

EXHIBIT X (updated August 25, 2006)
Foggy Bottom Campus Streetscape Plan¹

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¹ This proposed Streetscape Plan has been updated from the preliminary plan filed with the Zoning Commission on July 13, 2006 to reflect further input and guidance from the Office of Planning and Department of Transportation. The University is continuing to seek input from the appropriate District agencies and interested stakeholders with respect to the Streetscape Plan, and has scheduled an open community meeting to discuss the proposed Plan on August 30, 2006.

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SECTION 1: OVERVIEW

1.1 Introduction

The George Washington University (GW), founded in 1821 and rooted in the Foggy Bottom neighborhood since 1912, combines the resources of a major international research university with the dynamics of a vibrant, urban setting in the heart of the nation’s capital. GW’s location is key to its mission and critical to its success, as the opportunities and resources surrounding the campus attract outstanding faculty and students and help shape some of the University’s most successful academic programs.

Beyond the major international educational, financial, health, policy, and political institutions that are located in Washington DC, the District is comprised of distinct neighborhoods that together form the fabric of a unique and diverse city. The University values the Foggy Bottom and West End neighborhoods of which it is a part, and recognizes that a thriving community is a key component of the *GW Experience*. The building blocks of a vibrant community include not only well-planned and executed building design and functional, attractive open spaces and pedestrian pathways, but also sustainable streetscape elements. Over the past several years, the Foggy Bottom campus environment has been enhanced by various streetscape improvements, including new plantings, directional signage, art, benches, and other street furniture. The University remains committed to maintaining and enhancing the pedestrian environment of the campus for all who study, live, and work in and around the Foggy Bottom campus.

The Streetscape Plan is a component of the *Foggy Bottom Campus Plan: 2006 – 2025*. The proposed Campus Plan sets forth a development framework that provides for the location of increased density at targeted sites – primarily concentrated in the core of campus – in accordance with surrounding development patterns. This approach allows the University to preserve historic resources and retain open spaces, pedestrian pathways, and pocket parks on the balance of the campus, maintaining a diversity in the scale and character of the campus environment that supports and enhances the *GW living and learning* experience.

The Streetscape Plan sets forth an implementation plan for future streetscape improvements to occur over the next two decades in accordance with the fundamental planning concepts outlined in the *Foggy Bottom Campus Plan: 2006 – 2025*. Consistent with the Campus Plan, the Streetscape Plan reflects the diversity of the Foggy Bottom campus – particularly the primary “campus streets” (I, H, and G Streets) – and focuses on areas of the campus where University activity is concentrated. The proposed implementation plan defines three “layers” of streetscape elements, which build from a “base” layer that establishes and supports GW identity across the entire campus to a “premium” layer which celebrates the character and identity of the campus in key locations. Ultimately, it is intended that the Streetscape Plan will serve as a comprehensive planning resource to complement the development plan set forth in the *Foggy Bottom Campus Plan: 2006 – 2025* as well as the proposed Foggy Bottom Campus Historic Preservation Plan.

1.2 Development of the Streetscape Plan

The development of the Streetscape Plan takes into account feedback from a variety of stakeholders – including members of the Foggy Bottom and West End communities, District agencies, University students, faculty, and staff, as well as other interested parties – which has thus far been gathered primarily through the University’s comprehensive community-based planning process.² The proposed Plan has been informed by an evaluation of existing conditions, consideration of the sustainability of current and proposed streetscape elements, and the expertise and direction of streetscape and design professionals³. It is anticipated that this proposed Streetscape Plan will continue to be further refined and developed through ongoing collaboration between the University, the Office of Planning, and Department of Transportation. The University is also pursuing additional opportunities for further community discussions and input, including an open community meeting focused specifically on the Streetscape Plan scheduled for August 30, 2006.

1.3 Planning Goals and Design Principles

The Streetscape Plan is aimed at enhancing the Foggy Bottom campus environment and creating an appropriate “sense of place” and GW identity, particularly in those areas of campus where University activity is most concentrated. Several planning goals and design principles were established in connection with this comprehensive planning effort.

The following *planning goals* guided the development of the Streetscape Plan within the context of the Foggy Bottom campus and the surrounding neighborhoods:

- Recognize the University’s presence in Foggy Bottom and West End neighborhoods with a plan for maintenance of and improvements to various streetscape elements that is specific to GW and complementary to the existing Washington, DC fabric;
- Express the identity of the campus within the campus boundary and strengthen the character and presence of the University through the use of additional streetscape elements where campus uses and activities are more intense;
- Utilize streetscape elements to recognize and enhance the special nature of streets within the campus boundary, particularly the pedestrian character of the east/west “campus streets”; and
- Identify a coherent palette of streetscape elements that identifies the presence of the University and responds to needs of pedestrians, bicycles, and automobiles as they move through and within the campus.

The following *design principles* were established to guide the proposed improvements and implementation plan set forth in this Streetscape Plan (detailed more fully in Sections 4 and 5):

- Create a unified image in the streetscape that is unique to The George Washington University through the use of paving materials, plantings, lighting, street furniture, signage, and public art;

² As detailed in the *Foggy Bottom Campus Plan: 2006 – 2025*, for over a year leading up to the filing of the Campus Plan, the University engaged in a comprehensive community-based planning effort to fully explore and evaluate future development of the Foggy Bottom campus in the context of the surrounding neighborhoods.

³ Ehrenkrantz, Eckstut and Kuhn Architects (EE&K), a design firm with extensive urban campus design and streetscape planning expertise, is the lead design consultant for the *Foggy Bottom Campus Plan: 2006 – 2025* as well as this Streetscape Plan effort.

- Differentiate various uses in the street section (“streetscape zones”) as appropriate (e.g., through scale, texture, color, and/or material selection) in order to help identify the cartway, on-street parking, furnishing area, pedestrian way, spill zone, planting zone, and potential retail/food service or planting/seating areas;
- Design University way-finding, building identification, donor, and gateway signage to be clearly visible from the perspective of the pedestrian and/or the driver;
- Maintain existing street trees where possible and provide tree boxes in the furnishing zone that facilitate healthy growth and easy maintenance;
- Enhance planting in pocket parks and locate seating to facilitate pedestrian gathering;
- Direct pedestrian traffic through the use of appropriate treatments at crossings in conjunction with smaller module materials (i.e., brick sidewalks);
- Develop a vocabulary of standardized University elements to form the “kit of parts” for future streetscape development;
- Identify “special places” on campus where enhanced streetscape embellishments should occur;
- Promote an environment which provides ease of movement and safety for (and minimizes conflicts between) pedestrians and vehicles;
- Provide streetscape and landscape design elements that are sustainable, enhance context and are consistent with applicable District standards; and
- Enhance campus security and encourage positive surveillance through the use of streetscape elements.

SECTION 2: GENERAL GUIDELINES AND STANDARDS

2.1 Applicability

The Streetscape Plan is applicable to the entire Foggy Bottom campus (as specifically defined in the Campus Plan), which is generally bounded by Pennsylvania Avenue to the north, F Street to the south, and 24th and 19th Streets to the west and east, respectively. This Streetscape Plan is intended to run concurrently with the twenty-year term of the proposed *Foggy Bottom Campus Plan: 2006 – 2025*.

2.2 Plan Guidelines

This Streetscape Plan has been developed subject to the following guidelines:

1. This Plan sets forth general standards for the treatment of streetscape and open spaces within the boundaries of GW’s Foggy Bottom campus. Over the term of the Campus Plan, variations and modifications to these standards may be necessary based upon changes in materials or other conditions. It is anticipated that the University will seek input on such modifications from members of the Advisory Committee called for in the proposed conditions to the *Foggy Bottom Campus Plan: 2006 – 2025* as well as other community residents and interested stakeholders.
2. Implementation of the Streetscape Plan will be made on a project basis, either in connection with the various development projects set forth in the Campus Plan, or potentially as specific

streetscape-related projects, as appropriate funding resources become available. Implementation of Streetscape Plan elements will be addressed in individual campus development projects (e.g., as part of the second-stage PUD applications required for each project), and Streetscape Plan implementation progress will be reported to the aforementioned Advisory Committee as well as to other community members and interested stakeholders.

3. The potential concepts set forth in this Streetscape Plan are consistent with the Historic Preservation Guidelines set forth for “Landscaping, Landscape Features and Secondary Buildings in Historic District.” With respect to areas located within the potential historic district included as a component of the proposed Foggy Bottom Campus Historic Preservation Plan, appropriate review and permitting processes will be followed in recognition of the impact that landscape features can have on the character of the historically contributing properties when located in front yards or other areas that can be viewed from the public right of way.

It is contemplated that additional Streetscape Plan guidelines may be defined as this Plan is further developed and implemented.

2.3 Dimensional and Material Standards

In order to guide the implementation of this Streetscape Plan, the following general street zone dimensional and materials standards have been developed, taking into account the unique urban character of the Foggy Bottom campus.

1. Street Zone Dimensional Standards⁴ (EXHIBIT A: STREETScape ZONES DIAGRAM)
 - A. *Cartway* (paved area between curbs, dedicated to motor vehicles, including both parking and travel lanes): to remain consistent with existing conditions, approximately 33’ to 39’ (except where potential bumpouts or and/or mid-block crossings may be incorporated)
 1. *On-street parking*: to remain consistent with existing conditions, approximately 7’ to 8’ (except where parking spaces are contemplated to be removed as a result of potential bumpouts and/or mid-block crossings)
 - B. *Sidewalk Area* (typically subdivided into three zones)
 1. *Furnishing zone* (location for placement of street lights, benches, transit stops, bike racks, street trees, and other furnishings): 4’ to 6’ depending on building uses at edges of zone and existing conditions
 - a. Street trees spacing: 44’ to 66’
 - b. Lighting spacing: 44’ to 66’
 2. *Pedestrian way* or *clear zone*: minimum 4’, though 6’ preferred (width dependent on building uses at edge of zone and existing conditions)

⁴ Given the diversity in scale and character of the various campus streets as described more fully in this Plan, general ranges of measurements have been noted to accommodate varying conditions.

3. *Paving/Spill zone* (area between building and clear zone for planting of shrubs, ground cover, and ornamental trees, and location where door swings may occur without impeding pedestrian movement): minimum 2'
2. Paving Palette
 - Red Brick
 - London Pavers (2' x 4')
 - Scored concrete
 - Granite cobbles

SECTION 3: LOCATION, FUNCTION & EXISTING STREETScape CONDITIONS

As an urban campus, GW is defined not only by university buildings and open spaces, but also in large part by the city streets that traverse the campus. As articulated in the Campus Plan, the east-west streets within the campus are generally more pedestrian-oriented and help shape the character of the campus as well as its activity, development, and land use patterns, while the north-south streets are predominantly vehicular travel corridors, accommodating both local and regional traffic. In particular, 23rd Street serves as a key north-south travel corridor serving various modes of transportation, as illustrated in EXHIBIT B: STREETScape PLANNING GRAPHIC – PEDESTRIAN AND VEHICULAR CIRCULATION.

The location, function and existing conditions of streetscape components included on the three primary “campus streets” (I, H, and G Streets), the transitional campus streets (F Street and Pennsylvania Avenue), as well as the north-south campus streets are summarized below. The referenced exhibits are based on a streetscape analysis that identified quantity and general location of various streetscape elements. (EXHIBIT C: EXISTING CONDITIONS CAMPUS MAP – FOGGY BOTTOM CAMPUS)

3.1 Primary “Campus Streets”

3.1.1 I Street

Location & Function of Street. The Streetscape Plan is applicable to the portion of I Street that lies parallel and to the south of the commercial corridor of Pennsylvania Avenue, between 24th Street and The Shops at 2000 Penn. This section of I Street currently functions as a mixed-use corridor for a variety of academic, residential, and retail services.

Overview of Existing Conditions. The existing street lighting along I Street is adequate but has inconsistent spacing. While there is a significant amount of planting and pocket parks within the planting zone, there are potential opportunities to enhance the landscape and streetscape elements in the furnishing zone. Placards and banners in front of buildings serve as good directional signage, however, certain street markers, directional signs, and building inscriptions are difficult to read by both pedestrian and vehicular traffic. Paving is predominantly concrete, with the use of brick in certain locations, with granite curbs. (EXHIBIT D: EXISTING CONDITIONS STREET MAP – I STREET)

3.1.2 H Street

Location & Function of Street. The Streetscape Plan is applicable to the portion of H Street that lies between 19th and 24th Streets. This section of H Street currently serves as an active pedestrian corridor, lined with entrances to several academic and student support facilities, such as the Gelman Library and the Marvin Center, and to the major campus open spaces (University Yard and Kogan Plaza).

Overview of Existing Conditions. The existing street lighting along H Street is adequate but has inconsistent spacing. Although planting elements are replete along the corridor, potting wells and/or raised planters could be utilized in order to protect these elements from high pedestrian flow. Street markers and directional signs as well as parking signage could be improved to make them easier to read by both pedestrians and vehicular traffic. Paving varies between concrete and brick with fairly consistent use of brick gutters and granite curbs. (EXHIBIT E: EXISTING CONDITIONS STREET MAP – H STREET)

3.1.3 G Street

Location & Function of Street. The Streetscape Plan is applicable to G Street between 24th and 20th Streets. This section of G Street currently serves primarily as an academic corridor, but with a more moderate activity level than H Street. In general, G Street is characterized by many lower-scale buildings of architectural and historical significance.

Overview of Existing Conditions. The street lighting along G Street is adequate but inconsistently spaced. Similar to H Street, G Street includes many planting elements; however, potting wells and/or raised planters could be utilized in order to protect these elements from the pedestrian flow. Shrubs, ground cover, and ornamental trees lie mainly in the planting zone, with less planting in the furnishing zone. Street markers and directional signs as well as parking signage could be improved for easier reading by both pedestrians and vehicular commuters. Paving varies between brick and concrete with consistent use of brick gutters and granite curbs. (EXHIBIT F: EXISTING CONDITIONS STREET MAP – G STREET)

3.2 Transitional Streets

In addition to the primary campus streets identified above, F Street and Pennsylvania Avenue serve as transition streets between the campus and surrounding uses and neighborhoods.

3.2.1 F Street

Location & Function of Street. F Street is generally the southern boundary of the Foggy Bottom campus. It serves as an important transitional street between the campus and surrounding residential and institutional uses.

Overview of Existing Conditions. F Street has a diverse scale of buildings, from lower-scale townhouses to buildings 90' in height. Generally the street has wide sidewalks and plantings are found along building edges and in tree boxes. Paving is predominantly brick with concrete in certain locations. Street lights are evenly spaced down the corridor, for the most part, though in certain locations the spacing pattern is inconsistent.

3.2.2 Pennsylvania Avenue

Location & Function of Street. Pennsylvania Avenue is generally the northern boundary of the Foggy Bottom campus. The Avenue serves as a transitional street between the campus and the Central Business District (CBD) and is an important vehicular corridor for the District.

Overview of Existing Conditions. The wide, commercial corridor supports taller and denser buildings than the balance of campus. Pennsylvania Avenue feels highly urban, reflecting its location at the southern edge of the CBD, and office and retail development along the Avenue remains consistent with its commercial and high-density character. Paving is predominantly concrete. The street lighting and spacing is fairly consistent, with street lamps alternating on both sides of the corridor.

3.3 North-South Streets

3.3.1 20th Street

Location & Function of Street. 20th Street provides a transition between the campus and adjacent international and financial institutions area (including the IMF and World Bank buildings). 20th Street also serves as an important connection to the CBD.

Overview of Existing Conditions. The scale of the buildings along this corridor is diverse with shifts from the tall and dense World Bank/IMF buildings to several campus-scaled residence halls and academic buildings, as well as lower-scale townhouses. Cobra Head Pendant Post lights are spaced at approximately 60 to 90 feet along the street, usually alternating sides. The sidewalks are paved with concrete. Shrubs, ground cover, and a diverse collection of trees are well maintained in the planting zone. Street trees are generally spaced about 30 to 40 feet apart, and are occasionally spaced at wider intervals at building entrances and exits.

3.3.2 21st Street

Location & Function of Street. 21st Street is a one-way street that carries vehicular travel south from the CBD through the campus. It also provides an important connection for campus vehicular travel, as there are major institutional uses (academic, residential services) located along the corridor.

Overview of Existing Conditions. Low and medium scale academic and residential buildings line 21st Street through the center of the campus. Cobra Head Pendant Post lights are spaced 60 to 90 feet down the street, usually alternating sides. Sidewalks are mostly paved with concrete, with a few blocks paved with brick. Curbs are generally granite, with concrete curbs in some locations. Street trees are generally spaced about 30 to 40 feet apart, and are occasionally spaced at wider intervals at building entrances and exits. Shrubs, ground cover, and a diverse collection of trees are well maintained in the planting zone. Several intersections along 21st include public art, George Washington busts, and other special design elements.

3.3.3 22nd Street

Location & Function of Street. 22nd Street carries traffic one-way northbound and is a major conduit for travel between Virginia Avenue and Pennsylvania Avenue. The corridor provides a central

connection for campus vehicular travel as many institutional uses are located along the corridor (including academic buildings, residence halls, and student activity facilities). 22nd Street also provides a central connection between the campus, the government and health institutions area to the south, and the CBD to the north.

Overview of Existing Conditions. Low and medium scale academic and residential buildings line 22nd Street through the center of the campus. Cobra Head Pendant Post lights are spaced 60 to 90 feet down the street, usually alternating sides. Sidewalks are a mix of paving styles, including brick, concrete with brick in the furnishing zone, and concrete. Curbs are generally granite with brick gutters. Street trees are generally spaced about 30 to 40 feet apart, and are occasionally spaced at wider intervals at building entrances and exits. Shrubs, ground cover, and a diverse collection of trees are well maintained in the planting zone.

3.3.4 23rd Street

Location & Function of Street. 23rd Street is a major local and regional vehicular travel corridor. The 90' wide two-way street carries traffic through the campus between Virginia Avenue to the south of campus and Washington Circle along Pennsylvania Avenue to the north. It also provides connections to many important surrounding areas, including the West End and Foggy Bottom neighborhoods, Georgetown, the CBD, and the surrounding government, financial and health institutions areas. 23rd Street is also identified as a "special street" in the L'Enfant Plan.

Overview of Existing Conditions. Buildings that line 23rd street are generally medium to large scale in height and density. Cobra Head Pendant Post lights are spaced 60 to 90 feet down the street, usually alternating sides. Sidewalks are a mix of paving styles, including brick, concrete with brick in the furnishing zone, and concrete. Curbs are generally granite with brick gutters. Street trees are generally spaced about 30 to 40 feet apart, and are occasionally spaced at wider intervals at building entrances and exits. Shrubs, ground cover, and a diverse collection of trees are well maintained in the planting zone.

SECTION 4: PROPOSED STREET CONDITIONS

The development plan set forth in the *Foggy Bottom Campus Plan: 2006 – 2025* emphasizes the concentration of density in the core of campus where University activity is most intense, and proposes lower-scaled buildings at the edges of campus to appropriately transition into surrounding areas, particularly to the south and west of campus. Accordingly, this Streetscape Plan reflects this pattern of planning and development by gradually intensifying the use of GW streetscape elements where the University's buildings and activities are most concentrated in order to appropriately enhance the sense of University identity in those areas. (EXHIBIT G: STREETSCAPE PLANNING GRAPHIC – PROPOSED UNIVERSITY DEVELOPMENT AND ACTIVITY PATTERNS)

4.1 Primary "Campus Streets"

As indicated above, each primary campus street has its own identity and character which together help shape activity and use patterns on the Foggy Bottom campus. The proposed concepts included in this Plan illustrate potential streetscape conditions for each of the primary campus streets. These

illustrative concepts have been developed based upon the general campus-wide design principles set forth in Section 2, as well as the street-specific design principles identified below.⁵

4.1.1 I Street

I Street is envisioned as a vibrant mixed-use, retail-oriented corridor. The Foggy Bottom-GWU Metro station located at the intersection of 23rd and I Streets creates a high volume of pedestrian traffic, making the corridor an attractive market for retailers. In addition to new academic and student housing development, the Campus Plan proposes that the ground floors of several development sites along I Street include additional retail space, complementing existing shops and restaurants and creating a “critical mass” of university- and neighborhood-serving retail in the heart of the Foggy Bottom and West End neighborhoods. In order to adequately support the pedestrian volume associated with the proposed “I Street Retail Corridor” concept, the Streetscape Plan proposes retaining existing lighting to serve vehicular traffic and incorporating additional light fixtures to enhance pedestrian traffic.

Specific streetscape design principles for I Street include:

- Encourage ground floor retail on all new structures and major renovations;
- Allow design expression in the facades, canopies, and signage of individual retailers within GW-defined storefront guidelines;
- Encourage planting and/or seating areas in front of buildings and design benches to face the street where possible;
- Use red brick pavers on the sidewalk, easily cleanable materials in retail/food service areas, and evaluate the potential use of alternative materials or patterns in the furnishing zone;
- Balance illumination by evenly distributing light fixtures; and
- Encourage outdoor seating for restaurants with removable edge-defining elements (i.e. low planters or fences).

Proposed Dimensional Standards for I Street include:

- A. Cartway: 39’
 - 1. On-Street Parking: 8’

- B. Sidewalk Area
 - 1. Furnishing Zone: 4’
 - a. Tree spacing: 44’ to 66’
 - b. Lighting spacing: 44’ to 66’
 - 2. Pedestrian Way/Clear Zone: 6’
 - 3. Planting/Spill Zone: 2’ to 12’ (depending on location of retail venues along corridor)

⁵ GW will continue to study and evaluate the potential use of a range of paving options (including variations in texture, pattern, color, and/or materials) to help define various streetscape zones, as appropriate.

The concept for I Street is intended to illustrate the proposed variation of retail, academic, and residential uses along the corridor. (EXHIBIT H: PROPOSED CONDITIONS CONCEPT – I STREET)

4.1.2 H Street

In many ways, H Street functions as the “academic heart” of the Foggy Bottom campus, with vibrant and active pedestrian activity. The presence and identity of the University along H Street should be clearly evident through various streetscape components, including appropriate treatments at key campus intersections (i.e. plaques, insignias, benches, busts, landscaping), particularly at the corners of 21st and 22nd Streets. Pedestrian circulation could be improved along H Street through the use of traffic control mechanisms. Potential options to consider include a mid-block crossing between 21st and 22nd Streets as well as improved crossings at intersections through the use of “bumpouts”, specifically at the intersections of 21st and 22nd Streets.

Specific streetscape design principles for H Street include:

- Create a planting/seating zone through the addition of benches and ornamental trees, shrubs and ground covers as appropriate;
- Locate public art and other special features at strategic locations;
- Cluster benches in strategic locations along the corridor to encourage pedestrian congregation;
- Facilitate pedestrian crossing and slow vehicular traffic with material changes, bumpouts, and a mid-block crossing, particularly between 21st and 22nd Streets; and
- Balance illumination by evenly distributing light fixtures.

Proposed Dimensional Standards for H Street include:

- A. Cartway: 33' (+/- 1')
 - 1. On-Street Parking: 7'
- B. Sidewalk Area
 - 1. Furnishing Zone: 6'
 - a. Tree spacing: 44' to 66'
 - b. Lighting spacing: 44' to 66'
 - 2. Pedestrian Way/Clear Zone: 8'
 - 3. Planting/Spill Zone: 2'-15'

The proposed H Street concept includes a mid-block crossing between 21st and 22nd Streets to facilitate traffic flows to and from Kogan Plaza. In addition, the Plan proposes “bumpouts” to reduce crossing distance for pedestrians at the key intersections of 21st and 22nd Streets. The associated increased sidewalk width and the potential of material changes could minimize vehicular and pedestrian conflict. The proposed mid-block crossing would be designed in coordination with DDOT, but is currently contemplated to be consistent with the width of the Professor’s Gate at the entrance to Kogan Plaza (approximately 46’).⁶ (EXHIBIT I: PROPOSED CONDITIONS CONCEPT – H STREET)

⁶ This design would result in the loss of six metered parking spaces on H Street.

4.1.3 G Street

G Street is also a vibrant academic corridor, but with somewhat less intense activity than H Street. It is characterized by many lower-scale buildings of architectural and historical significance. Streetscape components should complement the existing built environment and enhance the planting area through landscape elements, brick sidewalks, and appropriate lighting.

Specific streetscape design principles for G Street include:

- Provide an interior curb to delineate planting zone from the pedestrian zone, as appropriate;
- Enhance planting and spill zones through the addition of benches and ornamental trees, shrubs and ground covers as appropriate;
- Balance illumination by evenly distributing light fixtures; and
- Facilitate pedestrian congregation through the use of benches clustered in key locations along the corridor.

Proposed Dimensional Standards for G Street include:

- A. Cartway: 36' (+/- 1')
 - 1. On-Street Parking: 7'
- B. Sidewalk Area
 - 1. Furnishing Zone: 6'
 - a. Tree spacing: 44' to 66'
 - b. Lighting spacing: 44' to 66'
 - 2. Pedestrian Way/Clear Zone: 8'
 - 3. Planting/Spill Zone: 2' to 15'

The proposed concept for G Street seeks to enhance existing conditions on the corridor – architectural character of buildings, brick paving along the pedestrian walkway – and activate movement at the street level. Many internal/mid-block pathways and connections, both existing and proposed, connect G Street to other areas of campus. The placement of benches at pathway entrances can help reinforce and guide pedestrian traffic along this network of campus pathways. (EXHIBIT J: PROPOSED CONDITIONS CONCEPT – G STREET)

4.2 Transitional Streets

Although this Streetscape Plan provides specific design principles and proposed concepts for the primary campus streets, the Plan also provides guidance for new streetscape development along the transitional corridors of Pennsylvania Avenue and F Street as well as the north/south vehicular corridors in an effort to take a comprehensive approach to the streetscape environment of the Foggy Bottom campus and complement the existing streetscape elements in these areas.

4.2.1 F Street

F Street is a wide corridor with residential and institutional uses. With the majority of the proposed new development concentrated in the core of campus, only one F Street development project is identified in the Campus Plan, specifically a residence hall to be developed as part of a public/private partnership between GW and DC Public Schools (the “School Without Walls” project). This residence hall project has been specifically designed to minimize impact on the surrounding neighborhoods, including utilizing internal pathways to direct pedestrian traffic toward the core of campus and away from residential streets. A safe pedestrian environment should be encouraged through appropriate lighting to increase opportunities for positive surveillance.

4.2.2 Pennsylvania Avenue

Pennsylvania Avenue is an active vehicular corridor and has buildings that are higher and denser than the balance of the campus. Similar to F Street, new development should support an improved pedestrian environment along the Avenue, including appropriate lighting and active ground floor uses to increase street level activity and encourage positive surveillance. Crosswalks, particularly at Washington Circle, could be improved to facilitate pedestrian safety and circulation.

4.3 North-South Streets

4.3.1 20th Street

New development along 20th Street is proposed to reflect the diversity of the surrounding built environment, including appropriately scaled development on Square 102 (consistent with the existing campus historic fabric surrounding the University Yard). Enhanced paving, lighting, and planting elements as well as street banners are proposed at the corners of G, H and I Streets to reflect the campus pedestrian activity and nature of these special areas of campus.

4.3.2 21st Street

Proposed academic and residential development along 21st Street is in scale with the surrounding built environment, particularly the historic buildings on Squares 102 and 103. In addition to basic identification elements, distinctive design elements are proposed at corners along the corridor at G, H, and I Streets to reflect the character and identity of the campus.

4.3.3 22nd Street

The *Foggy Bottom Campus Plan: 2006 – 2025* proposes the concentration of new development along 22nd Street, in the central campus “core”, including buildings of up to 110’. Accordingly, 22nd Street is proposed to include enhanced paving, lighting, and planting elements and street banners in addition to basic identification elements to reinforce the presence of key University activity along the entire corridor. Targeted intersections along the corridor are also appropriate locations for distinctive design elements to further enhance campus character.

4.3.4 23rd Street

The special nature of 23rd Street is reflected in the proposed Campus Plan, which calls for appropriately-scaled future development (including height setbacks along the street). As a “special street” and key travel corridor, the Streetscape Plan allows for enhanced paving, lighting, planting and street banners in addition to basic identification elements along the corridor, as well as distinctive design elements at key intersections.

SECTION 5: STREETScape IMPLEMENTATION PLAN

Incorporating the various planning goals and design principles set forth in this Plan, the following implementation plan proposes a framework for the implementation of various streetscape elements over the twenty-year term of the *Foggy Bottom Campus Plan: 2006 – 2025*, as funding becomes available.

The implementation plan is comprised of three layers of streetscape elements which build from *base* to *enhanced* to *premium* levels. Streetscape components included in the various layers are further defined in the proposed “kit of parts” (Section 5.2). The three layers are generally shaped and defined by campus use and activity patterns; however, unique conditions created by certain adjacent uses may call for specific, appropriate modifications to the general plan.

5.1 Layers of Streetscape Elements

5.1.1 Base Elements: *Establishing and Supporting GW Identity*

The Base Elements layer is applicable to the entire Foggy Bottom campus⁷. It serves as the campus-wide standard in terms of streetscape elements that identify the presence of the University. Base streetscape components include *building identifiers, furniture, and way-finding elements*. With respect to paving, lighting and planting elements, existing conditions are proposed to be maintained in those areas of campus which are included only in the Base Elements layer and are not otherwise identified within the Enhanced or Premium Elements layers. (EXHIBIT K: BASE LAYER STREETScape ELEMENTS)

5.1.2 Enhanced Elements: *Reinforcing the Presence of Key GW Activity*

Building upon the existing Base Elements layer, the Enhanced Elements layer includes additional streetscape components to be implemented at campus locations where key University activities occur. Implementation is proposed along the primary campus streets (I, H, and G Streets between 23rd and 20th Streets), 23rd Street between Washington Circle and Virginia Avenue, as well as the central campus corridor of 22nd Street between Pennsylvania Avenue and F Street. Enhanced streetscape components include a range of proposed *paving, lighting and planting elements*, as well as *street banners*. (EXHIBIT L: ENHANCED LAYER STREETScape ELEMENTS)

⁷ Squares 119 and 121 are located within the existing Foggy Bottom Campus Plan boundaries and are therefore included in the Base Elements layer. However, due to the current uses and ownership of buildings on those squares, GW has no immediate plans to implement the Streetscape Plan at these locations.

5.1.3 Premium Elements: *Celebrating the Character and Identity of the Foggy Bottom Campus*

The Premium Elements layer proposes the implementation of more *distinctive design elements* at specifically identified locations on campus to celebrate the unique character and identity of the campus, e.g., the special places of I Street Mall, Kogan Plaza and University Yard, H Street between 21st and 22nd Streets, as well as strategic intersections across campus. (EXHIBIT M: PREMIUM LAYER STREETScape ELEMENTS)

The full streetscape implementation plan is illustrated in EXHIBIT N: FOGGY BOTTOM CAMPUS STREETScape CONCEPT MAP.

5.2 Kit of Parts

The proposed “kit of parts” is comprised of the various streetscape elements included in the implementation plan. Over the term of this Plan, appropriate new elements may be introduced.

5.2.1 Building Identifiers

Building identifiers include flags that hang from building facades, awnings, and building engravings that serve as identifiers for either pedestrian or vehicular traffic, as well as placards that orient pedestrians to building locations.

5.2.2 Furniture

Furniture includes GW benches, GW blue trash receptacles and recycling bins, bike racks, and blue and white emergency call stations.

5.2.3 Way-Finding Elements

Way-Finding Elements include campus maps for general pedestrian orientation, vertical markers, directional signage, and location symbols to direct pedestrian and vehicular traffic to a particular destination. The University has made significant efforts over the last several years to improve upon and incorporate additional way-finding elements throughout campus, and will continue to evaluate way-finding design to further enhance pedestrian orientation.

5.2.4 Paving

Paving elements can incorporate a range of materials including brick, London pavers, granite cobbles and scored concrete, as well as brick gutters and granite curbs. These materials already exist in various locations throughout the campus.

5.2.5 Lighting

Street lighting elements include Washington Globe Single (18), Washington Globe Double (Twin 20), Intersection Tear Drop, and Cobra Head Pendant Post. These elements are consistent with DDOT standards for street lighting in the District of Columbia. The Washington Globe Single is already used on campus (notably on G Street), and the Cobra Head Pendant Post is used on 23rd

Street. Lamp heights and spacing ranges proposed under this Plan are designed to provide for the safety of pedestrians on campus and to coordinate with the proposed tree spacing pattern

5.2.6 Planting

Planting elements include street trees and tree pits within the furnishing zone as well as trees, shrubs and other plants within the planting zone. The University has made substantial efforts to maintain trees throughout the campus, and will continue to work to create a consistent tree pattern complementary to the proposed lighting pattern. Due to the high cost of purchasing, installing, and maintaining trees, the University plans to pursue alternative funding sources to help offset these expenses (e.g., The Casey Trees Endowment Fund and other similar organizations). The University will continue to evaluate the condition and health of its existing street trees in order to address ongoing maintenance and future tree replacement needs.

5.2.7 Street Banners

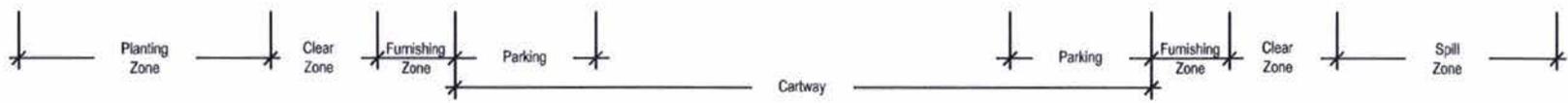
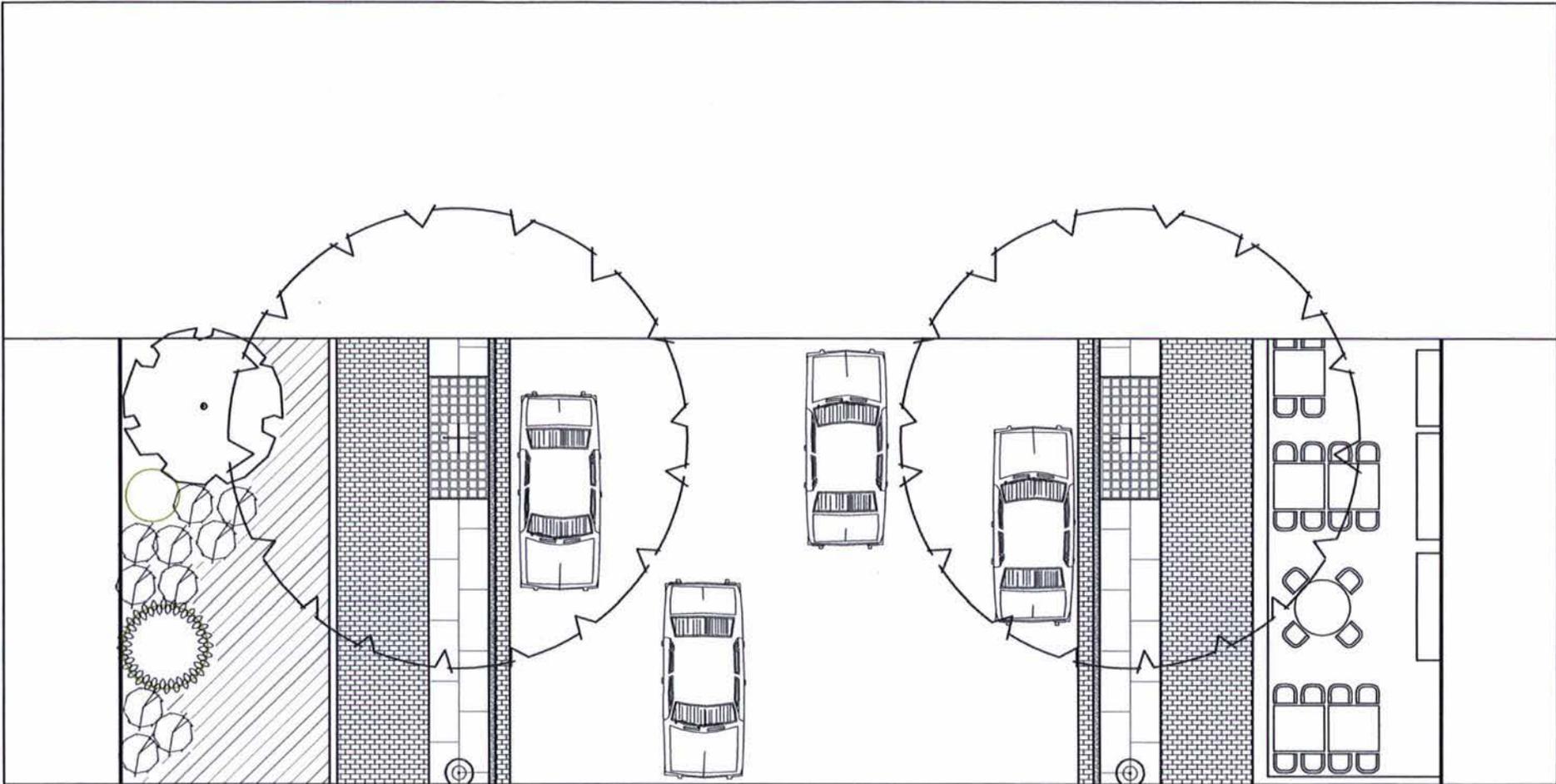
Street Banners include pedestrian, vehicular, and thematic banners, often mounted on street light posts. The University has installed attractive street banners at various locations on campus, and the Streetscape Plan contemplates the continued use of various street banners at specific campus locations, including along 23rd Street and I, H, and G Streets.

5.2.8 Distinctive Design Elements

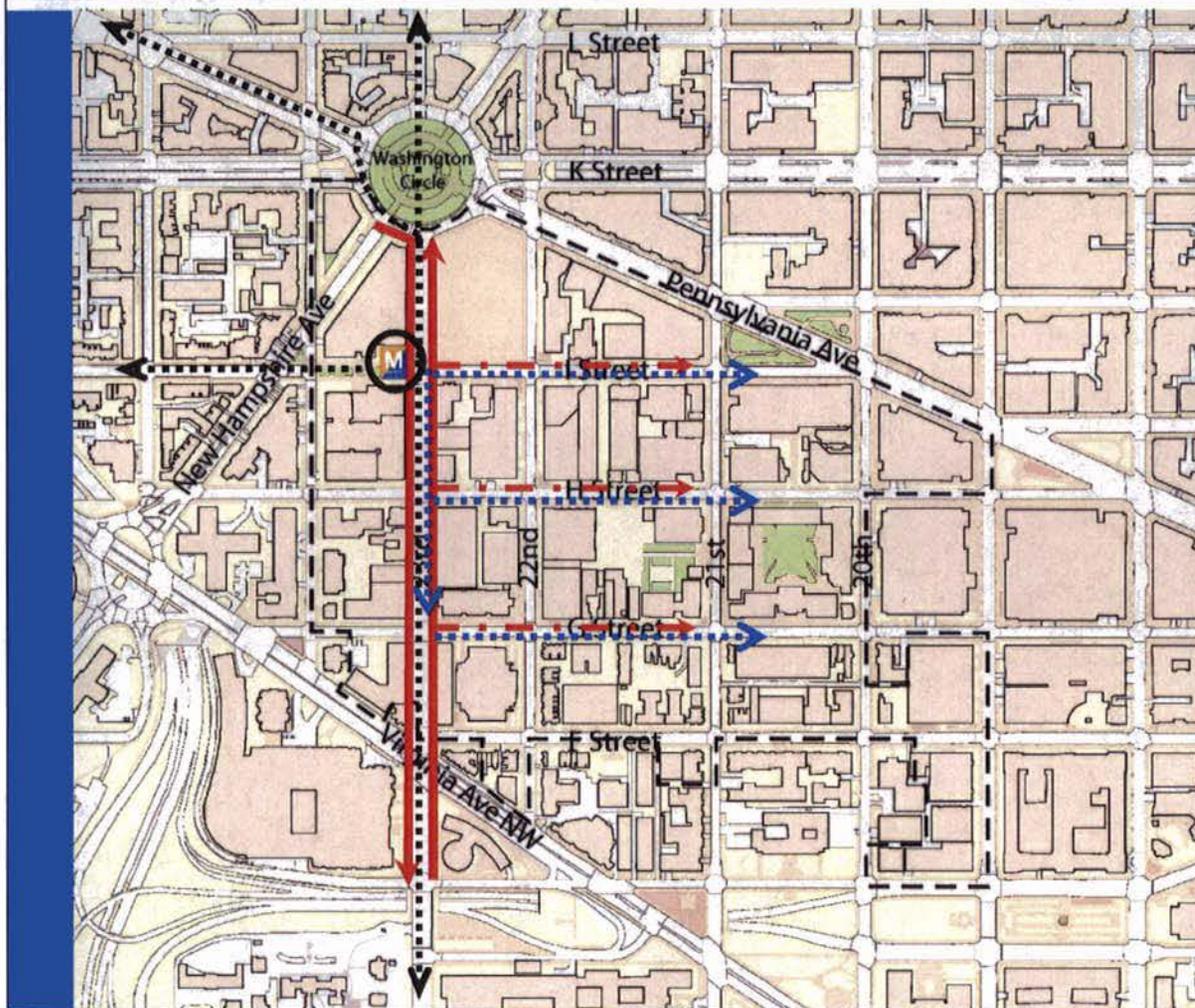
Distinctive Design Elements include public art, artifacts, plaques, busts, clocks, chess tables, sidewalk art, paving medallions, sidewalk bumpouts and mid-block crossings/crosswalks. The I Street Mall, Kogan Plaza, and noted intersections on I, G, and F Streets already include many premium elements, reflective of the University's efforts over the past several years to enhance the character and identity of the campus through the use of these unique streetscape elements. The implementation of this Plan provides not only for the placement of special GW features (e.g., busts of George Washington), but also encourages the location of public art at various campus locations. H Street between 22nd and 21st Streets is a key location for the implementation of distinctive design elements. The incorporation of bumpouts at the street corners at both ends of the block as well as a mid-block crossing with a potential paving medallion in the cross-walk are contemplated, as illustrated in the proposed conditions concept for H Street (EXHIBIT I).

SECTION 6: CONCLUSION

As an important component of the *Foggy Bottom Campus Plan: 2006 – 2026*, the Streetscape Plan sets forth a planning framework for future campus streetscape improvements that reflects the unique diversity of the Foggy Bottom campus. The University will continue to work with appropriate District agencies and members of the community to finalize the Plan in order to provide a long-term and comprehensive strategy that will enhance the safety, attractiveness and sustainability of the campus streetscape environment.



Streetscape Planning Exercise



23rd Street

- L'Enfant special street
- High volume vehicular Flow

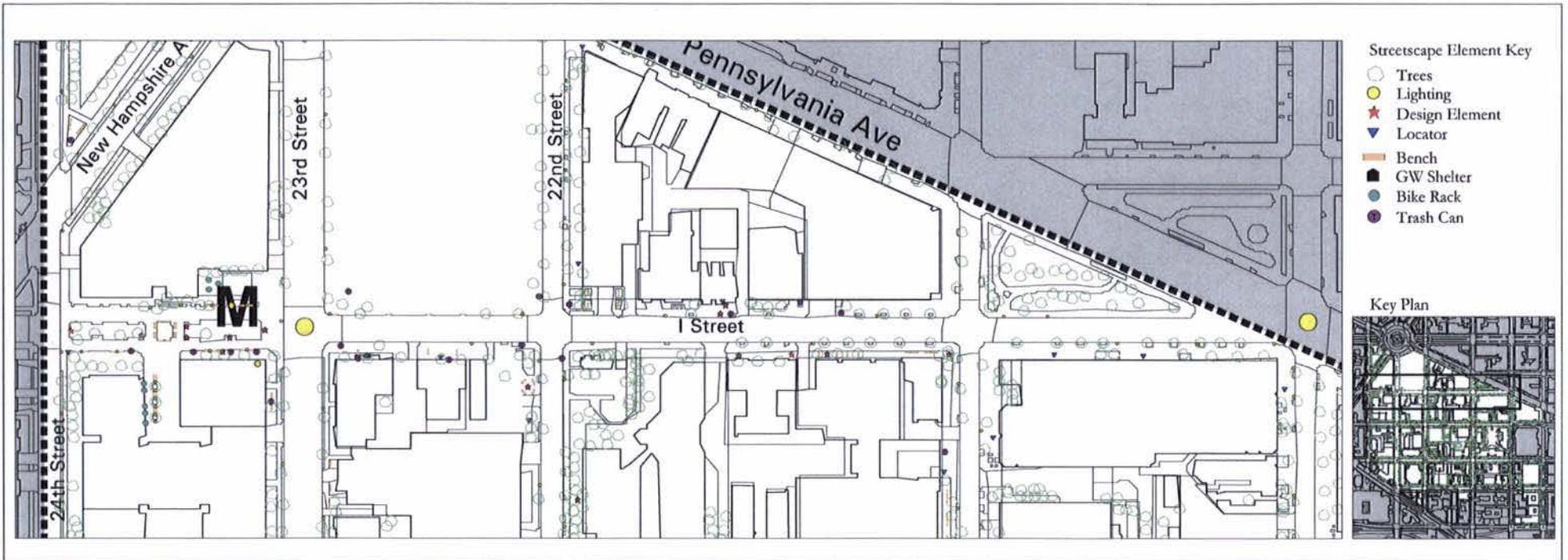
I, H, & G Streets

- Pedestrian oriented
- Diverse character

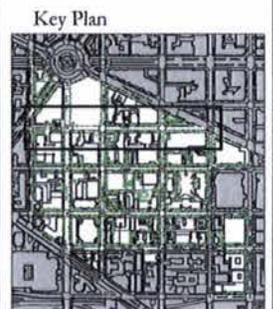
Foggy Bottom-GWU Metro Station

- Significant node for pedestrian access to surrounding neighborhoods to the north and west and government institutions to the south

- Significant node for pedestrian access to campus to the east



- Streetscape Element Key**
- Trees
 - Lighting
 - ★ Design Element
 - ▼ Locator
 - ▭ Bench
 - GW Shelter
 - Bike Rack
 - Trash Can



The George Washington University
Foggy Bottom Campus Streetscape Plan

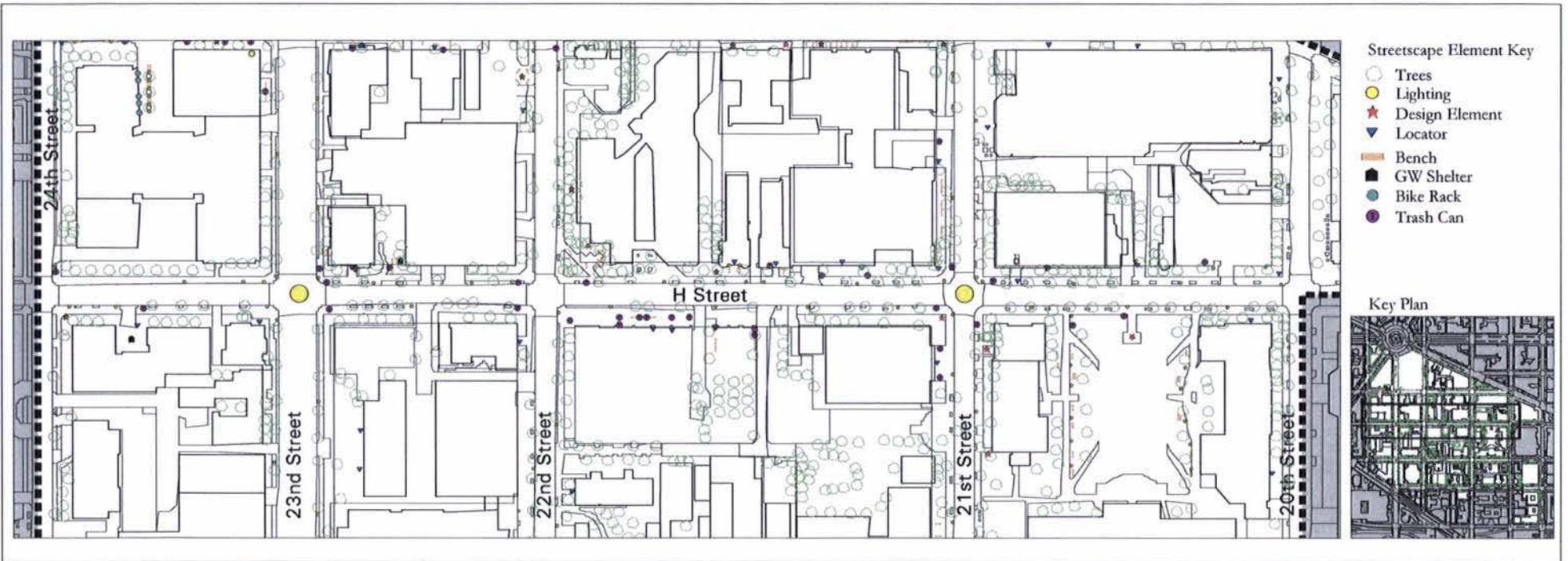


Exhibit C: Existing Conditions Campus Map
I Street

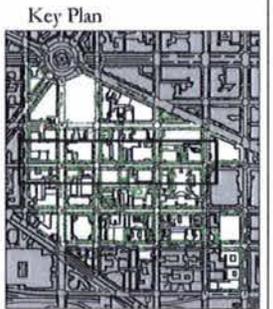


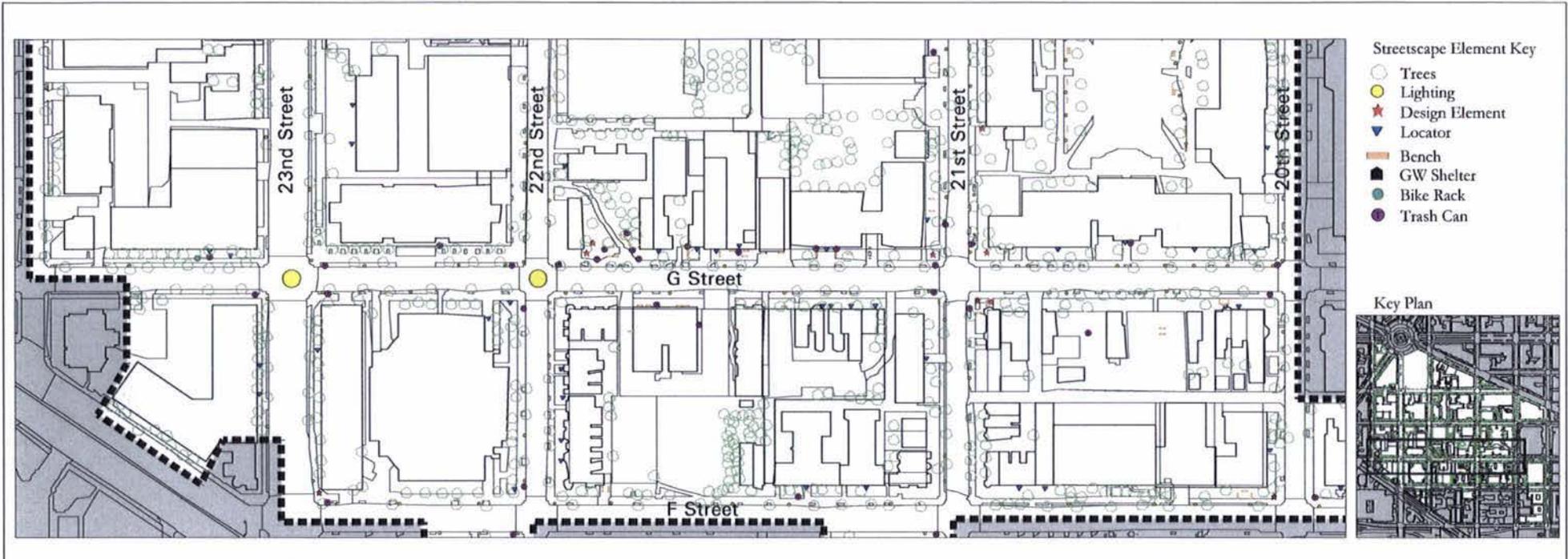
August 2006

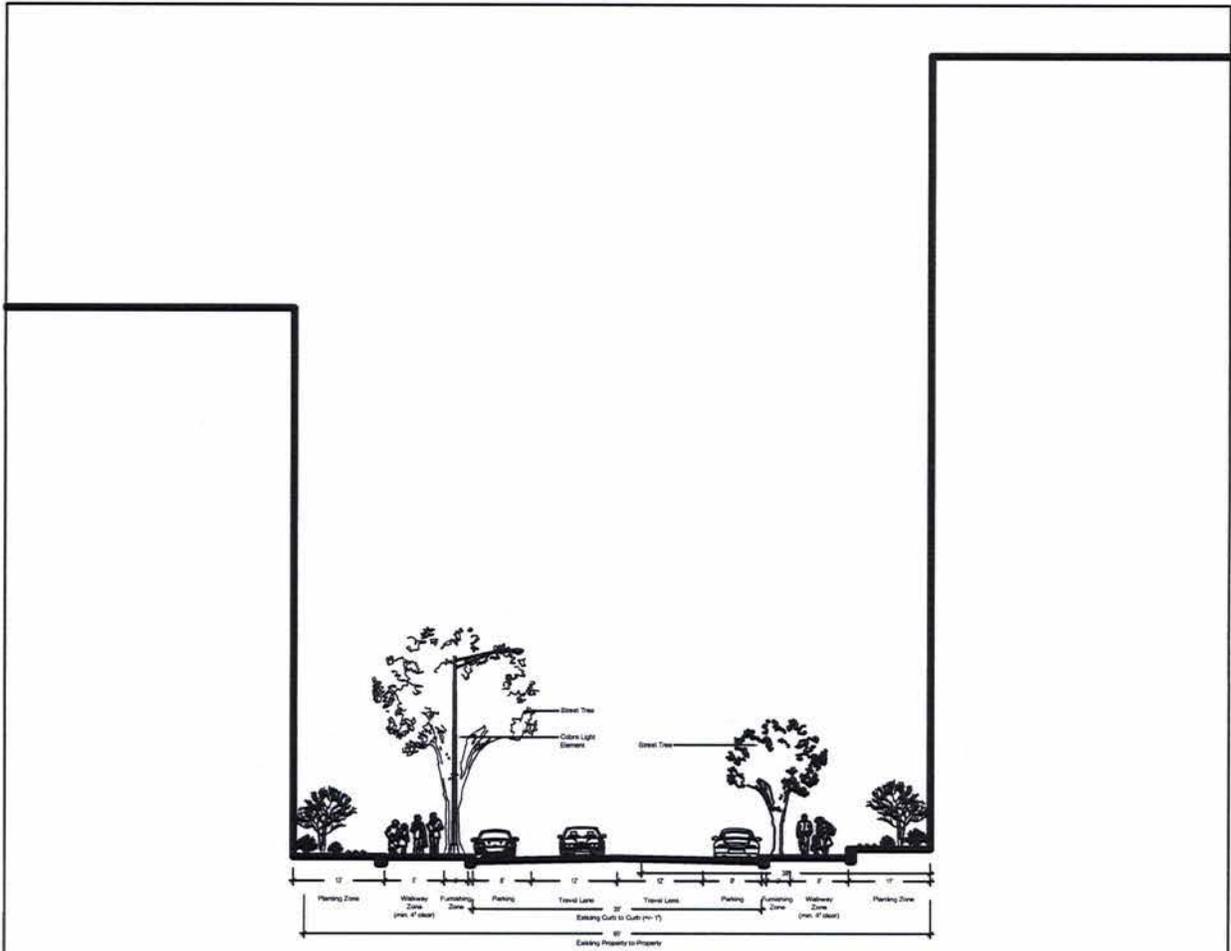
PROJECT	DATE
DESIGNED BY	DATE
DRAWN BY	DATE



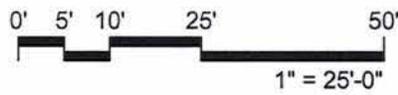
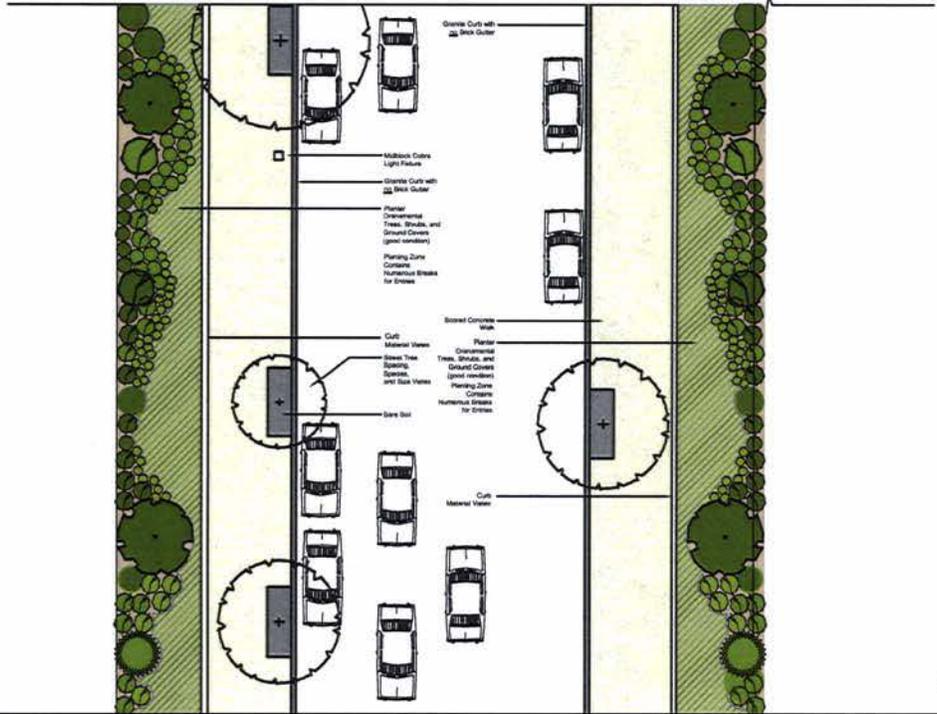
- Streetscape Element Key**
- Trees
 - Lighting
 - Design Element
 - Locator
 - Bench
 - GW Shelter
 - Bike Rack
 - Trash Can

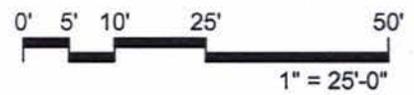
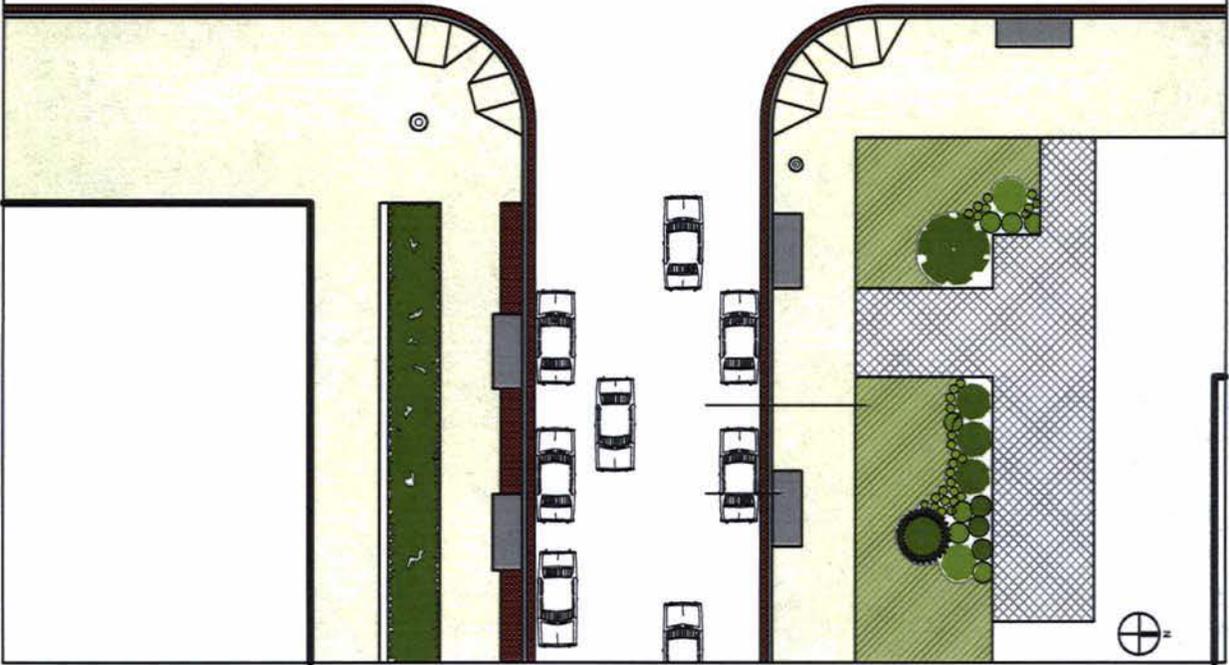
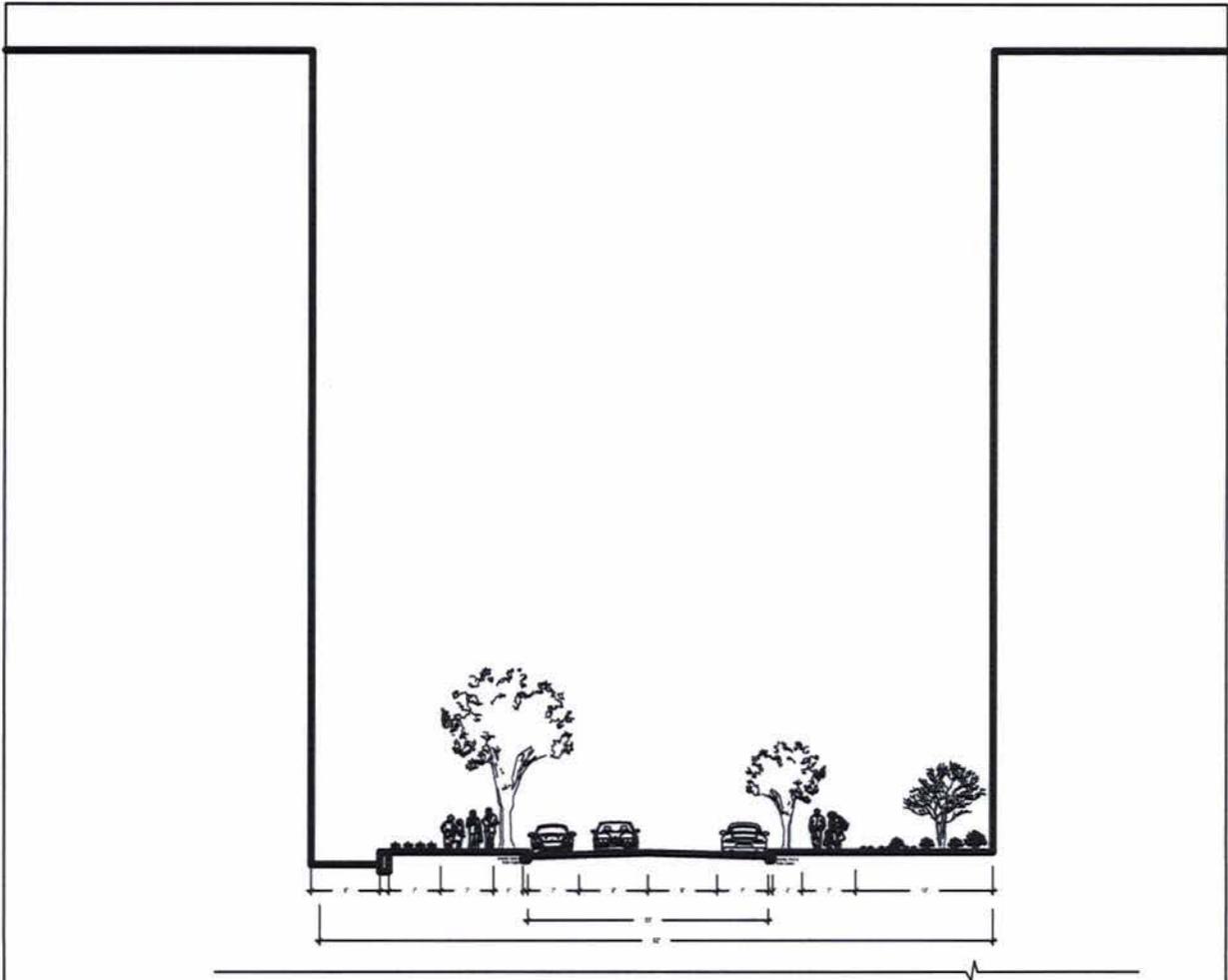


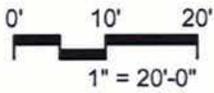
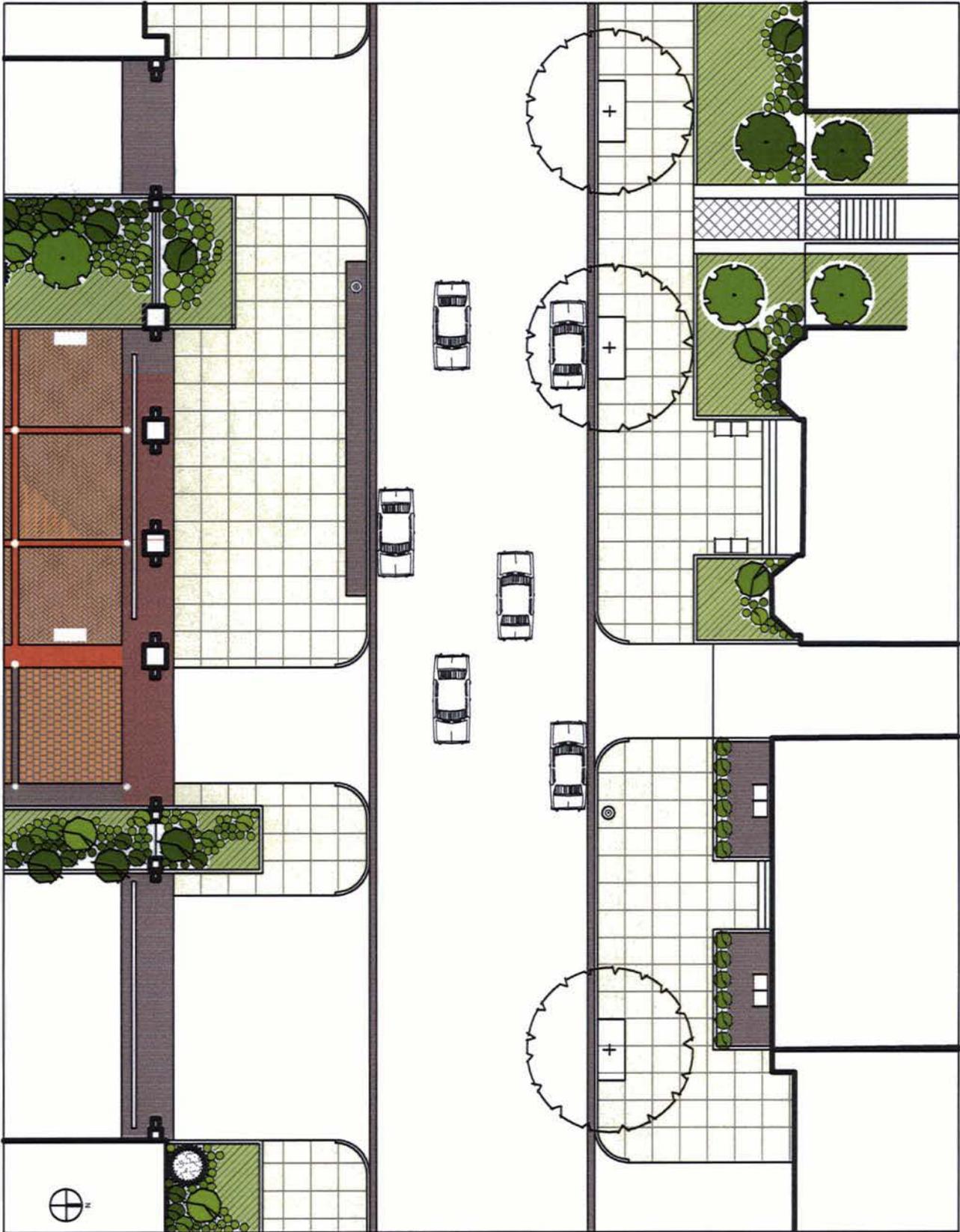


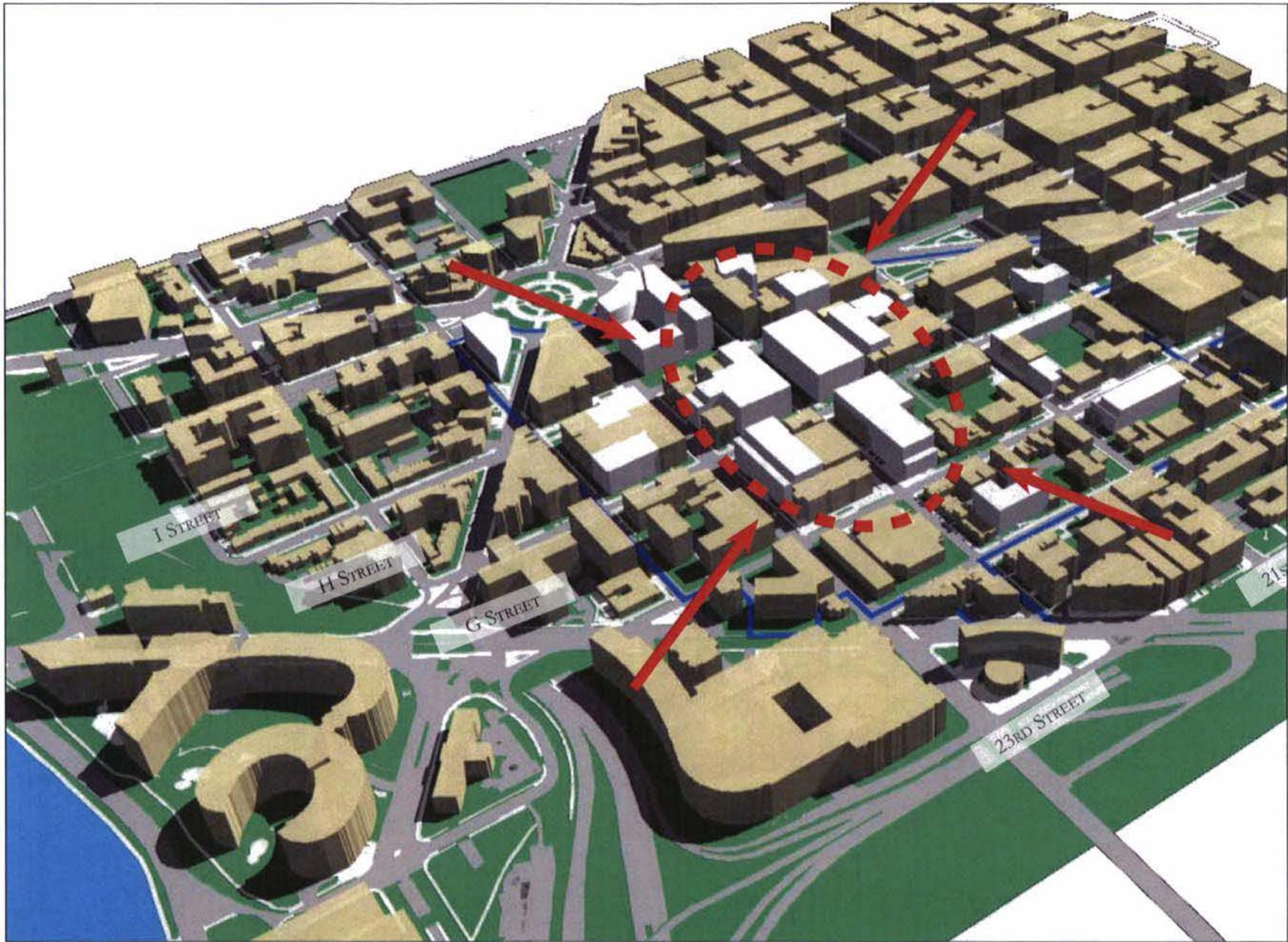


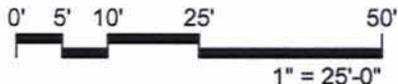
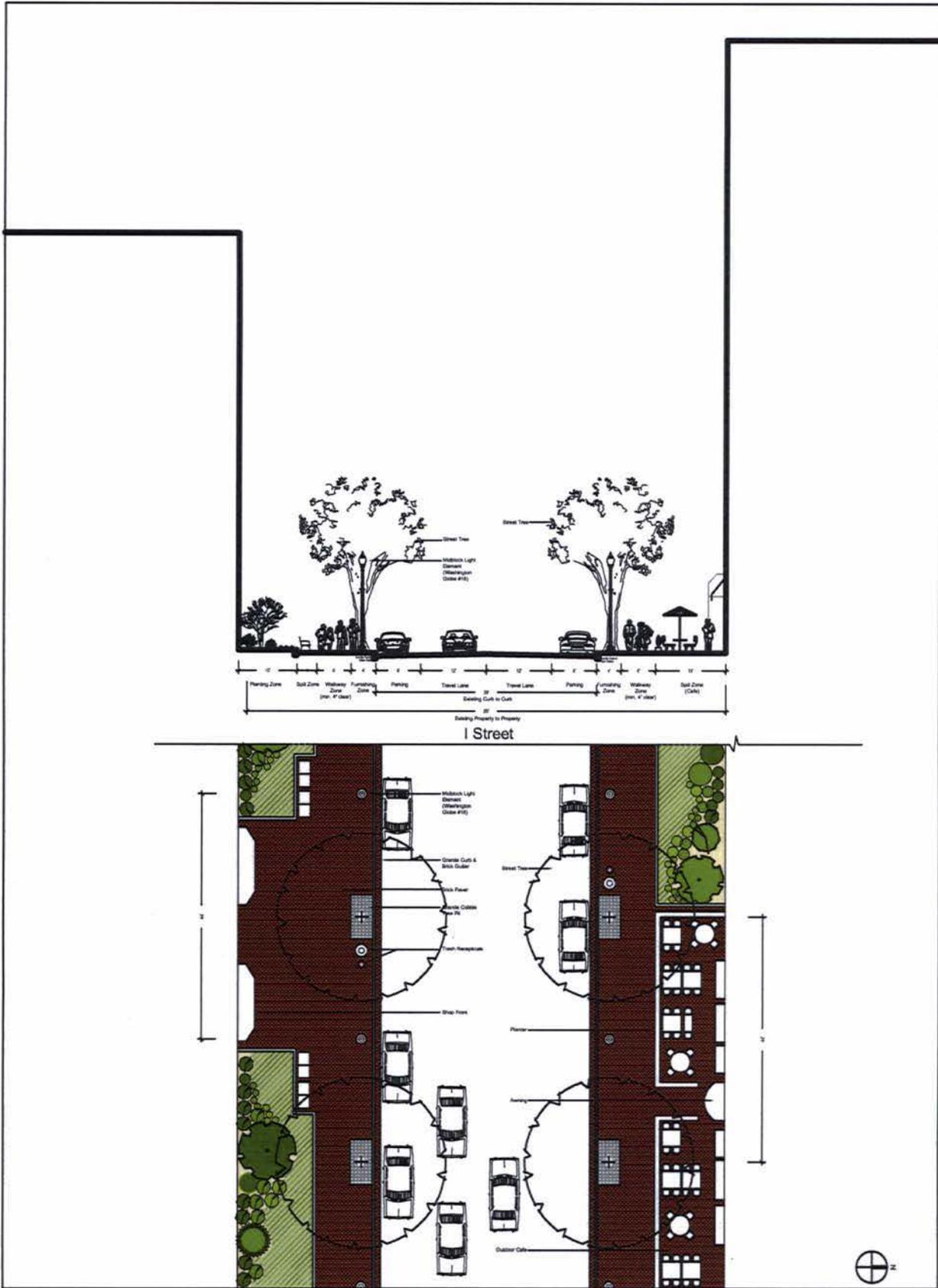
I Street

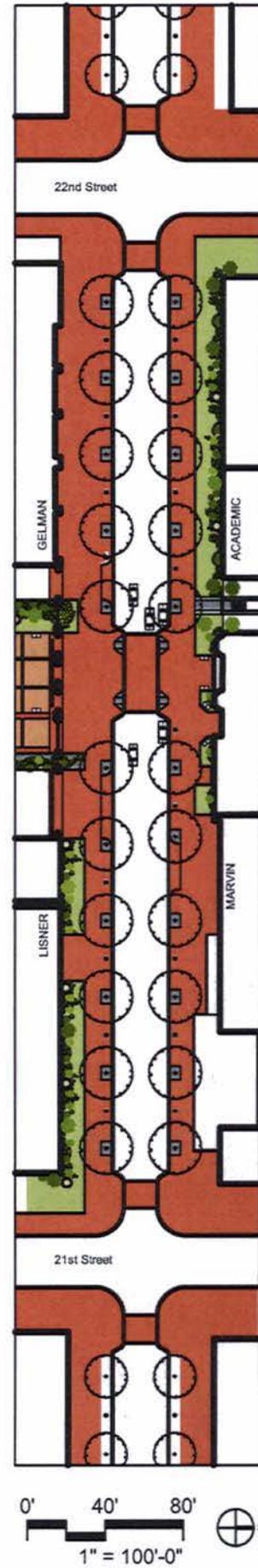
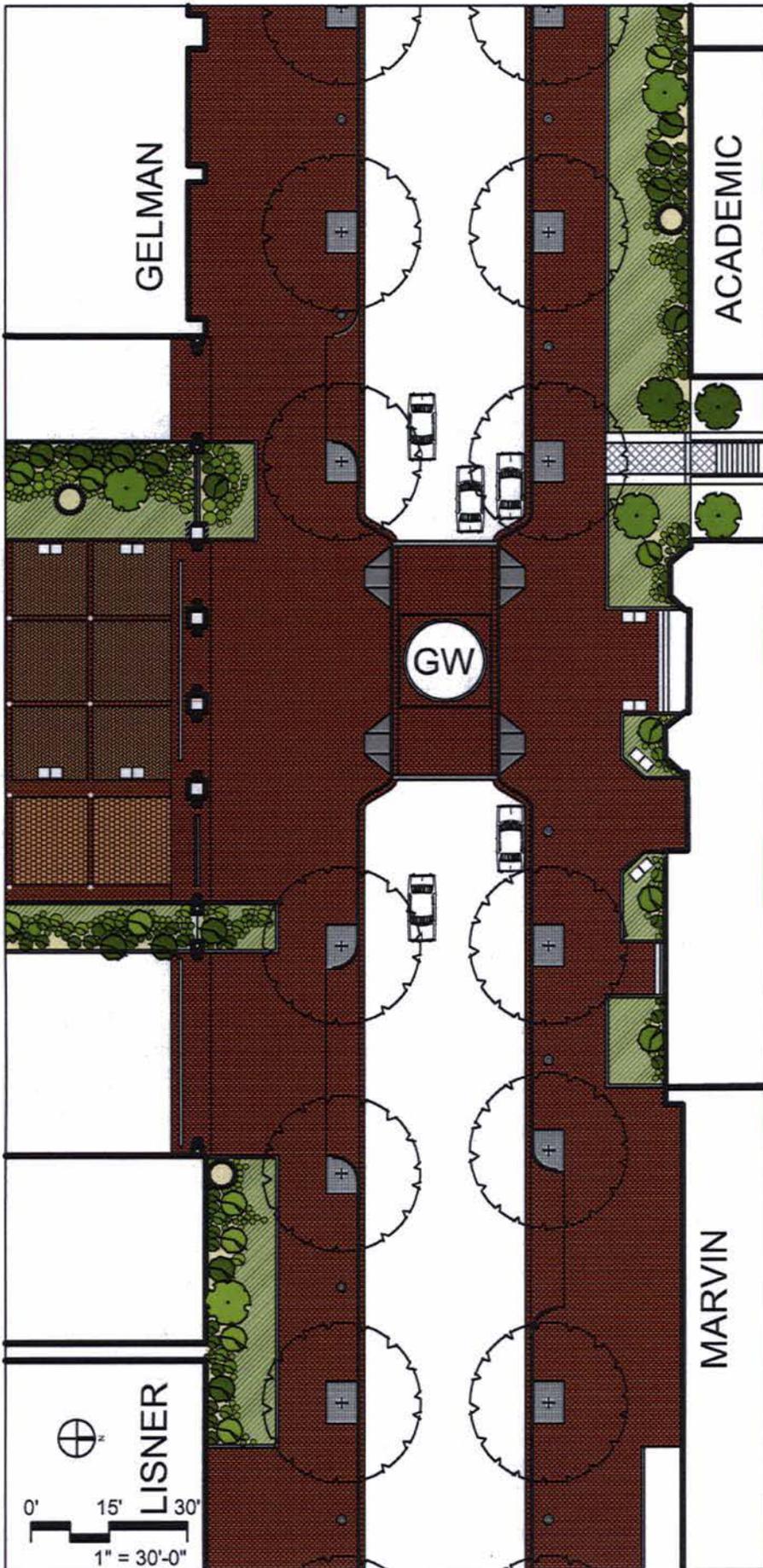


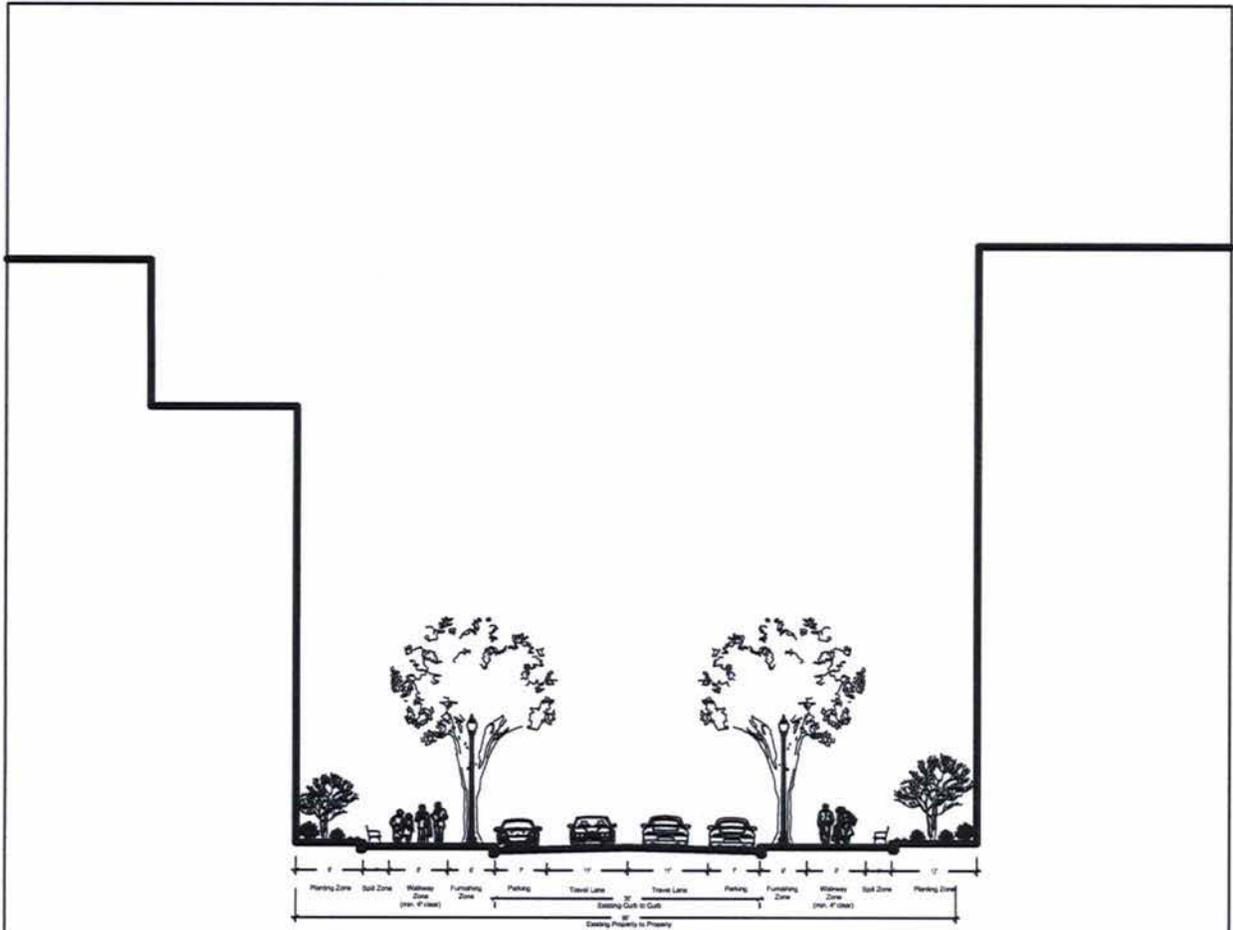




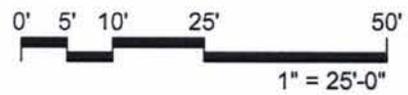


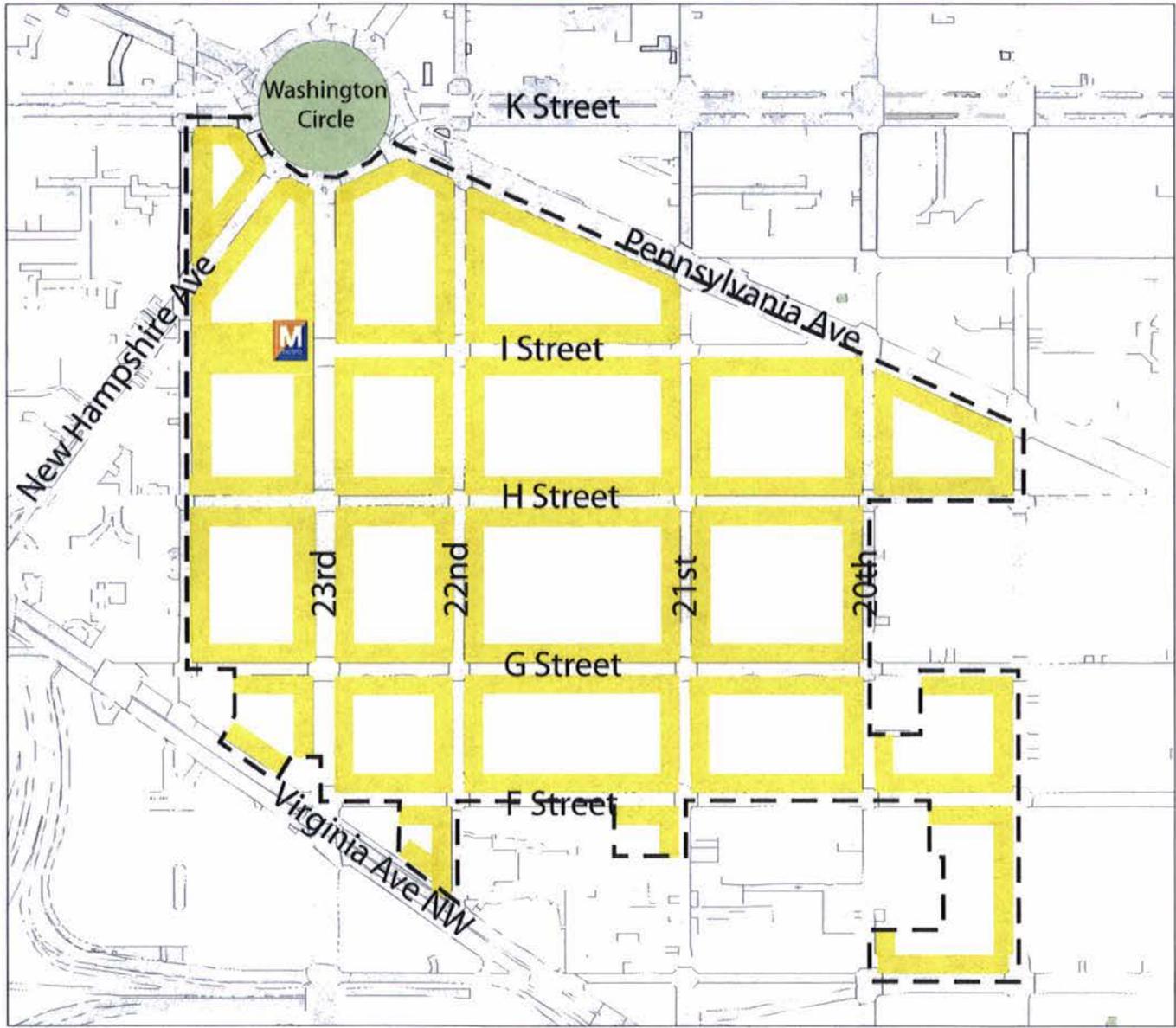






G Street





Base Layer Elements

establish and support GW identity

Building Identifiers

- Building Flags
- Placards
- Building Awnings
- Building Engravings

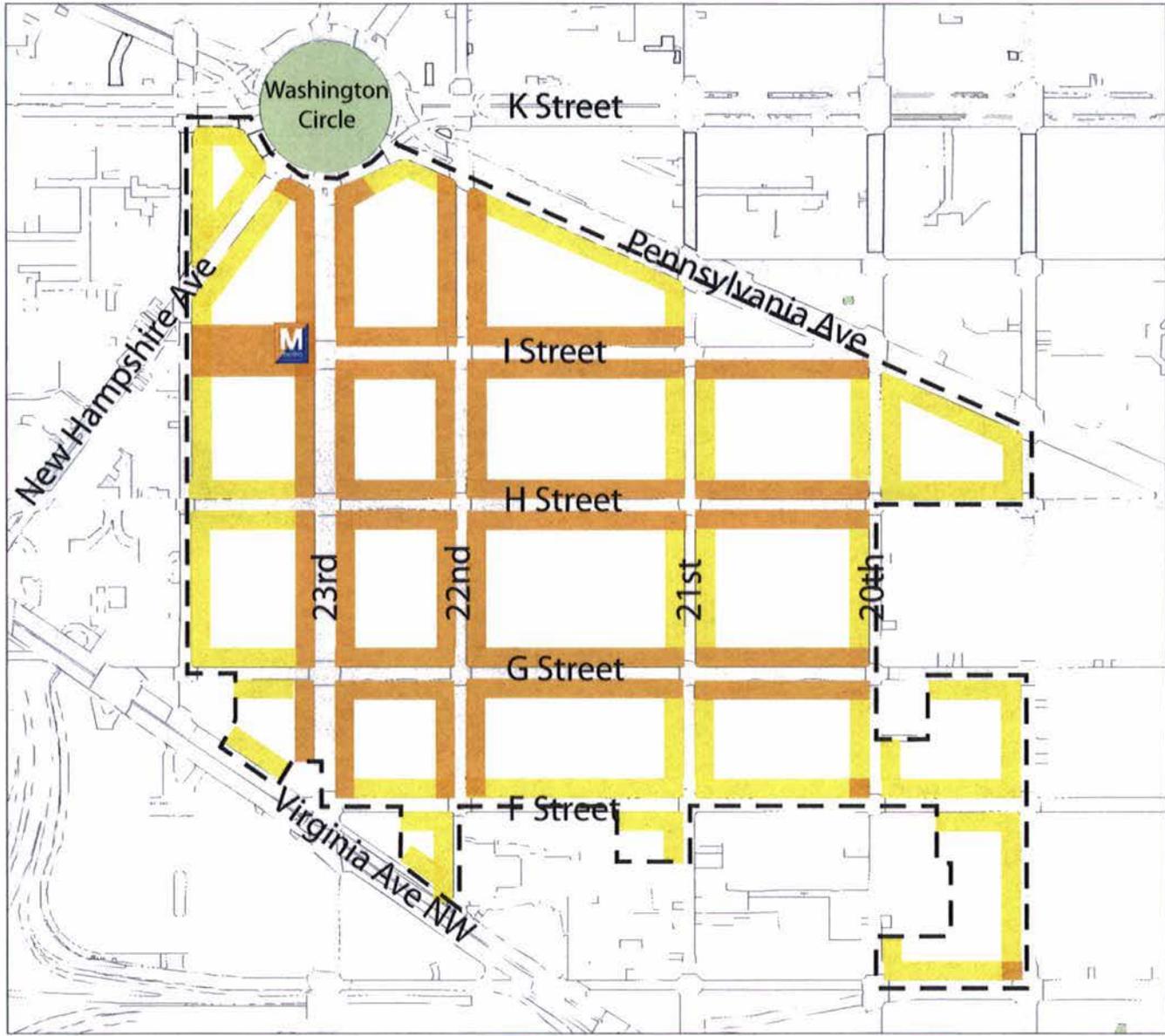
Furniture

- Signature Benches
- Trash Receptacles
- Recycling Bins
- Bike Racks
- Emergency Stations

Way-Finding Elements

- Campus Maps
- Vertical Markers
- Directional Signage
- Location Symbols

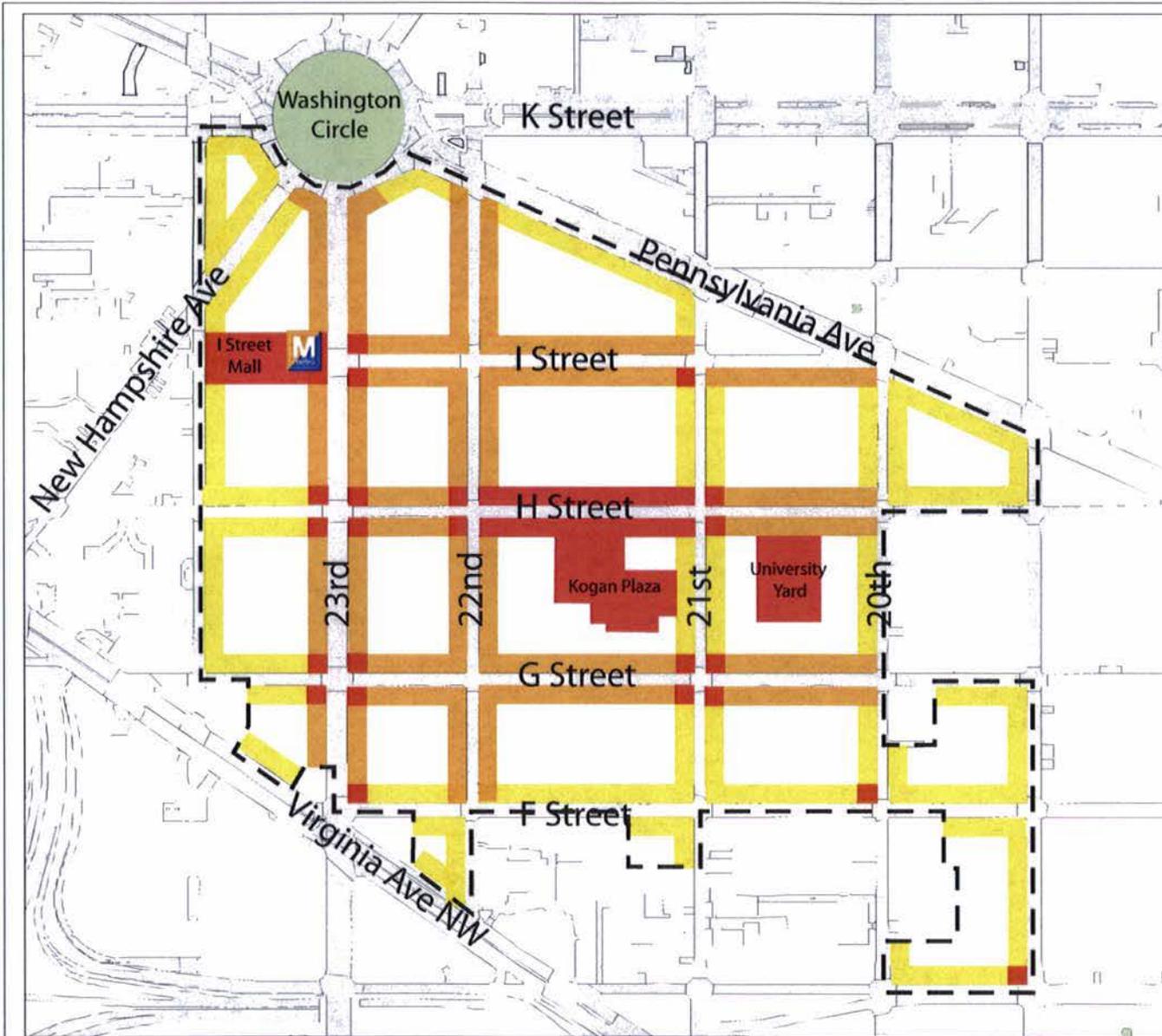
Maintain Existing Paving, Lighting, Planting



Enhanced Layer Elements

reinforce the presence of key GW activity

- Paving**
 - Brick
 - Cobble
 - London Paver
 - Scored Concrete
 - Brick gutter
 - Granite curb
- Lighting**
 - Washington Globe Single (18)
 - Washington Globe Double (Twin 20)
 - Intersection Tear Drop
 - Cobra Head Pendant Post
- Planting**
 - Street Trees
 - Tree Pits
 - Planting Zone
- Street Banners**
 - Pedestrian
 - Vehicular
 - Thematic

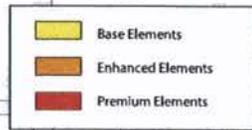
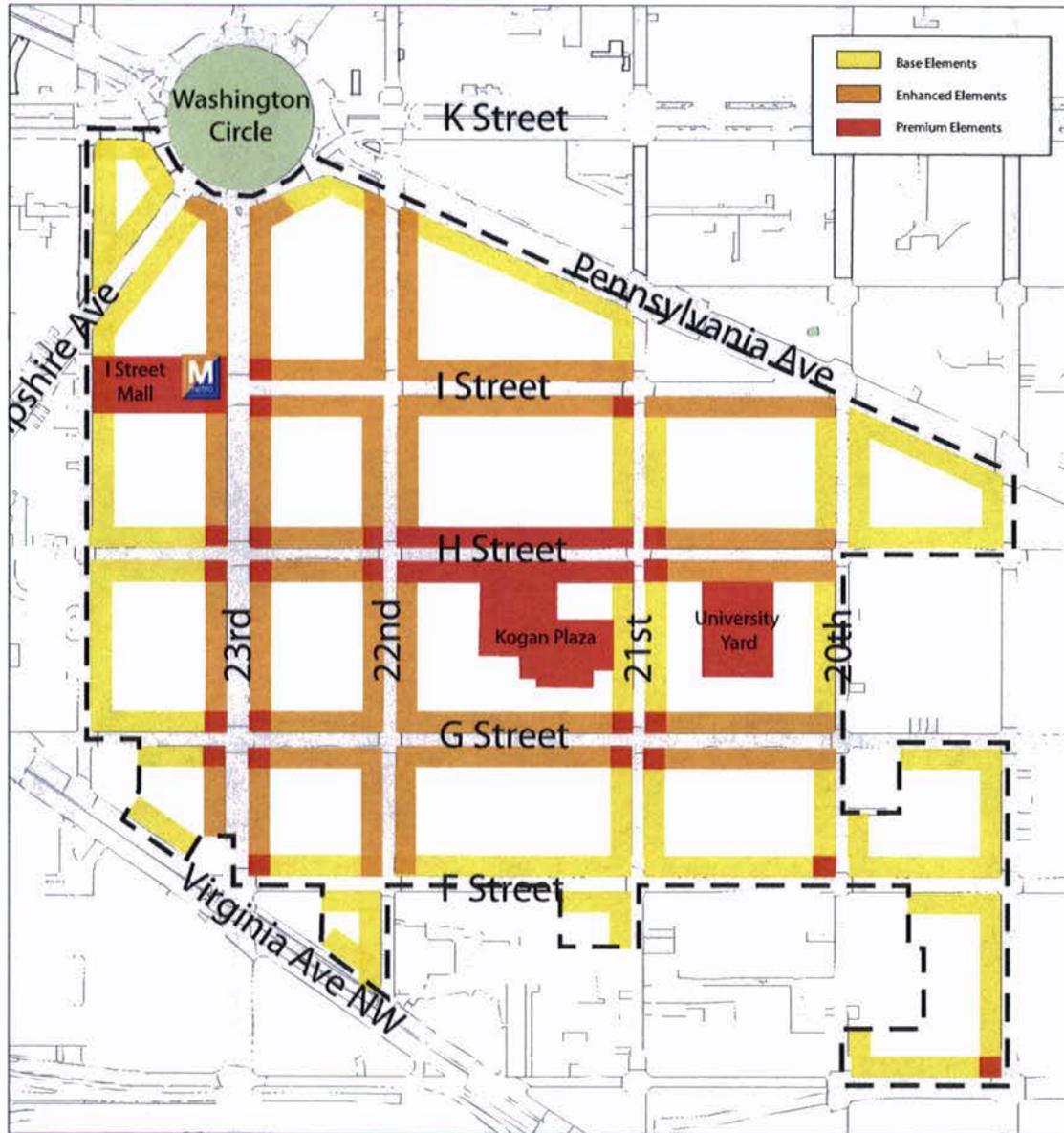


Premium Layer Elements

celebrate the character and identity of the Foggy Bottom Campus

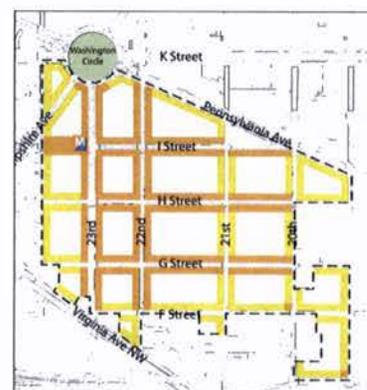
Distinctive Design Elements

- Bump-outs
- Mid-block Crossing/Crosswalk
- Busts
- Public Art
- Artifacts
- Plaques
- Clocks
- Chess Tables
- Notice Boards
- Sidewalk Art
- Paving Medallions



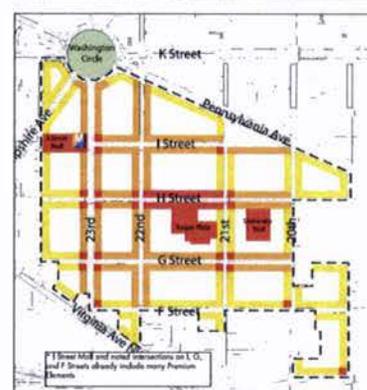
Base Layer Elements
establish and support GW identity

- | | |
|---|--|
| Building Identifiers
Building Flags
Placards
Building Awnings
Building Engravings | Way-Finding Elements
Campus Maps
Vertical Markers
Directional Signage
Location Symbols |
| Furniture
Signature Benches
Trash Receptacles
Recycling Bins
Bike Racks
Emergency Stations | Maintain Existing Paving,
Lighting, Planting |



Enhanced Layer Elements
reinforce the presence of key GW activity

- | | |
|---|--|
| Paving
Brick
Cobble
London Paver
Scored Concrete
Brick gutter
Granite curb | Planting
Street Trees
Tree Pits
Planting Zone |
| Lighting
Washington Globe
Single (18)
Washington Globe
Double (Twin 20)
Intersection Tear Drop
Cobra Head Pendant
Post | Street Banners
Pedestrian
Vehicular
Thematic |



Premium Layer Elements
celebrate the character and identity of the Foggy Bottom Campus

- Distinctive Design Elements
- Bump-outs
 - Mid-block Crossing/Crosswalk
 - Busts
 - Public Art
 - Artifacts
 - Plaques
 - Clocks
 - Chess Tables
 - Notice Boards
 - Sidewalk Art
 - Paving Medallions