on issues related to the construction. The construction contact will be a person whose sole responsibility it is to respond to the questions/comments/complaints of the residents of the neighborhoods.

The Proponent intends to follow the guidelines of the City of Boston and the MassDEP, which direct the evaluation and mitigation of construction impacts.

3.5.2 Construction Methodology/Public Safety

Construction methodologies that ensure public safety and protect nearby tenants will be employed. Techniques such as barricades and signage will be used. Construction management and scheduling will minimize impacts on the surrounding environment and will include plans for construction worker commuting and parking, routing plans for trucking and deliveries, and the control of noise and dust.

It may be necessary to occasionally occupy pedestrian walkways and parking lanes on the surrounding streets. As the design of the Project progresses, the Proponent will meet with BTD to discuss the specific location of barricades, the need for lane closures, pedestrian walkways, and truck queuing areas. Secure fencing, signage, and covered walkways and, if required, the suspension of the use of certain sidewalks during the most hazardous periods of overhead work activity during the construction of the superstructure, may be employed to ensure the safety and efficiency of all pedestrian and vehicular traffic flows. In addition, sidewalk areas and walkways near construction activities will be well marked and lighted to protect pedestrians and ensure their safety. Public safety for pedestrians on abutting sidewalks will also include covered pedestrian walkways when appropriate If required by BTD and the Boston Police Department, police details will be provided to facilitate traffic flow. These measures will be incorporated into the CMP which will be submitted to BTD for approval prior to the commencement of construction work.

3.5.3 Construction Schedule

Site work is anticipated to commence in the first quarter of 2012. It is anticipated that the Project will be completed in approximately 12 months.

Typical construction hours will be from 7:00 a.m. to 6:00 p.m., Monday through Friday, with most shifts ordinarily ending at 3:30 p.m. No substantial sound-generating activity will occur before 7:00 a.m. If longer hours, additional shifts, or Saturday work is required, the construction manager will place a work permit request to the Boston Air Pollution Control Commission and BTD in advance. Notification should occur during normal business hours, Monday through Friday. It is noted that some activities such as finishing activities could run beyond 6:00 p.m. to ensure the structural integrity of the finished product; certain components must be completed in a single pour, and placement of concrete cannot be interrupted.

3.5.4 Construction Staging/Access

Access to the site and construction staging areas will be provided in the CMP.

Although specific construction and staging details for have not been finalized, the Proponent and its construction management consultant will work to ensure that staging areas will be located to minimize impacts to pedestrian and vehicular flow. Secure fencing

and barricades will be used to isolate construction areas from pedestrian traffic adjacent to the site. Construction procedures will be designed to meet all Occupational Safety and Health Administration (OSHA) safety standards for specific site construction activities.

3.5.5 Construction Mitigation

The Proponent will follow City and MassDEP guidelines which will direct the evaluation and mitigation of construction impacts. As part of this process, the Proponent and construction team will evaluate the Commonwealth's Clean Air Construction Initiative.

A CMP will be submitted to BTD for review and approval prior to issuance of a Building Permit. The CMP will include detailed information on specific construction mitigation measures and construction methodologies to minimize impacts to abutters and the local community. The CMP will also define truck routes which will help in minimizing the impact of trucks on City and neighborhood streets.

"Don't Dump - Drains to Stony Brook Conduit" plaques will be installed at storm drains that are replaced or installed as part of the Project.

3.5.6 Construction Employment and Worker Transportation

The number of workers required during the construction period will vary. It is anticipated that approximately 250 construction jobs will be created over the length of construction. The Proponent will make reasonable good-faith efforts to have at least 50% of the total employee work hours be for Boston residents, at least 25% of total employee work hours be for minorities and at least 10% of the total employee work hours be for women. The Proponent will enter into a jobs agreement with the City of Boston.

To reduce vehicle trips to and from the construction site, minimal construction worker parking will be available at the site and all workers will be strongly encouraged to use public transportation and ridesharing options. The general contractor will work aggressively to ensure that construction workers are well informed of the public transportation options serving the area. Space on-site will be made available for workers' supplies and tools so they do not have to be brought to the site each day.

3.5.7 Construction Truck Routes and Deliveries

Truck traffic will vary throughout the construction period, depending on the activity. The construction team will manage deliveries to the site during morning and afternoon peak hours in a manner that minimizes disruption to traffic flow on adjacent streets. Construction truck routes to and from the site for contractor personnel, supplies, materials, and removal of excavations required for the development will be coordinated with BTD. Traffic logistics and routing will be planned to minimize community impacts. Truck access during construction will be determined by the BTD as part of the CMP. These routes will

be mandated as a part of all subcontractors' contracts for the development. The construction team will provide subcontractors and vendors with Construction Vehicle & Delivery Truck Route Brochures in advance of construction activity.

"No Idling" signs will be included at the loading, delivery, pick-up and drop-off areas.

3.5.8 Construction Air Quality

Short-term air quality impacts from fugitive dust may be expected during excavation and the early phases of construction. Plans for controlling fugitive dust during excavation and construction include mechanical street sweeping, wetting portions of the site during periods of high wind, and careful removal of debris by covered trucks. The construction contract will provide for a number of strictly enforced measures to be used by contractors to reduce potential emissions and minimize impacts, pursuant to this Article 80 approval. These measures are expected to include:

- Using wetting agents on areas of exposed soil on a scheduled basis;
- Using covered trucks;
- Minimizing spoils on the construction site;
- Monitoring of actual construction practices to ensure that unnecessary transfers and mechanical disturbances of loose materials are minimized;
- Minimizing storage of debris on the site; and
- Periodic street and sidewalk cleaning with water to minimize dust accumulations.

3.5.9 Construction Noise

The Proponent is committed to mitigating noise impacts from the construction of the Project. Increased community sound levels, however, are an inherent consequence of construction activities. Construction work will comply with the requirements of the City of Boston Noise Ordinance. Every reasonable effort will be made to minimize the noise impact of construction activities.

Mitigation measures are expected to include:

- Instituting a proactive program to ensure compliance with the City of Boston noise limitation policy;
- Using appropriate mufflers on all equipment and ongoing maintenance of intake and exhaust mufflers;

- Muffling enclosures on continuously running equipment, such as air compressors and welding generators;
- Replacing specific construction operations and techniques by less noisy ones where feasible;
- Selecting the quietest of alternative items of equipment where feasible;
- Scheduling equipment operations to keep average noise levels low, to synchronize the noisiest operations with times of highest ambient levels, and to maintain relatively uniform noise levels;
- Turning off idling equipment; and
- Locating noisy equipment at locations that protect sensitive locations by shielding or distance.

3.5.10 Construction Vibration

All means and methods for performing work at the site will be evaluated for potential vibration impacts on adjoining property, utilities, and adjacent existing structures. Acceptable vibration criteria will be established prior to construction, and vibration will be monitored, if required, during construction to ensure compliance with the agreed-upon standard.

3.5.11 Construction Waste

The Proponent will take an active role with regard to the reprocessing and recycling of construction waste. The disposal contract will include specific requirements that will ensure that construction procedures allow for the necessary segregation, reprocessing, reuse and recycling of materials when possible. For those materials that cannot be recycled, solid waste will be transported in covered trucks to an approved solid waste facility, per MassDEP Regulations for Solid Waste Facilities, 310 CMR 16.00. This requirement will be specified in the disposal contract. Construction will be conducted so that materials that may be recycled are segregated from those materials not recyclable to enable disposal at an approved solid waste facility.

3.5.12 Protection of Utilities

Existing public and private infrastructure located within the public right-of-way will be protected during construction. The installation of proposed utilities within the public way will be in accordance with the MWRA, BWSC, Boston Public Works, Dig Safe, and the governing utility company requirements. All necessary permits will be obtained before the

commencement of the specific utility installation. Specific methods for constructing proposed utilities where they are near to, or connect with, existing water, sewer and drain facilities will be reviewed by BWSC as part of its site plan review process.

3.5.13 Rodent Control

A rodent extermination certificate will be filed with each building permit application to the City. Rodent inspection monitoring and treatment will be carried out before, during, and at the completion of all construction work in compliance with the City's requirements. Rodent extermination prior to work start-up will consist of treatment of areas throughout the site. During the construction process, regular service visits will be made.

3.5.14 Wildlife Habitat

The site is currently developed and, as such, the development will not impact wildlife habitats as shown on the National Heritage and Endangered Species Priority Habitats of Rare Species and Estimated Habitats of Rare Wildlife.

3.6 Sustainable Design

This section provides a discussion of the sustainability efforts the Proponent will pursue related to each building within the Project.

The Proponent is committed to developing buildings that are sustainably designed, energy efficient, environmentally conscious and healthy for residents, staff of the commercial properties and the public. As required under Article 37 of the Boston Zoning Code, projects that are subject to Article 80B, Large Project Review, will be Leadership in Energy and Environmental Design (LEED) certifiable. There are seven categories in the LEED certification guidelines: Sustainable Sites, Water Efficiency, Energy and Atmosphere, Materials and Resources, Indoor Environmental Quality, Innovation in Design Process and the additional Regional Priority Credits. The Project is targeting several credits which span the seven categories and enable the Project to meet the zoning requirement as described below. The preliminary LEED checklist for each building is included in Appendix C. The credits that the buildings may achieve may change as the design evolves.

3.6.1 Residential Buildings

The residential portion of the Project is anticipated to meet the Certified Certification threshold with 47 credit points for the primary residential building and 46 credit points for each triplex. The credits that each of the residential buildings is anticipated to achieve are the same, except that the triplexes are not anticipated to achieve the Credit 7.2 under Sustainable Sites. Credits that are still being studied are italicized.

Sustainable Sites

The Project site is in a dense urban neighborhood close to several public transportation options. The proposed design includes three residential buildings.

Prerequisite 1 Construction Activity Pollution Prevention

The Construction Manager will submit and implement Erosion and Sedimentation Control (ESC) Plan for construction activities related to the demolition of existing and the construction of the new buildings. The ESC Plan will conform to the erosion and sedimentation requirements of the 2003 EPA Construction General Permit and specific municipal requirements for the City of Boston.

Credit 1 Site Selection

The Project site is located on previously developed urban site parcels in Boston Proper.

Credit 2 Development Density and Community Connectivity

The Project site is in the Jamaica Plain neighborhood of Boston bordering on the Dorchester/Roxbury neighborhood. The surrounding community is replete with housing, restaurants, shops, grocery stores, educational and religious institutions, performance venues and other community amenities. In addition, the Jamaica Plain Public Library is a short walk away.

Credit 3 Brownfield Redevelopment

The Project site may be classified as a Brownfield Site and will be assessed for hazardous materials.

Credit 4.1 Alternative Transportation, Public Transportation Access

The Forest Hills Orange line MBTA subway station and Needham Line are located approximately 0.3 miles from the Project site. There is a bus stop outside the subway station that functions as a hub/transfer station for several bus routes many of which pass directly by or in close proximity to the Project site. Other MBTA stations in close proximity include the 42 bus line just 0.1 mile from the Project site.

Credit 4.2 Alternative Transportation, Bicycle Storage & Changing Rooms

The primary residential building will have covered storage facilities for securing bicycles at the entrance of the premises at a minimum of 15% of building occupancy. Bicycle storage will be included within the design of the triplexes.

Credit 4.3 Alternate Transportation, Low-Emitting and Fuel-Efficient Vehicles

The residential portion of the Project site will have 5% of the total parking capacity dedicated for Low-Emitting & Fuel-Efficient Vehicles.

Credit 4.4 Alternate Transportation, Parking Capacity

The residential portion of the Project site will have a designated carpool drop-off area at the parking lot adjacent to the triplexes.

Credit 5.2 Site Development, Maximize Open Space

The Project will promote biodiversity by providing a vegetated roof area on the primary residential building and is also situated in an urban area. It is in lines of SS Credit 2: Development Density & Community Connectivity. A minimum of 25% will be dedicated to vegetated open spaces.

Credit 6.1 Stormwater Design, Quantity Control

The residential portion of the Project will have a stormwater management plan that will be implemented for the development. The site will also exceed the pre-development peak discharge rate and quantity for the one and two year 24-hour design storms.

Credit 6.2 Stormwater Design, Quality Control

The residential portion of the Project will have a stormwater management plan that will be implemented for development to ensure that it captures and treats the stormwater runoff from 90% of the average annual rainfall.

Credit 7.1 Heat Island Effect, Non-Roof

The Project may provide shade to the sidewalk via canopy tree planting methods. In addition, more than 50% of parking spaces will be in the parking garage and will meet or exceed SRI value limits.

Credit 7.2 Heat Island Effect, Roof

The roof of the proposed primary residential building will be a light colored roofing system to reflect sunlight and reduce heat gain. The primary residential building will also have planted area of vegetation located on the roof.

Credit 8 Light Pollution Reduction

The residential designs will reduce the input power of all non-emergency luminaires that are in the direct line of sight to any opening in the residential portion of the Project by 50% between 11:00 p.m. and 5:00 a.m. via sensors. The sensors will also have a manual

override for after hours in case needed. The exterior lighting falls under the LZ2: Low bracket; the residential portion of the Project will adhere to all guidelines necessary for the LZ2 low criteria.

Water Efficiency

The residential designs will specify low flow and high efficiency plumbing fixtures to achieve Water Efficiency.

Prerequisite 1 Water Use Reduction, 20% Reduction

Through the use of low flow and high efficiency plumbing fixtures, the residential designs will implement water use reduction strategies that use 20% less water than the water use baseline calculated for the buildings (not including irrigation) after meeting Energy Policy Act of 1992 fixture performance requirement.

Credits 1 Water Efficient Landscaping, Reduce by 50%

The residential portion of the Project will reduce water consumption for irrigation by 50% to attribute towards the plant species, density and microclimate factor.

Credit 3 Water Use Reduction

Specified fixtures will include high efficiency toilets and urinals, low flow lavatory faucets and ultra low flow shower heads. The goal is an overall water savings of 35% above the calculated baseline.

Energy and Atmosphere

The building systems will be designed to optimize energy performance and will not use refrigerants that are harmful to the environment. The owner will engage a Commissioning Agent to confirm the building systems are installed and function as intended and designed.

Prerequisite 1 Fundamental Commissioning of the Building Energy Systems

A third party Commissioning Agent (CxA) will be engaged by the owner for purposes of providing both basic and enhanced commissioning services for the building energy related systems including heating, ventilation, air condition, and refrigeration (HVAC & R), lighting and domestic hot water systems. The CxA will verify the building systems are installed, calibrated and performing to the building owner's requirements.

Prerequisite 2 Minimum Energy Performance

The building performance rating will demonstrate a minimum of a 10% improvement compared to the baseline building performance calculated using the rating method in Appendix G of ANSI/ASHREA/IESNA Standard 90.1-2007. A whole building energy simulation will demonstrate the projected energy savings for the residential buildings.

Prerequisite 3 Fundamental Refrigerant Management

The specifications for refrigerants used in the building HVAC & R systems will NOT permit the use of CFC based refrigerants.

Credit 1 Optimize Energy Performance

The proposed building systems will target a performance level of a minimum of 22% improvement over a baseline building performance rating. The team will develop a whole building energy model to demonstrate the expected performance rating of the designed building systems.

Materials and Resources

Throughout the construction phase of the residential buildings, the contractor will endeavor to divert construction and demolition waste from area landfills and procure materials that have recycled content and/or are manufactured locally.

Prerequisite 1 Storage and Collection of Recyclables

Storage of collected recyclables will be accommodated throughout the primary building and for the triplexes.

Credit 2 Construction Waste Management

This residential portion of the Project will have demolition debris and a construction waste management plan will be developed that will salvage/recycle a minimum of 50% of the debris.

Credits 4 Recycled Content 10%

The residential portion of the Project will require materials to include pre- and or post-consumer recycled content. During construction, materials submittals will include a document indicating the percentage of both pre and post-consumer recycled content. The CM will track the recycled content for each material with a goal to achieve 10% recycled-content materials based on overall materials costs.

Credit 5 Regional Materials

The residential buildings will use materials that are extracted, harvested, recovered and manufactured within a 500 mile radius of the job site. The goal is that 10% of the materials used will be regional materials. The CM will track the source location for each material with a target to achieve 10% regional materials based on overall costs.

Indoor Environmental Quality

The air quality will be monitored during the construction phase and likely prior to occupancy. Low emitting materials will be used throughout the construction to maintain and improve air quality. The occupants of the buildings will be able to maintain a comfortable environment through access to thermal and lighting controls.

Prerequisite 1 Minimum IAQ Performance

The mechanical systems are designed to meet or exceed the requirements of ASHRAE Standard 61.1-2007 sections 4 through 7 and/or applicable building codes.

Prerequisite 2 Environmental Tobacco Smoke (ETS) Control

The buildings will be non-smoking environments.

Credit 4.1 Low-Emitting Materials- Adhesives & Sealants

The designs will employ adhesive and seal that are to meet the low Volatile Organic Compounds (VOC) criteria for adhesives and sealants.

Credit 4.2 Low-Emitting Materials- Paints & Coating

The buildings will include requirements for paints and coating to meet low VOC criteria for paints and coatings.

Credit 4.3 Low-Emitting Materials, Flooring System

The buildings will include a hard surface flooring material that will be FloorScore certified and use carpet systems that will comply with the Carpet Institute of Green Label Program.

Credit 6.1 Controllability of Systems, Lighting

It is the intent of the design to provide individual lighting controls for regularly occupied spaces. The controls may include vacancy/occupancy sensors and day light dimming controls. The lighting system will be designed to include regular vacancy/occupancy spaces.

Credit 6.2 Controllability of Systems, Thermal Comfort

It is the intent of the design to provide individual programmable temperature controls to all occupied spaces in the buildings.

Credit 8.1 Daylight & Views, Daylight for 75% of the spaces

It is the intent of the design to locate regularly occupied spaces of the buildings to be provided with ample vision glasses to achieve daylight for 75% of the areas.

Credit 8.2 Daylight & Views, Daylight for 90% of the spaces

It is the intent of the design to locate regularly occupied spaces of the buildings to be provided with ample vision glasses to achieve daylight for 90% of the areas.

Innovation & Design Processes

The team has identified several possible ID credits which are listed below, (limited to five ID credits total).

Credit 1 Exemplary Performance for SSc4.1

The Project site is located on several bus routes with a frequency of service resulting in over 200 transit rides per day.

Regional Priority Credits

Regional Priority Credits (RPC) are established LEED credits designated by the USGBC to have priority for a particular area of the country. When a project team achieves one of the designated RPCs, an additional credit is awarded to the project. RPCs applicable to the Boston area include: SSc3, SSc6.1, and EAc2. This project anticipates three RPCs: SSc3 Brownfield Redevelopment, SSc6.1-Stormwater Design, Quantity Control, and EAc2 On Site Renewable Energy.

3.6.2 Retail Building

The retail building is anticipated to meet the Certified Certification threshold with 44 credit points. However, there are three credits, listed in italics below, still being considered to determine if appropriate.

Sustainable Sites

The site is in a dense urban neighborhood close to several public transportation options. The proposed design includes a 28,000 sf retail building.

Prerequisite 1 Construction Activity Pollution Prevention

The Construction Manager will submit and implement Erosion and Sedimentation Control (ESC) Plan for construction activities related to the demolition of existing and the construction of the new building specific to this building. The ESC Plan will conform to the erosion and sedimentation requirements of the 2003 EPA Construction General Permit and specific municipal requirements for the City of Boston.

Credit 1 Site Selection

The site is located on previously developed urban site parcels in Boston Proper.

Credit 2 Development Density and Community Connectivity

The site is in the Jamaica Plain neighborhood of Boston. The surrounding community is replete with housing, restaurants, shops, grocery stores, educational and religious institutions, performance venues and other community amenities. In addition, the McBride/Boynton Streets Community Garden is a short walk away.

Credit 3 Brownfield Redevelopment

The site will be classified as a Brownfield Site and will be assessed for hazardous materials.

Credit 4.1 Alternative Transportation, Public Transportation Access

The MBTA Orange Line's Green St. Station is located approximately 0.4 miles from the self storage site. There are several bus routes which pass directly by or in close proximity to the self storage site. Other MBTA stations in close proximity include the Forest Hills Station (0.6 miles), and the Centre St. @ Eliot St. Station (0.6 miles).

Credit 4.3 Low Emitting Fuel Efficient Vehicles

5% of the total parking will be designated for preferred parking for low emitting fuel efficient vehicles.

Credit 4.4 Alternate Transportation Parking Capacity

5% of the total parking will be designated for preferred parking for carpools or vanpools.

Credit 6.2 Stormwater Design, Quality Control

The stormwater will be treated prior to release into the municipal storm sewer system as described in Section 6.3.

Credit 7.2 Heat Island Effect, Roof

The building will include a high-albedo roof membrane with an SRI of 78 minimum for low sloped roofs, covering minimum of 75% of the roof area.

Credit 8 Light Pollution Reduction

For the interior, all non-emergency lighting will be closed or reduced by 50% between 11:00 p.m. and 5:00 a.m. For the exteriors, the building will not exceed 80% (50% building/features) of lighting power densities per IESNA 90.1-2004. The building will be defined per IESNA RP-33: LZ2.

Water Efficiency

The building design will specify low flow and high efficiency plumbing fixtures to achieve Water Efficiency.

Prerequisite 1 Water Use Reduction, 20% Reduction

Through the use of low flow and high efficiency plumbing fixtures, the building design will implement water use reduction strategies that use 20% less water than the water use baseline calculated for the building (not including irrigation) after meeting Energy Policy Act of 1992 fixture performance requirements.

Credits 1.1 and 1.2 Water Efficient Landscaping, Reduce by 50%, No Potable Use or No Irrigation

The planting plan for this site includes groundcovers, shrubs, and trees native and adapted to the local ecosystem. The site will not have a permanent irrigation system.

Credit 3 Water Use Reduction

Specified fixtures will include high efficiency toilets and urinals, low flow lavatory faucets and ultra low flow shower heads. The goal is an overall water savings of 30% above the calculated baseline.

Energy and Atmosphere

The building systems will be designed to optimize energy performance and will not use refrigerants that are harmful to the environment. The owner will engage a Commissioning Agent to confirm the building systems are installed and function as intended and designed.

Prerequisite 1 Fundamental Commissioning of the Building Energy Systems

A third party Commissioning Agent (CxA) will be engaged by the owner for purposes of providing both basic and enhanced commissioning services for the building energy related systems including heating, ventilation, air conditioning, and refrigeration (HVAC & R), lighting and domestic hot water systems. The CxA will verify the building systems are installed, calibrated and performing to the building owner's requirements.

Prerequisite 2 Minimum Energy Performance

The building performance rating will demonstrate a minimum of a 14% improvement compared to the baseline building performance calculated using the rating method in Appendix G of ANSI/ASHREA/IESNA Standard 90.1-2007. A whole building energy simulation will demonstrate the projected energy savings for the building.

Prerequisite 3 Fundamental Refrigerant Management

The specifications for refrigerants used in the building HVAC & R systems will NOT permit the use of CFC based refrigerants.

Credit 1 Optimize Energy Performance

The proposed building systems will target a performance level of a minimum of 10% improvement over a baseline building performance rating. The team will develop a whole building energy model to demonstrate the expected performance rating of the designed building systems.

Materials and Resources

Throughout the construction phase of the building, the contractor will endeavor to divert construction and demolition waste from area landfills and procure materials that have recycled content and/or are manufactured locally.

Prerequisite 1 Storage and Collection of Recyclables

Easily-accessible storage of collected recyclables will be provided for the entire building.

Credits 2.1 and 2.2 Construction Waste Management

Prior to the start of construction, the Construction Manager (CM) will prepare a Construction Waste Management plan. The CM will endeavor to divert as much demolition debris and construction waste from area landfills as possible with a goal of achieving 75% diversion.

Credits 4.1 and 4.2 Recycled Content 10% (post-consumer & ½ pre-consumer)

The building specifications will require materials to include pre- and or post-consumer recycled content. During construction, materials submittals will include a document indicating the percentage of both pre- and post-consumer recycled content. The CM will track the recycled content for each material with a goal to achieve 20% recycled-content materials based on overall materials costs.

Credit 5.1 Regional Materials, 10% Extracted, Processed and Manufactured Regionally

The building specifications will indicate which materials are to be extracted, harvested, recovered and manufactured within a 500 mile radius of the job site. The goal is that 10% of the materials used be regional materials. The CM will track the source location for each material with a target to achieve 10% regional materials based on overall materials costs.

Indoor Environmental Quality

The air quality will be monitored during the construction phase of the building and likely prior to occupancy. Low emitting materials will be used throughout construction to maintain and improve air quality. The building occupants will be able to maintain a comfortable environment through access to thermal and lighting controls.

Prerequisite 1 Minimum IAQ Performance

The building mechanical systems are designed to meet or exceed the requirements of ASHRAE Standard 61.1-2007 sections 4 through 7 and/or applicable building codes.

Prerequisite 2 Environmental Tobacco Smoke (ETS) Control

The building will be a non-smoking environment.

Credit 1 Outdoor Air Delivery Monitoring

The building will incorporate permanent CO_2 sensors and measuring devices to provide feedback on the performance of the HVAC system. Devices will be programmed to generate an alarm when the conditions vary by 10% from a set point.

Credits 4.1 Low-Emitting Materials, Adhesives & Sealants

The specifications will include requirements for adhesives and sealants to meet low Volatile Organic Compounds criteria for adhesives and sealants.

Credits 4.2 Low-Emitting Materials, Paints and Coatings

The specifications will include requirements for paints and coatings to meet low VOC criteria for paints and coatings.

Credits 4.3 Low-Emitting Materials, Flooring Systems

The specifications will include requirements for hard surface flooring materials to be FloorScore certified and carpet systems will comply with the Carpet Institute Green label program.

Credit 4.4 Low Emitting Materials, Composite Wood and Agrifiber Products

The Proponent will endeavor to use composite wood and Agrifiber products that contain no added urea-formaldehyde.

Credit 5 Indoor Chemical and Pollutant Source Control

The Proponent will design to minimize and control the entry of pollutants into the building and to contain chemical use areas.

Innovation & Design Processes

The team has identified several possible ID credits which are listed below, (limited to five ID credits total).

Credit 1 Exemplary Performance for SSc4.1

The site is located on several bus routes with a frequency of service resulting in over 200 transit rides per day.

Credit 2 LEED Accredited Professional (required ID credit for LEED certification)

A LEED AP will provide administrative services to oversee the LEED credit documentation process.

Additional ID credits under consideration

Exemplary Performance for MRc2.2 Construction Waste Management: Due to the high volume of demolition debris, there is a high likelihood the CM could divert 95% of the construction waste by weight from area landfills.

Green Housekeeping: Building Facilities/Maintenance will implement a cleaning program that uses 'green' cleaning products.

Low Mercury lighting: Building Facilities/Maintenance will establish a lighting purchasing plan to limit the levels of mercury containing lamps purchased for the building.

3.6.3 Self Storage Building

The self storage building is anticipated to meet the Certified Certification threshold with 42 credit points. However, there are two credits, listed in italics below, still being considered to determine if appropriate.

Sustainable Sites

The self storage site is in a dense urban neighborhood close to several public transportation options. The proposed design includes an approximately 130,000 sf self-storage facility. The storage facility will have approximately 1,233 self-storage units for rent by the public.

Prerequisite 1 Construction Activity Pollution Prevention

The Construction Manager will submit and implement an Erosion and Sedimentation Control (ESC) Plan for construction activities related to the demolition of existing and the construction of the new building. The ESC Plan will conform to the erosion and sedimentation requirements of the 2003 EPA Construction General Permit and specific municipal requirements for the City of Boston.

Credit 1 Site Selection

The self storage site is located on previously developed urban site parcels in Boston Proper.

Credit 2 Development Density and Community Connectivity

The self storage site is in the Jamaica Plain neighborhood of Boston. The surrounding community is replete with housing, restaurants, shops, grocery stores, educational and religious institutions, performance venues and other community amenities. In addition, the McBride/Boynton Streets Community Garden is a short walk away.

Credit 3 Brownfield Redevelopment

The self storage site will be classified as a Brownfield Site and will be assessed for hazardous materials.

Credit 4.1 Alternative Transportation, Public Transportation Access

The MBTA Orange Line's Green St. Station is located approximately 0.4 miles from the self storage site. There are several bus routes which pass directly by or in close proximity to the self storage site. Other MBTA stations in close proximity include the Forest Hills Station (0.6 miles), and the Centre St. @ Eliot St. Station (0.6 miles).

Credit 4.3 Low Emitting Fuel Efficient Vehicles

5% of the total parking will be designated for preferred parking for low emitting fuel efficient vehicles.

Credit 4.4 Alternate Transportation Parking Capacity

5% of the total parking will be designated for preferred parking for carpools or vanpools.

Credit 6.2 Stormwater Design, Quality Control

The stormwater will be treated prior to release into the municipal storm sewer system as described in Section 6.3.

Credit 7.2 Heat Island Effect, Roof

The self storage building will include a high-albedo roof membrane with an SRI of 78 minimum for low sloped roofs, covering a minimum of 75% of the roof area.

Credit 8 Light Pollution Reduction

For the interior, all non-emergency lighting will be closed or reduced by 50% between 11:00 p.m. and 5:00 a.m. For the exteriors, the self storage building will not exceed 80% (50% building/features) of lighting power densities per IESNA 90.1-2004. The self storage building will be defined per IESNA RP-33: LZ2.

Water Efficiency

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The planting plan for this site includes groundcovers, shrubs, and trees native and adapted to the local ecosystem. The site will not have a permanent irrigation system.

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Specified fixtures will include high efficiency toilets and urinals, low flow lavatory faucets and ultra low flow showerheads. The goal is an overall water savings of 30% above the calculated baseline.

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The building systems will be designed to optimize energy performance and will not use refrigerants that are harmful to the environment. The owner will engage a Commissioning Agent to confirm the building systems are installed and function as intended and designed.

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Credits 4.3 Low-Emitting Materials, Flooring Systems

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A LEED AP will provide administrative services to oversee the LEED credit documentation process.

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Low Mercury lighting: Building Facilities/Maintenance will establish a lighting purchasing plan to limit the levels of mercury containing lamps purchased for the building.

Chapter 4.0
Urban Design

4.0 URBAN DESIGN

4.1 Urban Design Context

The Project site is located in the Jamaica Plain neighborhood of Boston on the southwestern edge of the neighborhood approximately one-quarter mile from the southern terminus of the MBTA Orange Line at Forest Hills. The area is a continuation of the linear commercial/industrial zone that extends south from the City along the corridor between Washington Street and the Orange Line right-of-way. It is characterized by low-rise one to three story commercial buildings and light industrial occupancies interspersed with single and multi-family housing. Figure 4-1 shows the existing conditions of the site.

Although the urban center of Forest Hills and the MBTA station are nearby, they are visually separated by an elevated segment of the Monsignor William J. Casey overpass south of the Project site. A one-story car wash and the MBTA bus yards front Washington Street opposite the site. English High School and associated athletic fields are located north of the site across McBride Street. The MBTA bus yard has been identified by the BRA as a mixed-use redevelopment parcel, and the long-range urban development goals for the area are to extend low-rise, mixed use development along the Washington Street corridor and to remove physical barriers, such as the Casey overpass, to enhance connections to Forest Hills.

4.2 Streetscape/Neighborhood

The Project site and its immediate surroundings include commercial and industrial areas and a MBTA bus facility. A dense, cohesive residential area is located to the west, while smaller residential areas and large open spaces (Forest Hills Cemetery, Franklin Park and Arnold Arboretum) are located to the east, south and southwest. The small residential area abutting the site is isolated, has limited open space, and is cut off from access to the Southwest Corridor greenway. Figure 4-2 shows the Project location and the surrounding area.

The Project site's layout provides frontage on the primary commercial and vehicular arterial for the neighborhood, on an important secondary street that provides a cross connection over the Orange Line right-of-way, and on a tertiary residential street. These very different contexts provide opportunities to divide the site into three different uses each of which will be designed to strengthen and respond to their surroundings.


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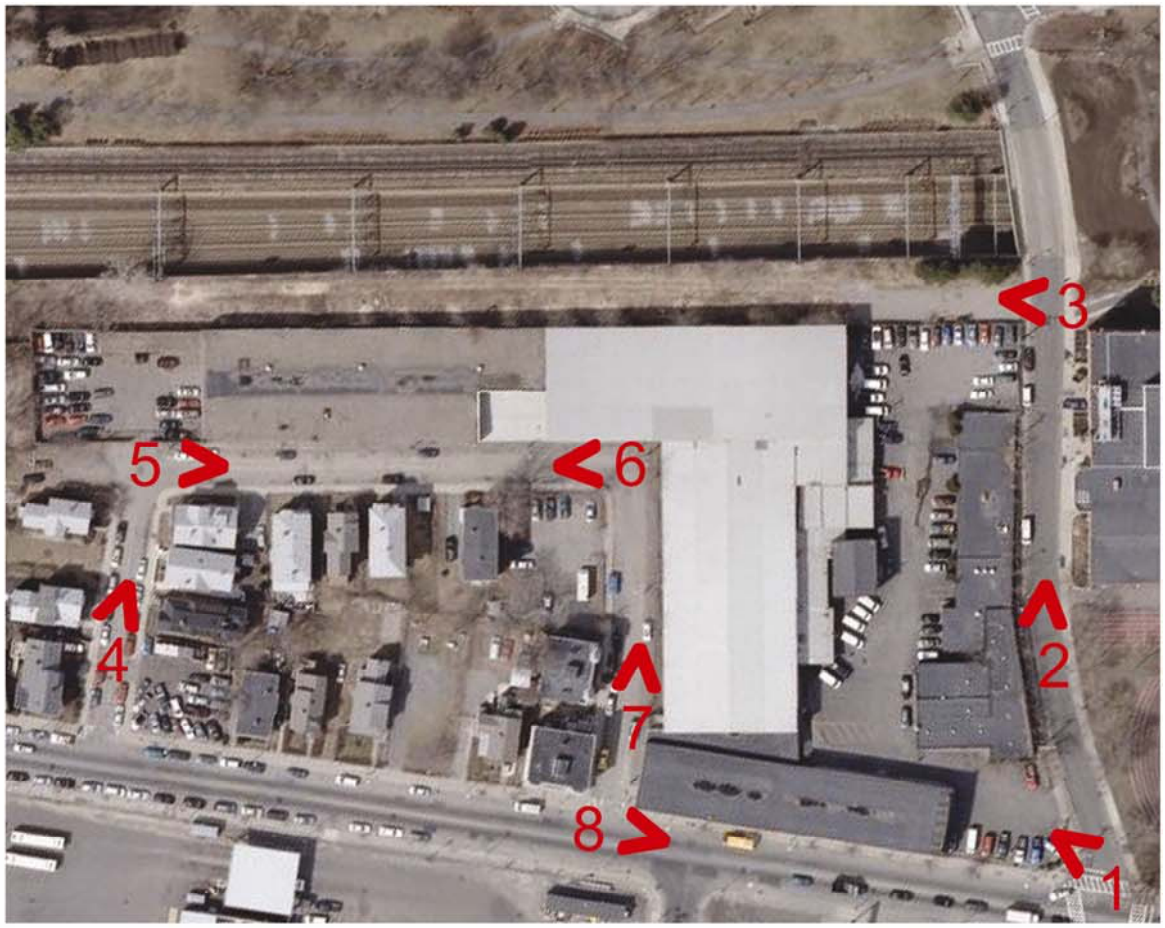

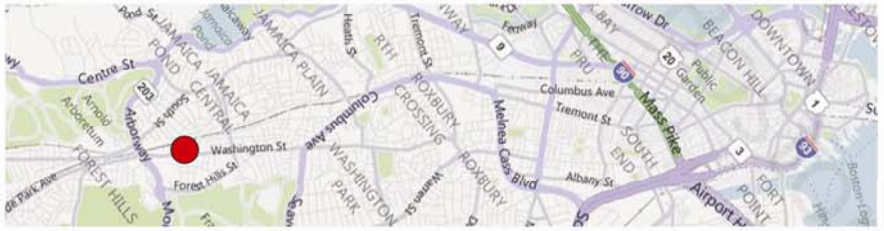

3521-3529 Washington Street Boston, MA

GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 4-1

Existing Conditions

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3521-3529 Washington Street Boston, MA

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Figure 4-2
Project Locus Map

4.3 Project Composition

The site includes a retail building on the corner of Washington and McBride Streets, a self storage building west of the retail building, a three-story residential building with a partially below-grade parking garage on the southern side of the site adjacent to the MBTA right-of-way, and two triplexes between the larger residential building and the self storage building (see Figure 4-3).

The two-story retail building located on Washington Street will anchor the corner of the site and establish a strong architectural edge along the street. The corner itself will be landscaped to buffer on-street parking on Washington and McBride Streets, and to soften the transition to the side street and the athletic fields and open space across McBride Street. This area also includes an outdoor seating area.

The Project acknowledges both the vehicular and pedestrian character of the Project area with off street parking for commercial and retail tenants, and pedestrian and vehicular access from McBride and Burnett Streets.

Well-marked crossings and expanded curbs and sidewalk perimeters will provide clear definition of crosswalks and both internal and on-street parking areas. Bike racks and enclosed rubbish collection centers will provide secure, discrete containment. Broader, better landscaped sidewalks and green spaces will improve transitions between commercial and residential uses. The site layout encourages a stronger connection between the Burnett Street neighborhood and nearby recreational and open space areas. The layout of parking and vehicular circulation encourages access within the site and minimizes travel on residential portions of the site.

Parking for both the commercial and retail buildings is located between the two buildings, away from the street edge. Generous plantings and low site walls help to define and soften parking areas, and the parking is laid out to provide a buffer between the existing residential buildings on Burnett Street and the new development. Cross movement through the site from Burnett is encouraged providing much-desired mid-block access to McBride Street for residents. The landscaped corner at McBride and Washington Streets will provide a pedestrian friendly intersection, and landscaping and sidewalk improvements will continue along the site, up McBride Street, to provide a continuous pedestrian path and link to the Southwest Corridor Park and neighborhoods to the west.

The retail component is sited tightly to the public sidewalk to strengthen the street wall and to define the corner of the site. The two-story height is an appropriate scale that supports and extends existing three-story residential buildings adjacent and across the street. A multi-tenanted building with a mix of uses and types of occupancy is anticipated. Leasing goals include occupancy that extends into evenings and weekends to foster a vibrant and active streetscape. The taller and larger commercial self-storage building is located adjacent to the MBTA right-of-of, away from the more commercial Washington Street, and takes

advantage of the rising grade along McBride Street and the adjacent five-story high school building to minimize the appearance of its height and footprint. Figures 1-2 through 1-5 shows the elevation of the retail and self storage buildings.

The triplexes will be similar in height and style to the homes across Burnett Street, will have similar setbacks from the street as the existing homes in the area, and front entrances toward the street. Parking will be located on a surface parking lot north of the triplexes, adjacent to the MBTA right-of-way. The three-story residential building will also be similar in height to the existing residences and set back from the street. The front façade is broken up into sections with portions reflective of the facades of the triplexes and existing homes. The parking garage beneath the building will be partially below-grade to minimize the visual impact of the parking garage on pedestrians. The garage level of the building has been carefully designed and integrated into the building elevations by designing the louvers that ventilate the garage to match the rhythm of the windows above and extensive dense landscaping along the length of the building at grade level will lessen the parking garage's visual impact on the pedestrian experience. Figures 1-6 and 1-7 shows elevations of the residential buildings.

The main entrance of the three-story residential building fronts Burnett Street, while vehicular access to the underground garage is from either side of the building. On the southern side of the Project site, a new open space will be developed that will welcome the new and existing residents.

4.4 Building Character

Although principal access to both the commercial storage and retail will be from the parking areas, additional tenant entrances are proposed along Washington Street and at the corner of McBride Street. Punched window openings and glazed curtainwall combined with terra cotta brick units, corrugated and smooth metal panel, and semi-transparent screen material will be used to articulate both the street and parking facades of the retail building.

The commercial storage facility will have a glazed, highlighted entrance at the northeast corner of the building that will clearly identify the customer service portion of the building. Materials will be a combination of split face block, corrugated and smooth metal panel, aluminum storefront, and semi-transparent mesh panels. The secure loading area will be partially incorporated within the building footprint. The stainless steel mesh panels located at the entrance will have a graduated openness that will be backlit to provide a welcoming and active entrance. Additional screens are located at the southern end of the west elevation and along the south elevation to support vegetated panels, providing a transition to the residential area along Burnett Street.

3521–3529 Washington Street Boston, MA

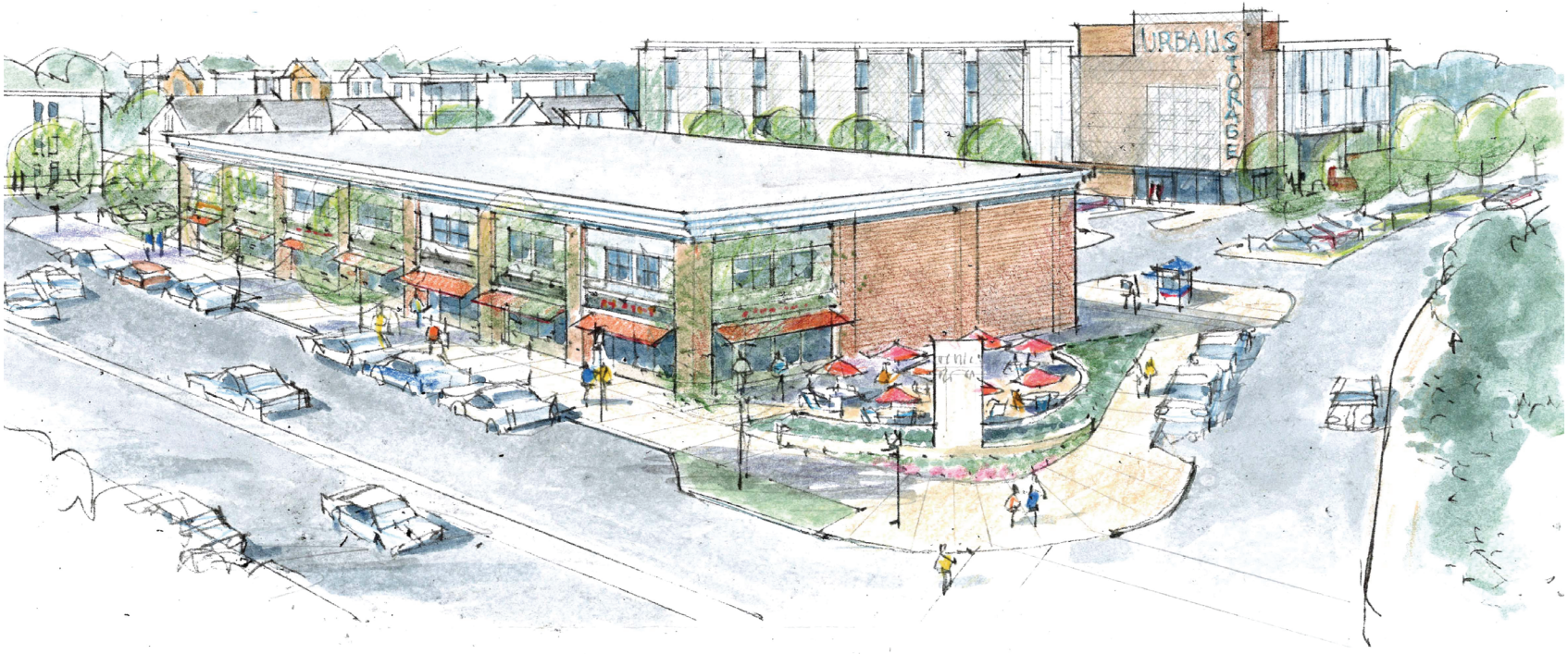
kzla
Kick Landscape Architecture, Inc.

Figure 4-3
Site Plan

The residential building will be wood framed construction, over a steel and concrete deck podium within which will be the parking garage. The façade of the building will include clapboard siding with various exposures, finishes and colors, as well as double hung windows, to relate to the surrounding residential context. The garage will be screened and planting beds will be included around the perimeter of the building. The entrance will be on Burnett Street, via a terraced, covered entry with a courtyard between the street and the building in the middle of the building. The building has been sited to create open landscaped green space for use by the building tenants. In addition, a roof garden is being studied as an amenity to building tenants.

The triplex buildings will be wood framed with clapboard exterior siding and double hung windows. Each triplex will closely reflect the design elements of the existing triplex buildings across Burnett Street.

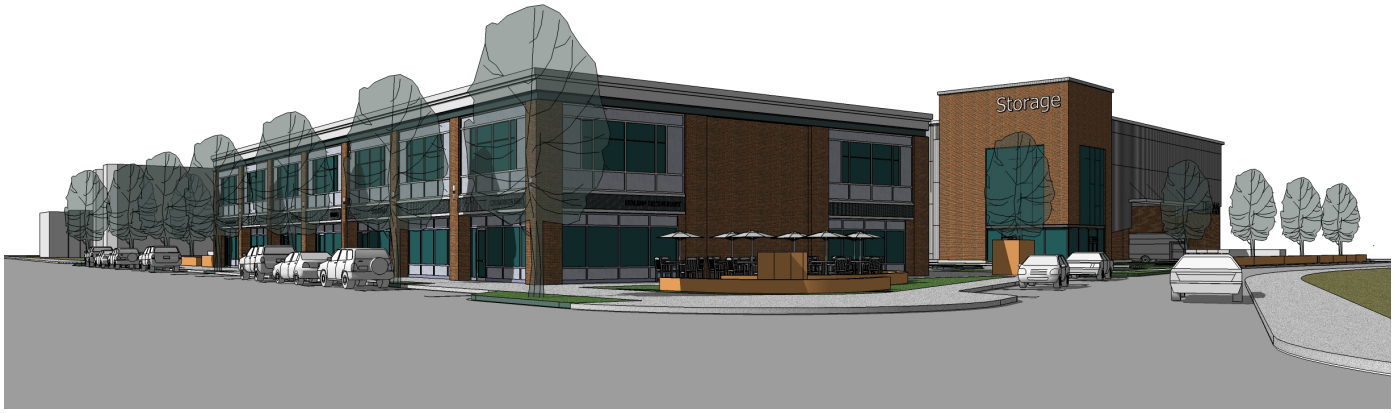
Figures 4-4 to 4-6 show renderings of the proposed Project.



3521–3529 Washington Street Boston, MA

GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 4-4
Retail Storage Rendering



3521–3529 Washington Street Boston, MA

GOODY CLANCY ARCHITECTURE PLANNING PRESERVATION

Figure 4-5
View from McBride and Washington Streets

3521-3529 Washington Street Boston, MA

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99cambridge

Figure 4-6
View Along Burnett Street

Chapter 5.0
Historic and Archaeological Resources

5.0 HISTORIC RESOURCES

The Project site is currently occupied by several one- and two-story metal clad warehouse buildings, believed to date from the mid-20th century. The remainder of the site is covered with bituminous concrete pavement. Adjacent to the Project site is a residential neighborhood consisting of late 19th century and early 20th century multi-family residences.

5.1 Historic Resources in the Vicinity

Olmsted Park System, Sections of the Back Bay Fens and the Emerald Necklace Parks

The Back Bay Fens and the Emerald Necklace Parks were designed by Frederick Law Olmsted as part of the Boston Park System. Landscaped as a park, the Muddy River runs through the Fens, and a conduit was created to carry the overflow of Stony Brook to the Muddy River. To accommodate the various city streets in the area, several bridges were also constructed through the Fens and Emerald Necklace Parks. Simple in design, the Fens consists of a passive park of walkways and a bridle path. When the Charles River dam was completed in 1910, the salt water marshes began to die and three of the large marshes on the southern half of the Fens were filled, and the Victory Garden, part of Olmsted's original design, was reconfigured in the early 20th century for playing fields. The Emerald Necklace Parks are similar in design to the Fens. The portion of the Emerald Necklace Park system closest to the Project site includes the Arborway, a tree-lined parkway connecting segments of the park system, which is approximately a quarter mile from the Project site.

Sumner Hill Historic District

The Sumner Hill Historic District occupies a portion of the hilly spine of Jamaica Plain that runs roughly north/south between Centre Street and the Stony Brook Valley (Southwest Corridor) in Jamaica Plain. The district is roughly bounded by Seaverns Avenue, Centre Street, South Street, Carolina Avenue, and the Southwest Corridor and encompasses 365 acres, containing 63 buildings and 18 structures. At its closest point the district is several hundred feet from the Project site, across the Southwest Corridor. The district is a well-preserved collection of wood frame residential buildings constructed during the mid-to-late 19th century in the Italianate, Second Empire, Victorian Gothic, Stick, Queen Anne, Shingle, and Colonial Revival styles. In addition, there are several prominent churches within the district, including two Gothic Revival churches constructed in native Roxbury puddingstone, the 1870 Jamaica Plain Methodist Church and the 1882 St. John's Episcopal Church, designed by Harris M. Stephenson.

Most of the district is steeply contoured and the upland area of the district, the product of the subdivision of several large 18th century estates, is characterized by picturesquely curving streets; generous, well-landscaped lots with puddingstone retaining walls; and large, architecturally distinguished homes.

Properties included in the Inventory of Historic and Archaeological Assets of the Commonwealth

Within the Project's vicinity are numerous properties included in the Massachusetts Historical Commission's (MHC) *Inventory of Historic and Archaeological Assets of the Commonwealth.* Generally, these properties include a mix of single and multi-family residences dating from the mid-19th century through the early 20th century.

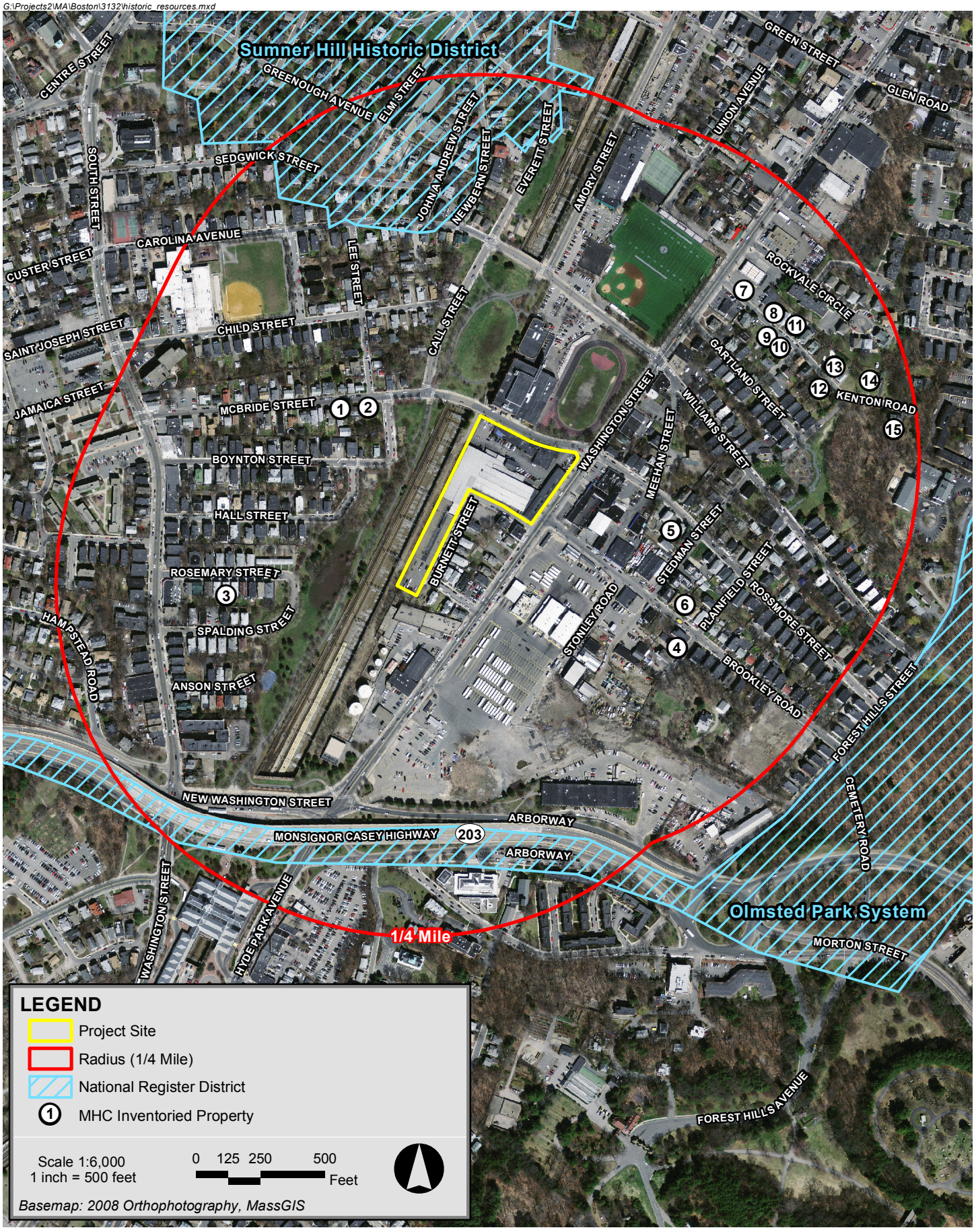
Properties within the Project's vicinity that are included in the State and National Registers and the MHC Inventory are identified in Table 5-1. Figure 5-1 depicts the locations of the State and National Register listed properties, and properties included in the Inventory, within one-quarter mile of the Project Site.

Table 5-1 Historic Resources in the vicinity

No.	Name	Address/Boundaries	Designation
A	Olmsted Park System	Back Bay Fens, Muddy River, Olmsted (Leverett) Park, Jamaica Pond, Arborway and Franklin Park	National Register Historic District, Boston Landmark
B	Sumner Hill Historic District	Seaverns & Carolina Avenues, and Everett & Newburn Streets	National Register Historic District
1.	John Ryan House	85 McBride Street	MHC Inventory
2.	Thomas Lally Double House	101-103 McBride Street	MHC Inventory
3.	Benjamin J. French Double House	19 Rosemary Street	MHC Inventory
4.	N. Curtis House	31 Plainfield Street	MHC Inventory
5.	John J. Brown Three Decker	35 Rossmore Street	MHC Inventory
6.	Ellen N. Poole House	48 Brookley Road	MHC Inventory
7.	House	2 Kenton Road	MHC Inventory
8.	House	18 Kenton Road	MHC Inventory
9.	House	19 Kenton Road	MHC Inventory
10.	House	23 Kenton Road	MHC Inventory
11.	House	24 Kenton Road	MHC Inventory
12.	Joseph A. Dadmund House	39 Kenton Road	MHC Inventory
13.	Leonard P. Holden House	40 Kenton Road	MHC Inventory
14.	House	56 Kenton Road	MHC Inventory
15.	House	63 Kenton Road	MHC Inventory

5.2 Archaeological Resources

A review of the MHC's archaeological base maps revealed no recorded archaeological sites within the immediate vicinity of the Project site. The Project site consists of a previously developed urban parcel. Due to previous development activities and disturbances, it is unlikely that the site contains significant archaeological resources.



3521-3529 Washington Street Boston, MA

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Figure 5-1
Historic Resources

5.3 Impacts to Historic Resources

Given the distance from the Project site to the National Register listed districts and Inventoried properties listed above, it is unlikely that there will be any impacts to these historic resources. The Project's proposed buildings will have varying heights similar to existing buildings in the area. While differences in building massing may create small areas of new shadow, given the heights of the proposed buildings, it is unlikely that any new shadows will extend to the historic districts and properties in the area.

As discussed in the Urban Design section above, the proposed residential triplex buildings will be wood framed with clapboard exterior siding and double hung windows, consistent with the design elements of the nearby residential neighborhood.

Chapter 6.0
Infrastructure Component

6.0 INFRASTUCTURE COMPONENT

The following sections describe the existing water, sewer, and drainage systems surrounding the site and explain how these systems will service the Project.

6.1 Sewage System

6.1.1 Existing Conditions

Currently, the Boston Water and Sewer Commission (BWSC) has a 10-inch metal sanitary sewer pipe in Burnett Street that flows downhill into Washington Street, and a 12-inch vitrified clay sanitary sewer pipe (VCP) in McBride Street that flows downhill and combines with the effluent from Burnett Street in Washington Street. The BWSC lines connect to the Massachusetts Water Resource Authority (MWRA) system and ultimately discharge into the Deer Island Treatment Facility. The proposed self-storage building would likely discharge into the 12-inch VCP in McBride Street, the proposed retail building would likely discharge into the 10-inch metal pipe in Washington Street, and the three residential buildings would likely discharge into the 10-inch metal pipe in Burnett Street.

6.1.2 Proposed Sewage Generation

The Project's sewage generation rates were estimated using Massachusetts State Environmental Code (Title 5) at 310 CMR 15.203. This reference lists typical generation values for the sources listed in Table 6-1. Other wastewater generation includes the cooling systems of each building. As shown in Table 6-1, the self-storage building will have average daily flows of approximately 75 gallons per day (gpd) of sanitary sewage, the retail building will have average daily flows of approximately 1,400 gpd of sanitary sewage, and the residential buildings will have average daily flows of approximately 8,140 gpd.

Table 6-1 Sewage Generation

Use	Units	Sewage Generation Rate	Total gpd
Storage Building	5 full and part-time employee positions	15 gpd/person	75
Retail	28,000 sf	50 gpd/1,000 sf	1,400
Residential (3 Buildings)	74 bedrooms	110 gpd/bedroom	8,140
Total			**9,615**

6.1.3 System Connections

The construction of all connections will be performed so as to minimize any effects on adjacent streets and to ensure that adequate facilities are available to service the site and surrounding area during construction. It should be noted that these sewer flows will be kept separate from all storm drain service connections. All appropriate permits and approvals will be obtained prior to construction.

6.2 Water Supply System

6.2.1 Existing Conditions

An eight-inch diameter ductile iron pipe (DIP) water main runs within Burnett Street immediately adjacent to the proposed residential buildings. A 12-inch DIP water main runs within McBride Street and connects to the 12-inch DIP water main within Washington Street.

There are five fire hydrants adjacent to the site. Two hydrants are located on McBride Street, one hydrant is located on Washington Street, and two hydrants are located on Burnett Street. There is one yard hydrant located on-site that will be removed during construction. There are no capacity issues anticipated for serving the Project with water from the city system.

6.2.2 Proposed Water System

The Project's water demand estimates for domestic sources are based on the Project's estimated sewage generation. A conservative factor of 1.1 is applied to the average daily wastewater flows. This factor accounts for consumption and other miscellaneous losses. Therefore, it is estimated that the proposed site will consume approximately 10,577 gpd of domestic water. The water will be supplied by the BWSC.

6.3 Stormwater System

6.3.1 Existing Conditions

Currently, the site is occupied by two masonry and metal buildings, a bituminous concrete parking area and driveways, chain link fencing, utility connections for the buildings, and a stormwater collection system. The site stormwater runoff enters catch basins via sheet flow or from roof leader connections from existing buildings and is discharged into McBride and Washington Streets untreated. There are no water quality methods in-place currently to treat the stormwater runoff. The site is also predominately impervious area with street trees located in gravel beds adjacent to the buildings.

6.3.2 Proposed Stormwater System

The BWSC and the Massachusetts Department of Environmental Protection (MassDEP) are attempting to separate stormwater and wastewater over time to prevent flooding of the system resulting in periodic overflows of combined sewer and stormwater into receiving waters.

The Proponent will work with these two agencies to help with the separation of stormwater and wastewater.

The existing site is mostly paved parking area and building coverage. The development of the Project will result in a substantial decrease in impervious surface area. The decrease in impervious area will result in a longer time of concentration and a lower peak runoff rate from the site. It should be noted that the Project is not located within the City of Boston's Groundwater Conservation Overlay District.

The water quality of the stormwater discharge will also be improved as a result of the proposed development. Per the BWSC *Regulations Governing the Use of Sanitary and Combined Sewers and Storm Drains, August 1998,* a particle separator will be installed on the new stormwater collection system to treat runoff before being discharged to a BWSC catch basin. The drainage system on the site will be separated from the sewer system as required by the City of Boston. All storm drains within the site will have plaques that state: "Don't Dump – Drains to Stony Brook Conduit."

6.4 Water Quality and Stormwater Management

The Project will not affect the water quality of nearby water bodies. Erosion and sediment control measures will be implemented during construction to minimize the transport of site soils to off-site areas and BWSC storm drain systems. During construction, existing catch basins will be protected with filter fabric, hay bales and/or crushed stone, to provide for sediment removal from runoff. These controls will be inspected and maintained throughout the construction phase until all areas of disturbance have been stabilized through the placement of pavement, structure, or vegetative cover.

All necessary dewatering will be conducted in accordance with a MWRA and BWSC discharge permit currently being prepared. Once construction is complete, the Project will be in compliance with all local and state stormwater management policies. See below for additional information.

6.5 MassDEP Stormwater Management Standards

In February of 2008, the MassDEP revised their Stormwater Management Standards to better address water quality and water quantity issues associated with project sites. The revisions promote increased stormwater recharge, treatment of more runoff from polluting land uses, low impact development (LID) techniques, pollution prevention, the removal of illicit discharges, and improved operation and maintenance of stormwater best management practices (BMPs).

A brief explanation of each standard and the system compliance is provided below:

Standard #1: No new stormwater conveyances (e.g., outfalls) may discharge untreated stormwater directly to or cause erosion in wetlands or waters of the Commonwealth.

The proposed design will comply with this Standard. No new untreated stormwater will be directly discharged to, nor will erosion be caused to wetlands or waters of the Commonwealth as a result of stormwater discharges related to the proposed Project.

Standard #2: Stormwater management systems must be designed so that post-development peak discharge rates do not exceed pre-development peak discharge rates.

The proposed design will comply with this standard. The site will have an increase in pervious area which will increase time of concentration values for stormwater runoff and lower peak runoff rates and volumes on-site.

Standard #3: Loss of annual recharge to groundwater shall be eliminated or minimized through the use of infiltration measures including environmentally sensitive site design, low impact development techniques, stormwater best management practices, and good operation and maintenance. At a minimum, the annual recharge from the post-development site shall approximate the annual recharge from pre-development conditions based on soil type. This Standard is met when the stormwater management system is designed to infiltrate the required recharge volume as determined in accordance with the Massachusetts Stormwater Handbook.

The proposed design will comply with this standard. The Project will meet and exceed this Standard as the amount of pervious area on-site will be substantially increased from current conditions.

Standard #4: Stormwater management systems shall be designed to remove 80% of the average annual post-construction load of Total Suspended Solids (TSS). This standard is met when:

a) *Suitable practices for source control and pollution prevention are identified in a long-term pollution prevention plan, and thereafter are implemented and maintained;*

b) *Structural stormwater best management practices are sized to capture the required water quality volume as determined in accordance with the Massachusetts Stormwater Handbook; and*

c) *Pretreatment is provided in accordance with the Massachusetts Stormwater Handbook.*

The proposed design will comply with this standard. Currently, no method for treating stormwater runoff is in place. The proposed development will have a particle separator that will be designed for 80% TSS removal before discharging to a BWSC catch basin. Pretreatment will include deep sumps and hoods in all site catch basins.

Standard #5: For land uses with higher potential pollutant loads, source control and pollution prevention shall be implemented in accordance with the Massachusetts Stormwater Handbook to eliminate or reduce the discharge of stormwater runoff from such land uses to the maximum extent practicable. If through source control and/or pollution prevention, all land uses with higher potential pollutant loads cannot be completely protected from exposure to rain, snow, snow melt and stormwater runoff, the proponent shall use the specific structural stormwater BMPs determined by the Department to be suitable for such uses as provided in the Massachusetts Stormwater Handbook. Stormwater discharges from land uses with higher potential pollutant loads shall also comply with the requirements of the Massachusetts Clean Waters Act, M.G.L. c. 21, §§ 26-53 and the regulations promulgated thereunder at 314 CMR 3.00, 314 CMR 4.00 and 314 CMR 5.00.

The proposed design will comply with this standard. The Project is not associated with Higher Potential Pollutant Loads (per the Policy, Volume I, page 1-8). The Project complies with this standard.

Standard #6: Stormwater discharges within the Zone II or Interim Wellhead Protection Area of a public water supply and stormwater discharges near or to any other critical area require the use of the specific source control and pollution prevention measures and the specific structural stormwater best management practices determined by the Department to be suitable for managing discharges to such areas as provided in the Massachusetts Stormwater Handbook. A discharge is near a critical area if there is a strong likelihood of a significant impact occurring to said area, taking into account site specific factors. Stormwater discharges to Outstanding Resource Waters and Special Resource Waters shall be removed and set back from the receiving water or wetland and receive the highest and best practical method of treatment. A "storm water discharge" as defined in 314 CMR 3.04(2)(a)1 or (b) to an Outstanding Resource Water or Special Resource Water shall comply with 314 CMR 3.00 and 314 CMR 4.00.5 Stormwater discharges to a Zone I or Zone A are prohibited unless essential to the operation of the public water supply.

The proposed design will comply with this standard. The Project will not discharge untreated stormwater to a sensitive area or any other area.

Standard #7: A redevelopment project is required to meet the following Stormwater Management Standards only to the maximum extent practicable: Standard 2, Standard 3, and the pretreatment and structural stormwater best management practice requirements of Standards 4, 5, and 6. Existing stormwater discharges shall comply with Standard 1 only to the maximum extent practicable. A redevelopment project shall also comply with all other requirements of the Stormwater Management Standards and improve existing conditions.

The proposed design will comply with this standard. The Project will meet or exceed all standards.

Standard #8: A plan to control construction related impacts, including erosion, sedimentation, and other pollutant sources during construction and land disturbance activities (construction period erosion, sedimentation, and pollution prevention plan) shall be developed and implemented.

The proposed design will comply with this standard. Sedimentation and erosion controls will be incorporated as part of the design of this Project and employed during site construction.

Standard #9: A long term Operation and Maintenance (O&M) Plan shall be developed and implemented to ensure that stormwater management systems function as designed.

The proposed design will comply with this standard. A long term Operations and Maintenance Plan will be developed and maintained for the Project.

Standard #10: All illicit discharges to the stormwater management system are prohibited.

The proposed design will comply with this standard. There will be no illicit discharges associated with the Project.

6.6 Mitigation Measures

The first one-inch of stormwater runoff volume will be treated via a proposed particle separator before discharging into an existing BWSC catch basin at the intersection of Burnett Street and Washington Street.

6.7 Coordination with the Boston Water & Sewer Commission

Proposed connections to the BWSC's water, sanitary sewer, and storm drain system will be designed in conformance with the BWSC's design standards, Sewer Use and Water Distribution System Regulations, and Requirements for Site Plans. The Proponent will submit a General Service Application and a site plan for review and approval prior to construction. The site plan will indicate the existing and proposed water mains, sanitary sewers, storm sewers, telephone, gas, electric, steam, and cable television. The plan will include the disconnections of the existing services as well as the proposed connections.

6.8 Energy Requirements and Service

6.8.1 Existing and Proposed Electric Service

NSTAR provides electric service to the City of Boston. The site is currently served with overhead electric wires connecting to utility poles adjacent to the property. There are overhead electric lines in Burnett and McBride Streets and underground electric wires in Washington Street. Electric power design for new service will be coordinated with NSTAR as the design of each phase progresses and electric consumption is determined.

6.8.2 Gas Service

National Grid provides natural gas service in the area. It is anticipated that new gas services will be provided to each of the proposed buildings from the services in the adjacent streets.

6.8.3 Telephone System

Verizon New England and Comcast provide telephone and cable services in the area. There are underground telephone and cable service lines in the adjacent streets. New telephone and cable lines will be constructed underground to the proposed buildings. The provider of these services will be determined prior to construction.

Chapter 7.0
Coordination With Other Agencies

7.0 COORDINATION WITH OTHER AGENCIES

7.1 Architectural Access Board Requirements

The Project will comply with the requirements of the Architectural Access Board and the standards of the Americans with Disabilities Act.

7.2 Massachusetts Environmental Policy Act (MEPA)

The Project does not exceed any MEPA thresholds, and therefore MEPA review is not required.

7.3 Massachusetts Historical Commission

The Proponent does not anticipate that the Project will require any state or federal licenses, permits or approvals, and does not anticipate utilizing any state or federal funds. Therefore, review by the Massachusetts Historical Commission (MHC) is not anticipated at this time. In the event that state or federal licenses, permits, approvals or funding is involved, the Proponent will file an MHC Project Notification Form to initiate review of the Project.

7.4 Boston Landmarks Commission

If it can not be confirmed that the existing buildings on the Project site are less than 50 years old, the Proponent will consult with the staff of the Boston Landmarks Commission (BLC) and an Article 85 (Demolition Delay) application will be filed if necessary.

7.5 Other Permits and Approvals

Section 1.8 of this Expanded PNF provides an anticipated list of agencies from which permits and approvals for the Project will be sought.

Chapter 8.0
Project Certification

8.0 PROJECT CERTIFICATION

This form has been submitted to the Boston Redevelopment Authority as required by the Boston Zoning Code, Article 80.

Signature of Proponent's Representative

David Fulton
SSG Development, LLC
651 Washington Street, Suite 200
Brookline, MA 02446
(617) 938-6478

Signature of Preparer

Cindy Schlessinger
Epsilon Associates, Inc.
3 Clock Tower Place, Suite 250
Maynard, MA 01754
(978) 897-7100

8/22/2011
Date:

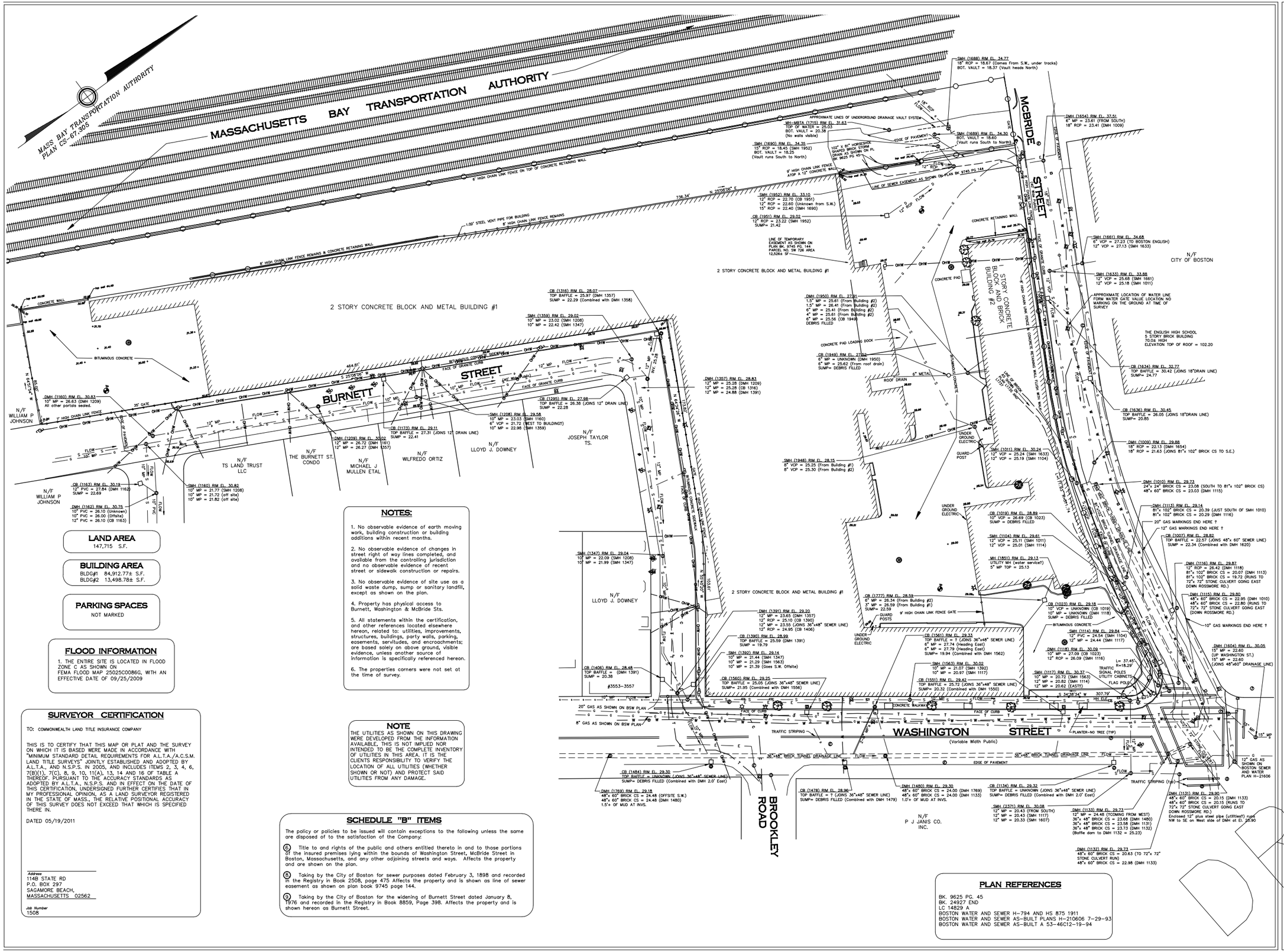
8/22/11
Date:

Signature of Proponent's Representative

David Goldman
New Boston Ventures, LLC
540 Tremont Street, Suite 8
Boston, MA 02116
(617) 542-3500

8/22/11
Date:

Appendix A
Site Survey



LAND AREA
147,715 S.F.

BUILDING AREA
BLDG#1 84,912.77± S.F.
BLDG#2 13,498.78± S.F.

PARKING SPACES
NOT MARKED

FLOOD INFORMATION
1. THE ENTIRE SITE IS LOCATED IN FLOOD ZONE C AS SHOWN ON FEMA FLOOD MAP 25025C0086G, WITH AN EFFECTIVE DATE OF 09/25/2009

SURVEYOR CERTIFICATION
TO: COMMONWEALTH LAND TITLE INSURANCE COMPANY

THIS IS TO CERTIFY THAT THIS MAP OR PLAT AND THE SURVEY ON WHICH IT IS BASED WERE MADE IN ACCORDANCE WITH "MINIMUM STANDARD DETAIL REQUIREMENTS FOR A.L.T.A./A.C.S.M. LAND TITLE SURVEYS" JOINTLY ESTABLISHED AND ADOPTED BY A.L.T.A., AND N.S.P.S. IN 2005, AND INCLUDES ITEMS 2, 3, 4, 6, 7(B)(1), 7(C), 8, 9, 10, 11(A), 13, 14 AND 16 OF TABLE A THEREOF. PURSUANT TO THE ACCURACY STANDARDS AS ADOPTED BY A.L.T.A., N.S.P.S. AND IN EFFECT ON THE DATE OF THIS CERTIFICATION, UNDERSIGNED FURTHER CERTIFIES THAT IN MY PROFESSIONAL OPINION, AS A LAND SURVEYOR REGISTERED IN THE STATE OF MASS., THE RELATIVE POSITIONAL ACCURACY OF THIS SURVEY DOES NOT EXCEED THAT WHICH IS SPECIFIED THERE IN.

DATED 05/19/2011

Address
114B STATE RD
P.O. BOX 297
SAGAMORE BEACH,
MASSACHUSETTS 02562

Job Number
1508

NOTES:
1. No observable evidence of earth moving work, building construction or building additions within recent months.
2. No observable evidence of changes in street right of way lines completed, and available from the controlling jurisdiction and no observable evidence of recent street or sidewalk construction or repairs.
3. No observable evidence of site use as a solid waste dump, sump or sanitary landfill, except as shown on the plan.
4. Property has physical access to Burnett, Washington & McBride Sts.
5. All statements within the certification, and other references located elsewhere hereon, related to: utilities, improvements, structures, buildings, party walls, parking, easements, servitudes, and encroachments; are based solely on above ground, visible evidence, unless another source of information is specifically referenced hereon.
6. The properties corners were not set at the time of survey.

NOTE
THE UTILITIES AS SHOWN ON THIS DRAWING WERE DEVELOPED FROM THE INFORMATION AVAILABLE, THIS IS NOT IMPLIED NOR INTENDED TO BE THE COMPLETE INVENTORY OF UTILITIES IN THIS AREA. IT IS THE CLIENTS RESPONSIBILITY TO VERIFY THE LOCATION OF ALL UTILITIES (WHETHER SHOWN OR NOT) AND PROTECT SAID UTILITIES FROM ANY DAMAGE.

SCHEDULE "B" ITEMS
The policy or policies to be issued will contain exceptions to the following unless the same are disposed of to the satisfaction of the Company.

(6) Title to and rights of the public and others entitled thereto in and to those portions of the insured premises lying within the bounds of Washington Street, McBride Street in Boston, Massachusetts, and any other adjoining streets and ways. Affects the property and are shown on the plan.

(8) Taking by the City of Boston for sewer purposes dated February 3, 1898 and recorded in the Registry in Book 2508, page 475 Affects the property and is shown as line of sewer easement as shown on plan book 9745 page 144.

(9) Taking by the City of Boston for the widening of Burnett Street dated January 8, 1976 and recorded in the Registry in Book 8859, Page 398. Affects the property and is shown hereon as Burnett Street.

PLAN REFERENCES
BK. 9625 PG. 45
BK. 24927 END
LC 14829 A
BOSTON WATER AND SEWER H-794 AND HS 875 1911
BOSTON WATER AND SEWER AS-BUILT PLANS H-210606 7-29-93
BOSTON WATER AND SEWER AS-BUILT A 53-46C12-19-94

SITE
\1508 SSG JP\Research

LOCUS MAP
NOT TO SCALE

LEGEND
- HYDRANT
- WATER GATE
- DRAIN MANHOLE SQUARE
- DRAIN MANHOLE
- ELECTRIC MANHOLE
- TELEPHONE MANHOLE
- CATCH BASIN
- DRAIN LINE — D —
- SEWER MANHOLE
- SEWER LINE — S —
- GAS VALVE
- GAS LINE — G —
- UTILITY POLE UP46
- UNDERGROUND ELECTRIC LINE — E —
- OVERHEAD UTILITY WIRES — OHW —
- UNDERGROUND TELEPHONE — T —
- UNDERGROUND COMMUNICATIONS — C —
- LIGHT POLE
- FLOOD LIGHT
- POST MOUNTED LIGHT
- TRAFFIC SIGNAL
- SIGN POST
- TEST BORING TB
- OBSERVATION WELL W
- DECIDUOUS TREES

THIS MAPPING IS MADE FOR THE PARTY NAMED HEREON, HIS OR HER MORTGAGEE AND GUARANTOR, EXCLUSIVELY: NO FURTHER LIABILITY IS ASSUMED.

REVISIONS

DATE	DESCRIPTION	INIT.

ALTA / ACSM LAND TITLE SURVEY PLAN
MAP 11 0260 5010
#3521 WASHINGTON ST
JAMAICA PLAIN, MASS

BENNETT ENGINEERING
LAND SURVEYING, ENGINEERING, & DEVELOPMENT SERVICES
PO BOX 297 SAGAMORE BEACH, MA 02562
TEL. (508) 888-4888 FAX. (508) 888-4887

DRAWN BY: SGL
CHECK BY: TRB
JOB # 1508

DATE:05/19/2011
SCALE: 1"=30'
SHEET NO. 1 OF 2

Appendix B
Transportation

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

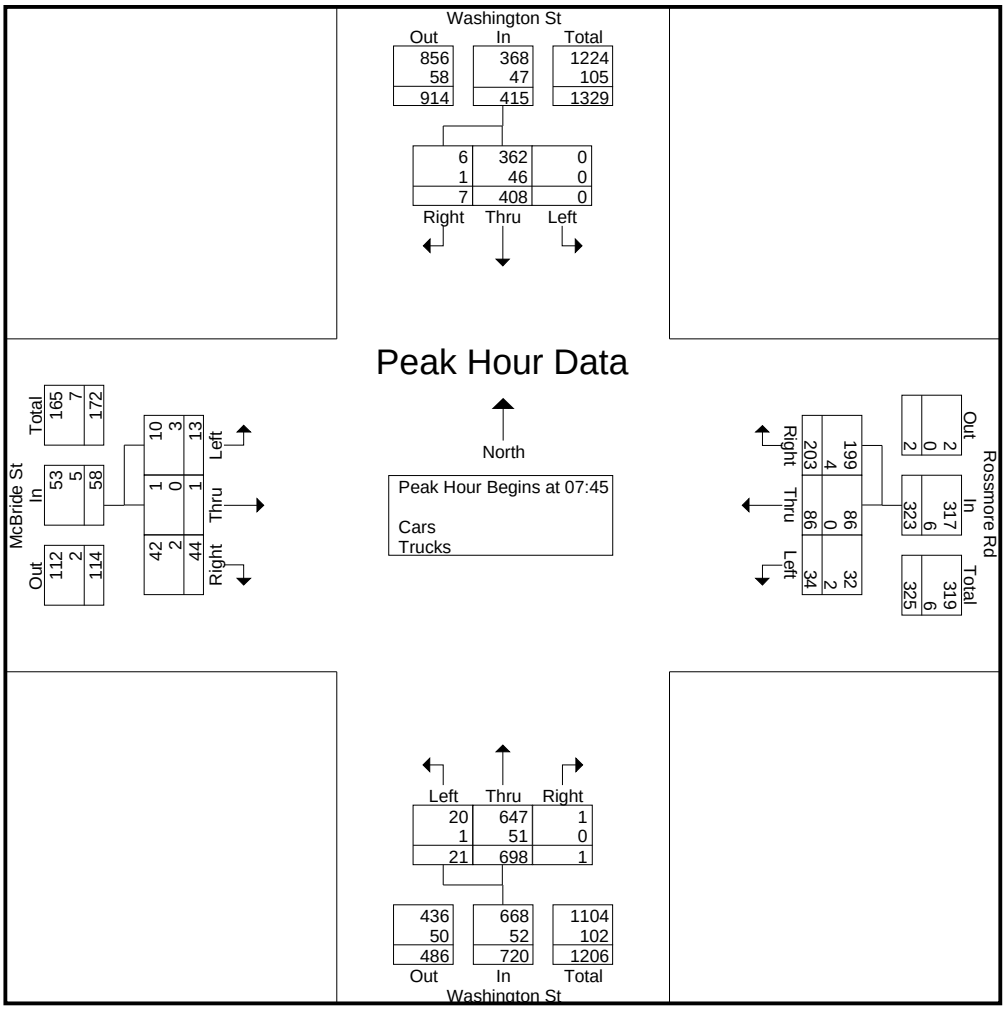
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
07:00	0	86	4	1	7	53	4	167	0	1	0	5	328
07:15	0	108	0	7	18	46	4	162	0	3	1	6	355
07:30	0	91	3	3	19	49	4	180	0	0	0	9	358
07:45	0	94	1	6	27	52	3	183	0	4	1	8	379
Total	0	379	8	17	71	200	15	692	0	8	2	28	1420
08:00	0	93	2	11	13	64	6	165	0	3	0	11	368
08:15	0	106	2	7	15	49	6	171	0	3	0	10	369
08:30	0	115	2	10	31	38	6	179	1	3	0	15	400
08:45	0	94	1	10	16	45	4	132	0	3	0	13	318
Total	0	408	7	38	75	196	22	647	1	12	0	49	1455
Grand Total	0	787	15	55	146	396	37	1339	1	20	2	77	2875
Apprch %	0	98.1	1.9	9.2	24.5	66.3	2.7	97.2	0.1	20.2	2	77.8	
Total %	0	27.4	0.5	1.9	5.1	13.8	1.3	46.6	0	0.7	0.1	2.7	
Cars	0	693	9	52	144	390	35	1238	1	15	2	75	2654
% Cars	0	88.1	60	94.5	98.6	98.5	94.6	92.5	100	75	100	97.4	92.3
Trucks	0	94	6	3	2	6	2	101	0	5	0	2	221
% Trucks	0	11.9	40	5.5	1.4	1.5	5.4	7.5	0	25	0	2.6	7.7

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:45																	
07:45	0	94	1	95	6	27	52	85	3	**183**	0	**186**	**4**	**1**	8	13	379
08:00	0	93	**2**	95	**11**	13	**64**	**88**	**6**	165	0	171	3	0	11	14	368
08:15	0	106	2	108	7	15	49	71	6	171	0	177	3	0	10	13	369
08:30	0	**115**	2	**117**	10	**31**	38	79	6	179	**1**	186	3	0	**15**	**18**	**400**
Total Volume	0	408	7	415	34	86	203	323	21	698	1	720	13	1	44	58	1516
% App. Total	0	98.3	1.7		10.5	26.6	62.8		2.9	96.9	0.1		22.4	1.7	75.9		
PHF	.000	.887	.875	.887	.773	.694	.793	.918	.875	.954	.250	.968	.813	.250	.733	.806	.948
Cars	0	362	6	368	32	86	199	317	20	647	1	668	10	1	42	53	1406
% Cars	0	88.7	85.7	88.7	94.1	100	98.0	98.1	95.2	92.7	100	92.8	76.9	100	95.5	91.4	92.7
Trucks	0	46	1	47	2	0	4	6	1	51	0	52	3	0	2	5	110
% Trucks	0	11.3	14.3	11.3	5.9	0	2.0	1.9	4.8	7.3	0	7.2	23.1	0	4.5	8.6	7.3

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



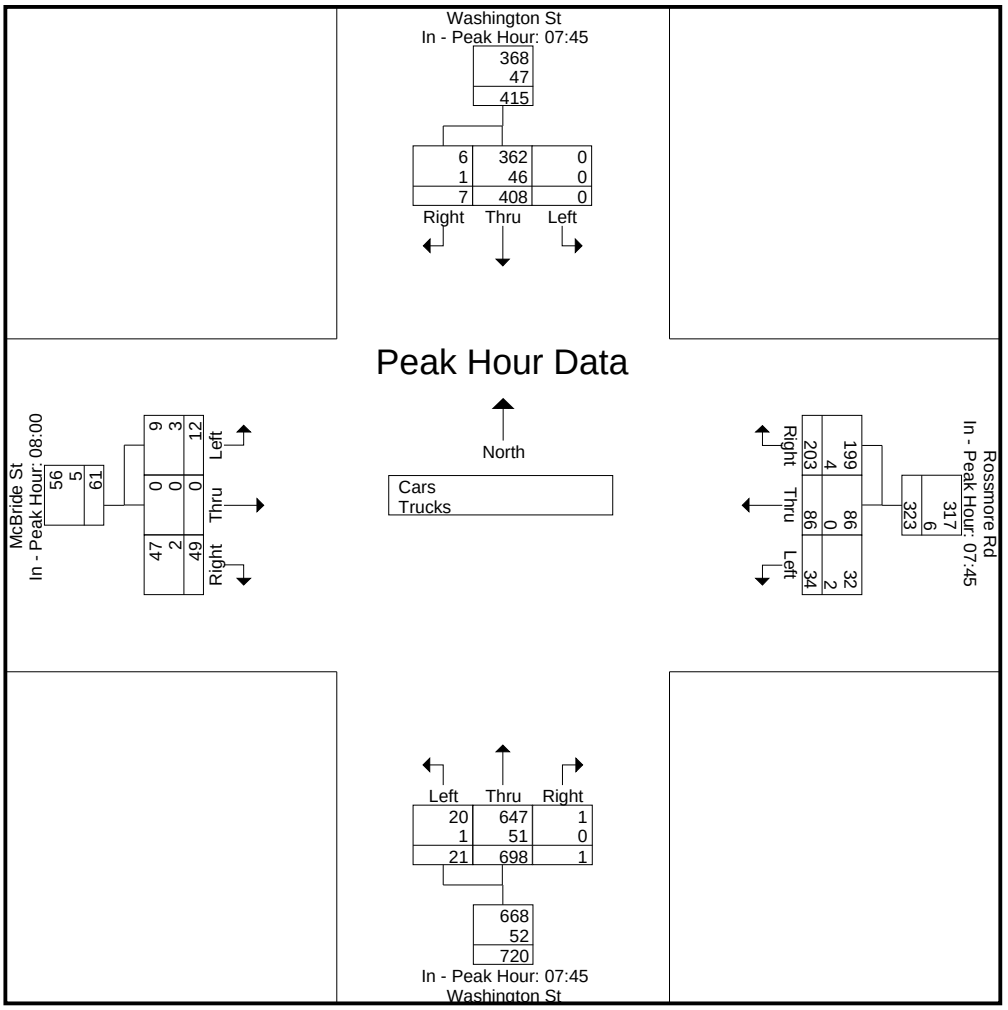
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:45				07:45				07:45				08:00			
+0 mins.	0	94	1	95	6	27	52	85	3	**183**	0	**186**	**3**	0	11	14
+15 mins.	0	93	**2**	95	**11**	13	**64**	**88**	**6**	165	0	171	3	0	10	13
+30 mins.	0	106	2	108	7	15	49	71	6	171	0	177	3	0	**15**	**18**
+45 mins.	0	**115**	2	**117**	10	**31**	38	79	6	179	**1**	186	3	0	13	16
Total Volume	0	408	7	415	34	86	203	323	21	698	1	720	12	0	49	61
% App. Total	0	98.3	1.7		10.5	26.6	62.8		2.9	96.9	0.1		19.7	0	80.3	
PHF	.000	.887	.875	.887	.773	.694	.793	.918	.875	.954	.250	.968	1.000	.000	.817	.847
Cars	0	362	6	368	32	86	199	317	20	647	1	668	9	0	47	56
% Cars	0	88.7	85.7	88.7	94.1	100	98	98.1	95.2	92.7	100	92.8	75	0	95.9	91.8
Trucks	0	46	1	47	2	0	4	6	1	51	0	52	3	0	2	5
% Trucks	0	11.3	14.3	11.3	5.9	0	2	1.9	4.8	7.3	0	7.2	25	0	4.1	8.2

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars

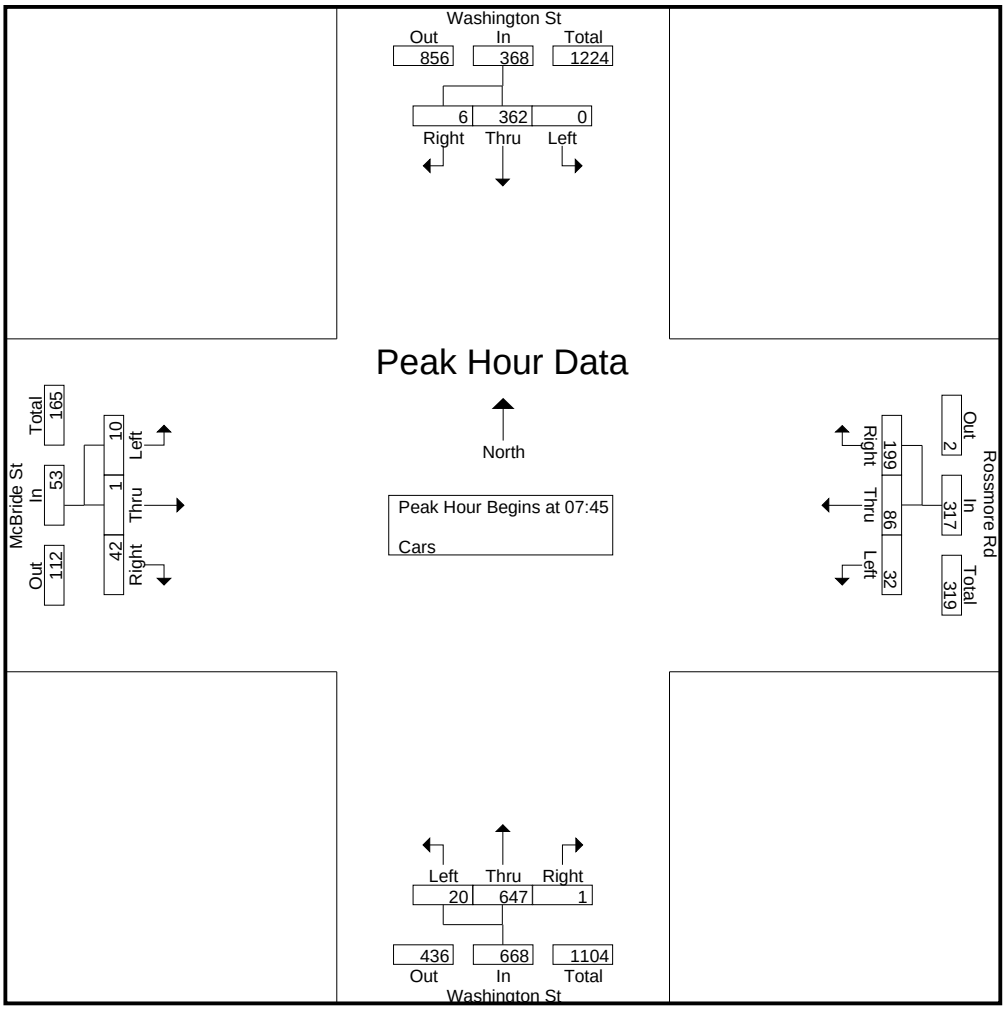
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
07:00	0	75	1	1	5	52	3	157	0	0	0	5	299
07:15	0	93	0	7	18	46	4	148	0	2	1	6	325
07:30	0	80	1	3	19	49	4	161	0	0	0	9	326
07:45	0	83	1	6	27	50	3	166	0	4	1	8	349
Total	0	331	3	17	69	197	14	632	0	6	2	28	1299
08:00	0	78	2	10	13	63	5	154	0	1	0	11	337
08:15	0	94	1	7	15	48	6	159	0	3	0	9	342
08:30	0	107	2	9	31	38	6	168	1	2	0	14	378
08:45	0	83	1	9	16	44	4	125	0	3	0	13	298
Total	0	362	6	35	75	193	21	606	1	9	0	47	1355
Grand Total	0	693	9	52	144	390	35	1238	1	15	2	75	2654
Apprch %	0	98.7	1.3	8.9	24.6	66.6	2.7	97.2	0.1	16.3	2.2	81.5	
Total %	0	26.1	0.3	2	5.4	14.7	1.3	46.6	0	0.6	0.1	2.8	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:45																	
07:45	0	83	1	84	6	27	50	83	3	166	0	169	**4**	**1**	8	13	349
08:00	0	78	**2**	80	**10**	13	**63**	**86**	5	154	0	159	1	0	11	12	337
08:15	0	94	1	95	7	15	48	70	**6**	159	0	165	3	0	9	12	342
08:30	0	**107**	2	**109**	9	**31**	38	78	6	**168**	**1**	**175**	2	0	**14**	**16**	**378**
Total Volume	0	362	6	368	32	86	199	317	20	647	1	668	10	1	42	53	1406
% App. Total	0	98.4	1.6		10.1	27.1	62.8		3	96.9	0.1		18.9	1.9	79.2		
PHF	.000	.846	.750	.844	.800	.694	.790	.922	.833	.963	.250	.954	.625	.250	.750	.828	.930

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



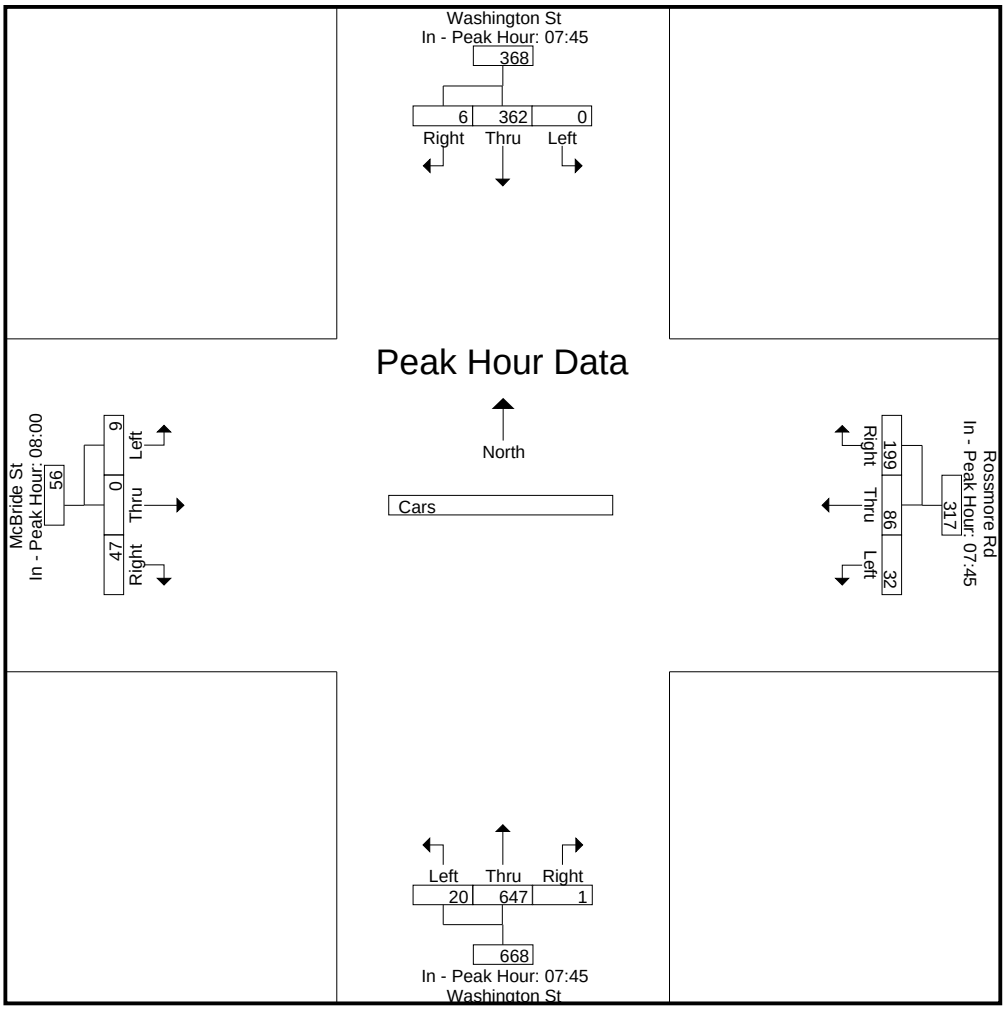
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:45				07:45				07:45				08:00			
+0 mins.	0	83	1	84	6	27	50	83	3	166	0	169	1	0	11	12
+15 mins.	0	78	**2**	80	**10**	13	**63**	**86**	5	154	0	159	**3**	0	9	12
+30 mins.	0	94	1	95	7	15	48	70	**6**	159	0	165	2	0	**14**	**16**
+45 mins.	0	**107**	2	**109**	9	**31**	38	78	6	**168**	**1**	**175**	3	0	13	16
Total Volume	0	362	6	368	32	86	199	317	20	647	1	668	9	0	47	56
% App. Total	0	98.4	1.6		10.1	27.1	62.8		3	96.9	0.1		16.1	0	83.9	
PHF	.000	.846	.750	.844	.800	.694	.790	.922	.833	.963	.250	.954	.750	.000	.839	.875

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Trucks

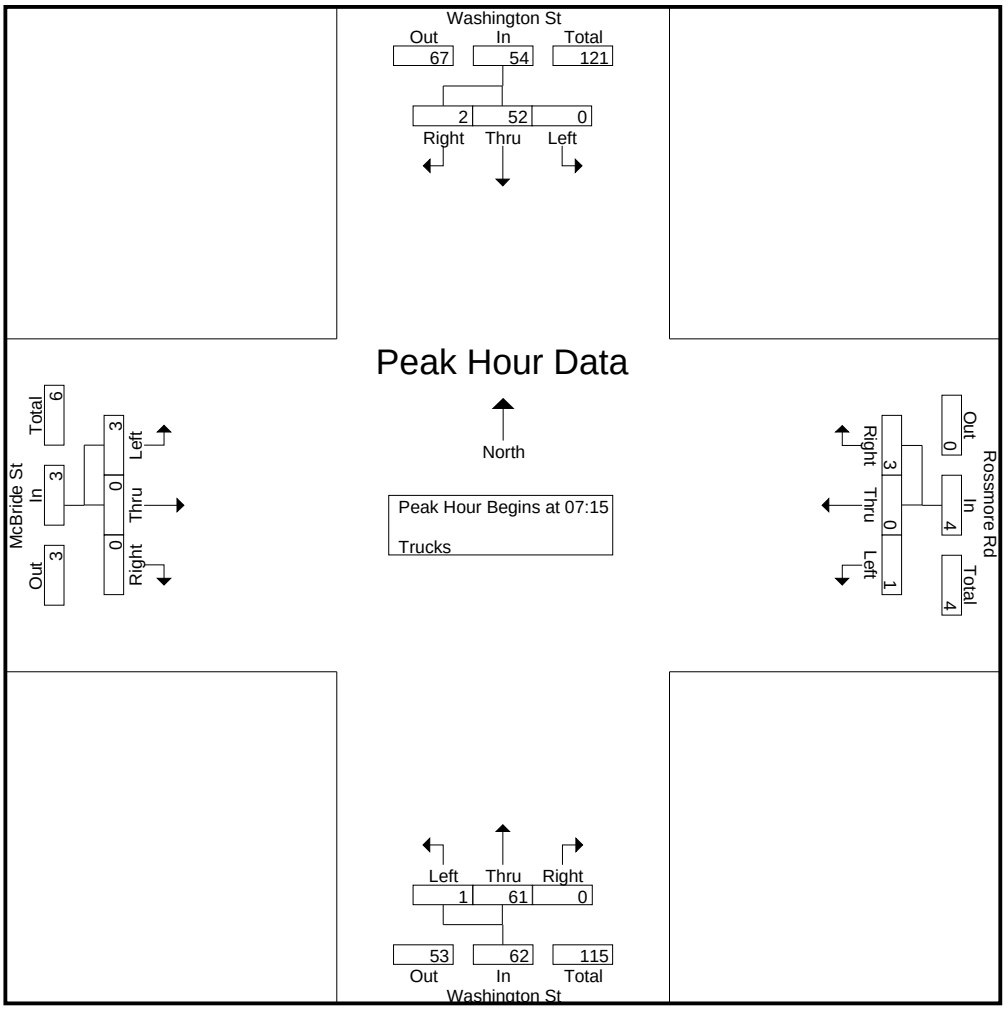
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
07:00	0	11	3	0	2	1	1	10	0	1	0	0	29
07:15	0	15	0	0	0	0	0	14	0	1	0	0	30
07:30	0	11	2	0	0	0	0	19	0	0	0	0	32
07:45	0	11	0	0	0	2	0	17	0	0	0	0	30
Total	0	48	5	0	2	3	1	60	0	2	0	0	121
08:00	0	15	0	1	0	1	1	11	0	2	0	0	31
08:15	0	12	1	0	0	1	0	12	0	0	0	1	27
08:30	0	8	0	1	0	0	0	11	0	1	0	1	22
08:45	0	11	0	1	0	1	0	7	0	0	0	0	20
Total	0	46	1	3	0	3	1	41	0	3	0	2	100
Grand Total	0	94	6	3	2	6	2	101	0	5	0	2	221
Apprch %	0	94	6	27.3	18.2	54.5	1.9	98.1	0	71.4	0	28.6	
Total %	0	42.5	2.7	1.4	0.9	2.7	0.9	45.7	0	2.3	0	0.9	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:15																	
07:15	0	**15**	0	**15**	0	0	0	0	0	14	0	14	1	0	0	1	30
07:30	0	11	**2**	13	0	0	0	0	0	**19**	0	**19**	0	0	0	0	**32**
07:45	0	11	0	11	0	0	**2**	**2**	0	17	0	17	0	0	0	0	30
08:00	0	15	0	15	**1**	0	1	2	**1**	11	0	12	**2**	0	0	**2**	31
Total Volume	0	52	2	54	1	0	3	4	1	61	0	62	3	0	0	3	123
% App. Total	0	96.3	3.7		25	0	75		1.6	98.4	0		100	0	0		
PHF	.000	.867	.250	.900	.250	.000	.375	.500	.250	.803	.000	.816	.375	.000	.000	.375	.961

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



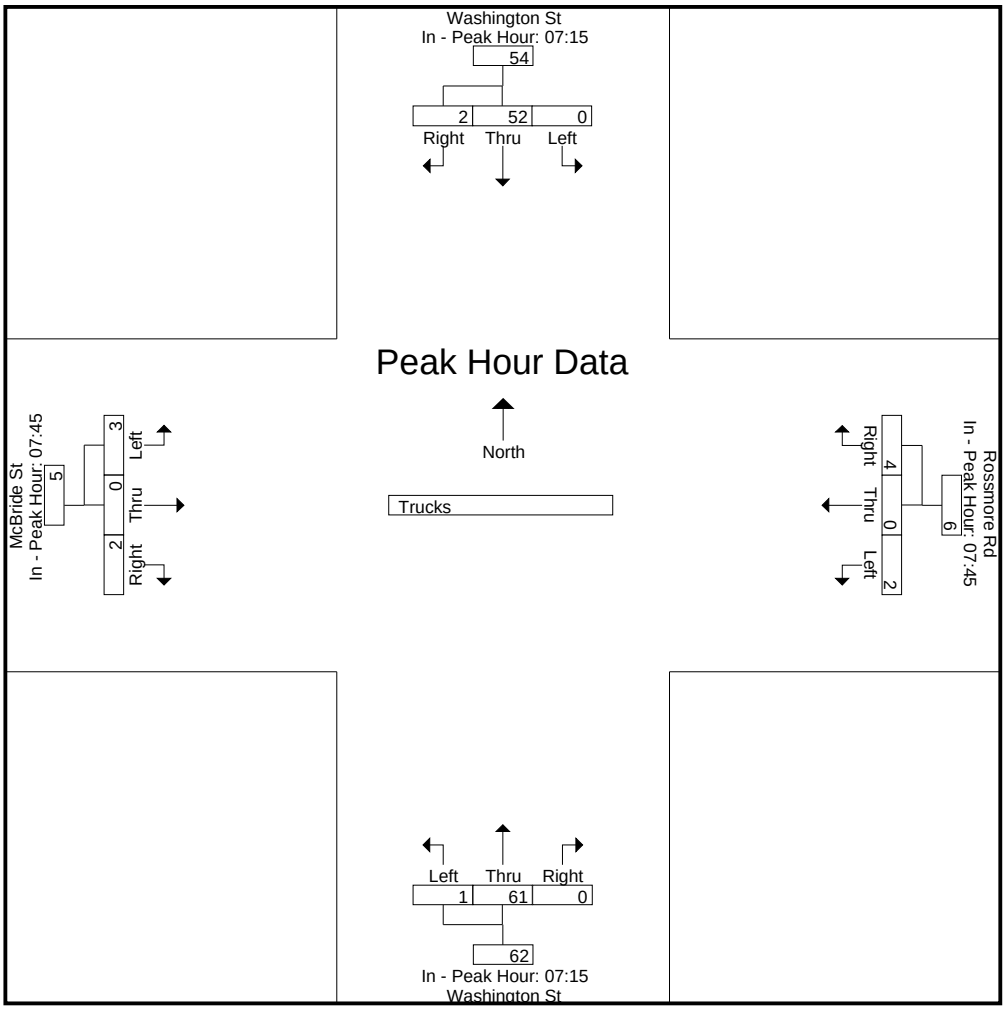
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:15				07:45				07:15				07:45			
+0 mins.	0	**15**	0	**15**	0	0	**2**	**2**	0	14	0	14	0	0	0	0
+15 mins.	0	11	**2**	13	**1**	0	1	2	0	**19**	0	**19**	**2**	0	0	**2**
+30 mins.	0	11	0	11	0	0	1	1	0	17	0	17	0	0	**1**	1
+45 mins.	0	15	0	15	1	0	0	1	**1**	11	0	12	1	0	1	2
Total Volume	0	52	2	54	2	0	4	6	1	61	0	62	3	0	2	5
% App. Total	0	96.3	3.7		33.3	0	66.7		1.6	98.4	0		60	0	40	
PHF	.000	.867	.250	.900	.500	.000	.500	.750	.250	.803	.000	.816	.375	.000	.500	.625

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Bikes Peds

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West						
Start Time	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Exclu. Total	Inclu. Total	Int. Total
07:00	0	0	0	0	0	1	0	0	0	0	0	2	0	0	0	9	11	1	12
07:15	0	0	0	3	0	0	1	0	0	1	0	8	0	0	0	3	14	2	16
07:30	0	0	0	0	0	1	0	0	0	2	0	5	0	0	0	2	7	3	10
07:45	0	1	0	0	0	0	0	0	0	0	0	4	0	1	0	1	5	2	7
Total	0	1	0	3	0	2	1	0	0	3	0	19	0	1	0	15	37	8	45
08:00	0	0	0	4	0	0	0	0	0	1	0	10	0	0	0	2	16	1	17
08:15	0	2	0	0	0	2	0	1	0	1	0	5	0	0	0	2	8	5	13
08:30	0	0	0	1	0	0	0	1	0	1	0	3	0	0	0	3	8	1	9
08:45	0	1	0	0	0	1	1	1	0	1	0	0	0	0	0	1	2	4	6
Total	0	3	0	5	0	3	1	3	0	4	0	18	0	0	0	8	34	11	45
Grand Total	0	4	0	8	0	5	2	3	0	7	0	37	0	1	0	23	71	19	90
Apprch %	0	100	0		0	71.4	28.6		0	100	0		0	100	0				
Total %	0	21.1	0		0	26.3	10.5		0	36.8	0		0	5.3	0		78.9	21.1	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:30																	
07:30	0	0	0	0	0	1	0	1	0	**2**	0	**2**	0	0	0	0	3
07:45	0	1	0	1	0	0	0	0	0	0	0	0	0	**1**	0	**1**	2
08:00	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	1
08:15	0	**2**	0	**2**	0	**2**	0	**2**	0	1	0	1	0	0	0	0	**5**
Total Volume	0	3	0	3	0	3	0	3	0	4	0	4	0	1	0	1	11
% App. Total	0	100	0		0	100	0		0	100	0		0	100	0		
PHF	.000	.375	.000	.375	.000	.375	.000	.375	.000	.500	.000	.500	.000	.250	.000	.250	.550

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
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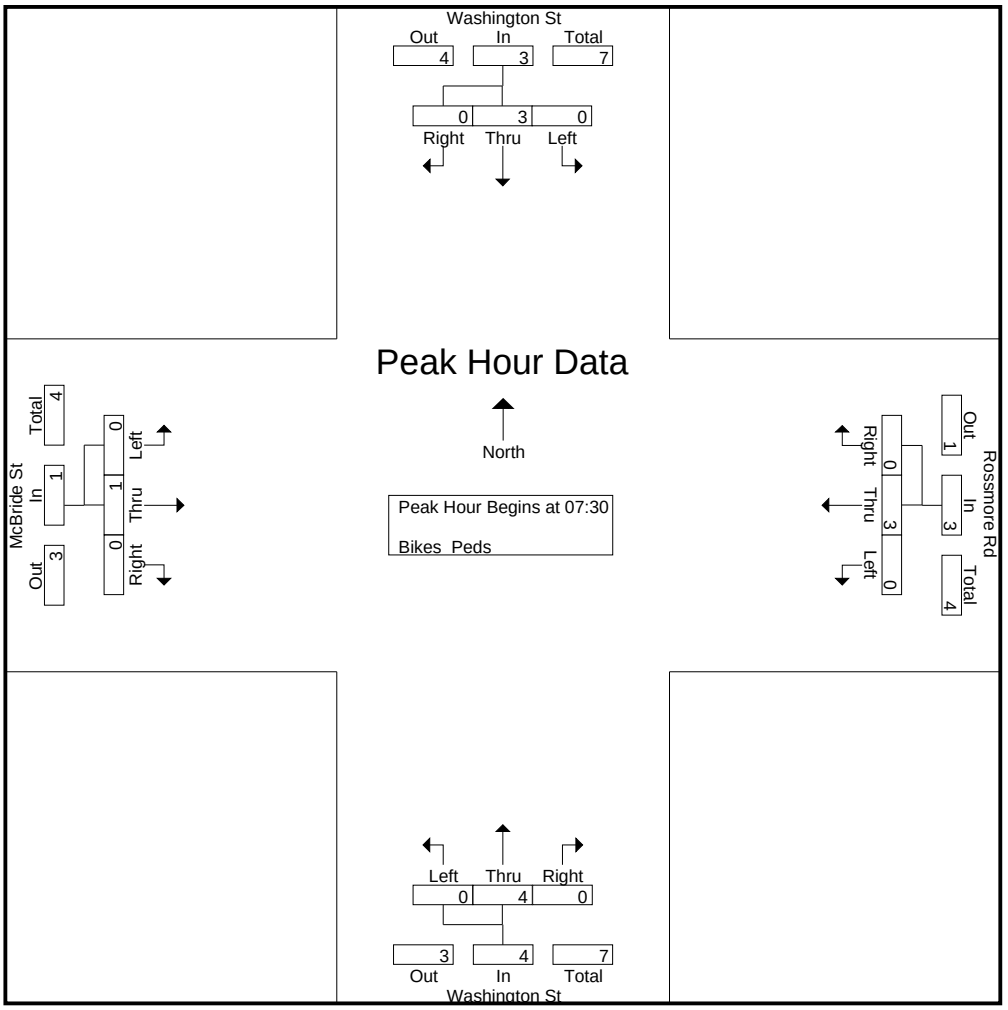


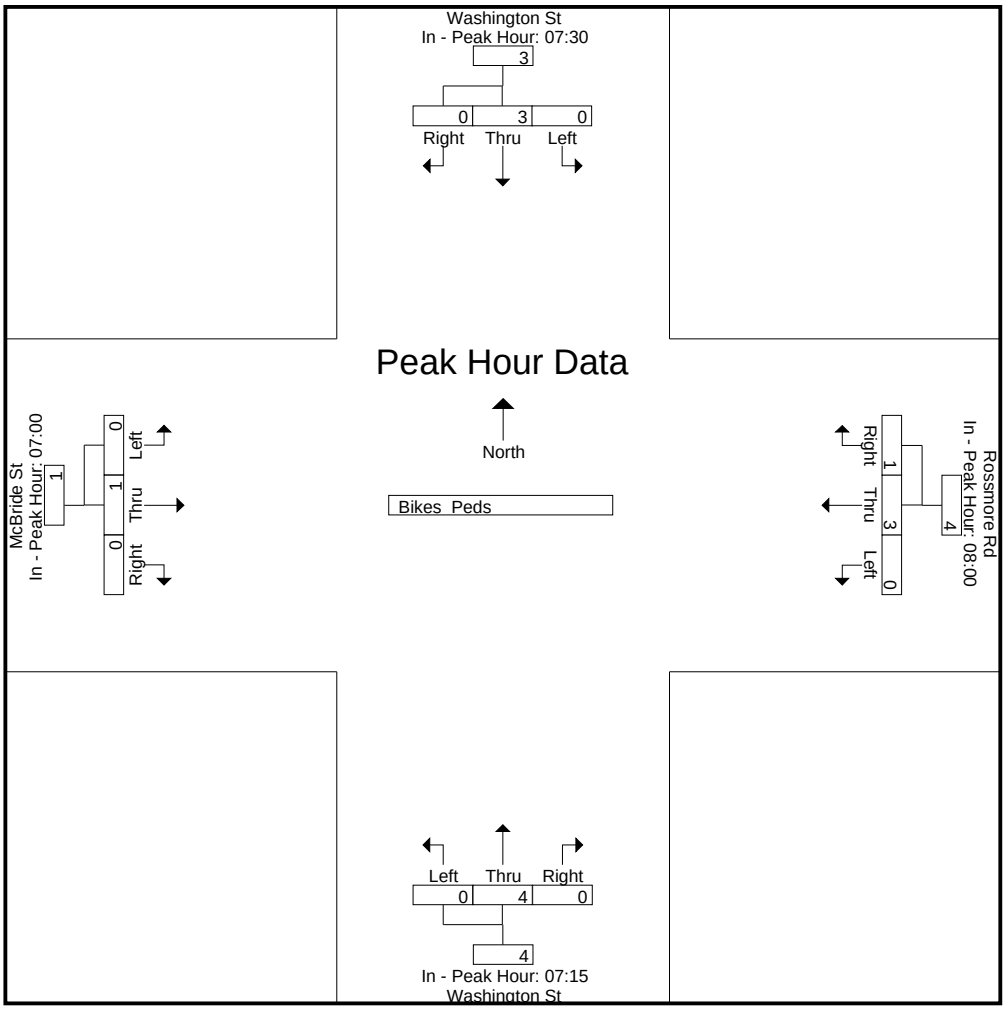
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	07:30				08:00				07:15				07:00			
+0 mins.	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0
+15 mins.	0	1	0	1	0	**2**	0	**2**	0	**2**	0	**2**	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	0	**2**	0	**2**	0	1	**1**	2	0	1	0	1	0	**1**	0	**1**
Total Volume	0	3	0	3	0	3	1	4	0	4	0	4	0	1	0	1
% App. Total	0	100	0		0	75	25		0	100	0		0	100	0	
PHF	.000	.375	.000	.375	.000	.375	.250	.500	.000	.500	.000	.500	.000	.250	.000	.250

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

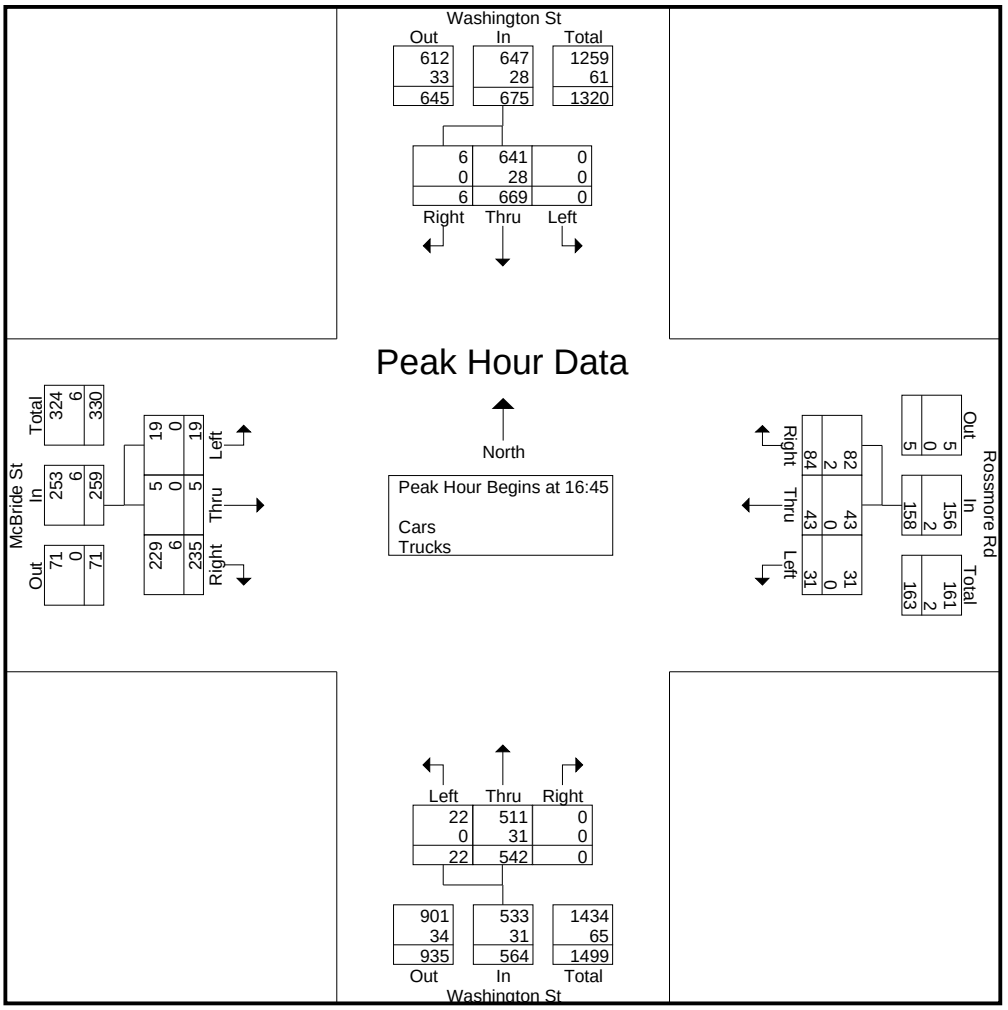
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
16:00	0	164	2	7	7	21	5	130	0	8	4	51	399
16:15	0	159	2	4	11	23	7	120	0	7	0	63	396
16:30	0	142	1	2	7	27	9	128	0	5	2	59	382
16:45	0	171	0	10	13	23	8	139	0	3	3	64	434
Total	0	636	5	23	38	94	29	517	0	23	9	237	1611
17:00	0	158	2	3	9	18	5	137	0	7	0	59	398
17:15	0	173	1	10	8	20	4	132	0	2	2	55	407
17:30	0	167	3	8	13	23	5	134	0	7	0	57	417
17:45	0	163	1	5	9	18	13	129	0	3	2	55	398
Total	0	661	7	26	39	79	27	532	0	19	4	226	1620
Grand Total	0	1297	12	49	77	173	56	1049	0	42	13	463	3231
Apprch %	0	99.1	0.9	16.4	25.8	57.9	5.1	94.9	0	8.1	2.5	89.4	
Total %	0	40.1	0.4	1.5	2.4	5.4	1.7	32.5	0	1.3	0.4	14.3	
Cars	0	1239	9	48	77	166	56	984	0	37	13	447	3076
% Cars	0	95.5	75	98	100	96	100	93.8	0	88.1	100	96.5	95.2
Trucks	0	58	3	1	0	7	0	65	0	5	0	16	155
% Trucks	0	4.5	25	2	0	4	0	6.2	0	11.9	0	3.5	4.8

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 16:45																	
16:45	0	171	0	171	**10**	**13**	**23**	**46**	**8**	**139**	0	**147**	3	**3**	**64**	**70**	**434**
17:00	0	158	2	160	3	9	18	30	5	137	0	142	**7**	0	59	66	398
17:15	0	**173**	1	**174**	10	8	20	38	4	132	0	136	2	2	55	59	407
17:30	0	167	**3**	170	8	13	23	44	5	134	0	139	7	0	57	64	417
Total Volume	0	669	6	675	31	43	84	158	22	542	0	564	19	5	235	259	1656
% App. Total	0	99.1	0.9		19.6	27.2	53.2		3.9	96.1	0		7.3	1.9	90.7		
PHF	.000	.967	.500	.970	.775	.827	.913	.859	.688	.975	.000	.959	.679	.417	.918	.925	.954
Cars	0	641	6	647	31	43	82	156	22	511	0	533	19	5	229	253	1589
% Cars	0	95.8	100	95.9	100	100	97.6	98.7	100	94.3	0	94.5	100	100	97.4	97.7	96.0
Trucks	0	28	0	28	0	0	2	2	0	31	0	31	0	0	6	6	67
% Trucks	0	4.2	0	4.1	0	0	2.4	1.3	0	5.7	0	5.5	0	0	2.6	2.3	4.0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	16:45				16:45				16:45				16:15			
+0 mins.	0	171	0	171	**10**	**13**	**23**	**46**	**8**	**139**	0	**147**	**7**	0	63	**70**
+15 mins.	0	158	2	160	3	9	18	30	5	137	0	142	5	2	59	66
+30 mins.	0	**173**	1	**174**	10	8	20	38	4	132	0	136	3	**3**	**64**	70
+45 mins.	0	167	**3**	170	8	13	23	44	5	134	0	139	7	0	59	66
Total Volume	0	669	6	675	31	43	84	158	22	542	0	564	22	5	245	272
% App. Total	0	99.1	0.9		19.6	27.2	53.2		3.9	96.1	0		8.1	1.8	90.1	
PHF	.000	.967	.500	.970	.775	.827	.913	.859	.688	.975	.000	.959	.786	.417	.957	.971
Cars	0	641	6	647	31	43	82	156	22	511	0	533	18	5	236	259
% Cars	0	95.8	100	95.9	100	100	97.6	98.7	100	94.3	0	94.5	81.8	100	96.3	95.2
Trucks	0	28	0	28	0	0	2	2	0	31	0	31	4	0	9	13
% Trucks	0	4.2	0	4.1	0	0	2.4	1.3	0	5.7	0	5.5	18.2	0	3.7	4.8

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
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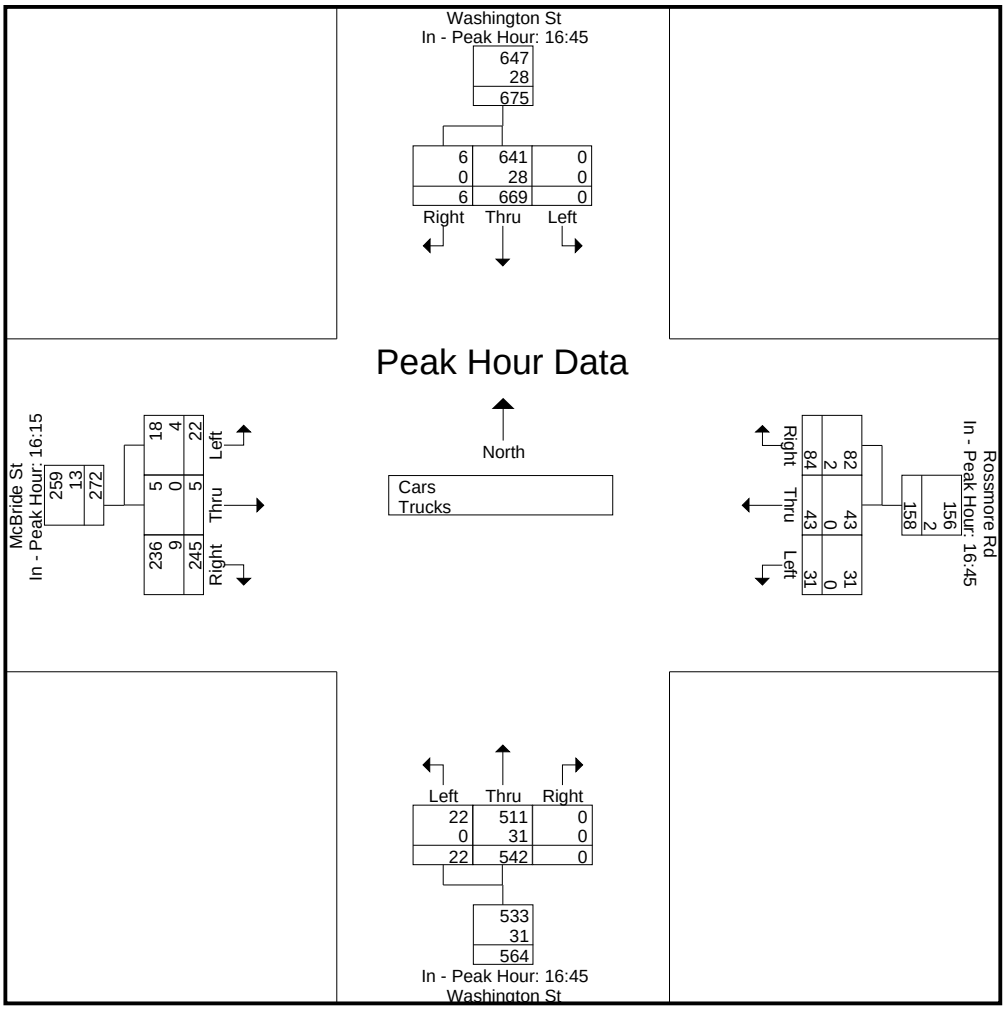


Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars

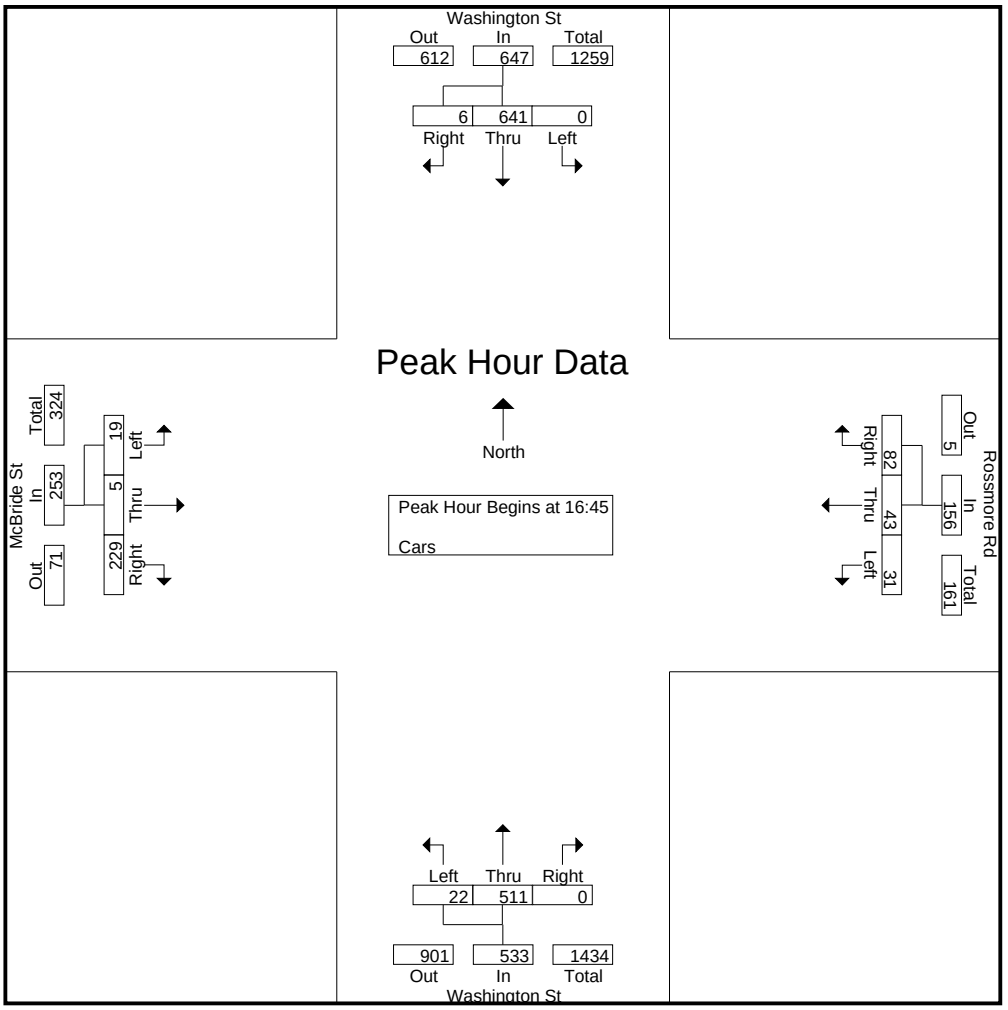
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
16:00	0	158	1	7	7	19	5	124	0	7	4	46	378
16:15	0	148	1	3	11	22	7	109	0	6	0	60	367
16:30	0	132	0	2	7	26	9	118	0	2	2	58	356
16:45	0	161	0	10	13	22	8	128	0	3	3	60	408
Total	0	599	2	22	38	89	29	479	0	18	9	224	1509
17:00	0	148	2	3	9	18	5	131	0	7	0	58	381
17:15	0	168	1	10	8	20	4	126	0	2	2	54	395
17:30	0	164	3	8	13	22	5	126	0	7	0	57	405
17:45	0	160	1	5	9	17	13	122	0	3	2	54	386
Total	0	640	7	26	39	77	27	505	0	19	4	223	1567
Grand Total	0	1239	9	48	77	166	56	984	0	37	13	447	3076
Apprch %	0	99.3	0.7	16.5	26.5	57	5.4	94.6	0	7.4	2.6	89.9	
Total %	0	40.3	0.3	1.6	2.5	5.4	1.8	32	0	1.2	0.4	14.5	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 16:45																	
16:45	0	161	0	161	**10**	**13**	**22**	**45**	**8**	128	0	**136**	3	**3**	**60**	**66**	**408**
17:00	0	148	2	150	3	9	18	30	5	**131**	0	136	**7**	0	58	65	381
17:15	0	**168**	1	**169**	10	8	20	38	4	126	0	130	2	2	54	58	395
17:30	0	164	**3**	167	8	13	22	43	5	126	0	131	7	0	57	64	405
Total Volume	0	641	6	647	31	43	82	156	22	511	0	533	19	5	229	253	1589
% App. Total	0	99.1	0.9		19.9	27.6	52.6		4.1	95.9	0		7.5	2	90.5		
PHF	.000	.954	.500	.957	.775	.827	.932	.867	.688	.975	.000	.980	.679	.417	.954	.958	.974

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



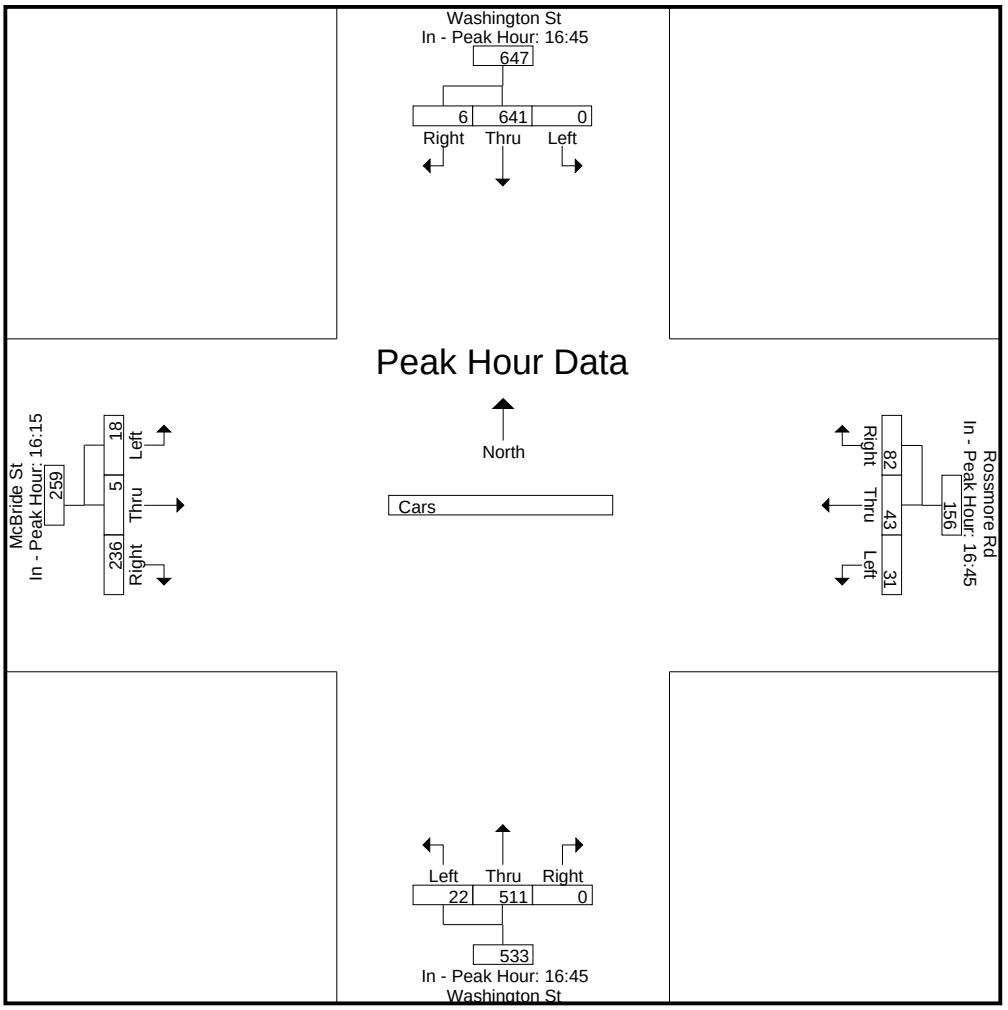
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	16:45				16:45				16:45				16:15			
+0 mins.	0	161	0	161	**10**	**13**	**22**	**45**	**8**	128	0	**136**	6	0	**60**	**66**
+15 mins.	0	148	2	150	3	9	18	30	5	**131**	0	136	2	2	58	62
+30 mins.	0	**168**	1	**169**	10	8	20	38	4	126	0	130	3	**3**	60	66
+45 mins.	0	164	**3**	167	8	13	22	43	5	126	0	131	**7**	0	58	65
Total Volume	0	641	6	647	31	43	82	156	22	511	0	533	18	5	236	259
% App. Total	0	99.1	0.9		19.9	27.6	52.6		4.1	95.9	0		6.9	1.9	91.1	
PHF	.000	.954	.500	.957	.775	.827	.932	.867	.688	.975	.000	.980	.643	.417	.983	.981

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011

Groups Printed- Trucks

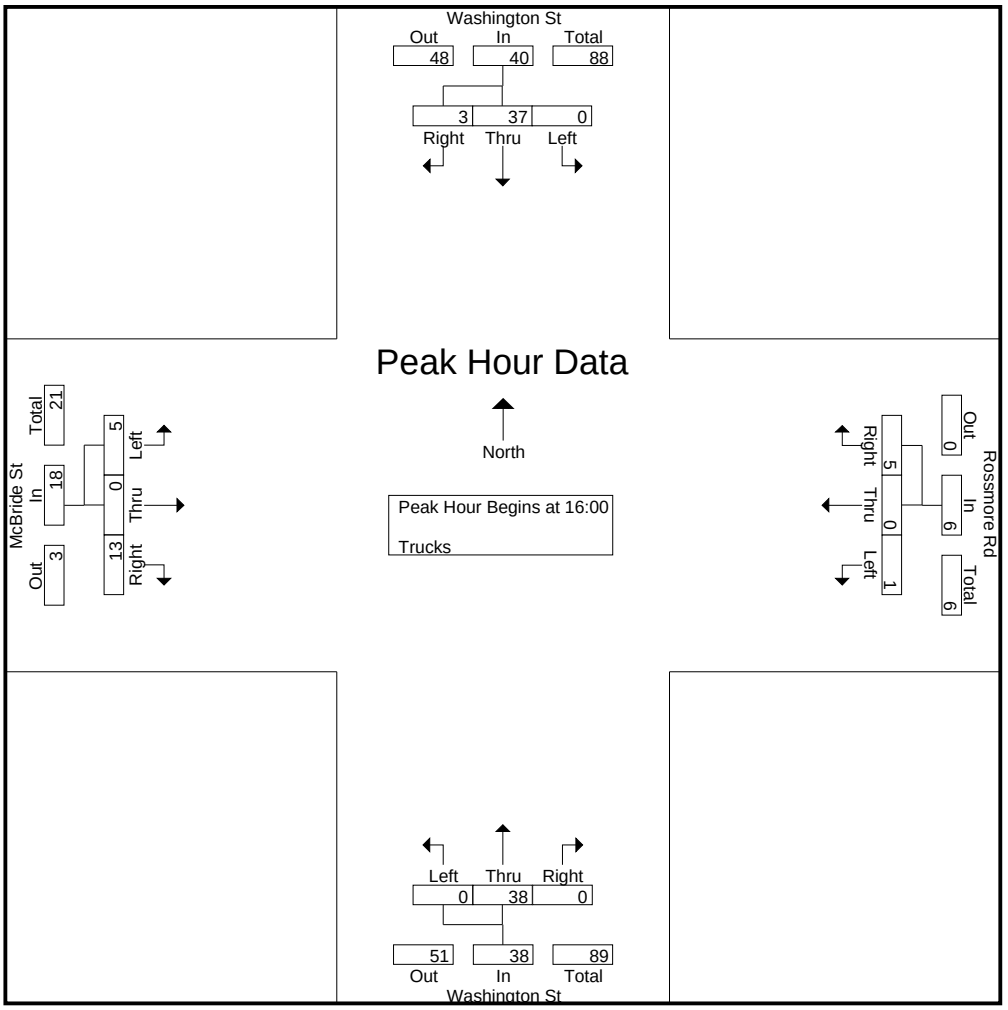
	Washington St From North			Rossmore Rd From East			Washington St From South			McBride St From West			
Start Time	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Left	Thru	Right	Int. Total
16:00	0	6	1	0	0	2	0	6	0	1	0	5	21
16:15	0	11	1	1	0	1	0	11	0	1	0	3	29
16:30	0	10	1	0	0	1	0	10	0	3	0	1	26
16:45	0	10	0	0	0	1	0	11	0	0	0	4	26
Total	0	37	3	1	0	5	0	38	0	5	0	13	102
17:00	0	10	0	0	0	0	0	6	0	0	0	1	17
17:15	0	5	0	0	0	0	0	6	0	0	0	1	12
17:30	0	3	0	0	0	1	0	8	0	0	0	0	12
17:45	0	3	0	0	0	1	0	7	0	0	0	1	12
Total	0	21	0	0	0	2	0	27	0	0	0	3	53
Grand Total	0	58	3	1	0	7	0	65	0	5	0	16	155
Apprch %	0	95.1	4.9	12.5	0	87.5	0	100	0	23.8	0	76.2	
Total %	0	37.4	1.9	0.6	0	4.5	0	41.9	0	3.2	0	10.3	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 16:00																	
16:00	0	6	**1**	7	0	0	**2**	**2**	0	6	0	6	1	0	**5**	**6**	21
16:15	0	**11**	1	**12**	**1**	0	1	2	0	**11**	0	**11**	1	0	3	4	**29**
16:30	0	10	1	11	0	0	1	1	0	10	0	10	**3**	0	1	4	26
16:45	0	10	0	10	0	0	1	1	0	11	0	11	0	0	4	4	26
Total Volume	0	37	3	40	1	0	5	6	0	38	0	38	5	0	13	18	102
% App. Total	0	92.5	7.5		16.7	0	83.3		0	100	0		27.8	0	72.2		
PHF	.000	.841	.750	.833	.250	.000	.625	.750	.000	.864	.000	.864	.417	.000	.650	.750	.879

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



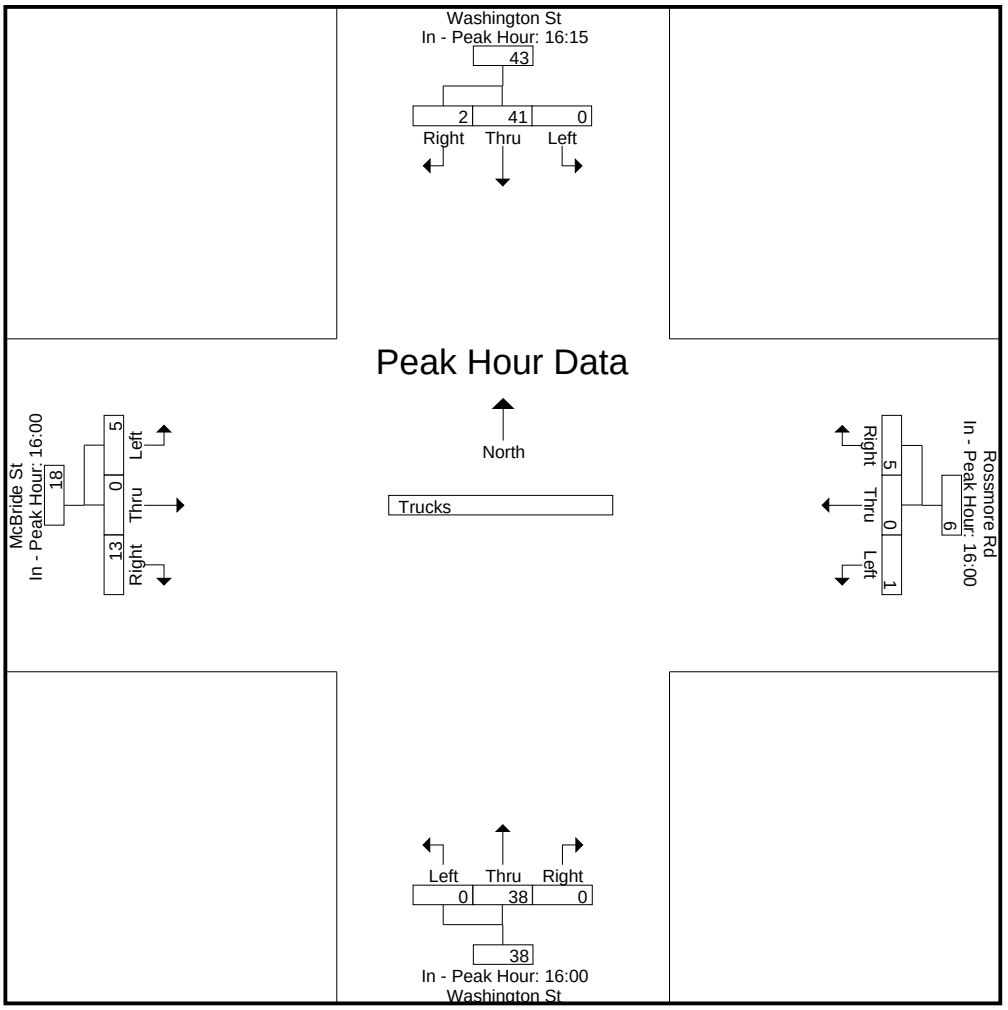
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	16:15				16:00				16:00				16:00			
+0 mins.	0	**11**	**1**	**12**	0	0	**2**	**2**	0	6	0	6	1	0	**5**	**6**
+15 mins.	0	10	1	11	**1**	0	1	2	0	**11**	0	**11**	1	0	3	4
+30 mins.	0	10	0	10	0	0	1	1	0	10	0	10	**3**	0	1	4
+45 mins.	0	10	0	10	0	0	1	1	0	11	0	11	0	0	4	4
Total Volume	0	41	2	43	1	0	5	6	0	38	0	38	5	0	13	18
% App. Total	0	95.3	4.7		16.7	0	83.3		0	100	0		27.8	0	72.2	
PHF	.000	.932	.500	.896	.250	.000	.625	.750	.000	.864	.000	.864	.417	.000	.650	.750

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 1

Groups Printed- Bikes Peds

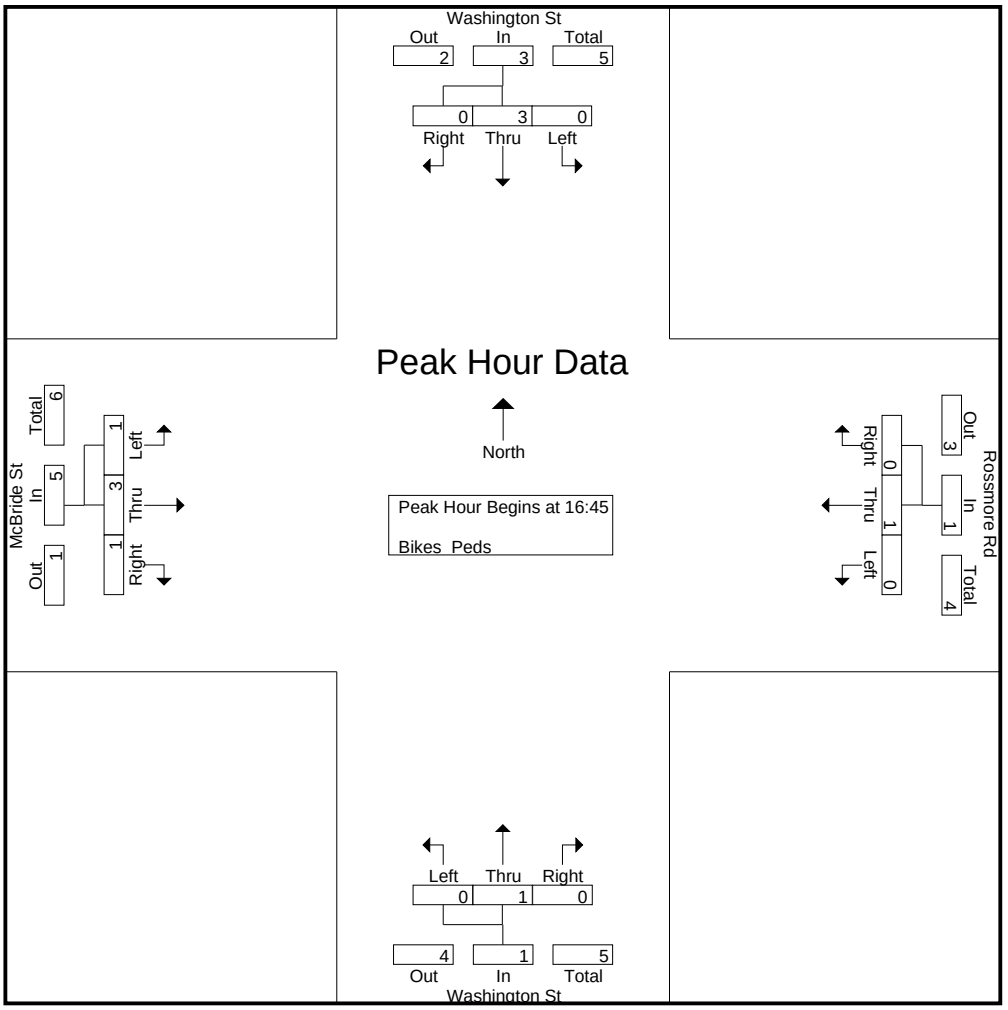
	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West						
Start Time	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Left	Thru	Right	Peds	Exclu. Total	Inclu. Total	Int. Total
16:00	0	0	0	2	0	0	0	5	0	1	0	5	0	0	0	0	12	1	13
16:15	0	1	0	0	0	2	0	2	0	2	0	1	0	0	0	1	4	5	9
16:30	0	0	0	0	0	0	0	1	0	0	0	2	0	0	0	0	3	0	3
16:45	0	0	0	7	0	0	0	7	0	1	0	5	0	2	0	3	22	3	25
Total	0	1	0	9	0	2	0	15	0	4	0	13	0	2	0	4	41	9	50
17:00	0	0	0	0	0	0	0	2	0	0	0	3	0	0	1	5	10	1	11
17:15	0	1	0	2	0	0	0	1	0	0	0	0	0	0	0	1	4	1	5
17:30	0	2	0	1	0	1	0	3	0	0	0	2	1	1	0	4	10	5	15
17:45	0	2	0	1	0	0	0	0	0	0	0	2	0	0	0	1	4	2	6
Total	0	5	0	4	0	1	0	6	0	0	0	7	1	1	1	11	28	9	37
Grand Total	0	6	0	13	0	3	0	21	0	4	0	20	1	3	1	15	69	18	87
Apprch %	0	100	0		0	100	0		0	100	0		20	60	20				
Total %	0	33.3	0		0	16.7	0		0	22.2	0		5.6	16.7	5.6		79.3	20.7	

	Washington St From North				Rossmore Rd From East				Washington St From South				McBride St From West				
Start Time	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Left	Thru	Right	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 16:45																	
16:45	0	0	0	0	0	0	0	0	0	**1**	0	**1**	0	**2**	0	**2**	3
17:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**1**	1	1
17:15	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
17:30	0	**2**	0	**2**	0	**1**	0	**1**	0	0	0	0	**1**	1	0	2	**5**
Total Volume	0	3	0	3	0	1	0	1	0	1	0	1	1	3	1	5	10
% App. Total	0	100	0		0	100	0		0	100	0		20	60	20		
PHF	.000	.375	.000	.375	.000	.250	.000	.250	.000	.250	.000	.250	.250	.375	.250	.625	.500

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 2



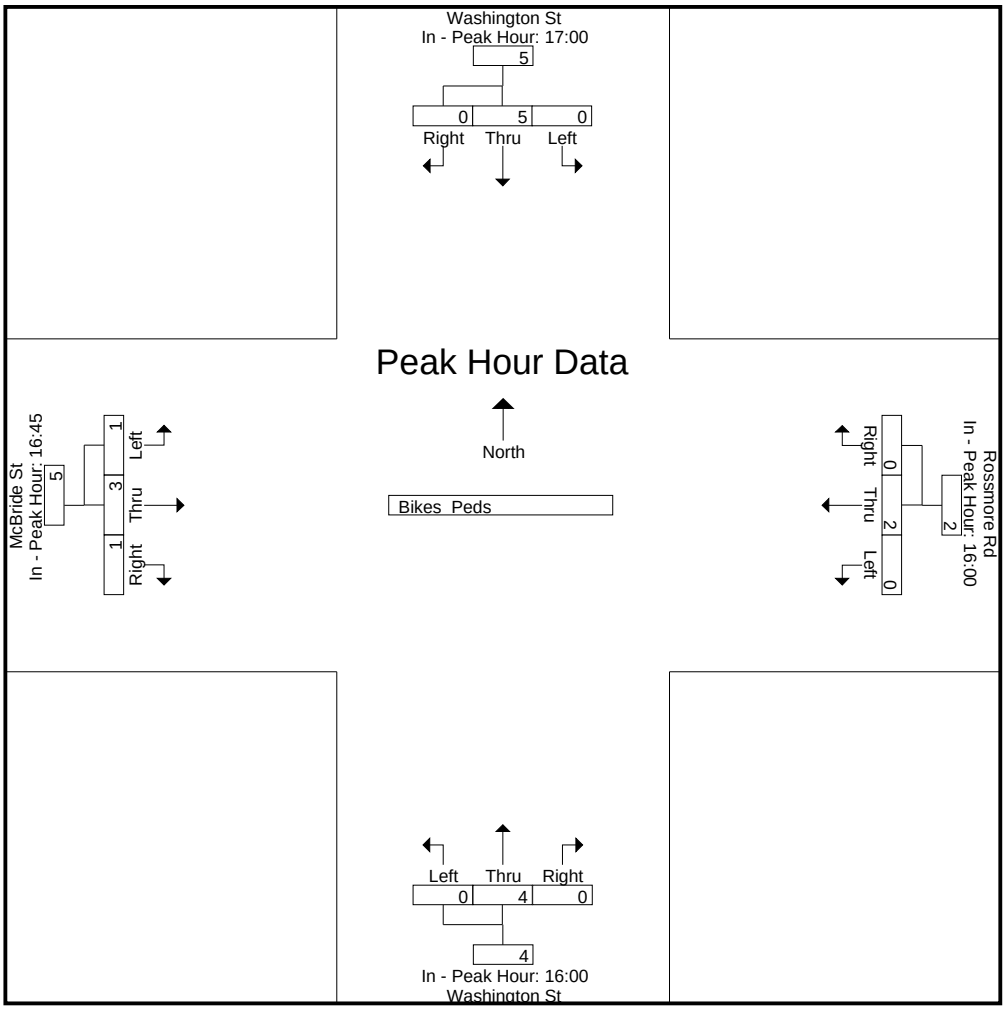
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1
Peak Hour for Each Approach Begins at:

	17:00				16:00				16:00				16:45			
+0 mins.	0	0	0	0	0	0	0	0	0	1	0	1	0	**2**	0	**2**
+15 mins.	0	1	0	1	0	**2**	0	**2**	0	**2**	0	**2**	0	0	**1**	1
+30 mins.	0	**2**	0	**2**	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	0	2	0	2	0	0	0	0	0	1	0	1	**1**	1	0	2
Total Volume	0	5	0	5	0	2	0	2	0	4	0	4	1	3	1	5
% App. Total	0	100	0		0	100	0		0	100	0		20	60	20	
PHF	.000	.625	.000	.625	.000	.250	.000	.250	.000	.500	.000	.500	.250	.375	.250	.625

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Rossmore Rd / McBride St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039001
Site Code : 11039001
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

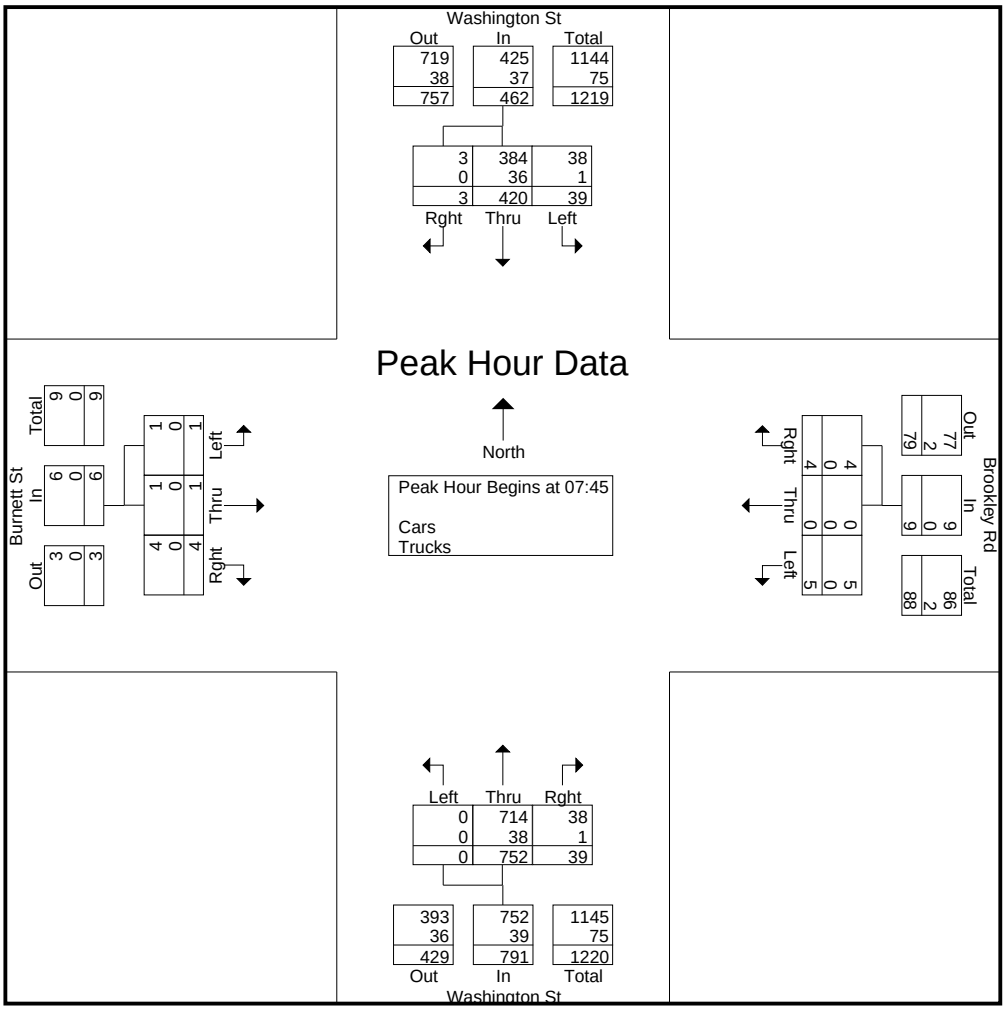
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
07:00	12	81	0	1	0	3	0	177	6	0	1	0	281
07:15	2	106	0	3	0	1	0	183	8	0	0	0	303
07:30	8	97	0	5	0	3	0	188	12	0	0	0	313
07:45	8	95	2	3	0	0	0	182	8	0	1	0	299
Total	30	379	2	12	0	7	0	730	34	0	2	0	1196
08:00	12	94	1	2	0	1	0	201	6	1	0	1	319
08:15	7	113	0	0	0	2	0	198	8	0	0	2	330
08:30	12	118	0	0	0	1	0	171	17	0	0	1	320
08:45	15	100	0	3	0	1	0	137	5	0	1	1	263
Total	46	425	1	5	0	5	0	707	36	1	1	5	1232
Grand Total	76	804	3	17	0	12	0	1437	70	1	3	5	2428
Apprch %	8.6	91.1	0.3	58.6	0	41.4	0	95.4	4.6	11.1	33.3	55.6	
Total %	3.1	33.1	0.1	0.7	0	0.5	0	59.2	2.9	0	0.1	0.2	
Cars	74	736	3	15	0	10	0	1358	68	1	3	5	2273
% Cars	97.4	91.5	100	88.2	0	83.3	0	94.5	97.1	100	100	100	93.6
Trucks	2	68	0	2	0	2	0	79	2	0	0	0	155
% Trucks	2.6	8.5	0	11.8	0	16.7	0	5.5	2.9	0	0	0	6.4

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:45																	
07:45	8	95	**2**	105	**3**	0	0	**3**	0	182	8	190	0	**1**	0	1	299
08:00	**12**	94	1	107	2	0	1	3	0	**201**	6	**207**	**1**	0	1	**2**	319
08:15	7	113	0	120	0	0	**2**	2	0	198	8	206	0	0	**2**	2	**330**
08:30	12	**118**	0	**130**	0	0	1	1	0	171	**17**	188	0	0	1	1	320
Total Volume	39	420	3	462	5	0	4	9	0	752	39	791	1	1	4	6	1268
% App. Total	8.4	90.9	0.6		55.6	0	44.4		0	95.1	4.9		16.7	16.7	66.7		
PHF	.813	.890	.375	.888	.417	.000	.500	.750	.000	.935	.574	.955	.250	.250	.500	.750	.961
Cars	38	384	3	425	5	0	4	9	0	714	38	752	1	1	4	6	1192
% Cars	97.4	91.4	100	92.0	100	0	100	100	0	94.9	97.4	95.1	100	100	100	100	94.0
Trucks	1	36	0	37	0	0	0	0	0	38	1	39	0	0	0	0	76
% Trucks	2.6	8.6	0	8.0	0	0	0	0	0	5.1	2.6	4.9	0	0	0	0	6.0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

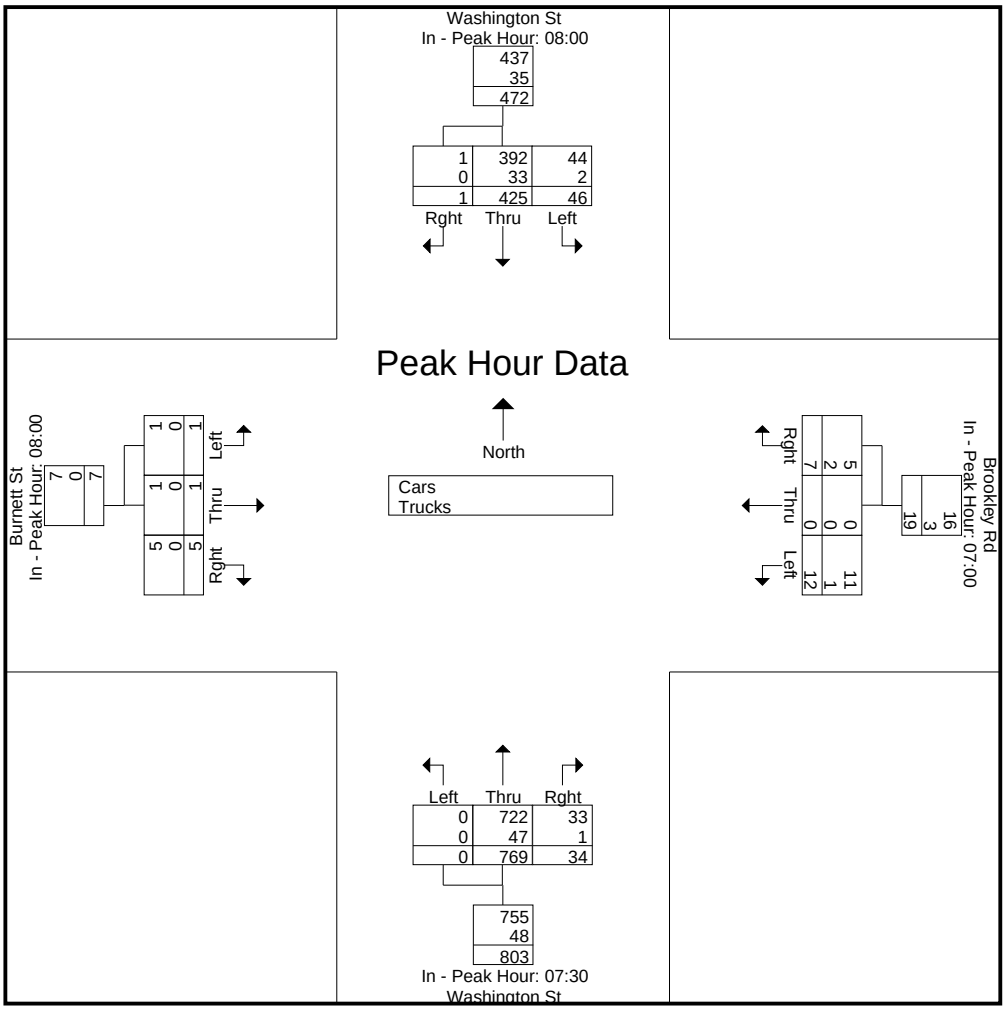
Peak Hour for Each Approach Begins at:

	08:00				07:00				07:30				08:00			
+0 mins.	12	94	**1**	107	1	0	**3**	4	0	188	**12**	200	**1**	0	1	**2**
+15 mins.	7	113	0	120	3	0	1	4	0	182	8	190	0	0	**2**	2
+30 mins.	12	**118**	0	**130**	**5**	0	3	**8**	0	**201**	6	**207**	0	0	1	1
+45 mins.	**15**	100	0	115	3	0	0	3	0	198	8	206	0	**1**	1	2
Total Volume	46	425	1	472	12	0	7	19	0	769	34	803	1	1	5	7
% App. Total	9.7	90	0.2		63.2	0	36.8		0	95.8	4.2		14.3	14.3	71.4	
PHF	.767	.900	.250	.908	.600	.000	.583	.594	.000	.956	.708	.970	.250	.250	.625	.875
Cars	44	392	1	437	11	0	5	16	0	722	33	755	1	1	5	7
% Cars	95.7	92.2	100	92.6	91.7	0	71.4	84.2	0	93.9	97.1	94	100	100	100	100
Trucks	2	33	0	35	1	0	2	3	0	47	1	48	0	0	0	0
% Trucks	4.3	7.8	0	7.4	8.3	0	28.6	15.8	0	6.1	2.9	6	0	0	0	0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011

Groups Printed- Cars

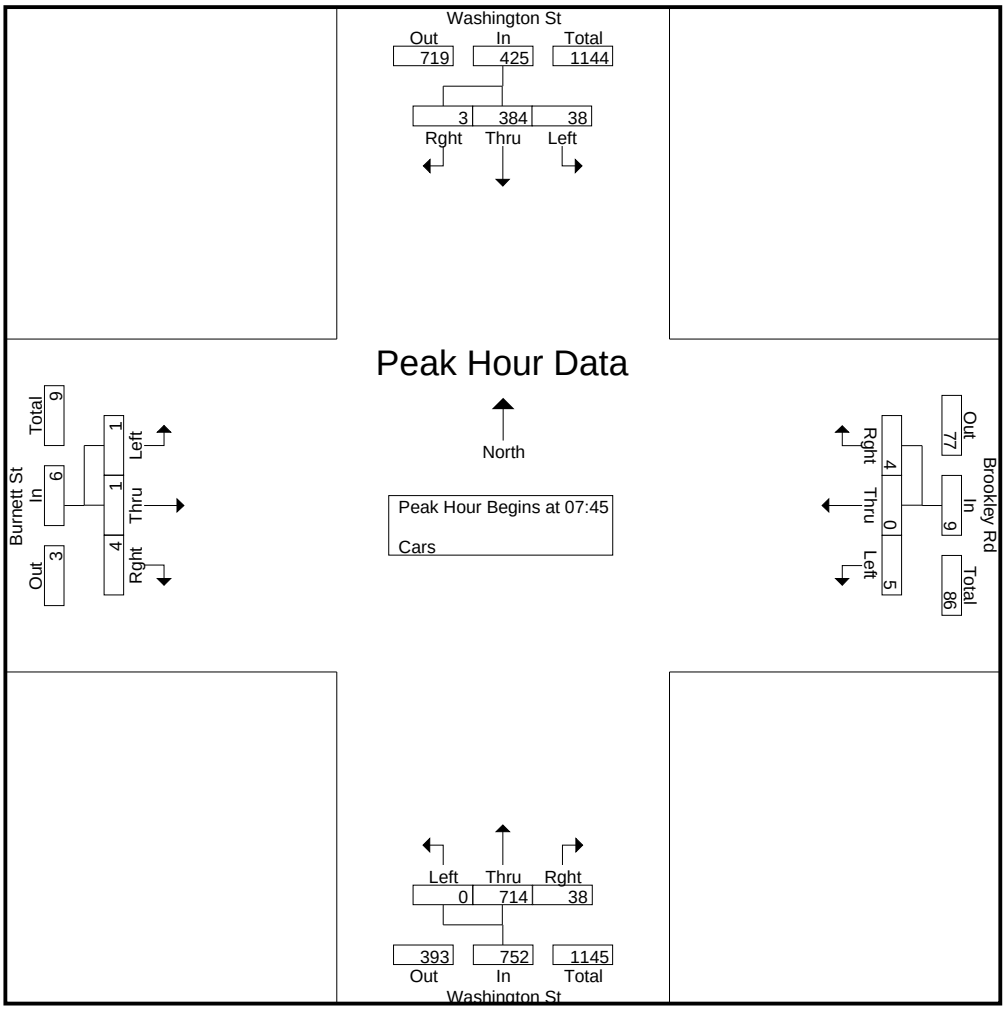
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
07:00	12	74	0	1	0	3	0	168	6	0	1	0	265
07:15	2	98	0	3	0	1	0	170	8	0	0	0	282
07:30	8	87	0	4	0	1	0	172	12	0	0	0	284
07:45	8	85	2	3	0	0	0	169	8	0	1	0	276
Total	30	344	2	11	0	5	0	679	34	0	2	0	1107
08:00	12	82	1	2	0	1	0	191	6	1	0	1	297
08:15	7	107	0	0	0	2	0	190	7	0	0	2	315
08:30	11	110	0	0	0	1	0	164	17	0	0	1	304
08:45	14	93	0	2	0	1	0	134	4	0	1	1	250
Total	44	392	1	4	0	5	0	679	34	1	1	5	1166
Grand Total	74	736	3	15	0	10	0	1358	68	1	3	5	2273
Apprch %	9.1	90.5	0.4	60	0	40	0	95.2	4.8	11.1	33.3	55.6	
Total %	3.3	32.4	0.1	0.7	0	0.4	0	59.7	3	0	0.1	0.2	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:45																	
07:45	8	85	**2**	95	**3**	0	0	**3**	0	169	8	177	0	**1**	0	1	276
08:00	**12**	82	1	95	2	0	1	3	0	**191**	6	**197**	**1**	0	1	**2**	297
08:15	7	107	0	114	0	0	**2**	2	0	190	7	197	0	0	**2**	2	**315**
08:30	11	**110**	0	**121**	0	0	1	1	0	164	**17**	181	0	0	1	1	304
Total Volume	38	384	3	425	5	0	4	9	0	714	38	752	1	1	4	6	1192
% App. Total	8.9	90.4	0.7		55.6	0	44.4		0	94.9	5.1		16.7	16.7	66.7		
PHF	.792	.873	.375	.878	.417	.000	.500	.750	.000	.935	.559	.954	.250	.250	.500	.750	.946

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

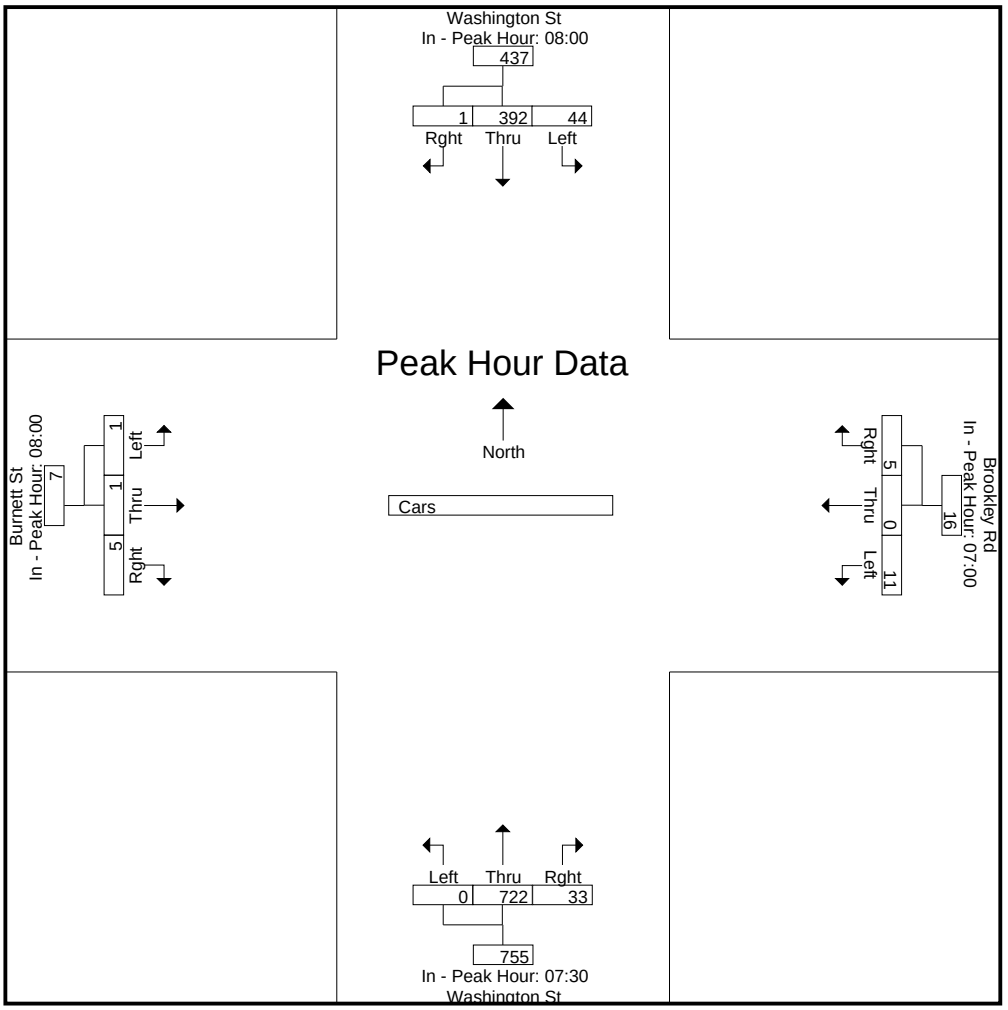
Peak Hour for Each Approach Begins at:

	08:00				07:00				07:30				08:00			
+0 mins.	12	82	**1**	95	1	0	**3**	4	0	172	**12**	184	**1**	0	1	**2**
+15 mins.	7	107	0	114	3	0	1	4	0	169	8	177	0	0	**2**	2
+30 mins.	11	**110**	0	**121**	**4**	0	1	**5**	0	**191**	6	**197**	0	0	1	1
+45 mins.	**14**	93	0	107	3	0	0	3	0	190	7	197	0	**1**	1	2
Total Volume	44	392	1	437	11	0	5	16	0	722	33	755	1	1	5	7
% App. Total	10.1	89.7	0.2		68.8	0	31.2		0	95.6	4.4		14.3	14.3	71.4	
PHF	.786	.891	.250	.903	.688	.000	.417	.800	.000	.945	.688	.958	.250	.250	.625	.875

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011

Groups Printed- Trucks

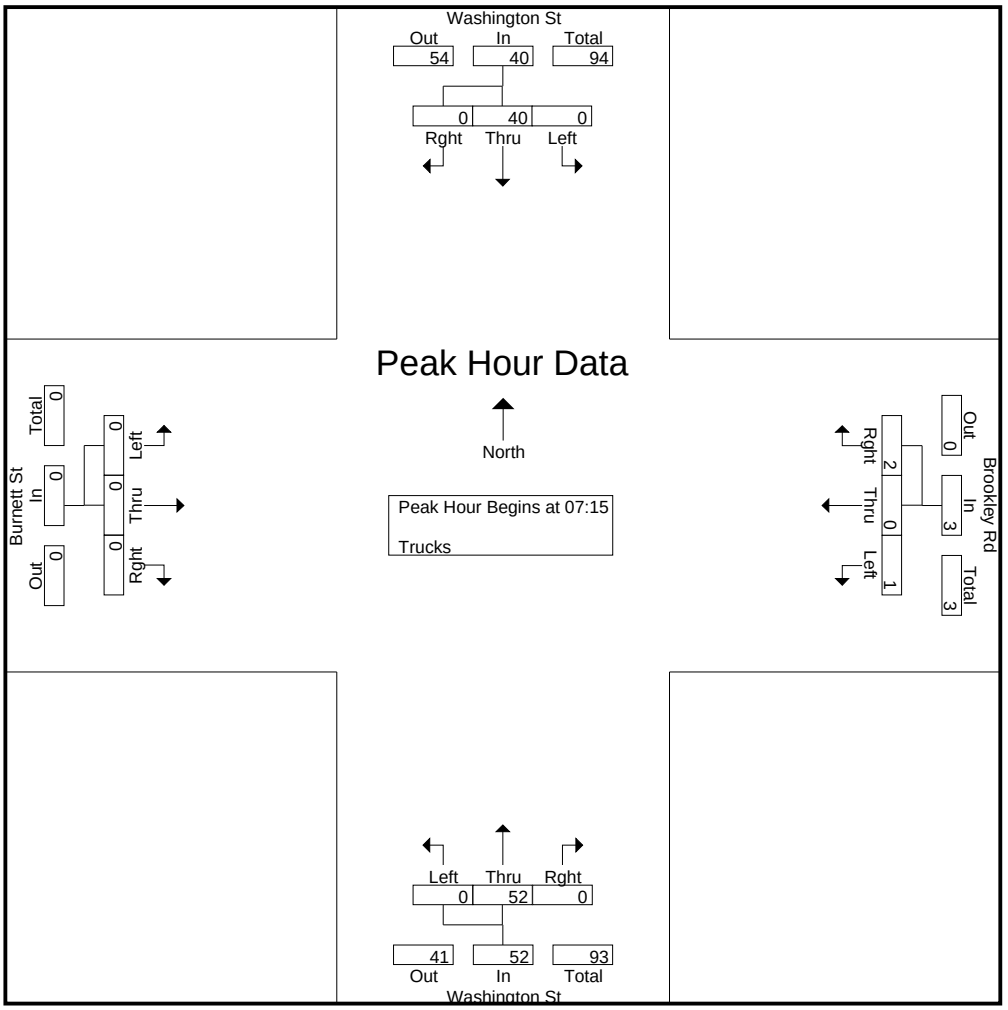
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
07:00	0	7	0	0	0	0	0	9	0	0	0	0	16
07:15	0	8	0	0	0	0	0	13	0	0	0	0	21
07:30	0	10	0	1	0	2	0	16	0	0	0	0	29
07:45	0	10	0	0	0	0	0	13	0	0	0	0	23
Total	0	35	0	1	0	2	0	51	0	0	0	0	89
08:00	0	12	0	0	0	0	0	10	0	0	0	0	22
08:15	0	6	0	0	0	0	0	8	1	0	0	0	15
08:30	1	8	0	0	0	0	0	7	0	0	0	0	16
08:45	1	7	0	1	0	0	0	3	1	0	0	0	13
Total	2	33	0	1	0	0	0	28	2	0	0	0	66
Grand Total	2	68	0	2	0	2	0	79	2	0	0	0	155
Apprch %	2.9	97.1	0	50	0	50	0	97.5	2.5	0	0	0	
Total %	1.3	43.9	0	1.3	0	1.3	0	51	1.3	0	0	0	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 07:15																	
07:15	0	8	0	8	0	0	0	0	0	13	0	13	0	0	0	0	21
07:30	0	10	0	10	**1**	0	**2**	**3**	0	**16**	0	**16**	0	0	0	0	**29**
07:45	0	10	0	10	0	0	0	0	0	13	0	13	0	0	0	0	23
08:00	0	**12**	0	**12**	0	0	0	0	0	10	0	10	0	0	0	0	22
Total Volume	0	40	0	40	1	0	2	3	0	52	0	52	0	0	0	0	95
% App. Total	0	100	0		33.3	0	66.7		0	100	0		0	0	0		
PHF	.000	.833	.000	.833	.250	.000	.250	.250	.000	.813	.000	.813	.000	.000	.000	.000	.819

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

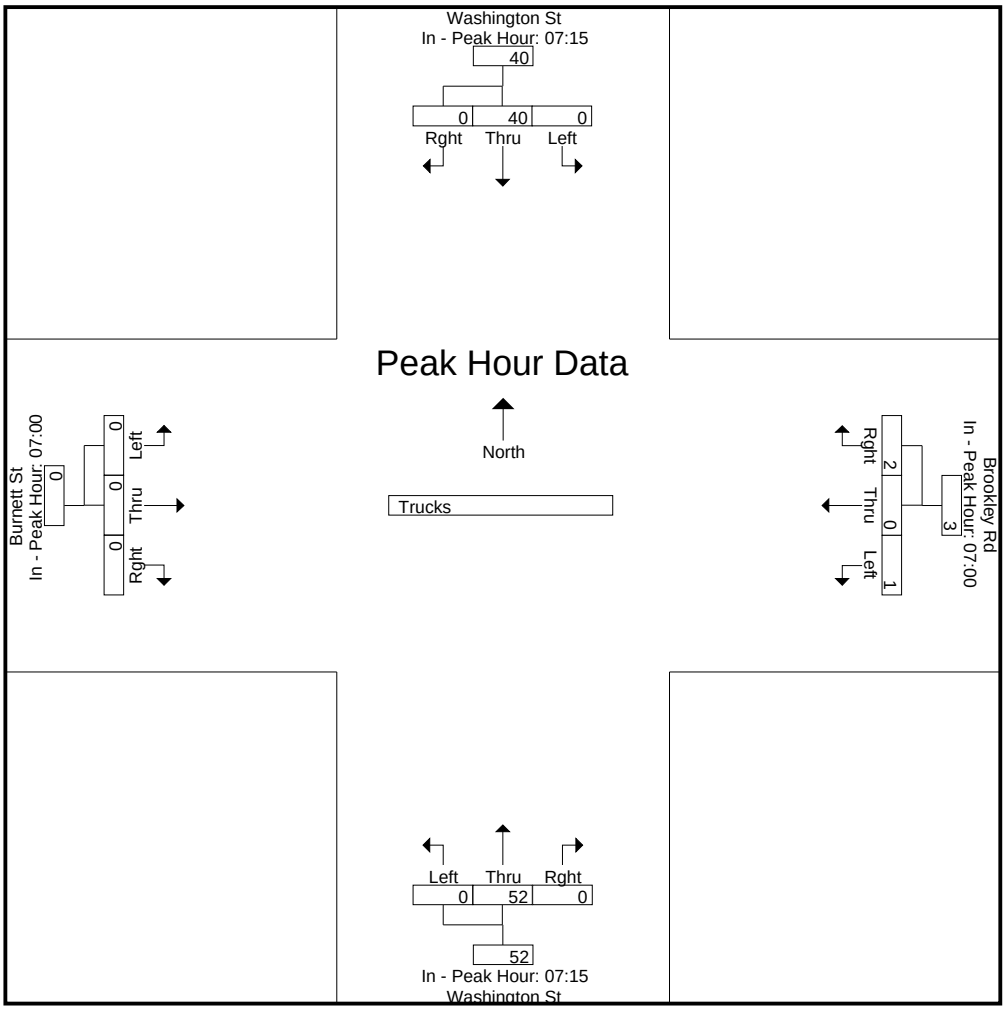
Peak Hour for Each Approach Begins at:

	07:15				07:00				07:15				07:00			
+0 mins.	0	8	0	8	0	0	0	0	0	13	0	13	0	0	0	0
+15 mins.	0	10	0	10	0	0	0	0	0	**16**	0	**16**	0	0	0	0
+30 mins.	0	10	0	10	**1**	0	**2**	**3**	0	13	0	13	0	0	0	0
+45 mins.	0	**12**	0	**12**	0	0	0	0	0	10	0	10	0	0	0	0
Total Volume	0	40	0	40	1	0	2	3	0	52	0	52	0	0	0	0
% App. Total	0	100	0		33.3	0	66.7		0	100	0		0	0	0	
PHF	.000	.833	.000	.833	.250	.000	.250	.250	.000	.813	.000	.813	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011

Groups Printed- Bikes Peds

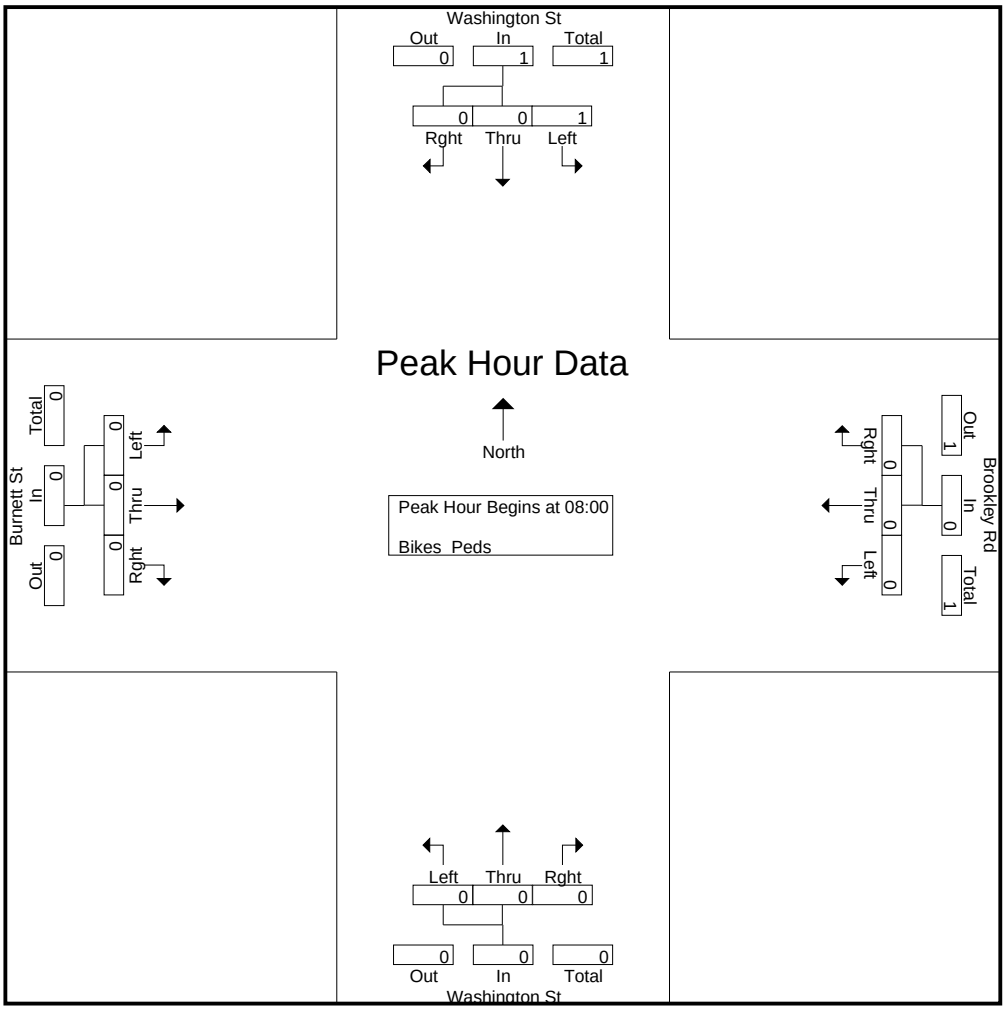
	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West						
Start Time	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Exclu. Total	Inclu. Total	Int. Total
07:00	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	8	9	0	9
07:15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	12	0	12
07:30	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	3	0	3
07:45	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	1	2	0	2
Total	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	24	26	0	26
08:00	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	9	10	0	10
08:15	0	0	0	0	0	0	0	3	0	0	0	2	0	0	0	3	8	0	8
08:30	0	0	0	1	0	0	0	1	0	0	0	0	0	0	0	4	6	0	6
08:45	1	0	0	1	0	0	0	2	0	0	0	0	0	0	0	4	7	1	8
Total	1	0	0	3	0	0	0	6	0	0	0	2	0	0	0	20	31	1	32
Grand Total	1	0	0	3	0	0	0	8	0	0	0	2	0	0	0	44	57	1	58
Apprch %	100	0	0		0	0	0		0	0	0		0	0	0				
Total %	100	0	0		0	0	0		0	0	0		0	0	0		98.3	1.7	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 08:00																	
08:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
08:15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
08:30	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
08:45	**1**	0	0	**1**	0	0	0	0	0	0	0	0	0	0	0	0	**1**
Total Volume	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
% App. Total	100	0	0		0	0	0		0	0	0		0	0	0		
PHF	.250	.000	.000	.250	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.250

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

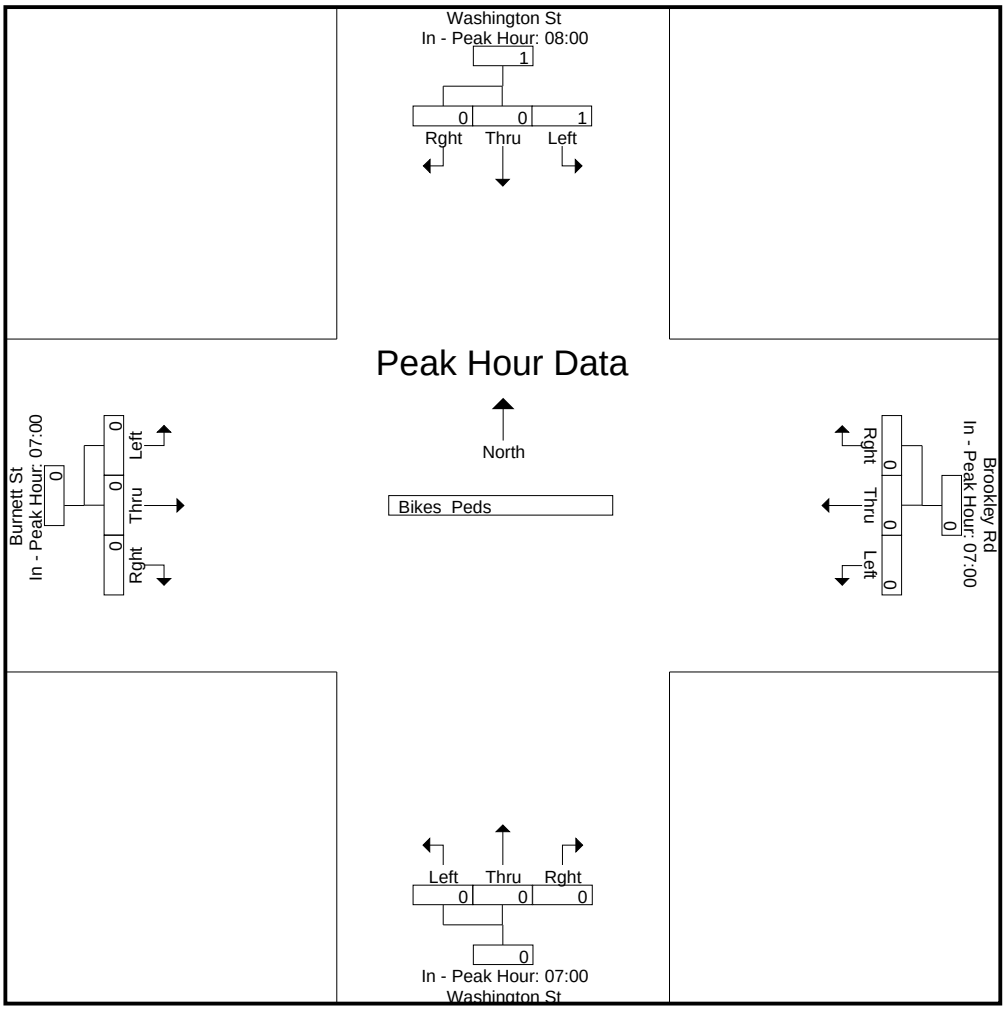
Peak Hour for Each Approach Begins at:

	08:00				07:00				07:00				07:00			
+0 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
+15 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
+45 mins.	**1**	0	0	**1**	0	0	0	0	0	0	0	0	0	0	0	0
Total Volume	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0
% App. Total	100	0	0		0	0	0		0	0	0		0	0	0	
PHF	.250	.000	.000	.250	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

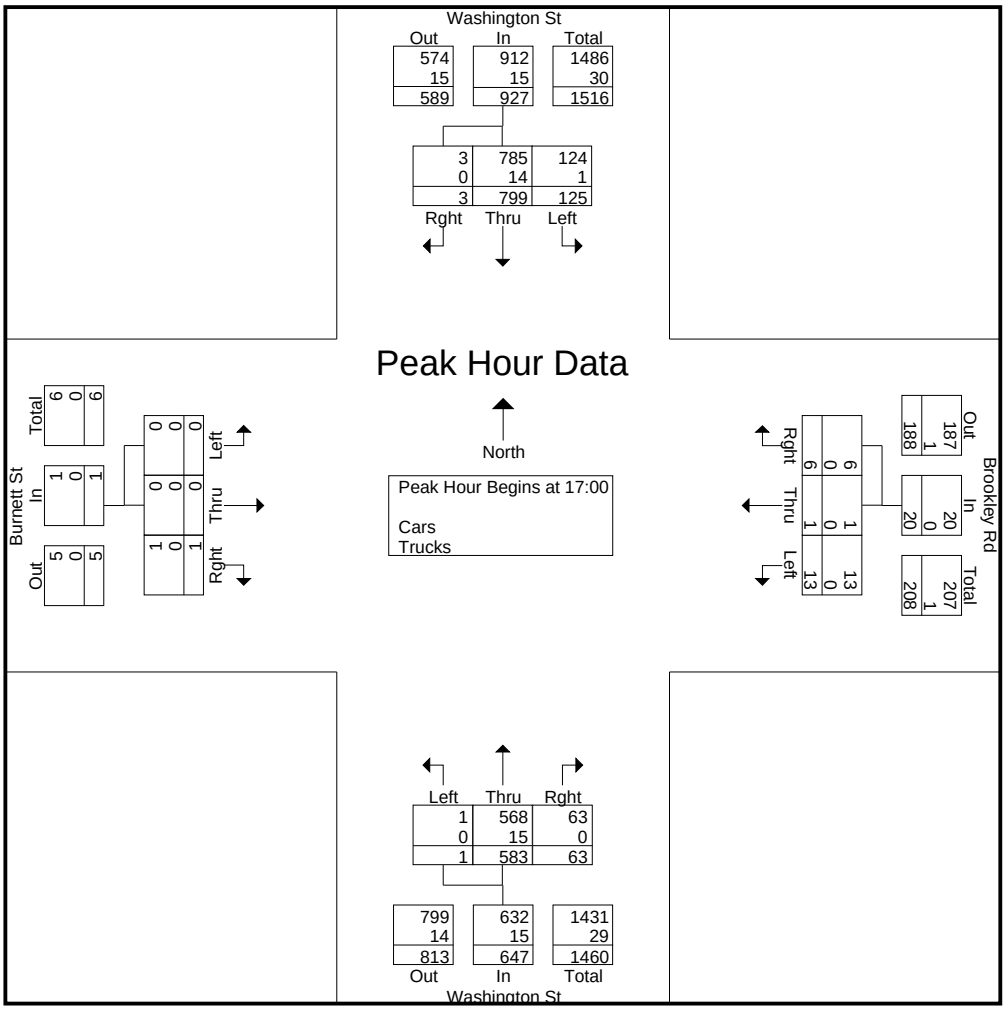
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
16:00	28	174	1	6	0	4	0	131	15	0	0	1	360
16:15	33	189	2	2	0	3	1	133	15	0	0	0	378
16:30	19	194	0	1	0	3	1	142	22	0	0	0	382
16:45	29	201	1	4	0	4	2	130	11	1	0	0	383
Total	109	758	4	13	0	14	4	536	63	1	0	1	1503
17:00	26	198	1	3	0	1	0	144	11	0	0	1	385
17:15	27	202	1	1	1	3	1	136	16	0	0	0	388
17:30	36	191	0	6	0	1	0	139	16	0	0	0	389
17:45	36	208	1	3	0	1	0	164	20	0	0	0	433
Total	125	799	3	13	1	6	1	583	63	0	0	1	1595
Grand Total	234	1557	7	26	1	20	5	1119	126	1	0	2	3098
Apprch %	13	86.6	0.4	55.3	2.1	42.6	0.4	89.5	10.1	33.3	0	66.7	
Total %	7.6	50.3	0.2	0.8	0	0.6	0.2	36.1	4.1	0	0	0.1	
Cars	230	1510	7	26	1	20	5	1080	124	1	0	2	3006
% Cars	98.3	97	100	100	100	100	100	96.5	98.4	100	0	100	97
Trucks	4	47	0	0	0	0	0	39	2	0	0	0	92
% Trucks	1.7	3	0	0	0	0	0	3.5	1.6	0	0	0	3

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 17:00																	
17:00	26	198	**1**	225	3	0	1	4	0	144	11	155	0	0	**1**	**1**	385
17:15	27	202	1	230	1	**1**	**3**	5	**1**	136	16	153	0	0	0	0	388
17:30	**36**	191	0	227	**6**	0	1	**7**	0	139	16	155	0	0	0	0	389
17:45	36	**208**	1	**245**	3	0	1	4	0	**164**	**20**	**184**	0	0	0	0	**433**
Total Volume	125	799	3	927	13	1	6	20	1	583	63	647	0	0	1	1	1595
% App. Total	13.5	86.2	0.3		65	5	30		0.2	90.1	9.7		0	0	100		
PHF	.868	.960	.750	.946	.542	.250	.500	.714	.250	.889	.788	.879	.000	.000	.250	.250	.921
Cars	124	785	3	912	13	1	6	20	1	568	63	632	0	0	1	1	1565
% Cars	99.2	98.2	100	98.4	100	100	100	100	100	97.4	100	97.7	0	0	100	100	98.1
Trucks	1	14	0	15	0	0	0	0	0	15	0	15	0	0	0	0	30
% Trucks	0.8	1.8	0	1.6	0	0	0	0	0	2.6	0	2.3	0	0	0	0	1.9

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	17:00				16:00				17:00				16:00			
+0 mins.	26	198	**1**	225	**6**	0	**4**	**10**	0	144	11	155	0	0	**1**	**1**
+15 mins.	27	202	1	230	2	0	3	5	**1**	136	16	153	0	0	0	0
+30 mins.	**36**	191	0	227	1	0	3	4	0	139	16	155	0	0	0	0
+45 mins.	36	**208**	1	**245**	4	0	4	8	0	**164**	**20**	**184**	**1**	0	0	1
Total Volume	125	799	3	927	13	0	14	27	1	583	63	647	1	0	1	2
% App. Total	13.5	86.2	0.3		48.1	0	51.9		0.2	90.1	9.7		50	0	50	
PHF	.868	.960	.750	.946	.542	.000	.875	.675	.250	.889	.788	.879	.250	.000	.250	.500
Cars	124	785	3	912	13	0	14	27	1	568	63	632	1	0	1	2
% Cars	99.2	98.2	100	98.4	100	0	100	100	100	97.4	100	97.7	100	0	100	100
Trucks	1	14	0	15	0	0	0	0	0	15	0	15	0	0	0	0
% Trucks	0.8	1.8	0	1.6	0	0	0	0	0	2.6	0	2.3	0	0	0	0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
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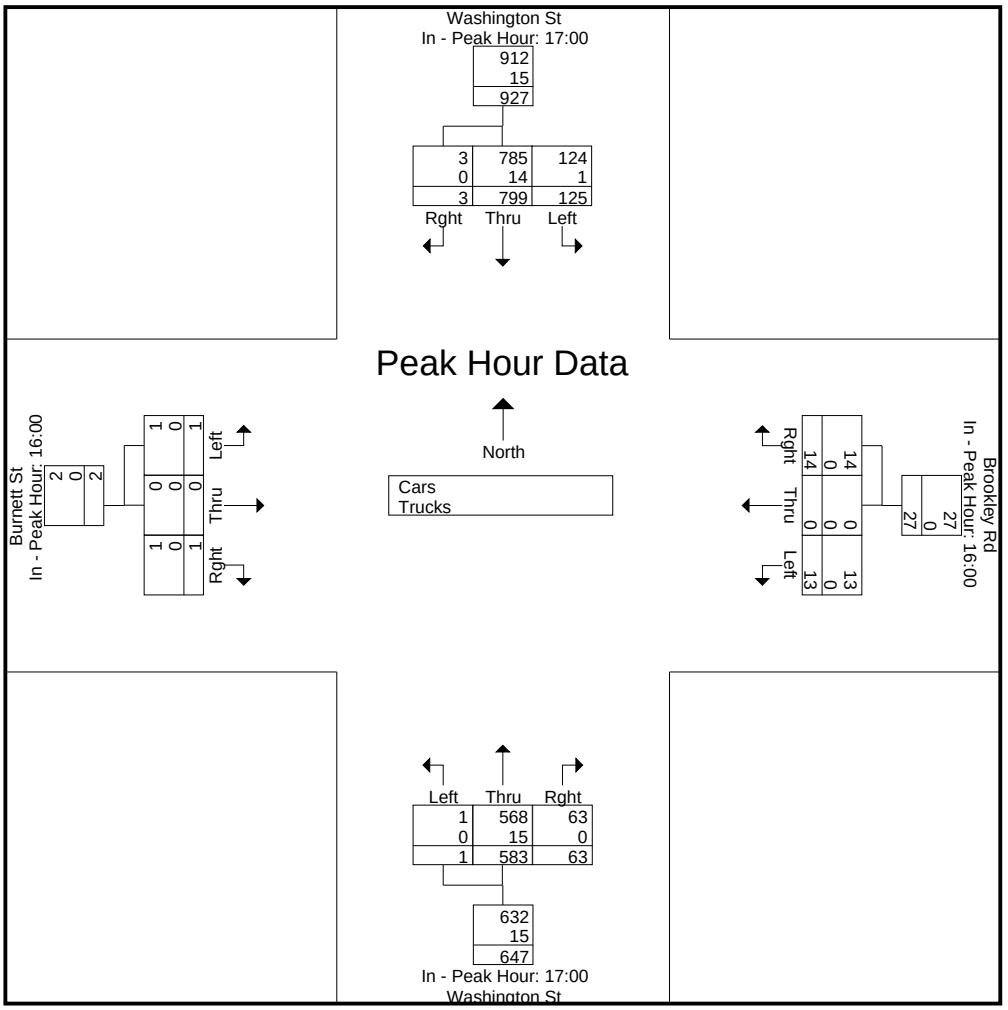


Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars

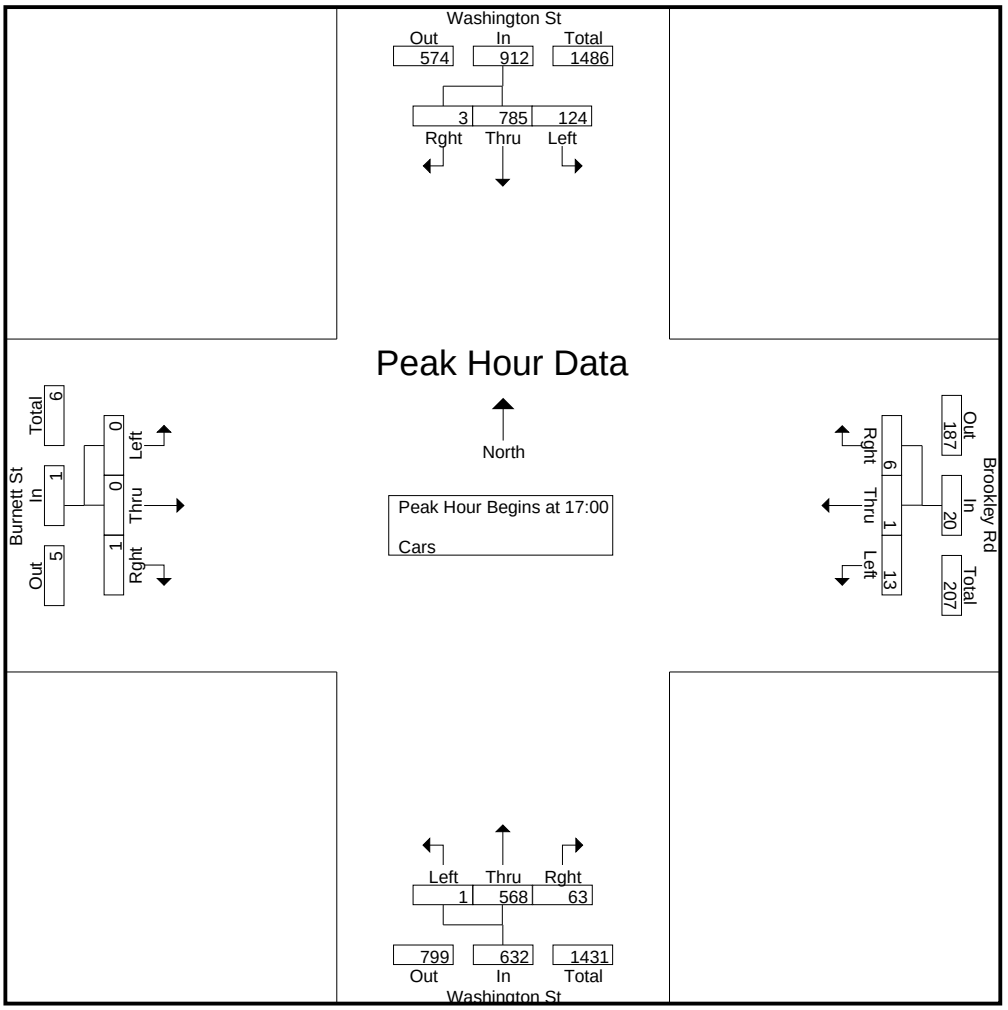
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
16:00	26	168	1	6	0	4	0	126	14	0	0	1	346
16:15	33	177	2	2	0	3	1	125	15	0	0	0	358
16:30	18	186	0	1	0	3	1	136	21	0	0	0	366
16:45	29	194	1	4	0	4	2	125	11	1	0	0	371
Total	106	725	4	13	0	14	4	512	61	1	0	1	1441
17:00	25	190	1	3	0	1	0	142	11	0	0	1	374
17:15	27	199	1	1	1	3	1	131	16	0	0	0	380
17:30	36	188	0	6	0	1	0	133	16	0	0	0	380
17:45	36	208	1	3	0	1	0	162	20	0	0	0	431
Total	124	785	3	13	1	6	1	568	63	0	0	1	1565
Grand Total	230	1510	7	26	1	20	5	1080	124	1	0	2	3006
Apprch %	13.2	86.4	0.4	55.3	2.1	42.6	0.4	89.3	10.3	33.3	0	66.7	
Total %	7.7	50.2	0.2	0.9	0	0.7	0.2	35.9	4.1	0	0	0.1	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 17:00																	
17:00	25	190	**1**	216	3	0	1	4	0	142	11	153	0	0	**1**	**1**	374
17:15	27	199	1	227	1	**1**	**3**	5	**1**	131	16	148	0	0	0	0	380
17:30	**36**	188	0	224	**6**	0	1	**7**	0	133	16	149	0	0	0	0	380
17:45	36	**208**	1	**245**	3	0	1	4	0	**162**	**20**	**182**	0	0	0	0	**431**
Total Volume	124	785	3	912	13	1	6	20	1	568	63	632	0	0	1	1	1565
% App. Total	13.6	86.1	0.3		65	5	30		0.2	89.9	10		0	0	100		
PHF	.861	.944	.750	.931	.542	.250	.500	.714	.250	.877	.788	.868	.000	.000	.250	.250	.908

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

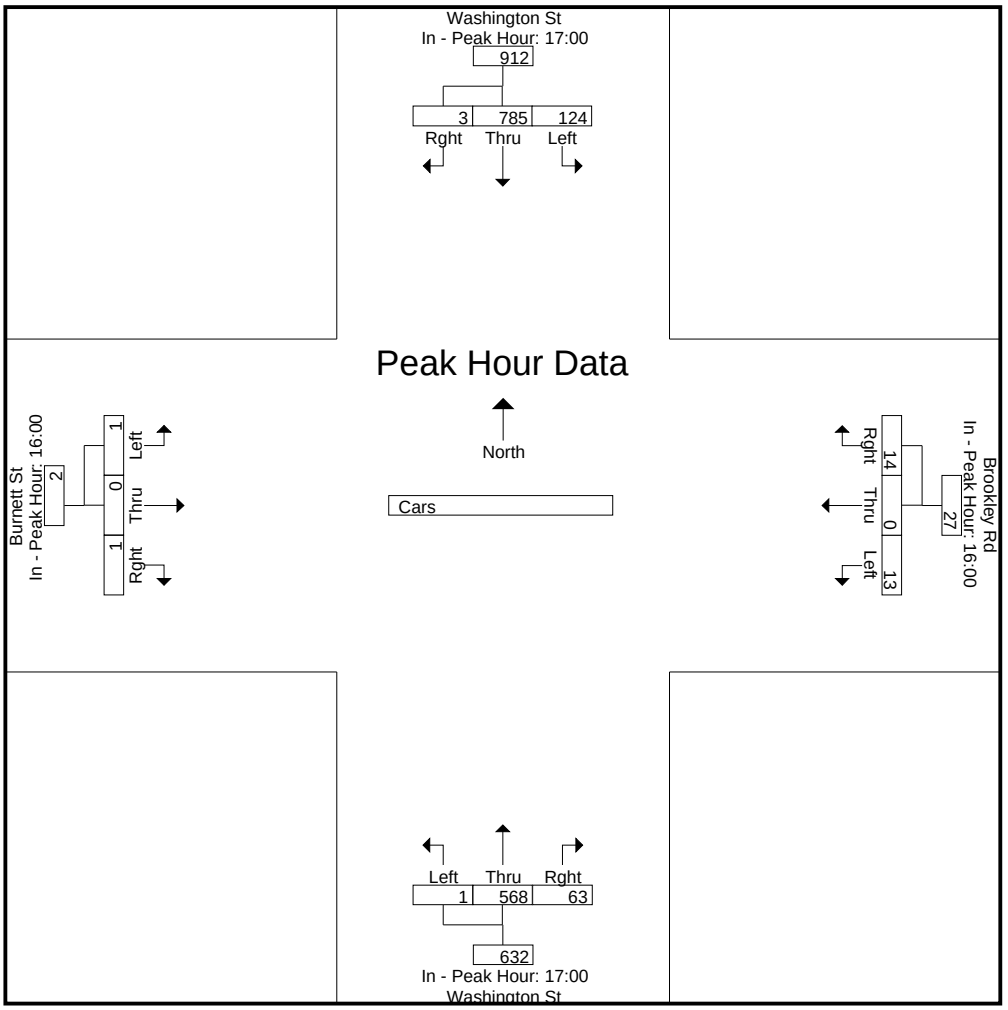
Peak Hour for Each Approach Begins at:

	17:00				16:00				17:00				16:00			
+0 mins.	25	190	**1**	216	**6**	0	**4**	**10**	0	142	11	153	0	0	**1**	**1**
+15 mins.	27	199	1	227	2	0	3	5	**1**	131	16	148	0	0	0	0
+30 mins.	**36**	188	0	224	1	0	3	4	0	133	16	149	0	0	0	0
+45 mins.	36	**208**	1	**245**	4	0	4	8	0	**162**	**20**	**182**	**1**	0	0	1
Total Volume	124	785	3	912	13	0	14	27	1	568	63	632	1	0	1	2
% App. Total	13.6	86.1	0.3		48.1	0	51.9		0.2	89.9	10		50	0	50	
PHF	.861	.944	.750	.931	.542	.000	.875	.675	.250	.877	.788	.868	.250	.000	.250	.500

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011

Groups Printed- Trucks

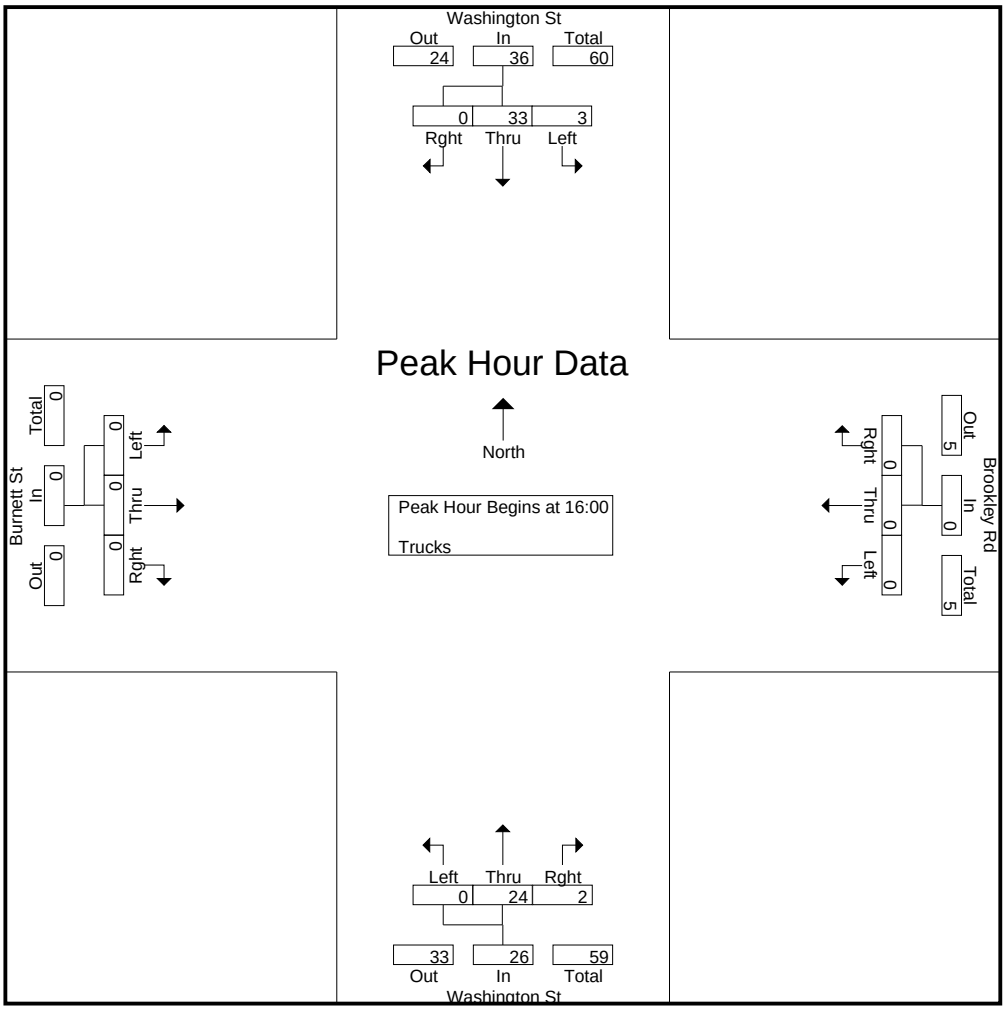
	Washington St From North			Brookley Rd From East			Washington St From South			Burnett St From West			
Start Time	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Left	Thru	Rght	Int. Total
16:00	2	6	0	0	0	0	0	5	1	0	0	0	14
16:15	0	12	0	0	0	0	0	8	0	0	0	0	20
16:30	1	8	0	0	0	0	0	6	1	0	0	0	16
16:45	0	7	0	0	0	0	0	5	0	0	0	0	12
Total	3	33	0	0	0	0	0	24	2	0	0	0	62
17:00	1	8	0	0	0	0	0	2	0	0	0	0	11
17:15	0	3	0	0	0	0	0	5	0	0	0	0	8
17:30	0	3	0	0	0	0	0	6	0	0	0	0	9
17:45	0	0	0	0	0	0	0	2	0	0	0	0	2
Total	1	14	0	0	0	0	0	15	0	0	0	0	30
Grand Total	4	47	0	0	0	0	0	39	2	0	0	0	92
Apprch %	7.8	92.2	0	0	0	0	0	95.1	4.9	0	0	0	
Total %	4.3	51.1	0	0	0	0	0	42.4	2.2	0	0	0	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 16:00																	
16:00	**2**	6	0	8	0	0	0	0	0	5	**1**	6	0	0	0	0	14
16:15	0	**12**	0	**12**	0	0	0	0	0	**8**	0	**8**	0	0	0	0	**20**
16:30	1	8	0	9	0	0	0	0	0	6	1	7	0	0	0	0	16
16:45	0	7	0	7	0	0	0	0	0	5	0	5	0	0	0	0	12
Total Volume	3	33	0	36	0	0	0	0	0	24	2	26	0	0	0	0	62
% App. Total	8.3	91.7	0		0	0	0		0	92.3	7.7		0	0	0		
PHF	.375	.688	.000	.750	.000	.000	.000	.000	.000	.750	.500	.813	.000	.000	.000	.000	.775

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

Peak Hour for Each Approach Begins at:

	16:15				16:00				16:00				16:00			
+0 mins.	0	**12**	0	**12**	0	0	0	0	0	5	**1**	6	0	0	0	0
+15 mins.	**1**	8	0	9	0	0	0	0	0	**8**	0	**8**	0	0	0	0
+30 mins.	0	7	0	7	0	0	0	0	0	6	1	7	0	0	0	0
+45 mins.	1	8	0	9	0	0	0	0	0	5	0	5	0	0	0	0
Total Volume	2	35	0	37	0	0	0	0	0	24	2	26	0	0	0	0
% App. Total	5.4	94.6	0		0	0	0		0	92.3	7.7		0	0	0	
PHF	.500	.729	.000	.771	.000	.000	.000	.000	.000	.750	.500	.813	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
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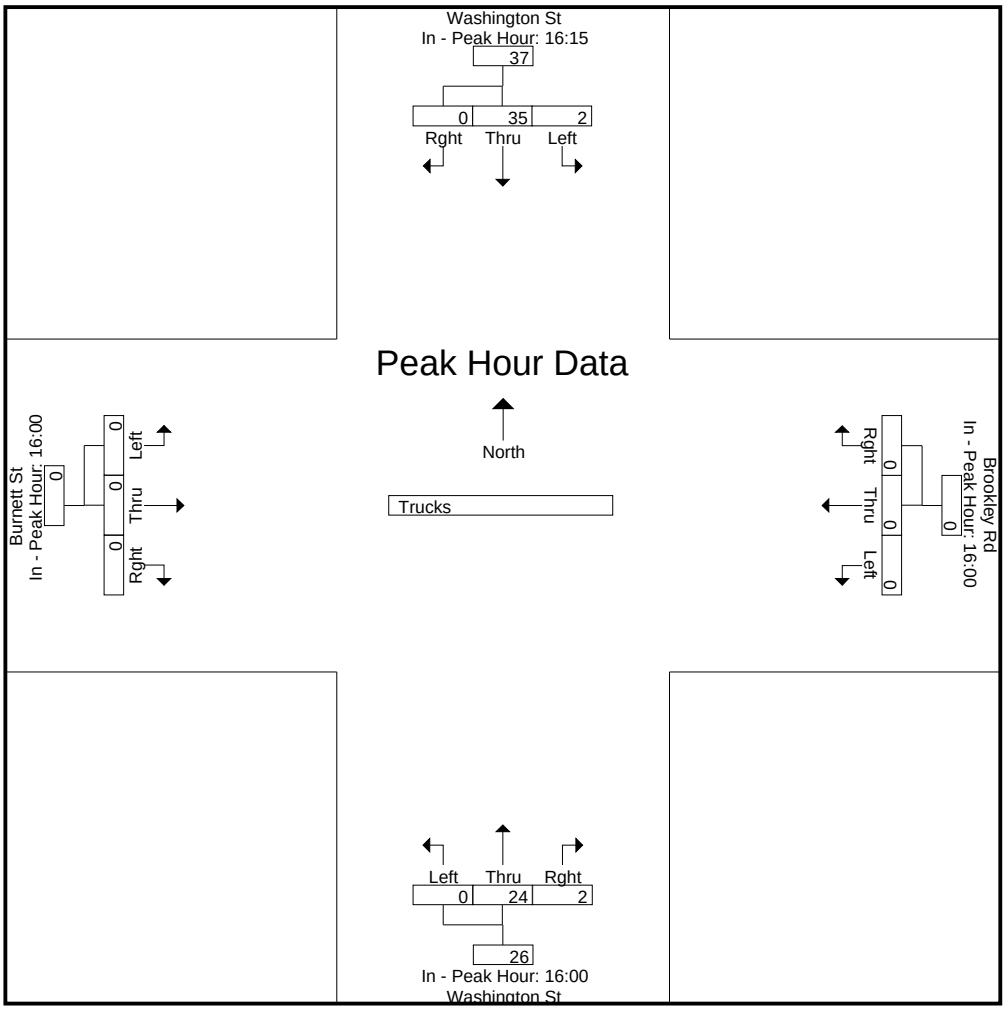


Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011

Groups Printed- Bikes Peds

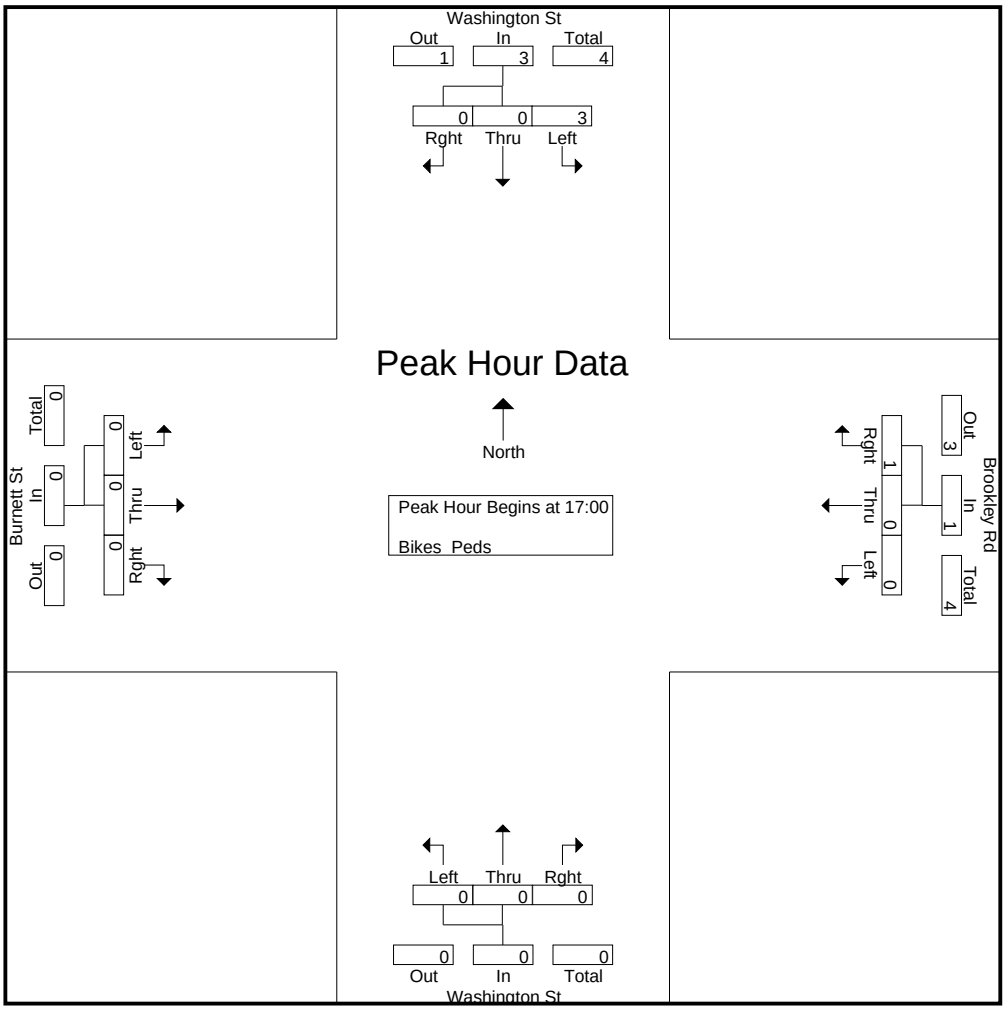
	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West						
Start Time	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Left	Thru	Rght	Peds	Exclu. Total	Inclu. Total	Int. Total
16:00	0	1	0	0	0	0	0	4	0	0	0	1	0	0	0	5	10	1	11
16:15	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	9	10	1	11
16:30	0	0	0	0	0	0	0	4	0	1	0	0	0	0	0	4	8	1	9
16:45	0	0	0	0	0	0	0	3	0	0	0	0	0	0	0	5	8	0	8
Total	0	1	0	0	0	0	0	11	0	2	0	2	0	0	0	23	36	3	39
17:00	1	0	0	0	0	0	0	7	0	0	0	0	0	0	0	10	17	1	18
17:15	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	13	18	0	18
17:30	0	0	0	0	0	0	1	5	0	0	0	0	0	0	0	4	9	1	10
17:45	2	0	0	3	0	0	0	0	0	0	0	0	0	0	0	7	10	2	12
Total	3	0	0	3	0	0	1	17	0	0	0	0	0	0	0	34	54	4	58
Grand Total	3	1	0	3	0	0	1	28	0	2	0	2	0	0	0	57	90	7	97
Apprch %	75	25	0		0	0	100		0	100	0		0	0	0				
Total %	42.9	14.3	0		0	0	14.3		0	28.6	0		0	0	0		92.8	7.2	

	Washington St From North				Brookley Rd From East				Washington St From South				Burnett St From West				
Start Time	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Left	Thru	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1																	
Peak Hour for Entire Intersection Begins at 17:00																	
17:00	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1
17:15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
17:30	0	0	0	0	0	0	**1**	**1**	0	0	0	0	0	0	0	0	1
17:45	**2**	0	0	**2**	0	0	0	0	0	0	0	0	0	0	0	0	**2**
Total Volume	3	0	0	3	0	0	1	1	0	0	0	0	0	0	0	0	4
% App. Total	100	0	0		0	0	100		0	0	0		0	0	0		
PHF	.375	.000	.000	.375	.000	.000	.250	.250	.000	.000	.000	.000	.000	.000	.000	.000	.500

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

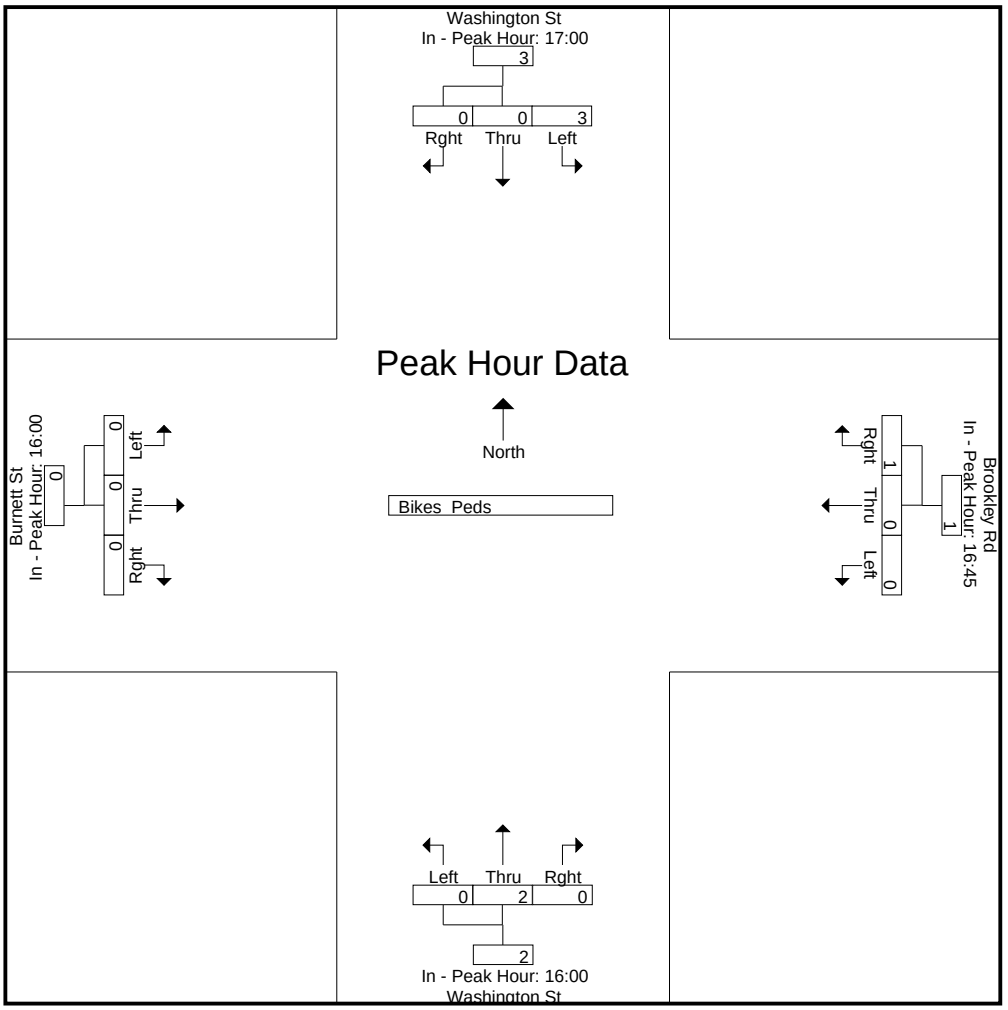
Peak Hour for Each Approach Begins at:

	17:00				16:45				16:00				16:00			
+0 mins.	1	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0
+15 mins.	0	0	0	0	0	0	0	0	0	**1**	0	**1**	0	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0
+45 mins.	**2**	0	0	**2**	0	0	**1**	**1**	0	0	0	0	0	0	0	0
Total Volume	3	0	0	3	0	0	1	1	0	2	0	2	0	0	0	0
% App. Total	100	0	0		0	0	100		0	100	0		0	0	0	
PHF	.375	.000	.000	.375	.000	.000	.250	.250	.000	.500	.000	.500	.000	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Brookley Rd / Burnett St
City/State : Boston, MA
Weather : Cloudy

File Name : 11039002
Site Code : 11039002
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

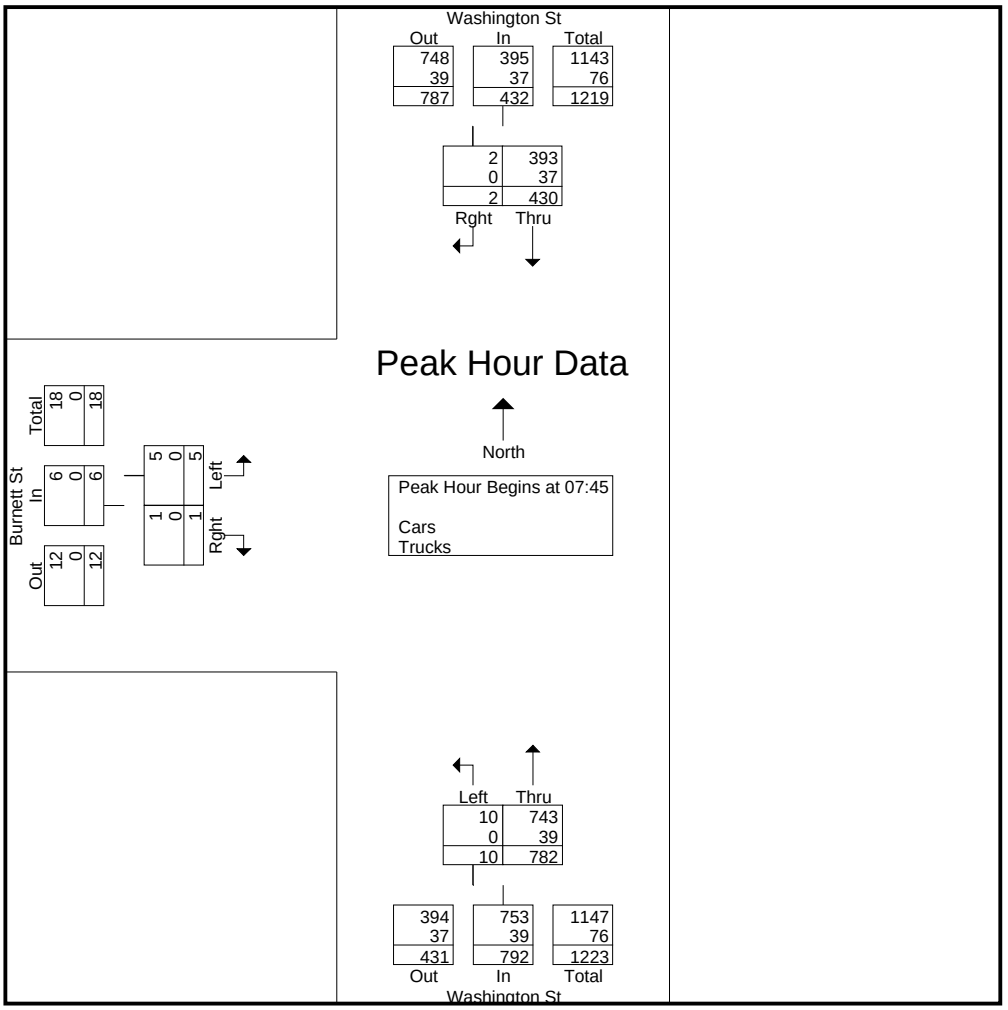
	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
07:00	82	0	0	179	1	0	262
07:15	111	0	0	193	0	1	305
07:30	102	0	2	199	1	1	305
07:45	95	0	3	191	0	0	289
Total	390	0	5	762	2	2	1161
08:00	98	1	3	206	1	0	309
08:15	119	0	2	204	1	0	326
08:30	118	1	2	181	3	1	306
08:45	98	0	2	147	0	4	251
Total	433	2	9	738	5	5	1192
Grand Total	823	2	14	1500	7	7	2353
Apprch %	99.8	0.2	0.9	99.1	50	50	
Total %	35	0.1	0.6	63.7	0.3	0.3	
Cars	751	2	14	1418	7	7	2199
% Cars	91.3	100	100	94.5	100	100	93.5
Trucks	72	0	0	82	0	0	154
% Trucks	8.7	0	0	5.5	0	0	6.5

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:45										
07:45	95	0	95	**3**	191	194	0	0	0	289
08:00	98	**1**	99	3	**206**	**209**	1	0	1	309
08:15	**119**	0	**119**	2	204	206	1	0	1	**326**
08:30	118	1	119	2	181	183	**3**	**1**	**4**	306
Total Volume	430	2	432	10	782	792	5	1	6	1230
% App. Total	99.5	0.5		1.3	98.7		83.3	16.7		
PHF	.903	.500	.908	.833	.949	.947	.417	.250	.375	.943
Cars	393	2	395	10	743	753	5	1	6	1154
% Cars	91.4	100	91.4	100	95.0	95.1	100	100	100	93.8
Trucks	37	0	37	0	39	39	0	0	0	76
% Trucks	8.6	0	8.6	0	5.0	4.9	0	0	0	6.2

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

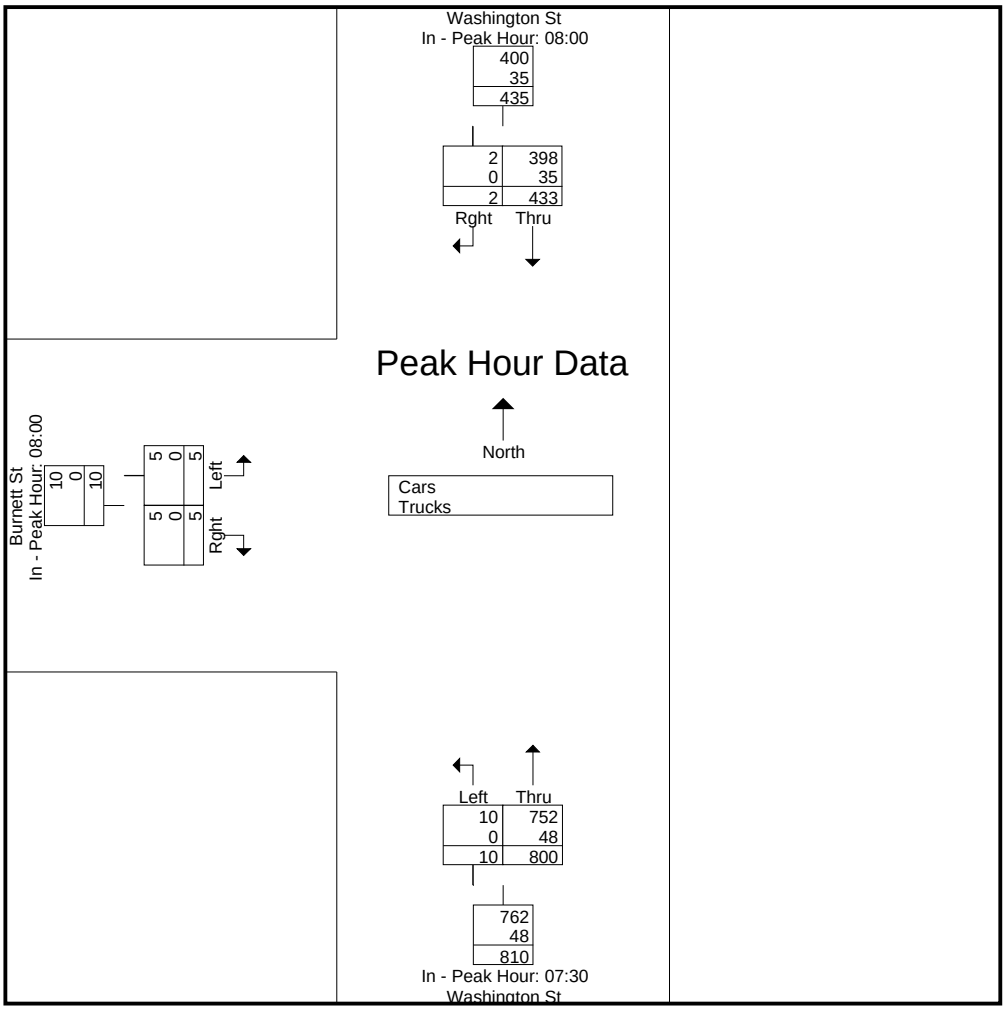
Peak Hour for Each Approach Begins at:

	08:00			07:30			08:00		
+0 mins.	98	**1**	99	2	199	201	1	0	1
+15 mins.	**119**	0	**119**	**3**	191	194	1	0	1
+30 mins.	118	1	119	3	**206**	**209**	**3**	1	**4**
+45 mins.	98	0	98	2	204	206	0	**4**	4
Total Volume	433	2	435	10	800	810	5	5	10
% App. Total	99.5	0.5		1.2	98.8		50	50	
PHF	.910	.500	.914	.833	.971	.969	.417	.313	.625
Cars	398	2	400	10	752	762	5	5	10
% Cars	91.9	100	92	100	94	94.1	100	100	100
Trucks	35	0	35	0	48	48	0	0	0
% Trucks	8.1	0	8	0	6	5.9	0	0	0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars

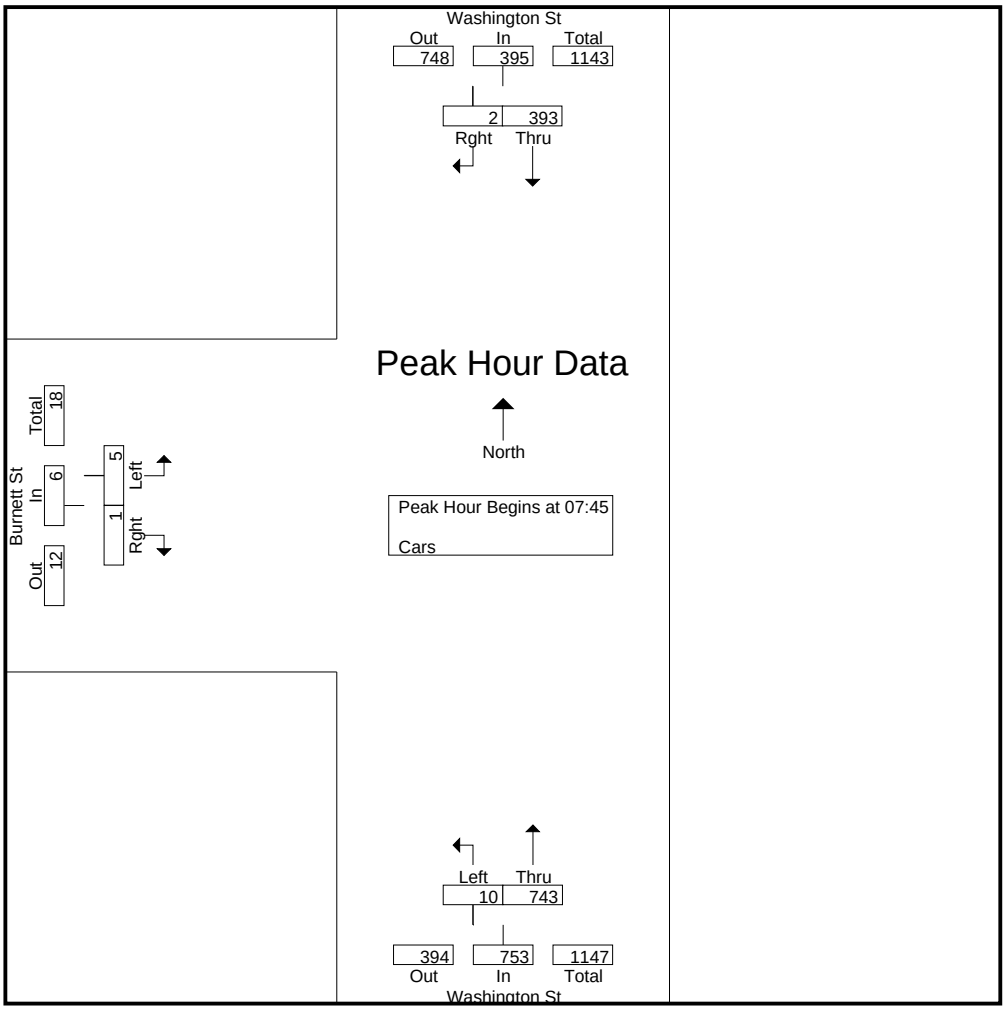
	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
07:00	74	0	0	170	1	0	245
07:15	103	0	0	180	0	1	284
07:30	91	0	2	183	1	1	278
07:45	85	0	3	178	0	0	266
Total	353	0	5	711	2	2	1073
08:00	85	1	3	196	1	0	286
08:15	113	0	2	195	1	0	311
08:30	110	1	2	174	3	1	291
08:45	90	0	2	142	0	4	238
Total	398	2	9	707	5	5	1126
Grand Total	751	2	14	1418	7	7	2199
Apprch %	99.7	0.3	1	99	50	50	
Total %	34.2	0.1	0.6	64.5	0.3	0.3	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:45										
07:45	85	0	85	**3**	178	181	0	0	0	266
08:00	85	**1**	86	3	**196**	**199**	1	0	1	286
08:15	**113**	0	**113**	2	195	197	1	0	1	**311**
08:30	110	1	111	2	174	176	**3**	**1**	**4**	291
Total Volume	393	2	395	10	743	753	5	1	6	1154
% App. Total	99.5	0.5		1.3	98.7		83.3	16.7		
PHF	.869	.500	.874	.833	.948	.946	.417	.250	.375	.928

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

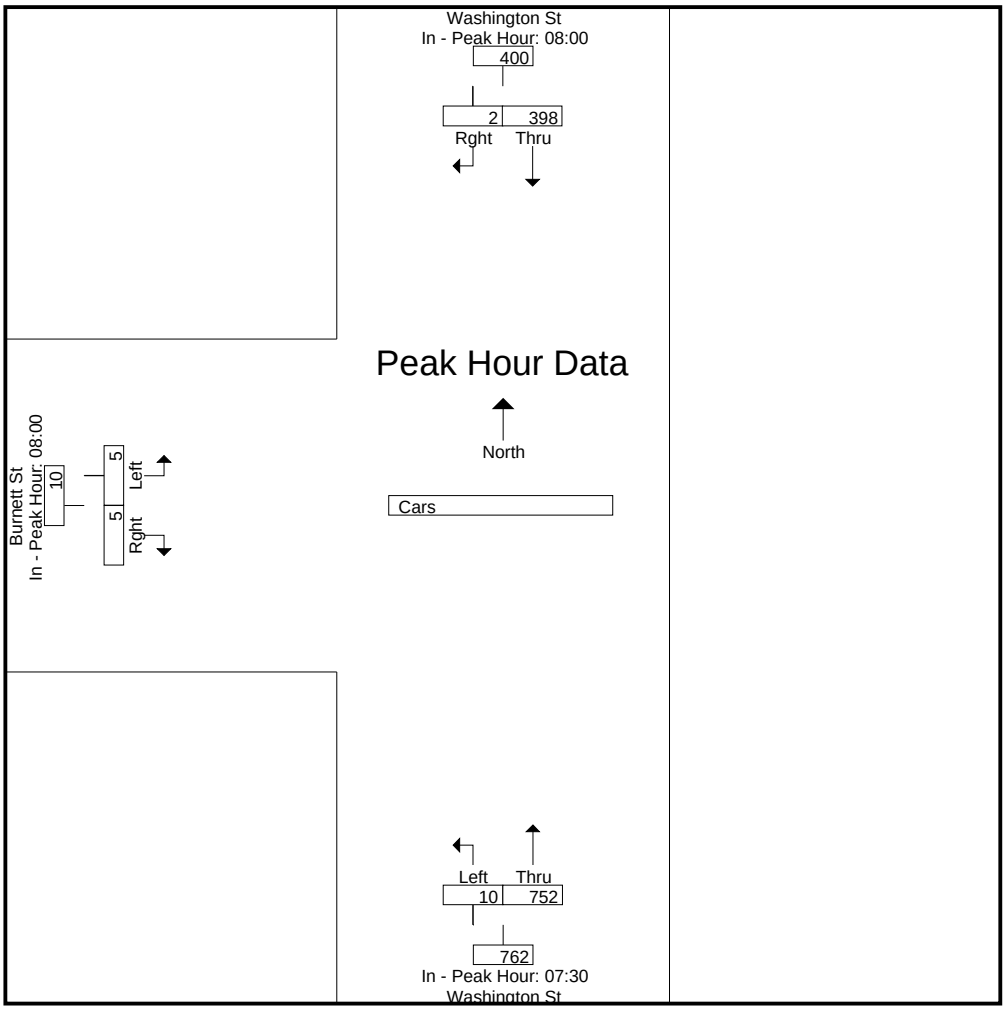
Peak Hour for Each Approach Begins at:

	08:00			07:30			08:00		
+0 mins.	85	**1**	86	2	183	185	1	0	1
+15 mins.	**113**	0	**113**	**3**	178	181	1	0	1
+30 mins.	110	1	111	3	**196**	**199**	**3**	1	**4**
+45 mins.	90	0	90	2	195	197	0	**4**	4
Total Volume	398	2	400	10	752	762	5	5	10
% App. Total	99.5	0.5		1.3	98.7		50	50	
PHF	.881	.500	.885	.833	.959	.957	.417	.313	.625

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Trucks

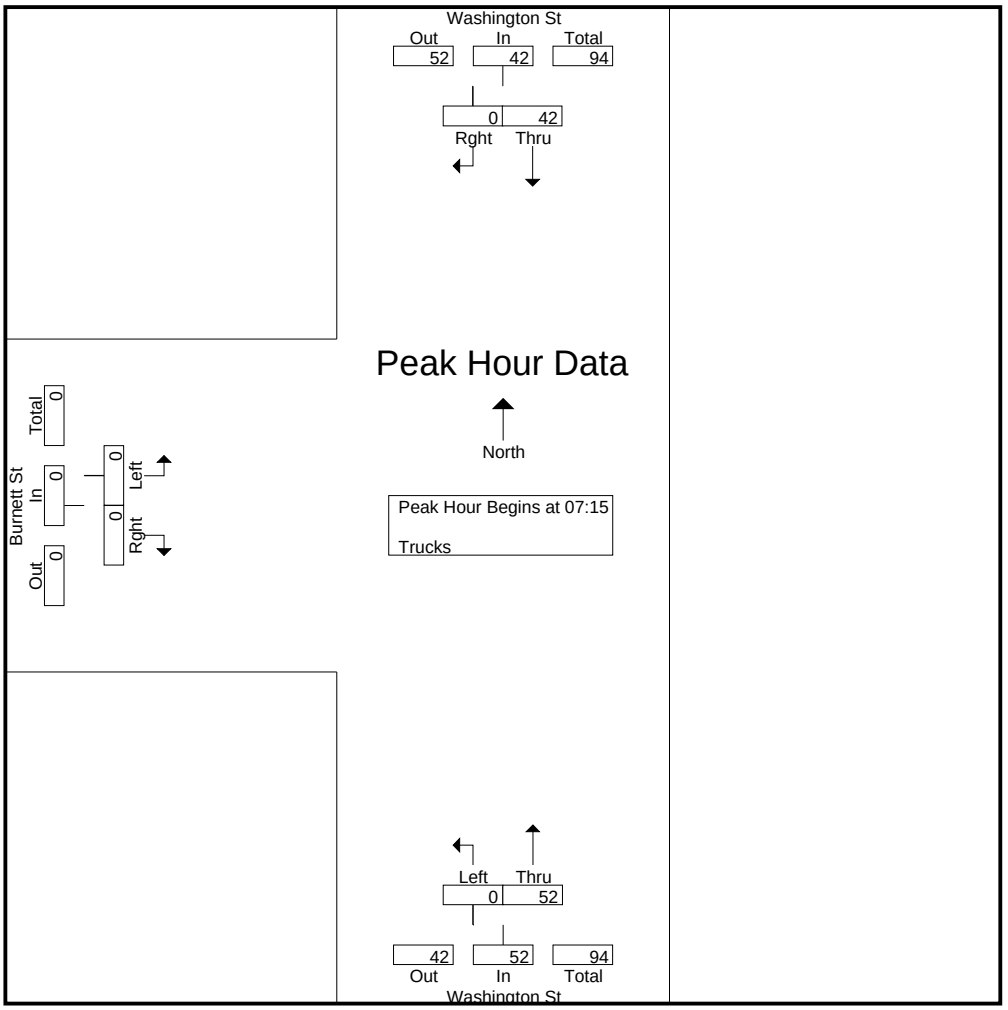
	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
07:00	8	0	0	9	0	0	17
07:15	8	0	0	13	0	0	21
07:30	11	0	0	16	0	0	27
07:45	10	0	0	13	0	0	23
Total	37	0	0	51	0	0	88
08:00	13	0	0	10	0	0	23
08:15	6	0	0	9	0	0	15
08:30	8	0	0	7	0	0	15
08:45	8	0	0	5	0	0	13
Total	35	0	0	31	0	0	66
Grand Total	72	0	0	82	0	0	154
Apprch %	100	0	0	100	0	0	
Total %	46.8	0	0	53.2	0	0	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 07:15										
07:15	8	0	8	0	13	13	0	0	0	21
07:30	11	0	11	0	**16**	**16**	0	0	0	**27**
07:45	10	0	10	0	13	13	0	0	0	23
08:00	**13**	0	**13**	0	10	10	0	0	0	23
Total Volume	42	0	42	0	52	52	0	0	0	94
% App. Total	100	0		0	100		0	0		
PHF	.808	.000	.808	.000	.813	.813	.000	.000	.000	.870

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

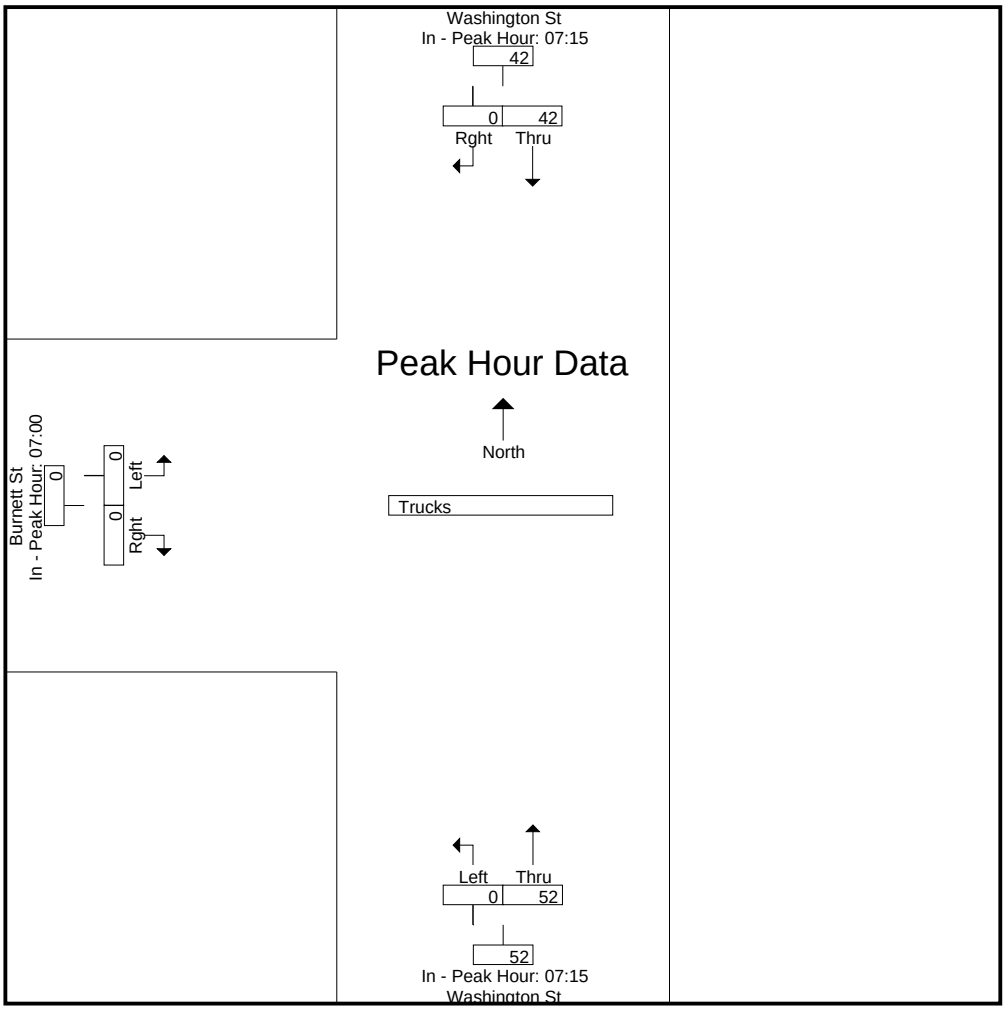
Peak Hour for Each Approach Begins at:

	07:15			07:15			07:00		
+0 mins.	8	0	8	0	13	13	0	0	0
+15 mins.	11	0	11	0	**16**	**16**	0	0	0
+30 mins.	10	0	10	0	13	13	0	0	0
+45 mins.	**13**	0	**13**	0	10	10	0	0	0
Total Volume	42	0	42	0	52	52	0	0	0
% App. Total	100	0		0	100		0	0	
PHF	.808	.000	.808	.000	.813	.813	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Bikes Peds

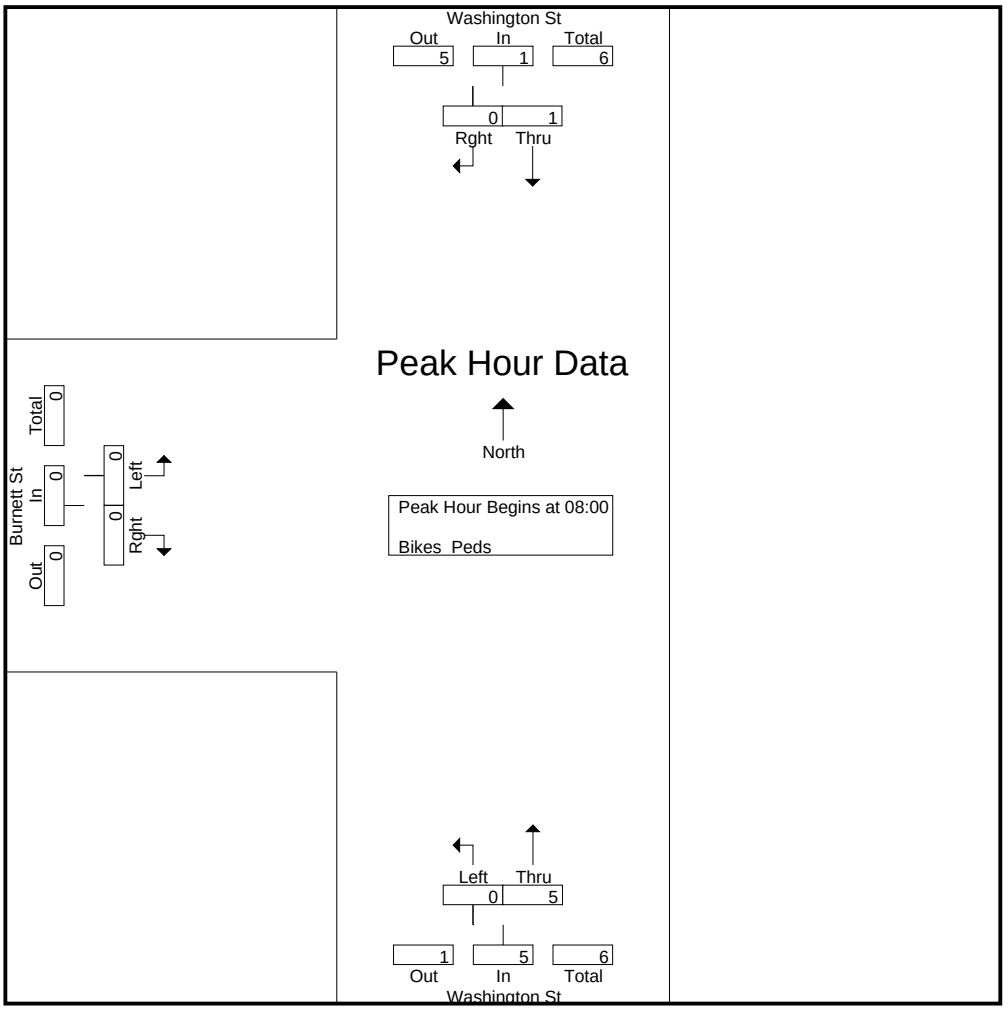
	Washington St From North			Washington St From South			Burnett St From West					
Start Time	Thru	Rght	Peds	Left	Thru	Peds	Left	Rght	Peds	Exclu. Total	Inclu. Total	Int. Total
07:00	0	0	0	0	0	0	0	0	4	4	0	4
07:15	0	0	0	0	0	1	0	0	13	14	0	14
07:30	0	0	0	0	0	1	0	0	3	4	0	4
07:45	0	0	1	0	0	1	0	0	4	6	0	6
Total	0	0	1	0	0	3	0	0	24	28	0	28
08:00	0	0	0	0	2	1	0	0	9	10	2	12
08:15	1	0	0	0	1	1	0	0	6	7	2	9
08:30	0	0	0	0	1	0	0	0	5	5	1	6
08:45	0	0	0	0	1	0	0	0	3	3	1	4
Total	1	0	0	0	5	2	0	0	23	25	6	31
Grand Total	1	0	1	0	5	5	0	0	47	53	6	59
Apprch %	100	0		0	100		0	0				
Total %	16.7	0		0	83.3		0	0		89.8	10.2	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 08:00										
08:00	0	0	0	0	**2**	**2**	0	0	0	**2**
08:15	**1**	0	**1**	0	1	1	0	0	0	2
08:30	0	0	0	0	1	1	0	0	0	1
08:45	0	0	0	0	1	1	0	0	0	1
Total Volume	1	0	1	0	5	5	0	0	0	6
% App. Total	100	0		0	100		0	0		
PHF	.250	.000	.250	.000	.625	.625	.000	.000	.000	.750

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Peak Hour Analysis From 07:00 to 08:45 - Peak 1 of 1

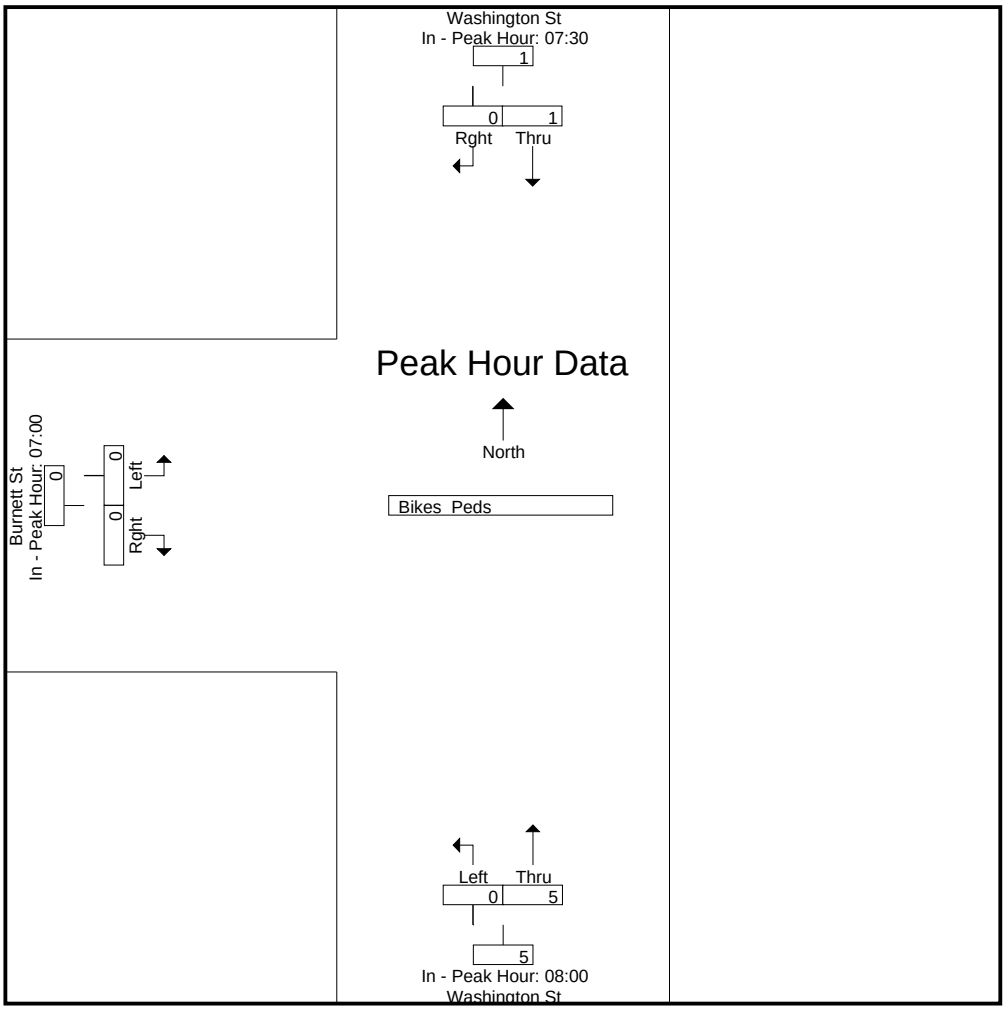
Peak Hour for Each Approach Begins at:

	07:30			08:00			07:00		
+0 mins.	0	0	0	0	**2**	**2**	0	0	0
+15 mins.	0	0	0	0	1	1	0	0	0
+30 mins.	0	0	0	0	1	1	0	0	0
+45 mins.	**1**	0	**1**	0	1	1	0	0	0
Total Volume	1	0	1	0	5	5	0	0	0
% App. Total	100	0		0	100		0	0	
PHF	.250	.000	.250	.000	.625	.625	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars - Trucks

	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
16:00	183	0	2	142	0	2	329
16:15	191	0	1	148	1	0	341
16:30	193	0	1	162	1	1	358
16:45	201	0	0	147	0	1	349
Total	768	0	4	599	2	4	1377
17:00	204	0	0	154	1	2	361
17:15	205	1	0	150	2	2	360
17:30	191	0	1	155	0	1	348
17:45	214	0	1	182	0	3	400
Total	814	1	2	641	3	8	1469
Grand Total	1582	1	6	1240	5	12	2846
Apprch %	99.9	0.1	0.5	99.5	29.4	70.6	
Total %	55.6	0	0.2	43.6	0.2	0.4	
Cars	1536	1	6	1198	5	12	2758
% Cars	97.1	100	100	96.6	100	100	96.9
Trucks	46	0	0	42	0	0	88
% Trucks	2.9	0	0	3.4	0	0	3.1

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 17:00										
17:00	204	0	204	0	154	154	1	2	3	361
17:15	205	**1**	206	0	150	150	**2**	2	**4**	360
17:30	191	0	191	**1**	155	156	0	1	1	348
17:45	**214**	0	**214**	1	**182**	**183**	0	**3**	3	**400**
Total Volume	814	1	815	2	641	643	3	8	11	1469
% App. Total	99.9	0.1		0.3	99.7		27.3	72.7		
PHF	.951	.250	.952	.500	.880	.878	.375	.667	.688	.918
Cars	801	1	802	2	626	628	3	8	11	1441
% Cars	98.4	100	98.4	100	97.7	97.7	100	100	100	98.1
Trucks	13	0	13	0	15	15	0	0	0	28
% Trucks	1.6	0	1.6	0	2.3	2.3	0	0	0	1.9

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
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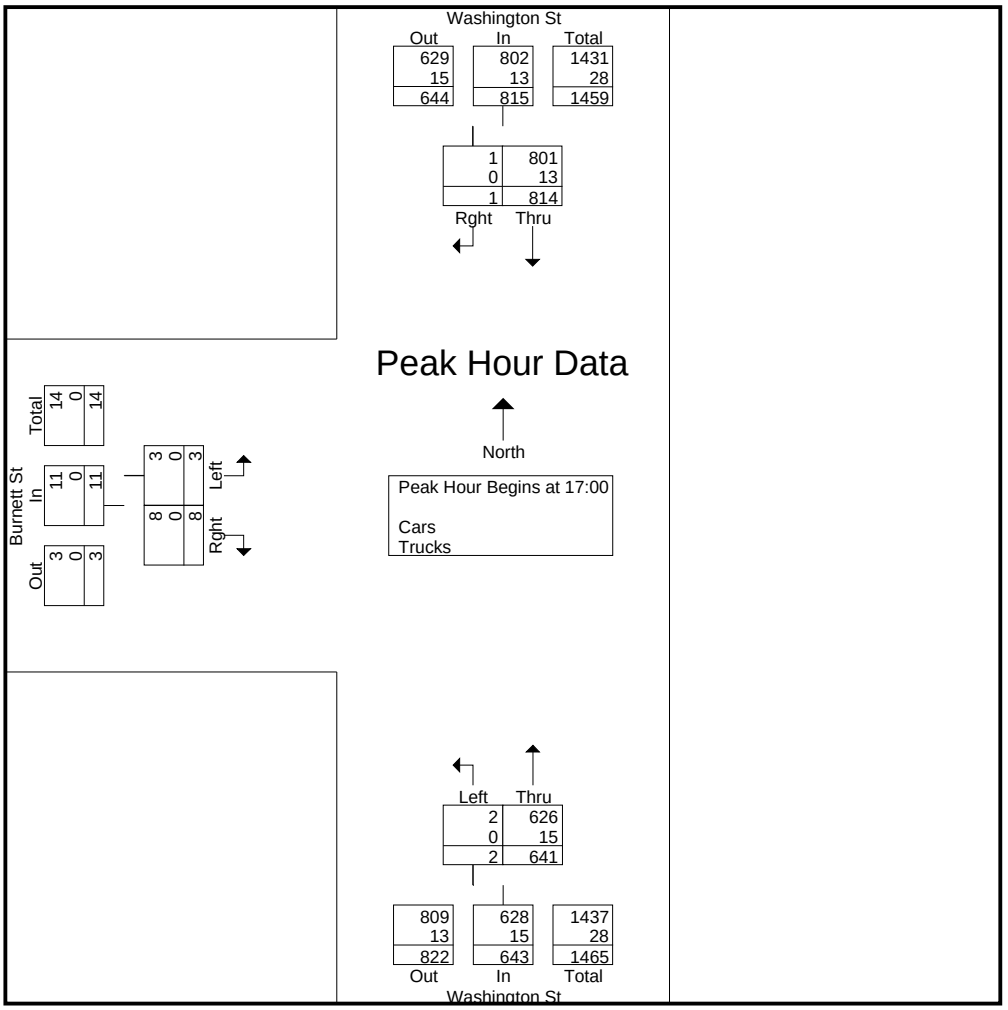


Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

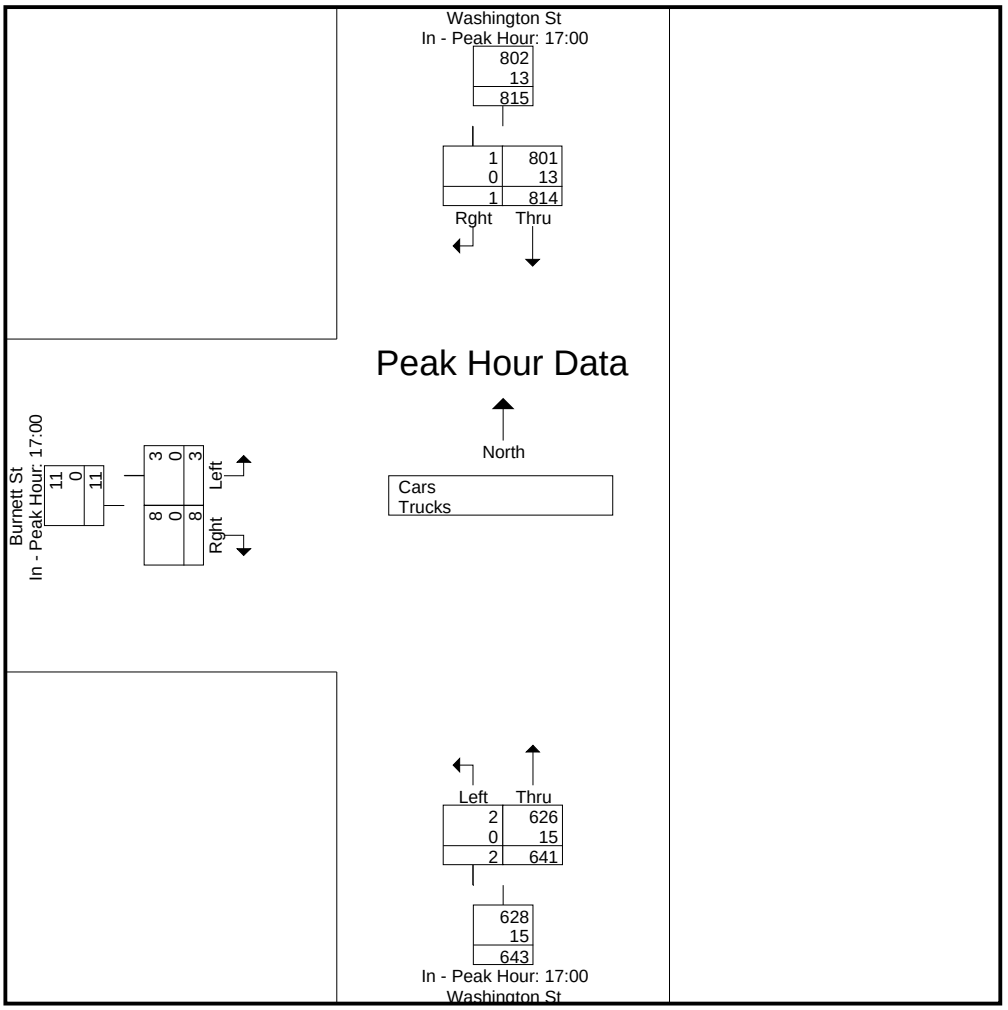
Peak Hour for Each Approach Begins at:

	17:00			17:00			17:00		
+0 mins.	204	0	204	0	154	154	1	2	3
+15 mins.	205	**1**	206	0	150	150	**2**	2	**4**
+30 mins.	191	0	191	**1**	155	156	0	1	1
+45 mins.	**214**	0	**214**	1	**182**	**183**	0	**3**	3
Total Volume	814	1	815	2	641	643	3	8	11
% App. Total	99.9	0.1		0.3	99.7		27.3	72.7	
PHF	.951	.250	.952	.500	.880	.878	.375	.667	.688
Cars	801	1	802	2	626	628	3	8	11
% Cars	98.4	100	98.4	100	97.7	97.7	100	100	100
Trucks	13	0	13	0	15	15	0	0	0
% Trucks	1.6	0	1.6	0	2.3	2.3	0	0	0

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 3



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Cars

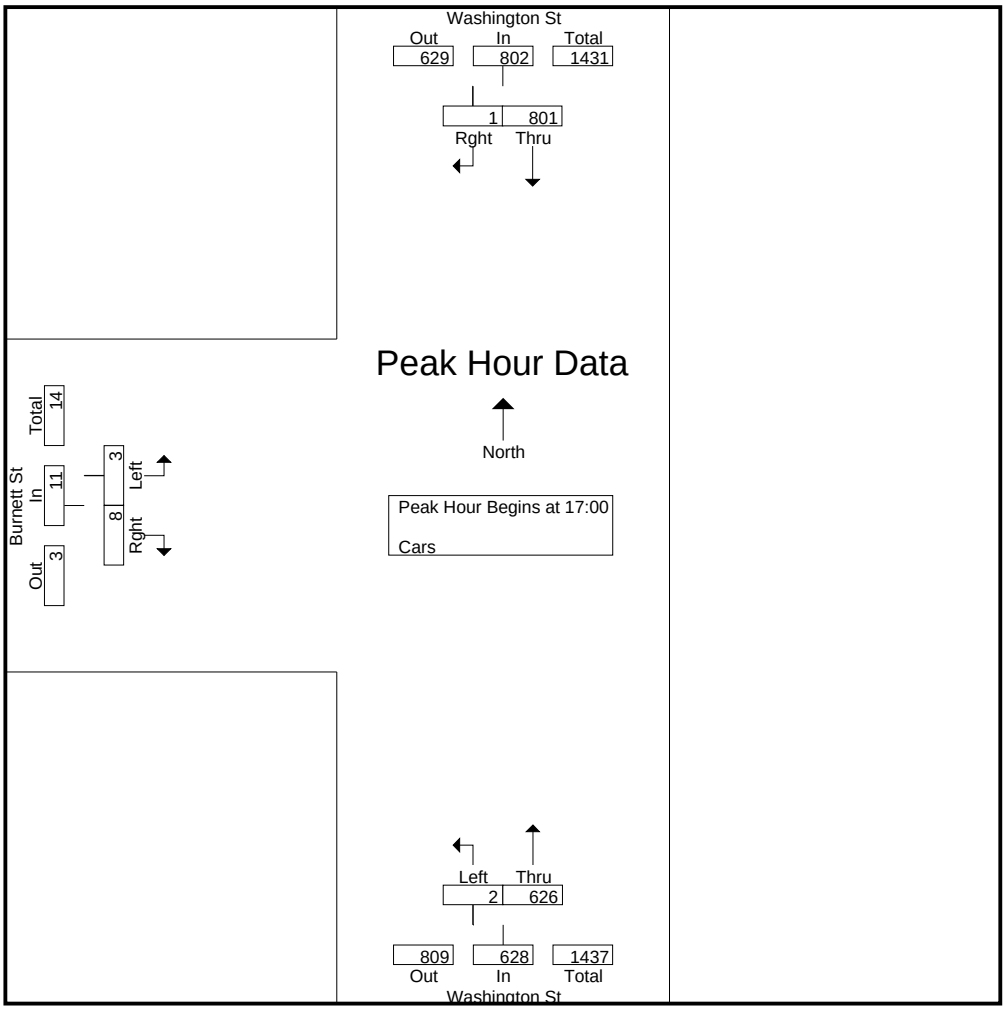
	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
16:00	177	0	2	136	0	2	317
16:15	179	0	1	140	1	0	321
16:30	185	0	1	155	1	1	343
16:45	194	0	0	141	0	1	336
Total	735	0	4	572	2	4	1317
17:00	196	0	0	152	1	2	351
17:15	203	1	0	145	2	2	353
17:30	188	0	1	149	0	1	339
17:45	214	0	1	180	0	3	398
Total	801	1	2	626	3	8	1441
Grand Total	1536	1	6	1198	5	12	2758
Apprch %	99.9	0.1	0.5	99.5	29.4	70.6	
Total %	55.7	0	0.2	43.4	0.2	0.4	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 17:00										
17:00	196	0	196	0	152	152	1	2	3	351
17:15	203	**1**	204	0	145	145	**2**	2	**4**	353
17:30	188	0	188	**1**	149	150	0	1	1	339
17:45	**214**	0	**214**	1	**180**	**181**	0	**3**	3	**398**
Total Volume	801	1	802	2	626	628	3	8	11	1441
% App. Total	99.9	0.1		0.3	99.7		27.3	72.7		
PHF	.936	.250	.937	.500	.869	.867	.375	.667	.688	.905

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

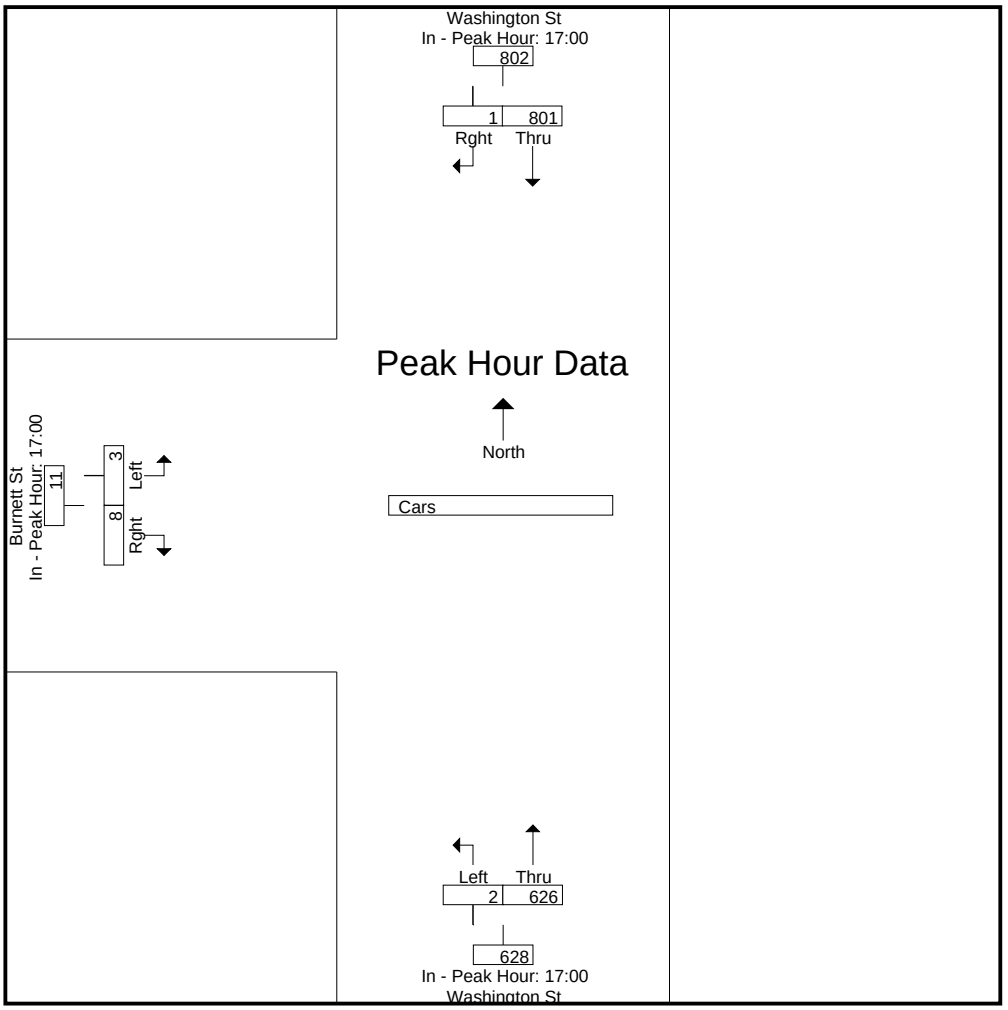
Peak Hour for Each Approach Begins at:

	17:00			17:00			17:00		
+0 mins.	196	0	196	0	152	152	1	2	3
+15 mins.	203	**1**	204	0	145	145	**2**	2	**4**
+30 mins.	188	0	188	**1**	149	150	0	1	1
+45 mins.	**214**	0	**214**	1	**180**	**181**	0	**3**	3
Total Volume	801	1	802	2	626	628	3	8	11
% App. Total	99.9	0.1		0.3	99.7		27.3	72.7	
PHF	.936	.250	.937	.500	.869	.867	.375	.667	.688

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Trucks

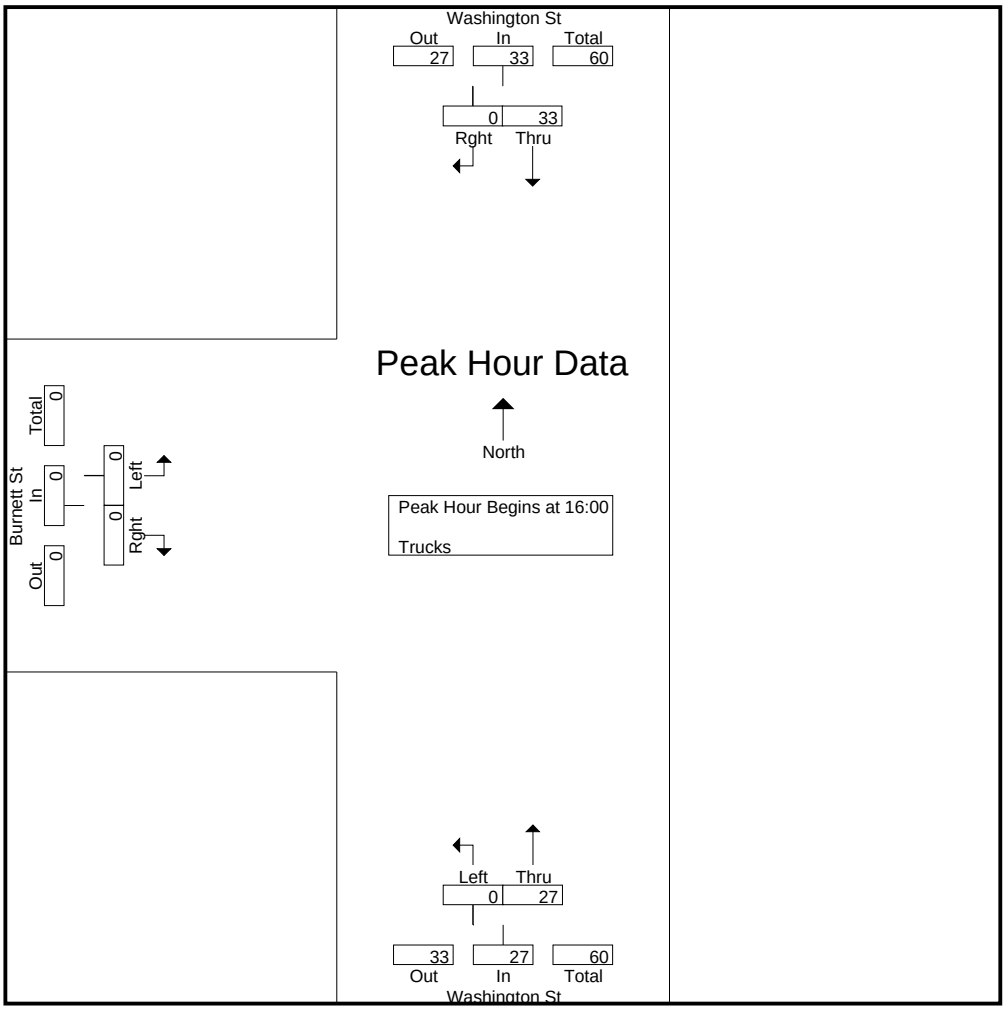
	Washington St From North		Washington St From South		Burnett St From West		
Start Time	Thru	Rght	Left	Thru	Left	Rght	Int. Total
16:00	6	0	0	6	0	0	12
16:15	12	0	0	8	0	0	20
16:30	8	0	0	7	0	0	15
16:45	7	0	0	6	0	0	13
Total	33	0	0	27	0	0	60
17:00	8	0	0	2	0	0	10
17:15	2	0	0	5	0	0	7
17:30	3	0	0	6	0	0	9
17:45	0	0	0	2	0	0	2
Total	13	0	0	15	0	0	28
Grand Total	46	0	0	42	0	0	88
Apprch %	100	0	0	100	0	0	
Total %	52.3	0	0	47.7	0	0	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 16:00										
16:00	6	0	6	0	6	6	0	0	0	12
16:15	**12**	0	**12**	0	**8**	**8**	0	0	0	**20**
16:30	8	0	8	0	7	7	0	0	0	15
16:45	7	0	7	0	6	6	0	0	0	13
Total Volume	33	0	33	0	27	27	0	0	0	60
% App. Total	100	0		0	100		0	0		
PHF	.688	.000	.688	.000	.844	.844	.000	.000	.000	.750

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 2



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

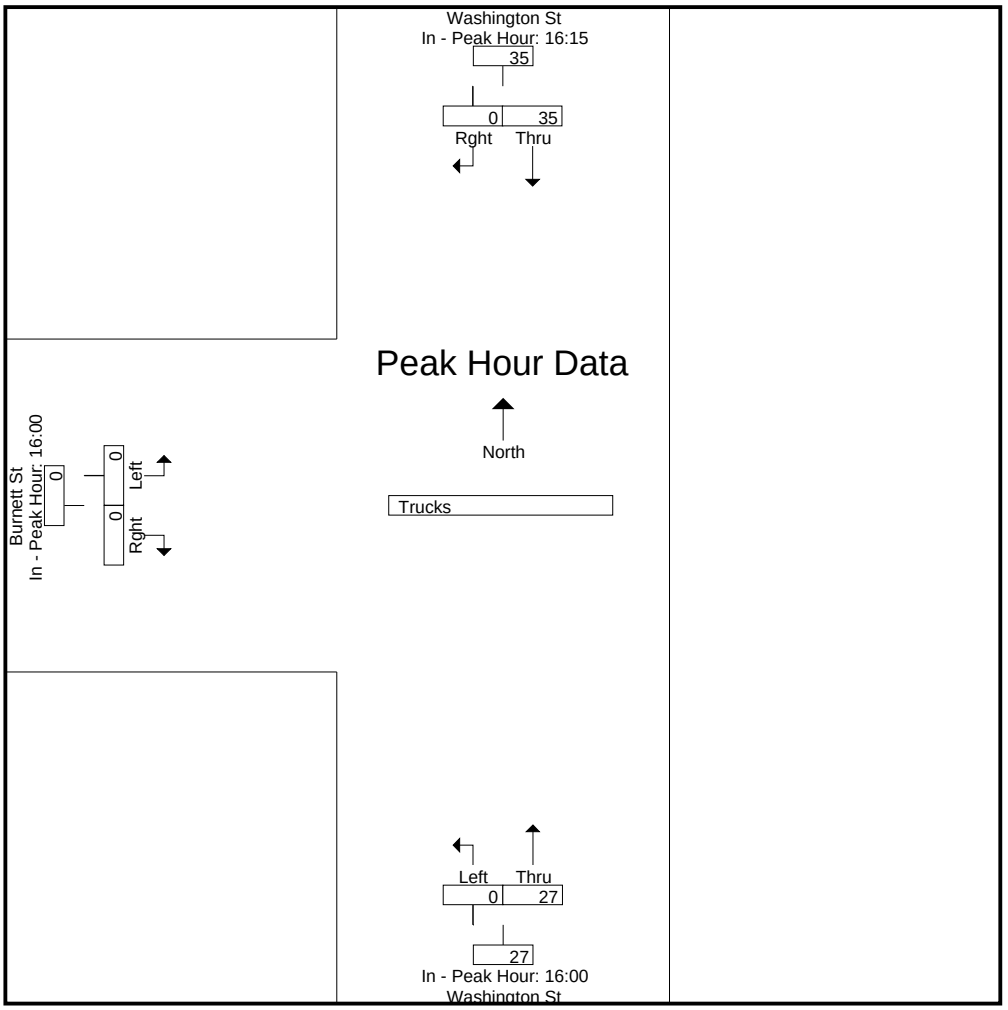
Peak Hour for Each Approach Begins at:

	16:15			16:00			16:00		
+0 mins.	**12**	0	**12**	0	6	6	0	0	0
+15 mins.	8	0	8	0	**8**	**8**	0	0	0
+30 mins.	7	0	7	0	7	7	0	0	0
+45 mins.	8	0	8	0	6	6	0	0	0
Total Volume	35	0	35	0	27	27	0	0	0
% App. Total	100	0		0	100		0	0	
PHF	.729	.000	.729	.000	.844	.844	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 1

Groups Printed- Bikes Peds

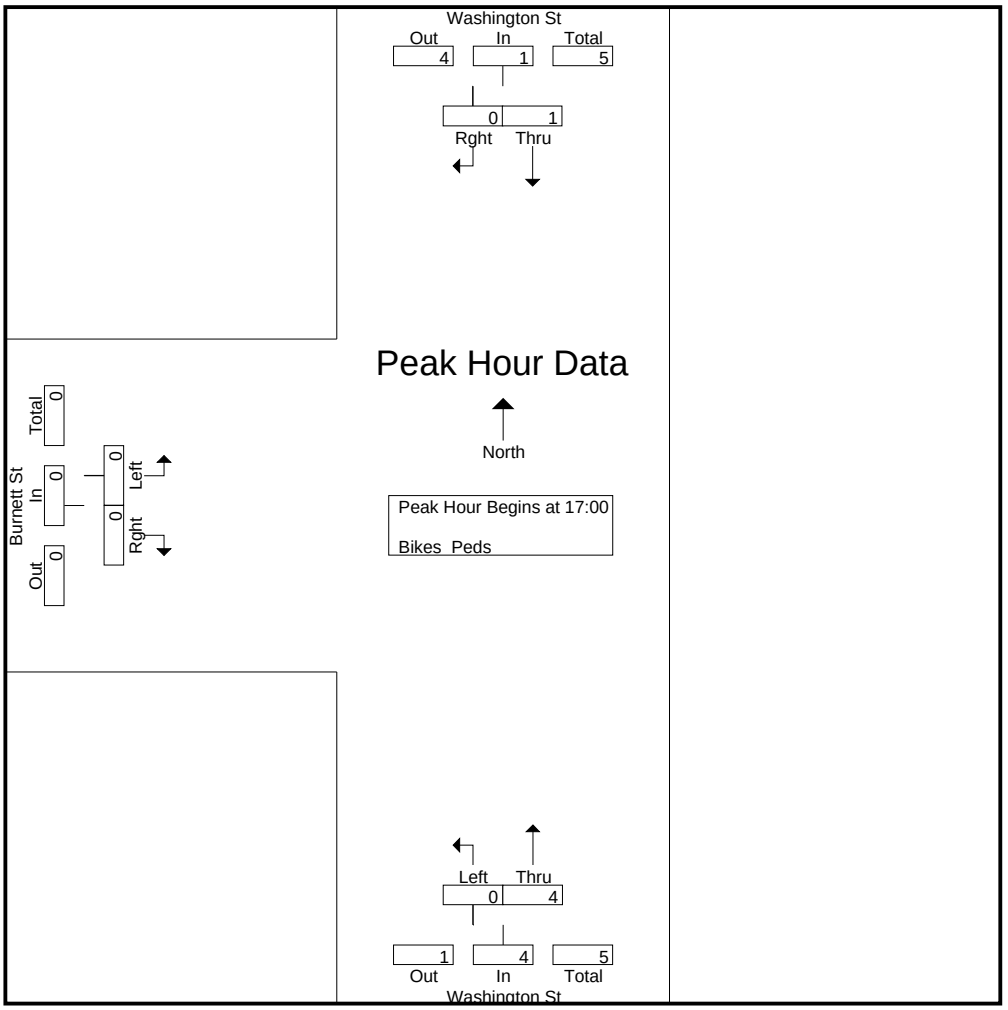
	Washington St From North			Washington St From South			Burnett St From West					
Start Time	Thru	Rght	Peds	Left	Thru	Peds	Left	Rght	Peds	Exclu. Total	Inclu. Total	Int. Total
16:00	0	0	0	0	0	0	0	0	5	5	0	5
16:15	0	0	0	0	2	2	0	0	9	11	2	13
16:30	0	0	2	0	1	1	0	0	6	9	1	10
16:45	0	0	0	0	0	0	0	0	8	8	0	8
Total	0	0	2	0	3	3	0	0	28	33	3	36
17:00	0	0	4	0	1	0	0	0	15	19	1	20
17:15	1	0	0	0	1	1	0	0	4	5	2	7
17:30	0	0	0	0	1	0	0	0	9	9	1	10
17:45	0	0	0	0	1	0	0	0	7	7	1	8
Total	1	0	4	0	4	1	0	0	35	40	5	45
Grand Total	1	0	6	0	7	4	0	0	63	73	8	81
Apprch %	100	0		0	100		0	0				
Total %	12.5	0		0	87.5		0	0		90.1	9.9	

	Washington St From North			Washington St From South			Burnett St From West			
Start Time	Thru	Rght	App. Total	Left	Thru	App. Total	Left	Rght	App. Total	Int. Total
Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1										
Peak Hour for Entire Intersection Begins at 17:00										
17:00	0	0	0	0	**1**	**1**	0	0	0	1
17:15	**1**	0	**1**	0	1	1	0	0	0	**2**
17:30	0	0	0	0	1	1	0	0	0	1
17:45	0	0	0	0	1	1	0	0	0	1
Total Volume	1	0	1	0	4	4	0	0	0	5
% App. Total	100	0		0	100		0	0		
PHF	.250	.000	.250	.000	1.000	1.000	.000	.000	.000	.625

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011



Peak Hour Analysis From 16:00 to 17:45 - Peak 1 of 1

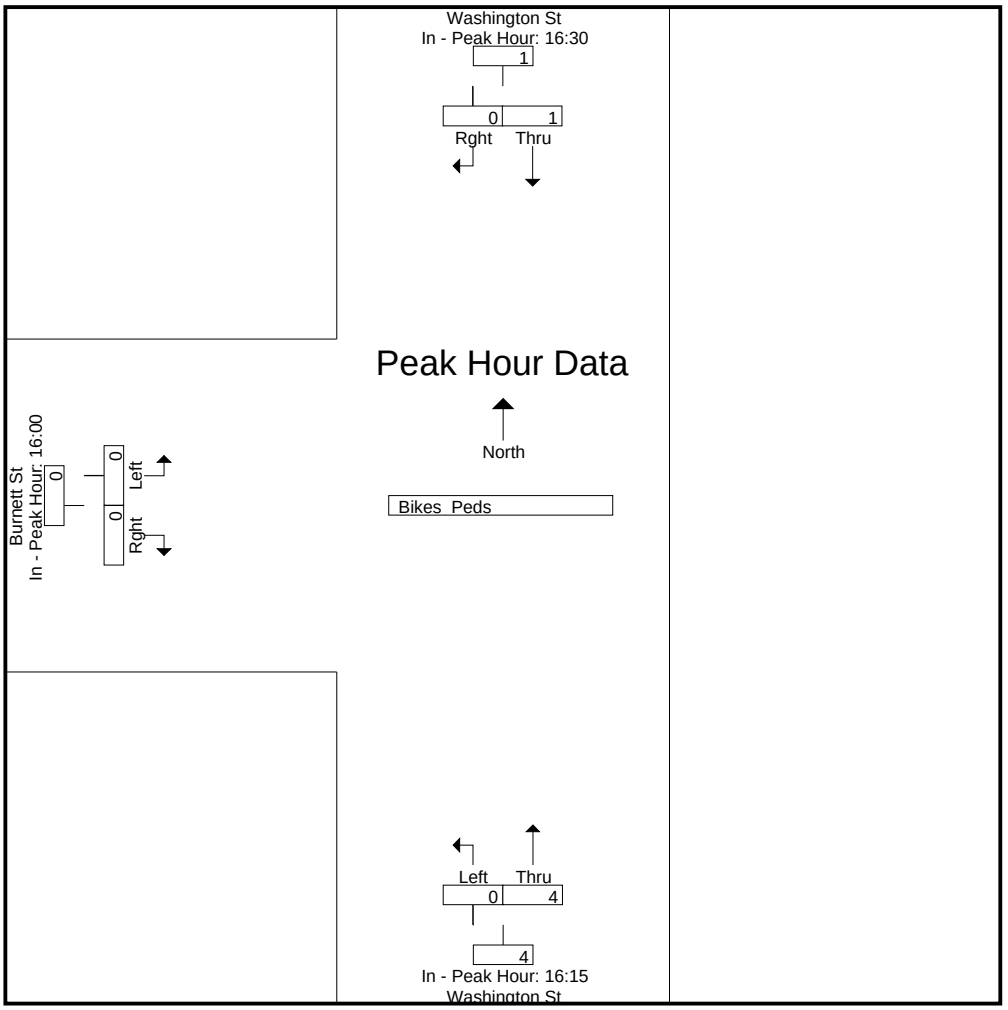
Peak Hour for Each Approach Begins at:

	16:30			16:15			16:00		
+0 mins.	0	0	0	0	**2**	**2**	0	0	0
+15 mins.	0	0	0	0	1	1	0	0	0
+30 mins.	0	0	0	0	0	0	0	0	0
+45 mins.	**1**	0	**1**	0	1	1	0	0	0
Total Volume	1	0	1	0	4	4	0	0	0
% App. Total	100	0		0	100		0	0	
PHF	.250	.000	.250	.000	.500	.500	.000	.000	.000

Accurate Counts
978-664-2565

N/S Street : Washington Street
E/W Street: Burnett Street
City/State : Boston, MA
Weather : Cloudy

File Name : 11039003
Site Code : 11039003
Start Date : 5/24/2011
Page No : 3



Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.893			0.919						0.998	
Flt Protected		0.990			0.995		0.950					
Satd. Flow (prot)	0	1400	0	0	1411	0	1392	1438	0	0	1383	0
Flt Permitted		0.906			0.964		0.312					
Satd. Flow (perm)	0	1281	0	0	1367	0	457	1438	0	0	1383	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					83						1	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		662			526			288			444	
Travel Time (s)		15.0			12.0			6.5			10.1	
Volume (vph)	13	0	44	34	86	203	21	698	0	0	408	7
Peak Hour Factor	0.81	0.92	0.73	0.77	0.69	0.79	0.88	0.95	0.92	0.92	0.89	0.88
Heavy Vehicles (%)	23%	0%	4%	6%	0%	4%	5%	7%	0%	0%	11%	14%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	16	0	60	44	125	257	24	735	0	0	458	8
Lane Group Flow (vph)	0	76	0	0	426	0	24	735	0	0	466	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	10.0	10.0		10.0	10.0		10.0	10.0			10.0	
Minimum Split (s)	14.0	14.0		14.0	14.0		14.0	14.0			14.0	
Total Split (s)	38.0	38.0	0.0	38.0	38.0	0.0	47.0	47.0	0.0	0.0	47.0	0.0
Total Split (%)	38.0%	38.0%	0.0%	38.0%	38.0%	0.0%	47.0%	47.0%	0.0%	0.0%	47.0%	0.0%
Maximum Green (s)	34.0	34.0		34.0	34.0		43.0	43.0			43.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		28.8			28.8		60.2	60.2			60.2	
Actuated g/C Ratio		0.29			0.29		0.60	0.60			0.60	
v/c Ratio		0.21			0.94		0.09	0.85			0.56	
Control Delay		26.4			57.5		14.0	30.7			21.3	

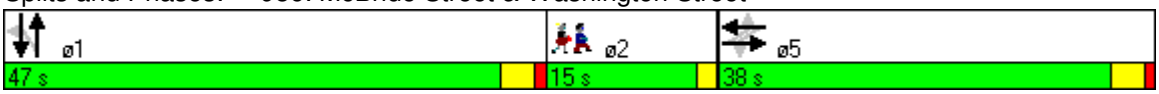
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	7.0
Minimum Split (s)	15.0
Total Split (s)	15.0
Total Split (%)	15%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	0.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	7.0
Flash Dont Walk (s)	6.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.0			0.0		0.0	0.0			0.3	
Total Delay		26.4			57.5		14.0	30.7			21.6	
LOS		C			E		B	C			C	
Approach Delay		26.4			57.5			30.2			21.6	
Approach LOS		C			E			C			C	
Queue Length 50th (ft)		35			213		6	345			146	
Queue Length 95th (ft)		69			210		26	#792			m348	
Internal Link Dist (ft)		582			446			208			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		436			520		275	865			833	
Starvation Cap Reductn		0			0		0	0			68	
Spillback Cap Reductn		0			0		0	0			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.17			0.82		0.09	0.85			0.61	

Intersection Summary

Area Type: CBD
Cycle Length: 100
Actuated Cycle Length: 100
Offset: 27 (27%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 110
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.94
Intersection Signal Delay: 34.4 Intersection LOS: C
Intersection Capacity Utilization 71.1% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 986: McBride Street & Washington Street



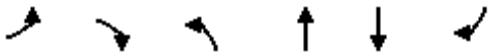
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	5	4	753	40	39	423
Peak Hour Factor	0.42	0.50	0.94	0.57	0.81	0.89
Hourly flow rate (vph)	12	8	801	70	48	475
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						288
pX, platoon unblocked	0.82					
vC, conflicting volume	1408	836			871	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1496	836			871	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	89	98			94	
cM capacity (veh/h)	105	370			770	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	20	871	523
Volume Left	12	0	48
Volume Right	8	70	0
cSH	148	1700	770
Volume to Capacity	0.13	0.51	0.06
Queue Length 95th (ft)	11	0	5
Control Delay (s)	33.1	0.0	1.7
Lane LOS	D		A
Approach Delay (s)	33.1	0.0	1.7
Approach LOS	D		

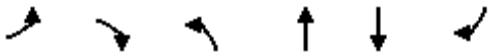
Intersection Summary			
Average Delay	1.1		
Intersection Capacity Utilization	70.7%	ICU Level of Service	C
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	2	4	0	791	425	3
Peak Hour Factor	0.25	0.50	0.92	0.94	0.89	0.38
Hourly flow rate (vph)	8	8	0	841	478	8
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					367	
pX, platoon unblocked	0.85	0.85	0.85			
vC, conflicting volume	1323	481	485			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1379	392	397			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	94	99	100			
cM capacity (veh/h)	137	564	1000			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	16	841	485
Volume Left	8	0	0
Volume Right	8	0	8
cSH	221	1000	1700
Volume to Capacity	0.07	0.00	0.29
Queue Length 95th (ft)	6	0	0
Control Delay (s)	22.6	0.0	0.0
Lane LOS	C		
Approach Delay (s)	22.6	0.0	0.0
Approach LOS	C		

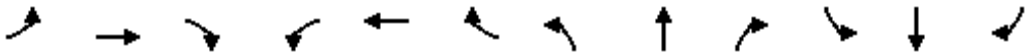
Intersection Summary			
Average Delay	0.3		
Intersection Capacity Utilization	56.3%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	5	1	10	782	430	2
Peak Hour Factor	0.41	0.25	0.83	0.95	0.90	0.50
Hourly flow rate (vph)	12	4	12	823	478	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					738	
pX, platoon unblocked	0.93	0.93	0.93			
vC, conflicting volume	1327	480	482			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1353	438	441			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	92	99	99			
cM capacity (veh/h)	153	577	1047			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	16	835	482
Volume Left	12	12	0
Volume Right	4	0	4
cSH	187	1047	1700
Volume to Capacity	0.09	0.01	0.28
Queue Length 95th (ft)	7	1	0
Control Delay (s)	26.1	0.3	0.0
Lane LOS	D	A	
Approach Delay (s)	26.1	0.3	0.0
Approach LOS	D		

Intersection Summary			
Average Delay	0.5		
Intersection Capacity Utilization	64.6%	ICU Level of Service	C
Analysis Period (min)	15		



Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.878			0.932						0.998	
Flt Protected		0.995			0.989		0.950					
Satd. Flow (prot)	0	1467	0	0	1451	0	1462	1452	0	0	1478	0
Flt Permitted		0.960			0.896		0.110					
Satd. Flow (perm)	0	1416	0	0	1315	0	169	1452	0	0	1478	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					54						1	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		662			526			299			444	
Travel Time (s)		15.0			12.0			6.8			10.1	
Volume (vph)	19	0	235	31	43	84	22	542	0	0	669	6
Peak Hour Factor	0.68	0.92	0.92	0.78	0.83	0.91	0.69	0.98	0.92	0.92	0.97	0.50
Heavy Vehicles (%)	0%	0%	2%	0%	0%	2%	0%	6%	0%	0%	4%	0%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	28	0	255	40	52	92	32	553	0	0	690	12
Lane Group Flow (vph)	0	283	0	0	184	0	32	553	0	0	702	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	10.0	10.0		10.0	10.0		10.0	10.0			10.0	
Minimum Split (s)	14.0	14.0		14.0	14.0		14.0	14.0			14.0	
Total Split (s)	37.0	37.0	0.0	37.0	37.0	0.0	48.0	48.0	0.0	0.0	48.0	0.0
Total Split (%)	37.0%	37.0%	0.0%	37.0%	37.0%	0.0%	48.0%	48.0%	0.0%	0.0%	48.0%	0.0%
Maximum Green (s)	33.0	33.0		33.0	33.0		44.0	44.0			44.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		23.4			23.4		65.6	65.6			65.6	
Actuated g/C Ratio		0.23			0.23		0.66	0.66			0.66	
v/c Ratio		0.85			0.53		0.29	0.58			0.72	
Control Delay		59.0			27.4		23.2	16.6			15.0	

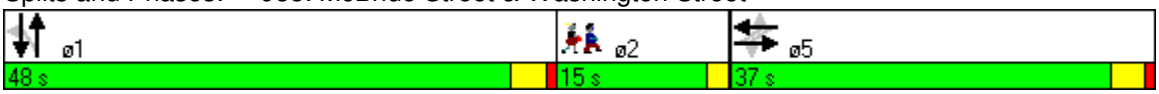
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	7.0
Minimum Split (s)	15.0
Total Split (s)	15.0
Total Split (%)	15%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	0.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	7.0
Flash Dont Walk (s)	6.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.0			0.0		0.0	0.0			1.0	
Total Delay		59.0			27.4		23.2	16.6			16.0	
LOS		E			C		C	B			B	
Approach Delay		59.0			27.4			16.9			16.0	
Approach LOS		E			C			B			B	
Queue Length 50th (ft)		174			72		7	156			179	
Queue Length 95th (ft)		239			108		33	#517			m#557	
Internal Link Dist (ft)		582			446			219			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		467			470		111	953			970	
Starvation Cap Reductn		0			0		0	0			93	
Spillback Cap Reductn		0			0		0	0			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.61			0.39		0.29	0.58			0.80	

Intersection Summary

Area Type: CBD
Cycle Length: 100
Actuated Cycle Length: 100
Offset: 58 (58%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.85
Intersection Signal Delay: 24.4 Intersection LOS: C
Intersection Capacity Utilization 65.5% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 988: McBride Street & Washington Street



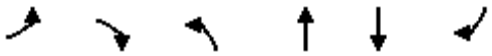
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	14	6	583	63	125	802
Peak Hour Factor	0.54	0.50	0.89	0.79	0.87	0.96
Hourly flow rate (vph)	26	12	655	80	144	835
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						299
pX, platoon unblocked	0.68					
vC, conflicting volume	1818	695			735	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	2197	695			735	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	9	97			84	
cM capacity (veh/h)	29	446			875	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	38	735	979
Volume Left	26	0	144
Volume Right	12	80	0
cSH	41	1700	875
Volume to Capacity	0.93	0.43	0.16
Queue Length 95th (ft)	90	0	15
Control Delay (s)	272.0	0.0	4.2
Lane LOS	F		A
Approach Delay (s)	272.0	0.0	4.2
Approach LOS	F		

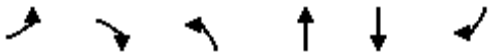
Intersection Summary			
Average Delay	8.2		
Intersection Capacity Utilization	106.3%	ICU Level of Service	G
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	0	1	1	646	812	4
Peak Hour Factor	0.25	0.25	0.25	0.89	0.96	0.75
Hourly flow rate (vph)	0	4	4	726	846	5
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					380	
pX, platoon unblocked	0.72	0.72	0.72			
vC, conflicting volume	1582	848	851			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1808	790	793			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	99	99			
cM capacity (veh/h)	63	283	603			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	4	730	851
Volume Left	0	4	0
Volume Right	4	0	5
cSH	283	603	1700
Volume to Capacity	0.01	0.01	0.50
Queue Length 95th (ft)	1	1	0
Control Delay (s)	17.9	0.2	0.0
Lane LOS	C	A	
Approach Delay (s)	17.9	0.2	0.0
Approach LOS	C		

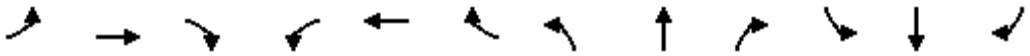
Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	57.8%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	3	8	2	641	814	1
Peak Hour Factor	0.38	0.67	0.50	0.88	0.95	0.25
Hourly flow rate (vph)	8	12	4	728	857	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					752	
pX, platoon unblocked	0.76	0.76	0.76			
vC, conflicting volume	1595	859	861			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1779	815	818			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	89	96	99			
cM capacity (veh/h)	69	291	626			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	20	732	861
Volume Left	8	4	0
Volume Right	12	0	4
cSH	128	626	1700
Volume to Capacity	0.15	0.01	0.51
Queue Length 95th (ft)	13	0	0
Control Delay (s)	38.2	0.2	0.0
Lane LOS	E	A	
Approach Delay (s)	38.2	0.2	0.0
Approach LOS	E		

Intersection Summary			
Average Delay	0.6		
Intersection Capacity Utilization	57.7%	ICU Level of Service	B
Analysis Period (min)	15		



Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.893			0.919						0.998	
Flt Protected		0.990			0.995		0.950					
Satd. Flow (prot)	0	1401	0	0	1411	0	1392	1438	0	0	1383	0
Flt Permitted		0.909			0.964		0.263					
Satd. Flow (perm)	0	1286	0	0	1367	0	385	1438	0	0	1383	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					83						1	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		662			526			288			444	
Travel Time (s)		15.0			12.0			6.5			10.1	
Volume (vph)	13	0	45	35	88	208	22	716	0	0	418	7
Peak Hour Factor	0.81	0.92	0.73	0.77	0.69	0.79	0.88	0.95	0.92	0.92	0.89	0.88
Heavy Vehicles (%)	23%	0%	4%	6%	0%	4%	5%	7%	0%	0%	11%	14%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	16	0	62	45	128	263	25	754	0	0	470	8
Lane Group Flow (vph)	0	78	0	0	436	0	25	754	0	0	478	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	8.0	8.0		8.0	8.0		10.0	10.0			10.0	
Minimum Split (s)	12.0	12.0		12.0	12.0		14.0	14.0			14.0	
Total Split (s)	38.0	38.0	0.0	38.0	38.0	0.0	43.0	43.0	0.0	0.0	43.0	0.0
Total Split (%)	38.0%	38.0%	0.0%	38.0%	38.0%	0.0%	43.0%	43.0%	0.0%	0.0%	43.0%	0.0%
Maximum Green (s)	34.0	34.0		34.0	34.0		39.0	39.0			39.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		29.5			29.5		58.7	58.7			58.7	
Actuated g/C Ratio		0.30			0.30		0.59	0.59			0.59	
v/c Ratio		0.21			0.94		0.11	0.89			0.59	
Control Delay		26.1			57.8		16.1	35.9			18.1	

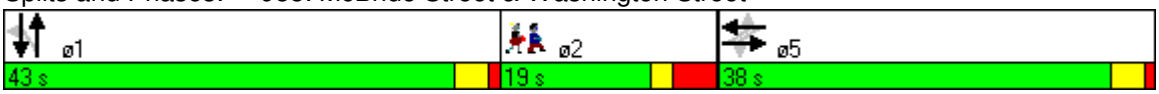
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	8.0
Minimum Split (s)	19.0
Total Split (s)	19.0
Total Split (%)	19%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	4.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	8.0
Flash Dont Walk (s)	5.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.0			0.0		0.0	0.0			0.1	
Total Delay		26.1			57.8		16.1	35.9			18.3	
LOS		C			E		B	D			B	
Approach Delay		26.1			57.8			35.3			18.3	
Approach LOS		C			E			D			B	
Queue Length 50th (ft)		35			216		6	380			84	
Queue Length 95th (ft)		70			217		30	#857			m#379	
Internal Link Dist (ft)		582			446			208			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		437			520		226	844			812	
Starvation Cap Reductn		0			0		0	0			31	
Spillback Cap Reductn		0			0		0	0			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.18			0.84		0.11	0.89			0.61	

Intersection Summary

Area Type: CBD
Cycle Length: 100
Actuated Cycle Length: 100
Offset: 13 (13%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 140
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.94
Intersection Signal Delay: 35.8 Intersection LOS: D
Intersection Capacity Utilization 72.8% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 988: McBride Street & Washington Street



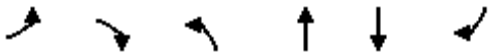
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	5	4	772	41	40	434
Peak Hour Factor	0.42	0.50	0.94	0.57	0.81	0.89
Hourly flow rate (vph)	12	8	821	72	49	488
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						288
pX, platoon unblocked	0.79					
vC, conflicting volume	1444	857			893	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1562	857			893	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	87	98			93	
cM capacity (veh/h)	92	360			755	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	20	893	537
Volume Left	12	0	49
Volume Right	8	72	0
cSH	131	1700	755
Volume to Capacity	0.15	0.53	0.07
Queue Length 95th (ft)	13	0	5
Control Delay (s)	37.3	0.0	1.8
Lane LOS	E		A
Approach Delay (s)	37.3	0.0	1.8
Approach LOS	E		

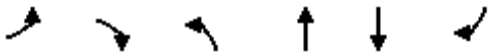
Intersection Summary			
Average Delay	1.2		
Intersection Capacity Utilization	72.2%	ICU Level of Service	C
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	2	4	0	811	436	3
Peak Hour Factor	0.25	0.50	0.92	0.94	0.89	0.38
Hourly flow rate (vph)	8	8	0	863	490	8
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					367	
pX, platoon unblocked	0.82	0.82	0.82			
vC, conflicting volume	1357	494	498			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1435	383	387			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	93	99	100			
cM capacity (veh/h)	122	549	969			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	16	863	498
Volume Left	8	0	0
Volume Right	8	0	8
cSH	200	969	1700
Volume to Capacity	0.08	0.00	0.29
Queue Length 95th (ft)	6	0	0
Control Delay (s)	24.6	0.0	0.0
Lane LOS	C		
Approach Delay (s)	24.6	0.0	0.0
Approach LOS	C		

Intersection Summary			
Average Delay	0.3		
Intersection Capacity Utilization	57.4%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	5	1	10	802	441	2
Peak Hour Factor	0.41	0.25	0.83	0.95	0.90	0.50
Hourly flow rate (vph)	12	4	12	844	490	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					738	
pX, platoon unblocked	0.89	0.89	0.89			
vC, conflicting volume	1360	492	494			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1404	430	433			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	91	99	99			
cM capacity (veh/h)	137	561	1015			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	16	856	494
Volume Left	12	12	0
Volume Right	4	0	4
cSH	168	1015	1700
Volume to Capacity	0.10	0.01	0.29
Queue Length 95th (ft)	8	1	0
Control Delay (s)	28.7	0.3	0.0
Lane LOS	D	A	
Approach Delay (s)	28.7	0.3	0.0
Approach LOS	D		

Intersection Summary			
Average Delay	0.5		
Intersection Capacity Utilization	65.8%	ICU Level of Service	C
Analysis Period (min)	15		

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.878			0.932						0.998	
Flt Protected		0.995			0.989		0.950					
Satd. Flow (prot)	0	1467	0	0	1451	0	1462	1452	0	0	1478	0
Flt Permitted		0.961			0.898		0.121					
Satd. Flow (perm)	0	1417	0	0	1318	0	186	1452	0	0	1478	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					61						1	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		662			526			299			444	
Travel Time (s)		15.0			12.0			6.8			10.1	
Volume (vph)	19	0	241	32	44	86	23	556	0	0	686	6
Peak Hour Factor	0.68	0.92	0.92	0.78	0.83	0.91	0.69	0.98	0.92	0.92	0.97	0.50
Heavy Vehicles (%)	0%	0%	2%	0%	0%	2%	0%	6%	0%	0%	4%	0%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	28	0	262	41	53	95	33	567	0	0	707	12
Lane Group Flow (vph)	0	290	0	0	189	0	33	567	0	0	719	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	8.0	8.0		8.0	8.0		10.0	10.0			10.0	
Minimum Split (s)	12.0	12.0		12.0	12.0		14.0	14.0			14.0	
Total Split (s)	34.0	34.0	0.0	34.0	34.0	0.0	37.0	37.0	0.0	0.0	37.0	0.0
Total Split (%)	37.8%	37.8%	0.0%	37.8%	37.8%	0.0%	41.1%	41.1%	0.0%	0.0%	41.1%	0.0%
Maximum Green (s)	30.0	30.0		30.0	30.0		33.0	33.0			33.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		21.7			21.7		56.5	56.5			56.5	
Actuated g/C Ratio		0.24			0.24		0.63	0.63			0.63	
v/c Ratio		0.85			0.52		0.28	0.62			0.77	
Control Delay		53.9			23.5		24.7	19.0			17.2	

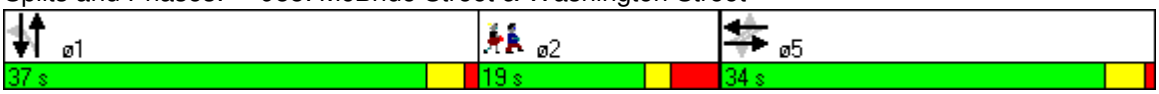
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	8.0
Minimum Split (s)	19.0
Total Split (s)	19.0
Total Split (%)	21%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	4.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	8.0
Flash Dont Walk (s)	5.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.7			0.2		0.0	0.1			2.3	
Total Delay		54.6			23.7		24.7	19.1			19.5	
LOS		D			C		C	B			B	
Approach Delay		54.6			23.7			19.4			19.5	
Approach LOS		D			C			B			B	
Queue Length 50th (ft)		158			62		7	154			131	
Queue Length 95th (ft)		224			99		35	#559			m#607	
Internal Link Dist (ft)		582			446			219			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		472			480		117	911			928	
Starvation Cap Reductn		0			0		0	0			107	
Spillback Cap Reductn		39			38		0	26			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.67			0.43		0.28	0.64			0.88	

Intersection Summary

Area Type: CBD
Cycle Length: 90
Actuated Cycle Length: 90
Offset: 8 (9%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 90
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.85
Intersection Signal Delay: 25.6 Intersection LOS: C
Intersection Capacity Utilization 67.3% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 988: McBride Street & Washington Street



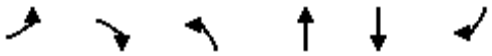
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	14	6	598	65	128	822
Peak Hour Factor	0.54	0.50	0.89	0.79	0.87	0.96
Hourly flow rate (vph)	26	12	672	82	147	856
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						299
pX, platoon unblocked	0.61					
vC, conflicting volume	1864	713			754	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	2426	713			754	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	0	97			83	
cM capacity (veh/h)	18	435			861	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	38	754	1003
Volume Left	26	0	147
Volume Right	12	82	0
cSH	26	1700	861
Volume to Capacity	1.47	0.44	0.17
Queue Length 95th (ft)	115	0	15
Control Delay (s)	570.3	0.0	4.4
Lane LOS	F		A
Approach Delay (s)	570.3	0.0	4.4
Approach LOS	F		

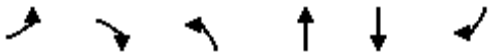
Intersection Summary			
Average Delay	14.5		
Intersection Capacity Utilization	108.6%	ICU Level of Service	G
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	0	1	1	662	833	4
Peak Hour Factor	0.25	0.25	0.25	0.89	0.96	0.75
Hourly flow rate (vph)	0	4	4	744	868	5
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					380	
pX, platoon unblocked	0.65	0.65	0.65			
vC, conflicting volume	1622	870	873			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1961	800	804			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	98	99			
cM capacity (veh/h)	45	251	537			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	4	748	873
Volume Left	0	4	0
Volume Right	4	0	5
cSH	251	537	1700
Volume to Capacity	0.02	0.01	0.51
Queue Length 95th (ft)	1	1	0
Control Delay (s)	19.6	0.2	0.0
Lane LOS	C	A	
Approach Delay (s)	19.6	0.2	0.0
Approach LOS	C		

Intersection Summary			
Average Delay	0.1		
Intersection Capacity Utilization	59.0%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	3	8	2	657	835	1
Peak Hour Factor	0.38	0.67	0.50	0.88	0.95	0.25
Hourly flow rate (vph)	8	12	4	747	879	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					752	
pX, platoon unblocked	0.69	0.69	0.69			
vC, conflicting volume	1636	881	883			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1916	828	831			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	85	95	99			
cM capacity (veh/h)	52	259	562			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	20	751	883
Volume Left	8	4	0
Volume Right	12	0	4
cSH	100	562	1700
Volume to Capacity	0.20	0.01	0.52
Queue Length 95th (ft)	17	1	0
Control Delay (s)	49.7	0.2	0.0
Lane LOS	E	A	
Approach Delay (s)	49.7	0.2	0.0
Approach LOS	E		

Intersection Summary			
Average Delay	0.7		
Intersection Capacity Utilization	58.9%	ICU Level of Service	B
Analysis Period (min)	15		

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.898			0.919						0.996	
Flt Protected		0.988			0.995		0.950					
Satd. Flow (prot)	0	1397	0	0	1411	0	1392	1438	0	0	1380	0
Flt Permitted		0.887			0.963		0.256					
Satd. Flow (perm)	0	1254	0	0	1366	0	375	1438	0	0	1380	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					82						2	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		220			526			288			444	
Travel Time (s)		5.0			12.0			6.5			10.1	
Volume (vph)	16	0	45	35	89	208	23	718	0	0	419	12
Peak Hour Factor	0.81	0.92	0.73	0.77	0.69	0.79	0.88	0.95	0.92	0.92	0.89	0.88
Heavy Vehicles (%)	23%	0%	4%	6%	0%	4%	5%	7%	0%	0%	11%	14%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	20	0	62	45	129	263	26	756	0	0	471	14
Lane Group Flow (vph)	0	82	0	0	437	0	26	756	0	0	485	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	8.0	8.0		8.0	8.0		10.0	10.0			10.0	
Minimum Split (s)	12.0	12.0		12.0	12.0		14.0	14.0			14.0	
Total Split (s)	38.0	38.0	0.0	38.0	38.0	0.0	43.0	43.0	0.0	0.0	43.0	0.0
Total Split (%)	38.0%	38.0%	0.0%	38.0%	38.0%	0.0%	43.0%	43.0%	0.0%	0.0%	43.0%	0.0%
Maximum Green (s)	34.0	34.0		34.0	34.0		39.0	39.0			39.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		29.7			29.7		58.5	58.5			58.5	
Actuated g/C Ratio		0.30			0.30		0.58	0.58			0.58	
v/c Ratio		0.22			0.94		0.12	0.90			0.60	
Control Delay		26.3			57.7		16.3	36.6			18.4	

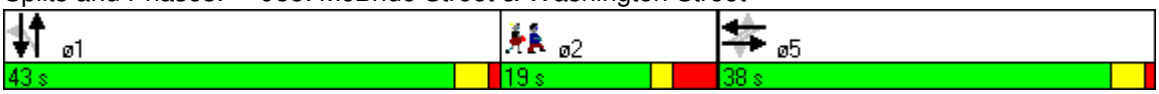
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	8.0
Minimum Split (s)	19.0
Total Split (s)	19.0
Total Split (%)	19%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	4.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	8.0
Flash Dont Walk (s)	5.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.0			0.0		0.0	0.0			0.1	
Total Delay		26.3			57.7		16.3	36.6			18.5	
LOS		C			E		B	D			B	
Approach Delay		26.3			57.7			36.0			18.5	
Approach LOS		C			E			D			B	
Queue Length 50th (ft)		37			217		7	387			86	
Queue Length 95th (ft)		73			219		31	#859			m#390	
Internal Link Dist (ft)		140			446			208			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		426			519		220	842			808	
Starvation Cap Reductn		0			0		0	0			29	
Spillback Cap Reductn		0			0		0	0			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.19			0.84		0.12	0.90			0.62	

Intersection Summary

Area Type: CBD
Cycle Length: 100
Actuated Cycle Length: 100
Offset: 13 (13%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 150
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.94
Intersection Signal Delay: 36.1 Intersection LOS: D
Intersection Capacity Utilization 72.3% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 988: McBride Street & Washington Street



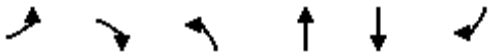
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	5	4	775	41	40	436
Peak Hour Factor	0.42	0.50	0.94	0.57	0.81	0.89
Hourly flow rate (vph)	12	8	824	72	49	490
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						288
pX, platoon unblocked	0.78					
vC, conflicting volume	1449	860			896	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1573	860			896	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	87	98			93	
cM capacity (veh/h)	90	358			753	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	20	896	539
Volume Left	12	0	49
Volume Right	8	72	0
cSH	128	1700	753
Volume to Capacity	0.16	0.53	0.07
Queue Length 95th (ft)	13	0	5
Control Delay (s)	38.1	0.0	1.8
Lane LOS	E		A
Approach Delay (s)	38.1	0.0	1.8
Approach LOS	E		

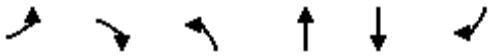
Intersection Summary			
Average Delay	1.2		
Intersection Capacity Utilization	72.3%	ICU Level of Service	C
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	5	8	5	811	436	4
Peak Hour Factor	0.25	0.50	0.92	0.94	0.89	0.38
Hourly flow rate (vph)	20	16	5	863	490	11
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					367	
pX, platoon unblocked	0.82	0.82	0.82			
vC, conflicting volume	1369	495	500			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1452	381	387			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	83	97	99			
cM capacity (veh/h)	118	547	964			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	36	868	500
Volume Left	20	5	0
Volume Right	16	0	11
cSH	181	964	1700
Volume to Capacity	0.20	0.01	0.29
Queue Length 95th (ft)	18	0	0
Control Delay (s)	29.8	0.2	0.0
Lane LOS	D	A	
Approach Delay (s)	29.8	0.2	0.0
Approach LOS	D		

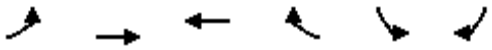
Intersection Summary			
Average Delay	0.9		
Intersection Capacity Utilization	61.8%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	5	4	11	807	445	2
Peak Hour Factor	0.41	0.25	0.83	0.95	0.90	0.50
Hourly flow rate (vph)	12	16	13	849	494	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					738	
pX, platoon unblocked	0.90	0.90	0.90			
vC, conflicting volume	1372	496	498			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1413	441	443			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	91	97	99			
cM capacity (veh/h)	136	559	1016			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	28	863	498
Volume Left	12	13	0
Volume Right	16	0	4
cSH	239	1016	1700
Volume to Capacity	0.12	0.01	0.29
Queue Length 95th (ft)	10	1	0
Control Delay (s)	22.1	0.4	0.0
Lane LOS	C	A	
Approach Delay (s)	22.1	0.4	0.0
Approach LOS	C		

Intersection Summary			
Average Delay	0.7		
Intersection Capacity Utilization	67.0%	ICU Level of Service	C
Analysis Period (min)	15		



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Volume (veh/h)	0	9	4	5	4	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	0	10	4	5	4	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type					None	
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	10				17	7
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	10				17	7
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				100	100
cM capacity (veh/h)	1623				1006	1081

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	10	10	4
Volume Left	0	0	4
Volume Right	0	5	0
cSH	1623	1700	1006
Volume to Capacity	0.00	0.01	0.00
Queue Length 95th (ft)	0	0	0
Control Delay (s)	0.0	0.0	8.6
Lane LOS			A
Approach Delay (s)	0.0	0.0	8.6
Approach LOS			A

Intersection Summary			
Average Delay	1.6		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Volume (veh/h)	58	1	6	118	1	3
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	63	1	7	128	1	3
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type					None	
Median storage veh)						
Upstream signal (ft)				220		
pX, platoon unblocked						
vC, conflicting volume			64		205	64
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			64		205	64
tC, single (s)			4.1		6.4	6.2
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	100
cM capacity (veh/h)			1551		785	1007

Direction, Lane #	EB 1	WB 1	NB 1
Volume Total	64	135	4
Volume Left	0	7	1
Volume Right	1	0	3
cSH	1700	1551	940
Volume to Capacity	0.04	0.00	0.00
Queue Length 95th (ft)	0	0	0
Control Delay (s)	0.0	0.4	8.8
Lane LOS		A	A
Approach Delay (s)	0.0	0.4	8.8
Approach LOS			A

Intersection Summary			
Average Delay	0.4		
Intersection Capacity Utilization	22.3%	ICU Level of Service	A
Analysis Period (min)	15		

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Lane Width (ft)	10	12	10	12	13	12	12	12	12	12	12	12
Storage Length (ft)	0		0	0		0	25		0	0		0
Storage Lanes	0		0	0		0	1		0	0		0
Total Lost Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
Leading Detector (ft)	50	50		50	50		50	50			50	
Trailing Detector (ft)	0	0		0	0		0	0			0	
Turning Speed (mph)	15		9	15		9	15		9	15		9
Lane Util. Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.884			0.932						0.994	
Flt Protected		0.993			0.989		0.950					
Satd. Flow (prot)	0	1476	0	0	1451	0	1462	1452	0	0	1473	0
Flt Permitted		0.935			0.893		0.121					
Satd. Flow (perm)	0	1390	0	0	1310	0	186	1452	0	0	1473	0
Right Turn on Red			No			Yes			Yes			Yes
Satd. Flow (RTOR)					60						3	
Headway Factor	1.25	1.14	1.25	1.14	1.25	1.14	1.30	1.30	1.14	1.14	1.30	1.14
Link Speed (mph)		30			30			30			30	
Link Distance (ft)		200			526			299			444	
Travel Time (s)		4.5			12.0			6.8			10.1	
Volume (vph)	30	0	242	32	45	86	24	558	0	0	689	16
Peak Hour Factor	0.68	0.92	0.92	0.78	0.83	0.91	0.69	0.98	0.92	0.92	0.97	0.50
Heavy Vehicles (%)	0%	0%	2%	0%	0%	2%	0%	6%	0%	0%	4%	0%
Parking (#/hr)				0	0	0	0	0			0	0
Adj. Flow (vph)	44	0	263	41	54	95	35	569	0	0	710	32
Lane Group Flow (vph)	0	307	0	0	190	0	35	569	0	0	742	0
Turn Type	Perm			Perm			Perm					
Protected Phases		5			5			1			1	
Permitted Phases	5			5			1					
Detector Phases	5	5		5	5		1	1			1	
Minimum Initial (s)	8.0	8.0		8.0	8.0		10.0	10.0			10.0	
Minimum Split (s)	12.0	12.0		12.0	12.0		14.0	14.0			14.0	
Total Split (s)	34.0	34.0	0.0	34.0	34.0	0.0	37.0	37.0	0.0	0.0	37.0	0.0
Total Split (%)	37.8%	37.8%	0.0%	37.8%	37.8%	0.0%	41.1%	41.1%	0.0%	0.0%	41.1%	0.0%
Maximum Green (s)	30.0	30.0		30.0	30.0		33.0	33.0			33.0	
Yellow Time (s)	3.0	3.0		3.0	3.0		3.0	3.0			3.0	
All-Red Time (s)	1.0	1.0		1.0	1.0		1.0	1.0			1.0	
Lead/Lag							Lead	Lead			Lead	
Lead-Lag Optimize?												
Vehicle Extension (s)	2.0	2.0		2.0	2.0		2.0	2.0			2.0	
Recall Mode	None	None		None	None		C-Max	C-Max			C-Max	
Walk Time (s)												
Flash Dont Walk (s)												
Pedestrian Calls (#/hr)												
Act Effct Green (s)		22.7			22.7		55.5	55.5			55.5	
Actuated g/C Ratio		0.25			0.25		0.62	0.62			0.62	
v/c Ratio		0.88			0.51		0.30	0.64			0.82	
Control Delay		56.7			23.0		26.2	19.7			18.7	

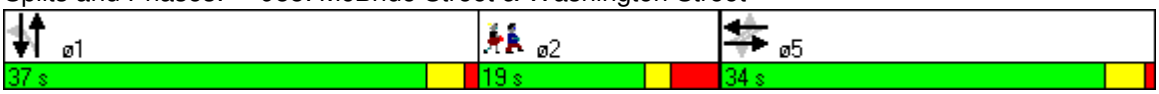
Lane Group	ø2
Lane Configurations	
Ideal Flow (vphpl)	
Lane Width (ft)	
Storage Length (ft)	
Storage Lanes	
Total Lost Time (s)	
Leading Detector (ft)	
Trailing Detector (ft)	
Turning Speed (mph)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Right Turn on Red	
Satd. Flow (RTOR)	
Headway Factor	
Link Speed (mph)	
Link Distance (ft)	
Travel Time (s)	
Volume (vph)	
Peak Hour Factor	
Heavy Vehicles (%)	
Parking (#/hr)	
Adj. Flow (vph)	
Lane Group Flow (vph)	
Turn Type	
Protected Phases	2
Permitted Phases	
Detector Phases	
Minimum Initial (s)	8.0
Minimum Split (s)	19.0
Total Split (s)	19.0
Total Split (%)	21%
Maximum Green (s)	13.0
Yellow Time (s)	2.0
All-Red Time (s)	4.0
Lead/Lag	Lag
Lead-Lag Optimize?	
Vehicle Extension (s)	2.0
Recall Mode	None
Walk Time (s)	8.0
Flash Dont Walk (s)	5.0
Pedestrian Calls (#/hr)	5
Act Effct Green (s)	
Actuated g/C Ratio	
v/c Ratio	
Control Delay	

Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Queue Delay		0.8			0.2		0.0	0.1			3.5	
Total Delay		57.5			23.1		26.2	19.8			22.2	
LOS		E			C		C	B			C	
Approach Delay		57.5			23.1			20.2			22.2	
Approach LOS		E			C			C			C	
Queue Length 50th (ft)		166			61		8	165			136	
Queue Length 95th (ft)		241			100		37	#560			m#637	
Internal Link Dist (ft)		120			446			219			364	
Turn Bay Length (ft)							25					
Base Capacity (vph)		463			477		115	896			910	
Starvation Cap Reductn		0			0		0	0			97	
Spillback Cap Reductn		33			33		0	26			0	
Storage Cap Reductn		0			0		0	0			0	
Reduced v/c Ratio		0.71			0.43		0.30	0.65			0.91	

Intersection Summary

Area Type: CBD
Cycle Length: 90
Actuated Cycle Length: 90
Offset: 8 (9%), Referenced to phase 1:NBSB, Start of Green
Natural Cycle: 100
Control Type: Actuated-Coordinated
Maximum v/c Ratio: 0.88
Intersection Signal Delay: 27.5 Intersection LOS: C
Intersection Capacity Utilization 69.6% ICU Level of Service C
Analysis Period (min) 15
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Splits and Phases: 988: McBride Street & Washington Street



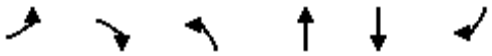
Lane Group	ø2
Queue Delay	
Total Delay	
LOS	
Approach Delay	
Approach LOS	
Queue Length 50th (ft)	
Queue Length 95th (ft)	
Internal Link Dist (ft)	
Turn Bay Length (ft)	
Base Capacity (vph)	
Starvation Cap Reductn	
Spillback Cap Reductn	
Storage Cap Reductn	
Reduced v/c Ratio	

Intersection Summary

Movement	WBL	WBR	NBT	NBR	SBL	SBT
Lane Configurations						
Sign Control	Stop		Free			Free
Grade	0%		0%			0%
Volume (veh/h)	14	6	601	66	128	828
Peak Hour Factor	0.54	0.50	0.89	0.79	0.87	0.96
Hourly flow rate (vph)	26	12	675	84	147	862
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)						299
pX, platoon unblocked	0.57					
vC, conflicting volume	1874	717			759	
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	2535	717			759	
tC, single (s)	6.4	6.2			4.1	
tC, 2 stage (s)						
tF (s)	3.5	3.3			2.2	
p0 queue free %	0	97			83	
cM capacity (veh/h)	14	433			857	

Direction, Lane #	WB 1	NB 1	SB 1
Volume Total	38	759	1010
Volume Left	26	0	147
Volume Right	12	84	0
cSH	21	1700	857
Volume to Capacity	1.83	0.45	0.17
Queue Length 95th (ft)	125	0	15
Control Delay (s)	785.9	0.0	4.5
Lane LOS	F		A
Approach Delay (s)	785.9	0.0	4.5
Approach LOS	F		

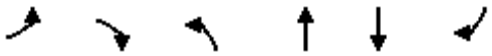
Intersection Summary			
Average Delay	19.0		
Intersection Capacity Utilization	109.2%	ICU Level of Service	H
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	4	14	13	662	834	8
Peak Hour Factor	0.25	0.25	0.25	0.89	0.96	0.75
Hourly flow rate (vph)	16	56	52	744	869	11
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					380	
pX, platoon unblocked	0.61	0.61	0.61			
vC, conflicting volume	1722	874	879			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	2176	795	804			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	44	77	90			
cM capacity (veh/h)	29	240	509			

Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	72	796	879
Volume Left	16	52	0
Volume Right	56	0	11
cSH	91	509	1700
Volume to Capacity	0.79	0.10	0.52
Queue Length 95th (ft)	104	8	0
Control Delay (s)	126.3	3.0	0.0
Lane LOS	F	A	
Approach Delay (s)	126.3	3.0	0.0
Approach LOS	F		

Intersection Summary			
Average Delay	6.6		
Intersection Capacity Utilization	60.3%	ICU Level of Service	B
Analysis Period (min)	15		



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Volume (veh/h)	3	11	6	669	848	1
Peak Hour Factor	0.38	0.67	0.50	0.88	0.95	0.25
Hourly flow rate (vph)	8	16	12	760	893	4
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None					
Median storage veh)						
Upstream signal (ft)					752	
pX, platoon unblocked	0.69	0.69	0.69			
vC, conflicting volume	1679	895	897			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1983	847	850			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	83	93	98			
cM capacity (veh/h)	46	252	550			

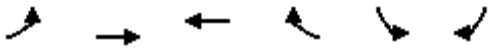
Direction, Lane #	EB 1	NB 1	SB 1
Volume Total	24	772	897
Volume Left	8	12	0
Volume Right	16	0	4
cSH	103	550	1700
Volume to Capacity	0.24	0.02	0.53
Queue Length 95th (ft)	21	2	0
Control Delay (s)	50.4	0.6	0.0
Lane LOS	F	A	
Approach Delay (s)	50.4	0.6	0.0
Approach LOS	F		

Intersection Summary			
Average Delay	1.0		
Intersection Capacity Utilization	59.7%	ICU Level of Service	B
Analysis Period (min)	15		

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Volume (veh/h)	261	3	11	74	3	11
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	284	3	12	80	3	12
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type					None	
Median storage veh)						
Upstream signal (ft)				200		
pX, platoon unblocked						
vC, conflicting volume			287		390	285
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			287		390	285
tC, single (s)			4.1		6.4	6.2
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			99		99	98
cM capacity (veh/h)			1287		612	758

Direction, Lane #	EB 1	WB 1	NB 1
Volume Total	287	92	15
Volume Left	0	12	3
Volume Right	3	0	12
cSH	1700	1287	722
Volume to Capacity	0.17	0.01	0.02
Queue Length 95th (ft)	0	1	2
Control Delay (s)	0.0	1.1	10.1
Lane LOS		A	B
Approach Delay (s)	0.0	1.1	10.1
Approach LOS			B

Intersection Summary			
Average Delay	0.6		
Intersection Capacity Utilization	25.5%	ICU Level of Service	A
Analysis Period (min)	15		



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Volume (veh/h)	0	4	9	12	14	0
Peak Hour Factor	0.92	0.92	0.92	0.92	0.92	0.92
Hourly flow rate (vph)	0	4	10	13	15	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type					None	
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	23				21	16
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	23				21	16
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	100				98	100
cM capacity (veh/h)	1606				1001	1069

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	4	23	15
Volume Left	0	0	15
Volume Right	0	13	0
cSH	1606	1700	1001
Volume to Capacity	0.00	0.01	0.02
Queue Length 95th (ft)	0	0	1
Control Delay (s)	0.0	0.0	8.7
Lane LOS			A
Approach Delay (s)	0.0	0.0	8.7
Approach LOS			A

Intersection Summary			
Average Delay	3.1		
Intersection Capacity Utilization	13.3%	ICU Level of Service	A
Analysis Period (min)	15		

3521 Washington Street

Detailed Trip Generation Estimation -- Self Storage Facility

Howard/Stein-Hudson Associates

August 15, 2011

Component	Size	Category	Directional Split	Trip Rates (Trips/ksf or unit)	Unadjusted Vehicle Trips	Capture Rate	Less capture trips	Assumed national vehicle occupancy rate[1]	**Converted to Person trips**	Transit Share[2]	**Transit Trips**	Walk/Bike/ Other Share[2]	**Walk/ Bike/ Other Trips**	Vehicle Share[2]	Vehicle Person Trips	Assumed local vehicle occupancy rate[3]	**Total Adjusted Vehicle Trips**
Daily																	
Self-Storage Facility[4]	130	Total		2.50	325		325	1.2	**390**	15%	**59**	24%	**94**	61%	238	1.8	**132**
	ksf	In	0.5	1.25	163		163	1.2	**195**	15%	**29**	24%	**47**	61%	119	1.8	**66**
		Out	0.5	1.25	163		163	1.2	**195**	15%	**29**	24%	**47**	61%	119	1.8	**66**
AM Peak Hour																	
Self-Storage Facility[4]	130	Total		0.15	20		20	1.2	**23**		**5**		**7**		12	1.8	**6**
	ksf	In	0.59	0.09	12		12	1.2	**14**	15%	**2**	31%	**4**	54%	8	1.8	**4**
		Out	0.41	0.06	8		8	1.2	**9**	28%	**3**	24%	**2**	48%	4	1.8	**2**
PM Peak Hour																	
Self-Storage Facility[4]	130	Total		0.26	34		34	1.2	**41**		**9**		**11**		21	1.8	**12**
	ksf	In	0.51	0.13	17		17	1.2	**21**	28%	**6**	24%	**5**	48%	10	1.8	**6**
		Out	0.49	0.13	17		17	1.2	**20**	15%	**3**	31%	**6**	54%	11	1.8	**6**

Notes:

1. 2001 National vehicle occupancy rates - 1.2: Home to work; 1.6
2. Mode shares based on BTD Data for Area 6.
3. Local vehicle occupancy rates based on 2000 Census data and 2001 National VOR.
4. ITE Trip Generation Equation, 8th Edition, LUC 151 (Mini-Warehouse) - Average Rates

3521 Washington Street

Detailed Trip Generation Estimation -- APARTMENT

Howard/Stein-Hudson Associates

August 15, 2011

Component	Size	Category	Directional Split	Trip Rates (Trips/ksf or unit)	Unadjusted Vehicle Trips	Capture Rate	Less capture trips	Assumed national vehicle occupancy rate[1]	**Converted to Person trips**	Transit Share[2]	**Transit Trips**	Walk/Bike/ Other Share[2]	**Walk/ Bike/ Other Trips**	Vehicle Share[2]	Vehicle Person Trips	Assumed local vehicle occupancy rate[3]	**Total Adjusted Vehicle Trips**
Daily																	
Residential - Apartments[4]	42	Total		9.00	378		378	1.2	**454**	14%	**64**	25%	**113**	61%	277	1.7	**163**
	Units	In	0.5	4.50	189		189	1.2	**227**	14%	**32**	25%	**57**	61%	138	1.7	**81**
		Out	0.5	4.50	189		189	1.2	**227**	14%	**32**	25%	**57**	61%	138	1.7	**81**
AM Peak Hour																	
Residential - Apartments[4]	42	Total		0.58	24		24	1.2	**29**		**12**		**4**		14	1.7	**8**
	Units	In	0.2	0.12	5		5	1.2	**6**	26%	**2**	18%	**1**	56%	3	1.7	**2**
		Out	0.8	0.46	19		19	1.2	**23**	44%	**10**	12%	**3**	44%	10	1.7	**6**
PM Peak Hour																	
Residential - Apartments[4]	42	Total		0.97	41		41	1.2	**49**		**18**		**7**		24	1.7	**14**
	Units	In	0.65	0.63	26		26	1.2	**32**	44%	**14**	12%	**4**	44%	14	1.7	**8**
		Out	0.35	0.34	14		14	1.2	**17**	26%	**4**	18%	**3**	56%	10	1.7	**6**

Notes:

1. 2001 National vehicle occupancy rates - 1.2: Home to work; 1.6
2. Mode shares based on BTD Data for Area 6.
3. Local vehicle occupancy rates based on 2000 Census data and 2001 National VOR.
4. ITE Trip Generation Equation, 8th Edition, LUC 220 (Apartment) - Equation.

3521 Washington Street

Detailed Trip Generation Estimation -- Health Club

Howard/Stein-Hudson Associates

August 15, 2011

Component	Size	Category	Directional Split	Trip Rates (Trips/ksf or unit)	Unadjusted Vehicle Trips	Capture Rate	Less capture trips	Assumed national vehicle occupancy rate[1]	**Converted to Person trips**	Transit Share[2]	**Transit Trips**	Walk/Bike/ Other Share[2]	**Walk/ Bike/ Other Trips**	Vehicle Share[2]	Vehicle Person Trips	Assumed local vehicle occupancy rate[3]	**Total Adjusted Vehicle Trips**
Daily																	
Health Club[4]	14	Total		32.93	461		461	1.2	**553**	15%	**83**	24%	**133**	61%	337	1.6	**211**
	ksf	In	0.5	16.47	231		231	1.2	**277**	15%	**41**	24%	**66**	61%	169	1.6	**105**
		Out	0.5	16.47	231		231	1.2	**277**	15%	**41**	24%	**66**	61%	169	1.6	**105**
AM Peak Hour																	
Health Club[4]	14	Total		1.38	19		19	1.2	**23**		**5**		**6**		12	1.6	**7**
	ksf	In	0.45	0.62	9		9	1.2	**10**	15%	**2**	31%	**3**	54%	6	1.6	**4**
		Out	0.55	0.76	11		11	1.2	**13**	28%	**4**	24%	**3**	48%	6	1.6	**4**
PM Peak Hour																	
Health Club[4]	14	Total		3.53	49		49	1.2	**59**		**13**		**16**		30	1.6	**19**
	ksf	In	0.57	2.01	28		28	1.2	**34**	28%	**9**	24%	**8**	48%	16	1.6	**10**
		Out	0.43	1.52	21		21	1.2	**26**	15%	**4**	31%	**8**	54%	14	1.6	**9**

Notes:

1. 2001 National vehicle occupancy rates - 1.2: Home to work; 1.6
2. Mode shares based on BTD Data for Area 6.
3. Local vehicle occupancy rates based on 2000 Census data and 2001 National VOR.
4. ITE Trip Generation Equation, 8th Edition, LUC 492 (Health Club) - Average Rate

3521 Washington Street

Detailed Trip Generation Estimation -- Retail

Howard/Stein-Hudson Associates

August 15, 2011

Component	Size	Category	Directional Split	Trip Rates (Trips/ksf or unit)	Unadjusted Vehicle Trips	Capture Rate	Less capture trips	Assumed national vehicle occupancy rate[1]	**Converted to Person trips**	Transit Share[2]	**Transit Trips**	Walk/Bike/ Other Share[2]	**Walk/ Bike/ Other Trips**	Vehicle Share[2]	Vehicle Person Trips	Assumed local vehicle occupancy rate[3]	**Total Adjusted Vehicle Trips**
Daily																	
Retail - Shopping Center[4]	14	Total		42.94	601	10%	541	1.8	**974**	15%	**146**	24%	**234**	61%	594	1.8	**330**
	ksf	In	0.5	21.47	301	10%	271	1.8	**487**	15%	**73**	24%	**117**	61%	297	1.8	**165**
		Out	0.5	21.47	301	10%	271	1.8	**487**	15%	**73**	24%	**117**	61%	297	1.8	**165**
AM Peak Hour																	
Retail - Shopping Center[4]	14	Total		1.00	14	10%	13	1.8	**23**		**5**		**6**		12	1.8	**7**
	ksf	In	0.61	0.61	9	10%	8	1.8	**14**	15%	**2**	31%	**4**	54%	7	1.8	**4**
		Out	0.39	0.39	5	10%	5	1.8	**9**	28%	**2**	24%	**2**	48%	4	1.8	**2**
PM Peak Hour																	
Retail - Shopping Center[4]	14	Total		3.73	52	10%	47	1.8	**85**		**18**		**23**		43	1.8	**24**
	ksf	In	0.49	1.83	26	10%	23	1.8	**41**	28%	**12**	24%	**10**	48%	20	1.8	**11**
		Out	0.51	1.90	27	10%	24	1.8	**43**	15%	**6**	31%	**13**	54%	23	1.8	**13**

Notes:

1. 2001 National vehicle occupancy rates - 1.2: Home to work; 1.6
2. Mode shares based on BTD Data for Area 6.
3. Local vehicle occupancy rates based on 2000 Census data and 2001 National VOR.
4. ITE Trip Generation Equation, 8th Edition, LUC 820 (Shopping Center) - Average Rates

Appendix C
LEED Checklists

LEED 2009 for Core and Shell Development

Project Checklist

Jamaica Plains Retail 11D1874

Date: August 8, 2011

Sustainable Sites — Possible Points: 28

Y	?	N			
Y			Prereq 1	Construction Activity Pollution Prevention	
1			Credit 1	Site Selection	1
5			Credit 2	Development Density and Community Connectivity	5
1			Credit 3	Brownfield Redevelopment	1
6			Credit 4.1	Alternative Transportation—Public Transportation Access	6
		2	Credit 4.2	Alternative Transportation—Bicycle Storage and Changing Rooms	2
3			Credit 4.3	Alternative Transportation—Low-Emitting and Fuel-Efficient Vehicles	3
2			Credit 4.4	Alternative Transportation—Parking Capacity	2
		1	Credit 5.1	Site Development—Protect or Restore Habitat	1
		1	Credit 5.2	Site Development—Maximize Open Space	1
		1	Credit 6.1	Stormwater Design—Quantity Control	1
1			Credit 6.2	Stormwater Design—Quality Control	1
		1	Credit 7.1	Heat Island Effect—Non-roof	1
1			Credit 7.2	Heat Island Effect—Roof	1
1			Credit 8	Light Pollution Reduction	1
		1	Credit 9	Tenant Design and Construction Guidelines	1

Water Efficiency — Possible Points: 10

Y			Prereq 1	Water Use Reduction—20% Reduction	
4			Credit 1	Water Efficient Landscaping	2 to 4
		2	Credit 2	Innovative Wastewater Technologies	2
3		1	Credit 3	Water Use Reduction	2 to 4

Energy and Atmosphere — Possible Points: 37

Y			Prereq 1	Fundamental Commissioning of Building Energy Systems	
Y			Prereq 2	Minimum Energy Performance	
Y			Prereq 3	Fundamental Refrigerant Management	
4		17	Credit 1	Optimize Energy Performance	3 to 21
		4	Credit 2	On-Site Renewable Energy	4
		2	Credit 3	Enhanced Commissioning	2
		2	Credit 4	Enhanced Refrigerant Management	2
		3	Credit 5.1	Measurement and Verification—Base Building	3
		3	Credit 5.2	Measurement and Verification—Tenant Submetering	3
		2	Credit 6	Green Power	2

Materials and Resources — Possible Points: 13

Y	?	N			
Y			Prereq 1	Storage and Collection of Recyclables	
		5	Credit 1	Building Reuse—Maintain Existing Walls, Floors, and Roof	1 to 5
2			Credit 2	Construction Waste Management	1 to 2
		1	Credit 3	Materials Reuse	1
1		1	Credit 4	Recycled Content	1 to 2
1		1	Credit 5	Regional Materials	1 to 2
		1	Credit 6	Certified Wood	1

Indoor Environmental Quality — Possible Points: 12

Y			Prereq 1	Minimum Indoor Air Quality Performance	
Y			Prereq 2	Environmental Tobacco Smoke (ETS) Control	
1			Credit 1	Outdoor Air Delivery Monitoring	1
		1	Credit 2	Increased Ventilation	1
		1	Credit 3	Construction IAQ Management Plan—During Construction	1
1			Credit 4.1	Low-Emitting Materials—Adhesives and Sealants	1
1			Credit 4.2	Low-Emitting Materials—Paints and Coatings	1
1			Credit 4.3	Low-Emitting Materials—Flooring Systems	1
1			Credit 4.4	Low-Emitting Materials—Composite Wood and Agrifiber Products	1
1			Credit 5	Indoor Chemical and Pollutant Source Control	1
		1	Credit 6	Controllability of Systems—Thermal Comfort	1
		1	Credit 7	Thermal Comfort—Design	1
		1	Credit 8.1	Daylight and Views—Daylight	1
		1	Credit 8.2	Daylight and Views—Views	1

Innovation and Design Process — Possible Points: 6

1			Credit 1.1	Innovation in Design:(SS4.1 over 200 transit rides per pay)	1
		1	Credit 1.2	Innovation in Design: Specific Title	1
		1	Credit 1.3	Innovation in Design: Specific Title	1
		1	Credit 1.4	Innovation in Design: Specific Title	1
		1	Credit 1.5	Innovation in Design: Specific Title	1
1			Credit 2	LEED Accredited Professional	1

Regional Priority Credits — Possible Points: 4

		1	Credit 1.1	Regional Priority: Specific Credit	1
		1	Credit 1.2	Regional Priority: Specific Credit	1
		1	Credit 1.3	Regional Priority: Specific Credit	1
		1	Credit 1.4	Regional Priority: Specific Credit	1

Total — Possible Points: 110

Certified 40 to 49 points Silver 50 to 59 points Gold 60 to 79 points Platinum 80 to 110

LEED 2009 for New Construction and Major Renovations

Project Checklist

Burnett Street- Residential

08.02.11

Sustainable Sites — Possible Points: 26

Y	?	N			
Y			Prereq 1	Construction Activity Pollution Prevention	
1			Credit 1	Site Selection	1
5			Credit 2	Development Density and Community Connectivity	5
	1		Credit 3	Brownfield Redevelopment	1
6			Credit 4.1	Alternative Transportation—Public Transportation Access	6
1			Credit 4.2	Alternative Transportation—Bicycle Storage and Changing Rooms	1
3			Credit 4.3	Alternative Transportation—Low-Emitting and Fuel-Efficient Vehicles	3
2			Credit 4.4	Alternative Transportation—Parking Capacity	2
		1	Credit 5.1	Site Development—Protect or Restore Habitat	1
1			Credit 5.2	Site Development—Maximize Open Space	1
1			Credit 6.1	Stormwater Design—Quantity Control	1
1			Credit 6.2	Stormwater Design—Quality Control	1
	1		Credit 7.1	Heat Island Effect—Non-roof	1
1			Credit 7.2	Heat Island Effect—Roof	1
1			Credit 8	Light Pollution Reduction	1

Water Efficiency — Possible Points: 10

Y			Prereq 1	Water Use Reduction—20% Reduction	
2		2	Credit 1	Water Efficient Landscaping	2 to 4
		2	Credit 2	Innovative Wastewater Technologies	2
3		2	Credit 3	Water Use Reduction	2 to 4

Energy and Atmosphere — Possible Points: 35

Y			Prereq 1	Fundamental Commissioning of Building Energy Systems	
Y			Prereq 2	Minimum Energy Performance	
Y			Prereq 3	Fundamental Refrigerant Management	
6		13	Credit 1	Optimize Energy Performance	1 to 19
		7	Credit 2	On-Site Renewable Energy	1 to 7
		2	Credit 3	Enhanced Commissioning	2
		2	Credit 4	Enhanced Refrigerant Management	2
		3	Credit 5	Measurement and Verification	3
		2	Credit 6	Green Power	2

Materials and Resources — Possible Points: 14

Y			Prereq 1	Storage and Collection of Recyclables	
		3	Credit 1.1	Building Reuse—Maintain Existing Walls, Floors, and Roof	1 to 3
		1	Credit 1.2	Building Reuse—Maintain 50% of Interior Non-Structural Elements	1
1		1	Credit 2	Construction Waste Management	1 to 2
		2	Credit 3	Materials Reuse	1 to 2

Materials and Resources, Continued

Y	?	N			
1		1	Credit 4	Recycled Content	1 to 2
1		1	Credit 5	Regional Materials	1 to 2
		1	Credit 6	Rapidly Renewable Materials	1
		1	Credit 7	Certified Wood	1

Indoor Environmental Quality — Possible Points: 15

Y			Prereq 1	Minimum Indoor Air Quality Performance	
Y			Prereq 2	Environmental Tobacco Smoke (ETS) Control	
		1	Credit 1	Outdoor Air Delivery Monitoring	1
		1	Credit 2	Increased Ventilation	1
		1	Credit 3.1	Construction IAQ Management Plan—During Construction	1
		1	Credit 3.2	Construction IAQ Management Plan—Before Occupancy	1
1			Credit 4.1	Low-Emitting Materials—Adhesives and Sealants	1
1			Credit 4.2	Low-Emitting Materials—Paints and Coatings	1
1			Credit 4.3	Low-Emitting Materials—Flooring Systems	1
		1	Credit 4.4	Low-Emitting Materials—Composite Wood and Agrifiber Products	1
		1	Credit 5	Indoor Chemical and Pollutant Source Control	1
1			Credit 6.1	Controllability of Systems—Lighting	1
1			Credit 6.2	Controllability of Systems—Thermal Comfort	1
		1	Credit 7.1	Thermal Comfort—Design	1
		1	Credit 7.2	Thermal Comfort—Verification	1
1			Credit 8.1	Daylight and Views—Daylight	1
	1		Credit 8.2	Daylight and Views—Views	1

Innovation and Design Process — Possible Points: 6

1			Credit 1.1	Innovation in Design: Specific Title	1
		1	Credit 1.2	Innovation in Design: Specific Title	1
		1	Credit 1.3	Innovation in Design: Specific Title	1
		1	Credit 1.4	Innovation in Design: Specific Title	1
		1	Credit 1.5	Innovation in Design: Specific Title	1
		1	Credit 2	LEED Accredited Professional	1

Regional Priority Credits — Possible Points: 4

1			Credit 1.1	Regional Priority: Specific Credit	1
1			Credit 1.2	Regional Priority: Specific Credit	1
1			Credit 1.3	Regional Priority: Specific Credit	1
		1	Credit 1.4	Regional Priority: Specific Credit	1

Total — Possible Points: 110

47	3	61	Total

Certified 40 to 49 points Silver 50 to 59 points Gold 60 to 79 points Platinum 80 to 110

LEED 2009 for New Construction and Major Renovations

Project Checklist

Burnett Street- Residential_Triplex

08.02.11

Y	?	N			
22	1	3	**Sustainable Sites**	Possible Points:	**26**
Y			Prereq 1	Construction Activity Pollution Prevention	
1			Credit 1	Site Selection	1
5			Credit 2	Development Density and Community Connectivity	5
	1		Credit 3	Brownfield Redevelopment	1
6			Credit 4.1	Alternative Transportation—Public Transportation Access	6
1			Credit 4.2	Alternative Transportation—Bicycle Storage and Changing Rooms	1
3			Credit 4.3	Alternative Transportation—Low-Emitting and Fuel-Efficient Vehicles	3
2			Credit 4.4	Alternative Transportation—Parking Capacity	2
		1	Credit 5.1	Site Development—Protect or Restore Habitat	1
1			Credit 5.2	Site Development—Maximize Open Space	1
1			Credit 6.1	Stormwater Design—Quantity Control	1
1			Credit 6.2	Stormwater Design—Quality Control	1
		1	Credit 7.1	Heat Island Effect—Non-roof	1
		1	Credit 7.2	Heat Island Effect—Roof	1
1			Credit 8	Light Pollution Reduction	1
5		5	**Water Efficiency**	Possible Points:	**10**
Y			Prereq 1	Water Use Reduction—20% Reduction	
2		2	Credit 1	Water Efficient Landscaping	2 to 4
		2	Credit 2	Innovative Wastewater Technologies	2
3		1	Credit 3	Water Use Reduction	2 to 4
6		29	**Energy and Atmosphere**	Possible Points:	**35**
Y			Prereq 1	Fundamental Commissioning of Building Energy Systems	
Y			Prereq 2	Minimum Energy Performance	
Y			Prereq 3	Fundamental Refrigerant Management	
6		13	Credit 1	Optimize Energy Performance	1 to 19
		7	Credit 2	On-Site Renewable Energy	1 to 7
		2	Credit 3	Enhanced Commissioning	2
		2	Credit 4	Enhanced Refrigerant Management	2
		3	Credit 5	Measurement and Verification	3
		2	Credit 6	Green Power	2
3		11	**Materials and Resources**	Possible Points:	**14**
Y			Prereq 1	Storage and Collection of Recyclables	
		3	Credit 1.1	Building Reuse—Maintain Existing Walls, Floors, and Roof	1 to 3
		1	Credit 1.2	Building Reuse—Maintain 50% of Interior Non-Structural Elements	1
1		1	Credit 2	Construction Waste Management	1 to 2
		2	Credit 3	Materials Reuse	1 to 2

Y	?	N			
			Materials and Resources, Continued		
1		1	Credit 4	Recycled Content	1 to 2
1		1	Credit 5	Regional Materials	1 to 2
		1	Credit 6	Rapidly Renewable Materials	1
		1	Credit 7	Certified Wood	1
6	1	8	**Indoor Environmental Quality**	Possible Points:	**15**
Y			Prereq 1	Minimum Indoor Air Quality Performance	
Y			Prereq 2	Environmental Tobacco Smoke (ETS) Control	
		1	Credit 1	Outdoor Air Delivery Monitoring	1
		1	Credit 2	Increased Ventilation	1
		1	Credit 3.1	Construction IAQ Management Plan—During Construction	1
		1	Credit 3.2	Construction IAQ Management Plan—Before Occupancy	1
1			Credit 4.1	Low-Emitting Materials—Adhesives and Sealants	1
1			Credit 4.2	Low-Emitting Materials—Paints and Coatings	1
1			Credit 4.3	Low-Emitting Materials—Flooring Systems	1
		1	Credit 4.4	Low-Emitting Materials—Composite Wood and Agrifiber Products	1
		1	Credit 5	Indoor Chemical and Pollutant Source Control	1
1			Credit 6.1	Controllability of Systems—Lighting	1
1			Credit 6.2	Controllability of Systems—Thermal Comfort	1
		1	Credit 7.1	Thermal Comfort—Design	1
		1	Credit 7.2	Thermal Comfort—Verification	1
1			Credit 8.1	Daylight and Views—Daylight	1
	1		Credit 8.2	Daylight and Views—Views	1
1		5	**Innovation and Design Process**	Possible Points:	**6**
1			Credit 1.1	Innovation in Design: Specific Title	1
		1	Credit 1.2	Innovation in Design: Specific Title	1
		1	Credit 1.3	Innovation in Design: Specific Title	1
		1	Credit 1.4	Innovation in Design: Specific Title	1
		1	Credit 1.5	Innovation in Design: Specific Title	1
		1	Credit 2	LEED Accredited Professional	1
3		1	**Regional Priority Credits**	Possible Points:	**4**
1			Credit 1.1	Regional Priority: Specific Credit	1
1			Credit 1.2	Regional Priority: Specific Credit	1
1			Credit 1.3	Regional Priority: Specific Credit	1
		1	Credit 1.4	Regional Priority: Specific Credit	1
46	2	62	**Total**	Possible Points:	**110**

Certified 40 to 49 points Silver 50 to 59 points Gold 60 to 79 points Platinum 80 to 110

LEED 2009 for New Construction and Major Renovations

Project Checklist

Jamaica Plains SSG 11D1874

Date: August 8, 2011

Sustainable Sites — Possible Points: 26

Y	?	N			
Y			Prereq 1	Construction Activity Pollution Prevention	
1			Credit 1	Site Selection	1
5			Credit 2	Development Density and Community Connectivity	5
1			Credit 3	Brownfield Redevelopment	1
6			Credit 4.1	Alternative Transportation—Public Transportation Access	6
		1	Credit 4.2	Alternative Transportation—Bicycle Storage and Changing Rooms	1
3			Credit 4.3	Alternative Transportation—Low-Emitting and Fuel-Efficient Vehicles	3
2			Credit 4.4	Alternative Transportation—Parking Capacity	2
		1	Credit 5.1	Site Development—Protect or Restore Habitat	1
		1	Credit 5.2	Site Development—Maximize Open Space	1
		1	Credit 6.1	Stormwater Design—Quantity Control	1
1			Credit 6.2	Stormwater Design—Quality Control	1
		1	Credit 7.1	Heat Island Effect—Non-roof	1
1			Credit 7.2	Heat Island Effect—Roof	1
1			Credit 8	Light Pollution Reduction	1

Water Efficiency — Possible Points: 10

Y			Prereq 1	Water Use Reduction—20% Reduction	
4			Credit 1	Water Efficient Landscaping	2 to 4
		2	Credit 2	Innovative Wastewater Technologies	2
3		1	Credit 3	Water Use Reduction	2 to 4

Energy and Atmosphere — Possible Points: 35

Y			Prereq 1	Fundamental Commissioning of Building Energy Systems	
Y			Prereq 2	Minimum Energy Performance	
Y			Prereq 3	Fundamental Refrigerant Management	
2		17	Credit 1	Optimize Energy Performance	1 to 19
		7	Credit 2	On-Site Renewable Energy	1 to 7
		2	Credit 3	Enhanced Commissioning	2
		2	Credit 4	Enhanced Refrigerant Management	2
		3	Credit 5	Measurement and Verification	3
		2	Credit 6	Green Power	2

Materials and Resources — Possible Points: 14

Y			Prereq 1	Storage and Collection of Recyclables	
		3	Credit 1.1	Building Reuse—Maintain Existing Walls, Floors, and Roof	1 to 3
		1	Credit 1.2	Building Reuse—Maintain 50% of Interior Non-Structural Elements	1
2			Credit 2	Construction Waste Management	1 to 2
		2	Credit 3	Materials Reuse	1 to 2

Materials and Resources, Continued

Y	?	N			
1		1	Credit 4	Recycled Content	1 to 2
1		1	Credit 5	Regional Materials	1 to 2
		1	Credit 6	Rapidly Renewable Materials	1
		1	Credit 7	Certified Wood	1

Indoor Environmental Quality — Possible Points: 15

Y			Prereq 1	Minimum Indoor Air Quality Performance	
Y			Prereq 2	Environmental Tobacco Smoke (ETS) Control	
1			Credit 1	Outdoor Air Delivery Monitoring	1
		1	Credit 2	Increased Ventilation	1
		1	Credit 3.1	Construction IAQ Management Plan—During Construction	1
		1	Credit 3.2	Construction IAQ Management Plan—Before Occupancy	1
1			Credit 4.1	Low-Emitting Materials—Adhesives and Sealants	1
1			Credit 4.2	Low-Emitting Materials—Paints and Coatings	1
1			Credit 4.3	Low-Emitting Materials—Flooring Systems	1
1			Credit 4.4	Low-Emitting Materials—Composite Wood and Agrifiber Products	1
1			Credit 5	Indoor Chemical and Pollutant Source Control	1
		1	Credit 6.1	Controllability of Systems—Lighting	1
		1	Credit 6.2	Controllability of Systems—Thermal Comfort	1
		1	Credit 7.1	Thermal Comfort—Design	1
		1	Credit 7.2	Thermal Comfort—Verification	1
		1	Credit 8.1	Daylight and Views—Daylight	1
		1	Credit 8.2	Daylight and Views—Views	1

Innovation and Design Process — Possible Points: 6

1			Credit 1.1	Innovation in Design: (SS4.1 Over 200 Transit rides per day)	1
		1	Credit 1.2	Innovation in Design: Specific Title	1
		1	Credit 1.3	Innovation in Design: Specific Title	1
		1	Credit 1.4	Innovation in Design: Specific Title	1
		1	Credit 1.5	Innovation in Design: Specific Title	1
1			Credit 2	LEED Accredited Professional	1

Regional Priority Credits — Possible Points: 4

		1	Credit 1.1	Regional Priority: Specific Credit	1
		1	Credit 1.2	Regional Priority: Specific Credit	1
		1	Credit 1.3	Regional Priority: Specific Credit	1
		1	Credit 1.4	Regional Priority: Specific Credit	1

Total — Possible Points: 110

42		68			

Certified 40 to 49 points Silver 50 to 59 points Gold 60 to 79 points Platinum 80 to 110