

U.S. 1 Corridor Plan

Adopted November 16, 1999

The Town of Wake Forest, North Carolina

Mayor:

George Mackie

Board of Commissioners:

Dan Heimbach
Bob Hill
Velma Boyd
Thomas Walters
Boyce Medlin

Planning Board:

Sherrill Brinkley, Chairman
Einar Bohlin
Kim Marshall
Al Merritt
Frank Drake
David Comacho
Theresa Watkins
Joe Glennon
Speed Massenburg
Rob Bridges

Prepared by:

**Mark Robinson & Associates P.A.
Landscape Architecture/Planning
1004 Bullard Court, Suite 105, Raleigh, NC 27615**

Table of Contents

<u>INTRODUCTION.....</u>	<u>1</u>
GOAL 1. IMPROVE TRANSPORTATION THROUGH THE U.S. 1 CORRIDOR.....	2
GOAL 2: PRESERVE AND ENHANCE THE VISUAL QUALITY OF THE CORRIDOR.	3
GOAL 3: ENCOURAGE DEVELOPMENT COMPATIBLE WITH GOALS 1 AND 2.....	3
<u>CONCEPT.....</u>	<u>4</u>
<u>CORRIDOR STREETScape – DESIGN GUIDELINES.....</u>	<u>6</u>
PINE WOODS EDGE: U.S. 1 STREETScape	6
STREET EDGE OAKS: INTERSECTION/ACCESS – ORIENTED FOCUS AREA STREETScape.....	7
STREETScape GUIDELINES: N.C. 98 TO STADIUM DRIVE	8
<u>SCREENING OF PARKING</u>	<u>9</u>
PARKING SCREENING: PINE WOODS EDGE AREAS	9
PARKING SCREENING: STREET EDGE OAKS AREAS.....	9
<u>BLANK BUILDING FAÇADES</u>	<u>10</u>
<u>SCREENING OF SERVICE AND LOADING AREAS AND OUTDOOR STORAGE....</u>	<u>10</u>
<u>INTERCHANGE AND INTERSECTION PLANTINGS</u>	<u>10</u>
INTERCHANGES	10
INTERSECTIONS	11
<u>PLANTING ACCENTS.....</u>	<u>11</u>
ACCENT MAGNOLIAS	11
DAFFODIL RIBBONS	11
<u>STREETScape IMPROVEMENTS WITHIN U.S. 1 RIGHTS-OF-WAY</u>	<u>12</u>
<u>SIGNAGE.....</u>	<u>13</u>

BUSINESS SIGNS	13
TOWN WELCOME SIGNS.....	14
OTHER MUNICIPAL SIGNS	14
HISTORIC MARKERS	14
GREENWAY MARKERS	14
<u>VEHICULAR ACCESS</u>	<u>15</u>
<u>PEDESTRIAN AND BICYCLE ACCESS.....</u>	<u>15</u>
<u>LIGON MILL PARKWAY</u>	<u>16</u>
<u>NATURAL, HISTORIC AND CULTURAL RESOURCES</u>	<u>17</u>
<u>CONCLUSION</u>	<u>17</u>
<u>TABLE OF STREETYARD WIDTHS & PLANTINGS.....</u>	<u>19</u>
<u>U.S. 1 STREETYARDS: PINE WOODS EDGE</u>	<u>19</u>
U.S. 1 STREETYARD WITHOUT SERVICE ROAD:.....	19
U.S. 1 STREETYARD WITH SERVICE ROAD:.....	19
<u>U.S. 1 STREETYARDS: STREET EDGE OAKS.....</u>	<u>20</u>
<u>COLLECTOR ROAD STREETYARDS:.....</u>	<u>20</u>
<u>LIGON MILL PARKWAY STREETYARD:.....</u>	<u>20</u>
<u>APPENDIX A</u>	<u>1</u>
<u>APPENDIX B</u>	<u>1</u>
<u>APPENDIX C</u>	<u>1</u>

INTRODUCTION

The U.S. 1 Corridor Plan for the Town of Wake Forest encompasses the area along U.S. 1 between the Neuse River and the Franklin County line. This Corridor, with the exception of an area west of U.S. 1 between the CSX railroad and Richland Creek Crossing, falls within the jurisdiction of the Town of Wake Forest. The width of the Corridor is approximately one half mile on each side of U.S. 1. Ligon Mill Road and its proposed extension to the north fall within this area and are included in the Plan.

The overall purpose of the Corridor Plan is to identify ways to preserve and improve the appearance and function of the Corridor by establishing design standards and guidelines for development of the Corridor landscape, with a focus on site appearance and function rather than on land use categories.

The U.S. 1 Corridor is both a major transportation link between Raleigh and the region north of the City and a gateway to the Town of Wake Forest. U.S. 1 and the collector roads leading to it are major commuter routes for residents of Wake Forest as well as for communities further north and east. These roads also serve as gateways into the community of Wake Forest for visitors and residents alike.

The Corridor Plan, therefore, has three major goals; 1) to facilitate the transportation function of the Corridor, including the regional flow along U.S. 1 and the connections to the Town of Wake Forest, 2) to preserve and enhance the visual quality of the Corridor so as to create a pleasant passage for all and a welcoming gateway to the community, and 3) to encourage development within this Corridor that is compatible with the first two goals.

The Corridor Plan identifies the following objectives as means to achieve these major goals:

Goal 1. Improve Transportation through the U.S. 1 Corridor.

Objective 1. Preserve and enhance the capacity of U.S. 1 to handle through traffic by means of design standards and strict controls on access.

Objective 2. Develop an interconnected network of roads and drives along and through the Corridor to make it easier to go from place to place within the Corridor, and to reduce the use of U.S. 1 and the major collector roads by local traffic.

Objective 3. Transform Ligon Mill Road into Ligon Mill Parkway serving as a major community transportation corridor parallel to U.S. 1 that provides vehicle, bicycle and pedestrian connections to neighborhoods, shopping areas, businesses and recreation within the community.

Objective 4. Encourage use of internal drives, service roads, and interconnected parking lots for access to and between businesses, to further reduce short distance traffic and turns onto U.S. 1 and the major collector roads.

Objective 5. Facilitate pedestrian travel as a means of transportation by providing an interconnected network of sidewalks, greenways and safe street crossings. Provide sidewalks on collector roads and service roads, with pedestrian connections to greenways, activity centers and main entrances to commercial businesses, offices and institutions.

Objective 6. Facilitate bicycle travel by developing a system of bike routes including bike lanes on Ligon Mill Road and other collectors where feasible, by widening outer lanes on less heavily traveled roads, and by including bike paths along greenway trails. Bike lanes on Ligon Mill Road would provide a route extending nearly the length of Wake Forests, with potential for connection to regional bikeways along the Neuse River.

Objective 7. Provide for connections to the future transit station along the CSX railroad corridor south of U.S. 1A and encourage development patterns in this area which promote access to and use of rail-based mass transit.

Goal 2: Preserve and enhance the visual quality of the Corridor.

Objective 1. Create an attractive, unified and coherent landscape along the length of U.S. 1 through Wake Forest through use of landscaped streetyards, site design controls, and a unified signage system.

Objective 2. Organize and identify development along the Corridor in a way that promotes the community as a whole, while helping travelers find the services they are looking for.

Objective 3. Preserve significant natural, historical and cultural features along the Corridor.

Objective 4. Protect stream corridors and visually emphasize stream crossings along major roads in the Corridor, to strengthen their contribution to the aesthetic character of the Corridor.

Objective 5. Welcome travelers and alert them to the presence of the greater Wake Forest community by means of a municipal way-finding signage system. This system should include “Welcome” signs at the north and south ends of the Corridor, directional signs at the main intersections identifying the Historical District, Downtown, Seminary and other points of regional interest, historical markers, and signage identifying the greenway trail system, bike routes and walking routes.

Goal 3: Encourage development compatible with Goals 1 and 2.

Objective 1. Promote visual “access” to businesses along U.S. 1 while providing safe and convenient physical access from secondary roads wherever possible.

Objective 2. Identify physical locations within the Corridor where a high degree of visibility is achievable and encourage development that needs such visibility to build in these locations.

Objective 3. Identify zones of development where greater visibility and direct physical access can be achieved without significant conflict with transportation and aesthetic goals. Encourage the most intensive development within these zones.

Objective 4. Develop Ligon Mill Parkway as an efficient and aesthetically pleasing spine that can serve any mixture of development.

CONCEPT

U.S. 1 is both a major gateway to Wake Forest and a regional arterial thoroughfare. It is essential that the Corridor area be developed in a way that maximizes the highway's carrying capacity and presents an attractive and welcoming route into and through Wake Forest.

U.S. 1 primarily serves through traffic. It is imperative to minimize impediments to free flow of traffic on this roadway. Access from the main travelway of U.S. 1 to adjacent land should be strictly limited. Properties along the U.S. 1 Corridor should be accessed from existing and new collector streets and service roads. This is particularly important along the portion of U.S. 1 south of N.C. 98. NCDOT plans eventually to upgrade U.S. 1 to freeway status between the North Wake Expressway (the Outer Loop) in Raleigh and N.C. 98 in Wake Forest, providing access only at interchanges located at Burlington Mills Road, U.S. 1A, N.C. 98 Bypass and N.C. 98 Business (existing N.C. 98).

Within the mile-wide Corridor, there are three focus areas that underlie the basic organization of the Corridor as a unit. These focus areas are:

- U.S. 1 Access – oriented
- U.S. 1 Visibility – oriented
- Town – oriented

The U. S. 1 Access – oriented focus areas offer the highest degree of visibility from the roadway to development and the greatest ease of access from U.S. 1.

The U.S. 1 Visibility – oriented focus areas offer visibility from roadway to development along U.S. 1, but access is generally limited to secondary roads.

The Town – oriented focus areas, the largest of the three areas, benefit from the proximity to U.S. 1, but do not have direct access and do not have direct visibility from the highway itself.

The landscape along the highway, within the U.S. 1 Access – and Visibility – oriented focus areas should be simple and bold, in keeping with the scale of the road and the speed of traffic. A unified pattern of streetyard plantings and signage along the Corridor will create an attractive and comprehensible visual experience for highway traveler. The objective of the streetyard plantings is to soften and unify the various buildings and land uses along the Corridor, creating an attractive visual “edge” to the highway while allowing views through to businesses and signage.

The plantings within the landscape along U.S. 1 consist of two basic types: the Pine Woods Edge and the Street Edge Oaks. Simply put, the plan calls for a distinct change in visual character between the landscape associated with intersections and the landscape associated with the land between intersections, so as to draw attention to these entrances to the community and create a visual rhythm which enlivens the highway corridor. The Pine Woods Edge, consisting of Loblolly Pines underplanted with Redbuds for spring color, constitutes the predominant highway edge planting along with heavy screening of most parking. The Street Edge Oaks, in single or double rows, with hedges as necessary to screen parking, distinguish the landscape plantings at intersections.

Ligon Mill Road, including its extension to Stadium Drive, as proposed in the Town’s thoroughfare plan, offers a parallel route through the U.S. 1 Corridor area. As a tree lined parkway, with a planted median and bike lanes and sidewalks on each side, it can become a gracious and lively seam through the community, connecting neighborhoods, businesses and institutions. A network of new and existing collector roads, local streets and interconnecting internal drives should be developed to further connect the community. These travelways should include provisions for pedestrian and bicycle travel as well as vehicles.

Street tree plantings along all streets in the Corridor will further unify and beautify the area, and create an environment more inviting for walking and bicycling. They will also contribute to the environmental health of the community by shading pavement and buildings.

Special natural, cultural and historic features existing in the Corridor should be preserved, accentuated and enhanced so to add interest to the Corridor and celebrate the heritage of Wake Forest. Groves of existing large oaks and other hardwoods exist in many places along the corridor. These should be preserved as landmarks wherever possible and added to over time.

CORRIDOR STREETScape – DESIGN GUIDELINES

PINE WOODS EDGE: U.S. 1 STREETScape

The Pine Woods Edge uses existing and planted vegetation, primarily Pine trees, underplanted with Redbuds, along the edges of U.S. 1 to create a strong visual edge to the highway, regardless of adjacent land uses. Wherever possible it is highly desirable that existing woods along U.S. 1 be preserved. This vegetation, located both within the highway rights-of-way and in adjacent streetyards, will serve to unify varying land uses and built forms. The streetyard plantings serve as visual baffles, softening but still allowing views of adjacent buildings and signage. A planted streetyard is required adjacent to the U.S. 1 rights-of-way. This streetyard shall be 50 feet wide where there is no service road adjacent to the main highway and 25 feet wide where there is a service road.

Where parking is potentially visible from the highway within Pine Woods Edge areas, dense screening must be provided. This screening may consist of topographic features, buildings, walls, evergreen planting or a combination thereof sufficiently tall and dense to visually block the view of at least 80% of the parking that is potentially visible from U.S. 1. Walls and berms must be supplemented by plantings. Total screening should be

provided for outdoor storage, service and loading areas. Long blank building walls should have at least 50% of the wall area masked by plantings. The planting area for these plantings should be in addition to the streetyard.

Tree plantings in the Pine Woods Edge may be arranged irregularly within the spacing limits described in the Table of Streetyard Widths & Plantings.

Openings in streetyard tree plantings to allow views of building facades may be provided along the streetyard. These openings shall be no more than 75 feet wide measured parallel to the highway. No more than two such openings should be permitted on any one site. The minimum spacing between openings should be 200 feet.

Except to create visual access as noted in the paragraph above, existing trees between the highway travelway and adjacent service roads may not be removed or cut back unless NCDOT deems it necessary for reasons of highway safety. Future service roads should be located far enough from the main travelway to allow at least a 30 foot planting area.

STREET EDGE OAKS: INTERSECTION/ACCESS – ORIENTED FOCUS AREA STREETScape

Street Edge Oaks are located around U.S. 1 intersections with the major collector roads in the Corridor. These include:

- Burlington Mills Road
- U.S. 1A
- N.C. 98 Bypass (future)
- N.C. 98/Wake Union Church Road
- Stadium Drive/Jenkins Road
- Harris Road/Purnell Road

Landscape plantings at intersections allow the highest level of visibility for adjacent development. Streetyards in these areas should be 25 feet wide, planted continuously

with double rows of deciduous street trees, primarily oaks, along with evergreen hedges where parking is visible. Additional screening and planting area are required for outdoor storage, service and loading areas or blank building facades.

Aggregation of businesses into unified business or shopping centers is encouraged for these areas, rather than many independent sites. Buildings should be located close to highway and collector road streetyards with no more than one bay of parking between building facade and streetyard. Wherever possible, parking areas of more than one bay should be aligned parallel to U.S. 1 or the largest street adjacent to the property. Under these conditions, a twenty foot planting island should be planted heavily with a mixture of deciduous and evergreen trees and shrubs. This arrangement will help minimize the apparent size of large parking areas as viewed from the primary adjacent roadway. Landscape islands and screen plantings are required between bays where more than one bay of parking is located between U.S. 1 and a building.

STREETSCAPE GUIDELINES: N.C. 98 TO STADIUM DRIVE

The Plan envisions the segment of U.S. 1 between N.C. 98 and Stadium Drive as an extended Focus Area; a lively regional center of commerce providing services, employment and tax base for Wake Forest residents and for the surrounding area. This area, fed by a number of major streets east and west of U.S. 1, is already a focus for concentrated commercial development that is expected to grow.

Organization of businesses into unified business or shopping centers is encouraged in this area. Vehicular access should be from collector roads or service roads rather than from U.S. 1 directly. North/south connections between the existing east/west collector roads should be developed on both sides of U.S. 1 to ease pressure on the N.C. 98/U.S. 1 intersection and improve local access. Businesses and centers are encouraged to “front” on these streets rather than on U.S. 1, using building mass and signage to establish a visible presence on U.S. 1 while orienting the main entrances towards the connector streets.

The objective of the streetscaping and site planting guidelines for this Focus Area is to create a bold, attractive framework that unifies and visually orders the multiplicity of structures and activities in this area. Double rows of Willow Oaks form the backbone of streetscaping along U.S. 1 with evergreen hedges to screen parking. Intersections will be accentuated by beds of annuals and ornamental plantings and by changing the type of street trees to species with colorful fall foliage.

SCREENING OF PARKING

Views of parking along U.S. 1 should be minimized. Parking areas along major collector roads should be screened using conventional methods.

Parking Screening: Pine Woods Edge Areas

At least 80% of any parking potentially visible from U.S. 1 should be screened from view using structural elements, topographical features, and plants to achieve this screening. Dense evergreens such as Southern Magnolias, Hollies or Red Cedars, closely spaced and tall enough at maturity to completely obscure views of parked cars, are examples of plant types suitable to achieve this screening.

Parking Screening: Street Edge Oaks Areas

Locate parking in side yards or rear yards and behind the line of the front building façade wherever possible. Screen parking with a four-foot high evergreen hedge along all perimeters visible from a public road. Along U.S. 1 it is strongly preferred that there be no more than one bay of parking located between the streetyard and a building façade. Six square feet of landscape area per linear foot of building façade is required between the façade and parking where parking is located between the streetyard and façade of the building. Each landscape area shall be at least six feet wide and 100 square feet in area. Provide at least 300 square feet of landscape area with a 10 foot minimum width for each shade tree planted in this area.

If more than one bay of parking is located between the U.S. 1 streetyard and a building, 20 foot wide landscape islands, with a mix of trees and tall shrubs at least 60% evergreen, must be provided between the first and second parking bays and between each two additional bays. Parking bays should be parallel to U.S. 1 wherever site conditions permit.

BLANK BUILDING FAÇADES

It is preferable that building walls facing U.S. 1 or another public street be enlivened by windows, public entrances and/or other architectural features. Long unarticulated building walls should be screened by having at least 50% of the wall area masked by plantings. The mixture of plants should include trees and shrubs, evergreen and deciduous.

SCREENING OF SERVICE AND LOADING AREAS AND OUTDOOR STORAGE

These site elements should be screened from view from all public roads and adjacent properties by buildings, solid walls combined with vegetation, or evergreen plantings with a mature height sufficient to hide the total vertical extent of the element to be screened. In Street Edge Oaks areas, a 15 foot width of landscape area must be provided in addition to the 25 foot width streetyard to accommodate the screen plantings for Service Areas, Outdoor Storage/Loading Docks, Dumpsters or Blank Building Façades.

INTERCHANGE AND INTERSECTION PLANTINGS

Interchanges

In the portion of the Corridor designated for future freeway status all intersections will eventually be converted to interchanges or eliminated. Landscape areas within existing and proposed interchanges provide opportunities for ornamental plantings and creation of new groves of Oaks and other hardwoods. Plantings within interchanges are further

described under “Streetscape Improvements Within U.S. Rights-Of-Way”. The intersections of interchange access ramps and collector streets will be treated like other intersections described below.

Intersections

Major intersections are accentuated throughout the U.S. 1 corridor by a change of street tree variety within 300 feet of the intersecting street.

The “Intersection Trees” species indicated are large durable shade trees with bright fall color. The intersection tree plantings extend 300 feet from the intersection along the major cross streets as well as along U.S. 1. A spacing between trunks of 75 feet maximum width is permitted at the intersection of two streetyards to allow greater visibility into adjacent developments, to accommodate signage, and to provide space for a substantial planting bed for colorful annuals and other ornamental plantings to accentuate the intersection.

PLANTING ACCENTS

To further enliven the U.S. 1 Corridor and strengthen the rhythm of the streetyard plantings, the Plan shows specific ornamental plantings at key points and at intervals along the route in addition to the standard streetyard and screen plantings.

Accent Magnolias

Small Clusters of Southern Magnolias (*Magnolia grandiflora*) are used to mark the transition points between planting types at various points along the Corridor.

Daffodil Ribbons

A continuous 10 foot wide band of daffodils is proposed along the U.S. 1 rights-of-way in all Street Edge Oaks areas. This band should be located so it can be readily visible from the highway; with NCDOT’s approval it should be located in the U.S. 1 rights-of-way wherever the highway is bounded by a fence or where existing woods extend into the rights-of-way.

STREETSCAPE IMPROVEMENTS WITHIN U.S. 1 RIGHTS-OF-WAY

Vegetation within the U.S. 1 Rights-of-Way plays an important role in creating an attractive streetscape. Trees along the edge of the highway corridor, particularly those along the fence row between the main travelway and the service road, provide a strong green vertical edge to the horizontal expanse of pavement and grass. Trees and shrub masses in the landscape areas within the interchanges create green oases, attractively accentuating the intersections. A grove of large oaks is included in a quadrant of the Route 98 interchange.

It is desirable to allow existing vegetation, especially trees, to flourish along the edges of the rights-of-way to the extent NCDOT deems compatible with traffic safety. Trees and underbrush should not be removed or trimmed except in the specific situations noted in this Plan or as deemed necessary by NCDOT.

Plantings in the open areas within the existing interchanges should be strengthened over time with additional plantings of trees and shrub masses. A planting plan for the U.S. 1A interchange is included in this Plan.

Future interchanges, most notably the N.C. 98 Bypass interchange, should be designed to include tree planting areas. Oak groves should be established in these areas to add to and reinforce existing groves of trees.

Plantings of Crape Myrtles along the outer edges of the interchange access ramps will create bright seasonal color in summer and fall, accentuating the tree plantings and visually containing the open space within the interchange. Tree spacing of 30 feet apart will allow visibility through to the Activity Node businesses while creating continuity in the planting.

Overhead power lines run parallel to U.S. 1 for long stretches of the Corridor, causing a widened clearing and a sharp vertical edge to the adjacent woods. Small trees should be planted along these edges to create a more attractive edge to the Corridor.

SIGNAGE

Signage along U.S. 1 should be organized into a corridor signage system so that information about the community's resources is conveyed clearly and attractively to travelers.

Business Signs

One freestanding sign will be allowed for each business or commercial center, or for each independent business not associated with a center. Freestanding signs may be placed immediately adjacent to the rights-of-way boundary, as long as they do not encroach on sight lines. Vegetation beside and in front of the sign may be arranged or trimmed to allow visibility of the sign from the highway.

The Plan includes a uniform sign design for freestanding business signs along U.S. 1; a double sided anodized metal box type sign, internally lit, in the shape of a vertical rectangle 15 feet tall x seven feet wide. The basic color should be uniform throughout the corridor. The content, logo, lettering size, style and colors will be the owner's choice.

Signage affixed to building walls is permitted in addition to the freestanding signs. Building mounted signage shall be governed by the Town's sign code.

Standard interstate food, gas and lodging directional signs are recommended to be located at the approaches to each interchange or major intersection.

Freestanding business signage along major collector streets within the U.S. 1 Corridor should also be of uniform design, similar in character to the U.S. 1 business sign. One freestanding business sign will be allowed per development or subdivision.

Town Welcome Signs

Signs welcoming travelers to the Town of Wake Forest should be installed at the north and south ends of the Corridor and at the U.S. 1A interchange. These signs should be located within the U.S. 1 rights-of-way, if permitted by NCDOT, or immediately adjacent to it.

The southern entry sign should be located on the east side of U.S. 1 just south of the start of the future access ramp to the Burlington Mills Road interchange. The northern entry sign should be located west of the highway near the existing “Turkey Shoot” sign. Locate a third sign in the triangular open space between U.S. 1A northbound exit ramp and the adjacent service road.

The Town’s Welcome Signs should incorporate dry stacked stone walls, similar to the one surrounding the Seminary campus. They should also incorporate the standard signs of the various civic and community organizations. A design for the U.S. 1A Welcome Sign is included in the Corridor Plan.

Other Municipal Signs

Attractive informational signage should be installed along U.S. 1 and collector roads leading into Town. These signs should highlight community features including the Downtown area, the Historic District and the main Seminary campus. This signage should be simple but distinctive. A way-finding system of signage should be developed.

Historic Markers

Historic markers should be used to identify places of historical significance in the community. These already exist in several places within the Town; new signs should match the style and materials of existing ones.

Greenway Markers

Simple bollard markers should be used to identify entrances to greenways within the Corridor and to provide direction along connecting trails. Schematic maps of walking

and bike routes, mounted on signs at intervals along the routes, could alert residents to these networks and encourage greater use.

VEHICULAR ACCESS

No additional driveway cuts should be allowed along the U.S. 1 travelway unless there is no other means of access to an adjacent property. Any new driveways should be for right in/right out access only with no median cuts. Individual driveways should be closed wherever possible.

Access to businesses and residential areas in the U.S. 1 Corridor should be via major collector roads, or other interconnecting routes for local traffic, to alleviate short distance traffic on both U.S. 1 and the major collector roads.

Plans for access to properties south of N.C. 98 along U.S. 1 should take into account NCDOT's plans for future freeway status and interchanges.

Any new service roads along U.S. 1 should be designed with sufficient space between them and the highway travelway to accommodate streetyard plantings.

Adjacent businesses are encouraged to provide internal connections between their parking areas to reduce short distance trips and frequent turns onto or off public roads.

PEDESTRIAN AND BICYCLE ACCESS

All new roads in the U.S. 1 Corridor should have a sidewalk on at least one side. All collector roads should have sidewalks on both sides. Sidewalks should be added to both sides of major collector roads where they do not currently exist. Service roads along U.S. 1 should have a sidewalk along the side adjacent to private land.

Sidewalks or other designated walkways should be provided for all business, commercial and multifamily properties leading from the public sidewalks to the front

doors of all primary buildings and connecting all the primary buildings and activity centers to each other.

Within the Corridor, greenway trails should be built along the greenways designated on the Town's Greenway Plan to provide alternate routes for pedestrians and bicyclists. Clear connections should be made to these trails from public sidewalks. The greenway trail system should connect to the regional Neuse River Greenway at the south end of the U.S. 1 Corridor, and through Wakefield on the west side of the Corridor as greenways are extended by Raleigh through that development, especially along Richland Creek.

Bicycle lanes should be provided along Ligon Mill Parkway and east/west connectors as shown in the Plan. These should be four feet wide, exclusive of curb and gutter, separated from the outer traffic lanes by a solid stripe. Bicycles should be accommodated on local collector streets in the area by widening the outer lanes from 12 to 14 feet. Provide ramped connections between bicycle lanes and greenway trails.

Businesses should be encouraged to provide bicycle parking to facilitate the use of bicycles for commuting and errands.

LIGON MILL PARKWAY

Ligon Mill Road, with its proposed extension, as delineated in the Town's Thoroughfare Plan, provides an opportunity to create a route through the community parallel to U.S. 1 that is an efficient and gracious entrance to much of the Town. The Plan also proposes a segment of parkway between Burlington Mills Road and the existing Ligon Mill Road along Smith Creek.

The Plan proposes a four lane divided parkway, with a 12 foot wide center segment, which can be used for a turn lane where necessary and otherwise developed as a planted median. A four foot wide bike lane should be provided on each side, inside the

gutter or shoulder, separated from the outer vehicle lane by a solid stripe. A five foot sidewalk should also be provided on each side, separated from the edge of pavement by an eight foot wide tree planting strip. A double row of shade trees should be planted along each side of the roadway; the inner row in the tree planting strip and the outer row in the private streetyard beyond the sidewalk. A 100 foot rights-of-way is needed for this section. Portions of Ligon Mill Parkway cannot easily be widened to this extent due to existing structures or natural features. In these areas the section can be narrowed by reducing the width of lanes, eliminating the turn lane or median, using 14 foot outer vehicle lanes for bikes, rather than bike lanes, and reducing the width of the planting strip between the street and sidewalk.

NATURAL, HISTORIC AND CULTURAL RESOURCES

Groves of mature hardwoods, primarily White Oaks, are scattered throughout the Corridor. In several locations they are still associated with old homesteads; elsewhere they now shelter newer structures or stand alone. Oak groves exist at most of the major intersections, particularly along collector streets just east of U.S. 1, serving as a strong repetitive element along the Corridor and a welcoming feature at major entrances to Town. These groves should be preserved as part of the streetyards and supplemented with plantings of new Oaks to maintain their presence over time.

Several historic homesteads identified in the Town's Land Use Plan also occur in the Corridor area. These are indicated on the Corridor Plan. These sites, including the buildings and mature trees, offer a glimpse of the visual and cultural character and history of the community. It is encouraged that they be preserved to the extent practical, as historical and visual community resources.

CONCLUSION

The U.S. 1 Corridor Plan is, at one level, a simple set of planting guidelines for areas bordering a major highway and associated connected roadways. More subtly, but with broader implications, the Plan is a set of suggestions through which the needs of

efficient access and travel and the practical needs of commercial and residential development are both ordered and accommodated without significant compromise of one set of needs by the other. The aesthetic promoted by planting guidelines is also part of this effort to impart a sense of order and cohesion. Order and cohesion are further enhanced by the selective and clear presentation of visual information, information that alerts and directs people receiving it. Plantings and signage are means by which to focus attention upon useful information. Roadways, pedestrian-ways and bikeways – interconnected, clearly identified, and sensibly organized – allow movement in a logical, efficient and orderly manner. The U.S. 1 Corridor Plan is a combination of projected changes and specific guidelines. It is a means by which to suggest the nature of anticipated changes, to understand the pattern resulting from and reasons for such changes, and to develop tools that enable the Town to manage such changes.

TABLE OF STREETYARD WIDTHS & PLANTINGS

U.S. 1 STREETYARDS: PINE WOODS EDGE

Wherever possible, existing woods should be preserved within the U.S. 1 streetyards and used to meet the streetyard planting requirements.

U.S. 1 Streetyard Without Service Road:

Streetyard Width		50' average width (35' minimum/75' maximum)
Streetyard Plantings	Loblolly Pines	18 trees/100 lf, randomly spaced (8' on center minimum/30' on center maximum)
	Redbuds	5 trees/100 lf

U.S. 1 Streetyard With Service Road:

Streetyard Width		25' average width (35' minimum/75' maximum)	
Streetyard Plantings			
Alternate A: (To be used wherever NCDOT allows planting between U.S. 1 and service road.)	Planting between U.S. 1 and Service Road.	Loblolly Pines	7 trees/100 lf
		Redbuds	4 trees/100 lf
AND			
	Streetyard Planting	Loblolly Pines	10 trees/100 lf
		Redbuds	3 trees/100 lf
Alternate B: (To be used where NCDOT does not allow planting between U.S. 1 and service road.)	Planting in Streetyard Only:	Loblolly Pines	18 trees/100 lf
		Redbuds	5 trees/100 lf

U.S. 1 STREETYARDS: STREET EDGE OAKS

Streetyard Width – U.S. 1 Frontage		25’ average width (with or without service road) 20’ minimum/30’ maximum
Collector Road Frontage		25’ average width within 300 feet of U.S. 1 rights-of-way
Streetyard Plantings – U.S. 1 Frontage	Willow Oaks	2 rows, 50’ on center typical
	OR	
	Shumard or Nuttall Oaks	2 rows, 50’ on center standing at intersections and extending 300 feet in all directions. Locate both rows in streetyard, unless there is sufficient space for 1 row between service road and highway.

COLLECTOR ROAD STREETYARDS:

Streetyard Width		15’ average width (10’ minimum/25’ maximum)
Streetyard Plantings	Oak or equally durable shade tree	30’ on center

LIGON MILL PARKWAY STREETYARD:

Streetyard Width		10’ minimum
Streetyard Plantings	Double row of shade trees. Trees shall be at least 60% Oak species well adapted for street tree use in this region.	1 row located between sidewalk and street, 1 located in streetyard.

APPENDIX A

STREETSCAPE, LANDSCAPING, & SIGNAGE DIAGRAMS

U.S. 1 STREETSCAPES

- Pine Woods Edge – U.S. 1 Frontage – No Service Road
- Pine Woods Edge – U.S. 1 Frontage – With Service Road
- Street Edge Oaks – U.S. 1 Frontage – No Service Road
- Street Edge Oaks – U.S. 1 Frontage – With Service Road

LIGON MILL PARKWAY STREETSCAPE

- 100 Ft. Rights-of-Way
- 90 Ft. Rights-of-Way – Option A
- 90 Ft. Rights-of-Way – Option B

COLLECTOR ROADS STREETSCAPE

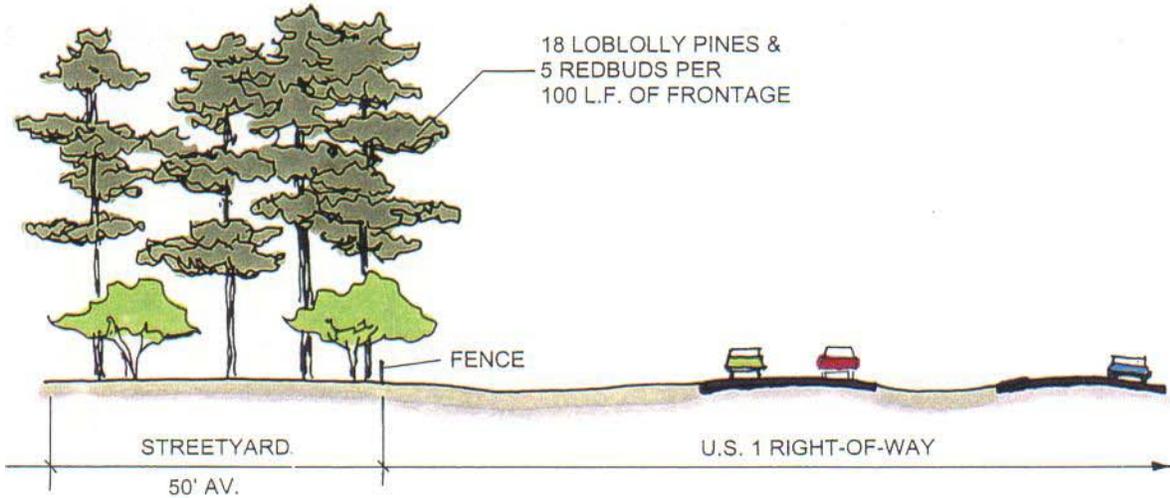
U.S. 1 – STREET EDGE OAKS AREAS:

LANDSCAPING FOR SPECIFIC SITE CONDITIONS ADJACENT TO U.S. 1

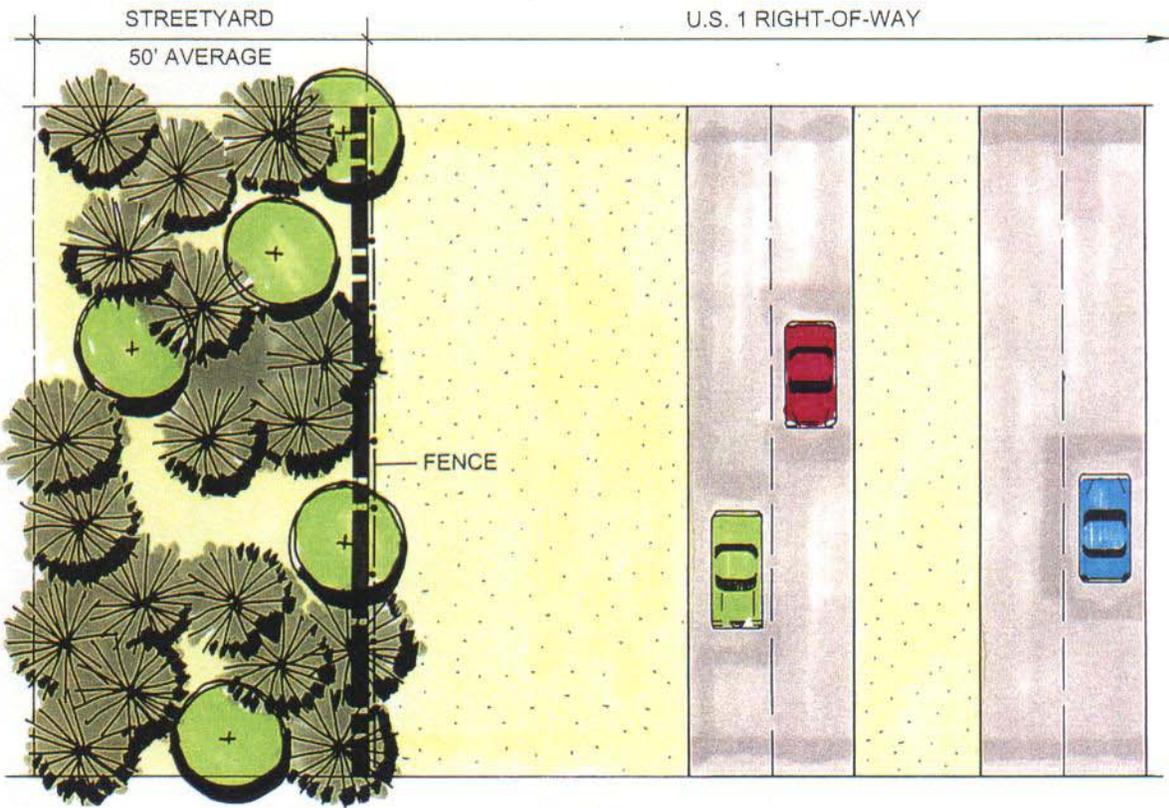
- Option A: Building Next to Street Yard
- Option B: Parking Next to Street Yard (Single Bay)
- Option C: Service/Storage Next to Street Yard
- Option D: Parking Lot Next to Street Yard (Multiple Bays)

SIGNAGE

- Standard U.S. 1 Business Sign
- Ligon Mill Parkway Business Sign
- Town Identity Sign – 1A Intersection

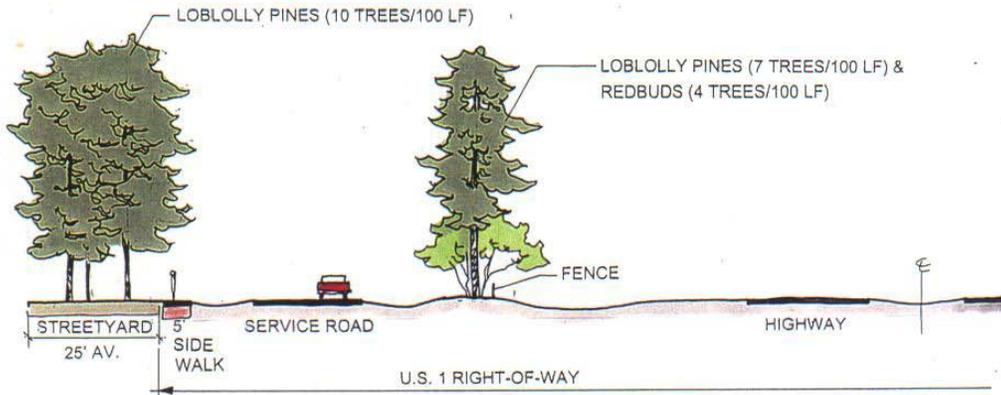


SECTION

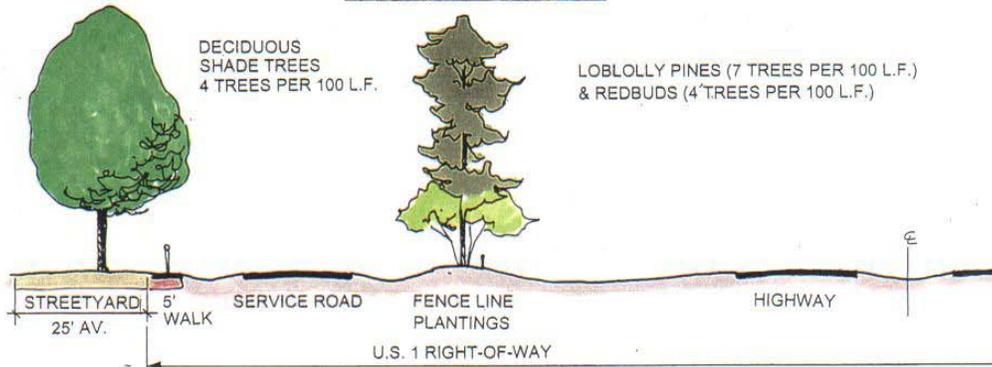


PLAN

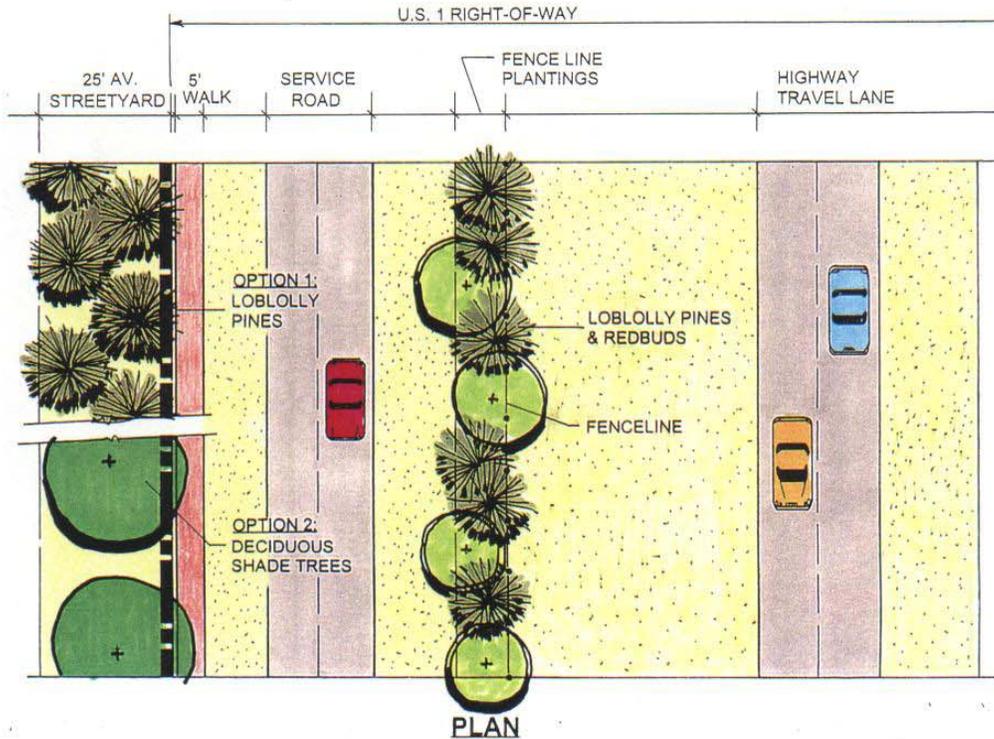
**PINE WOODS EDGE
U.S. 1 FRONTAGE – NO SERVICE ROAD**



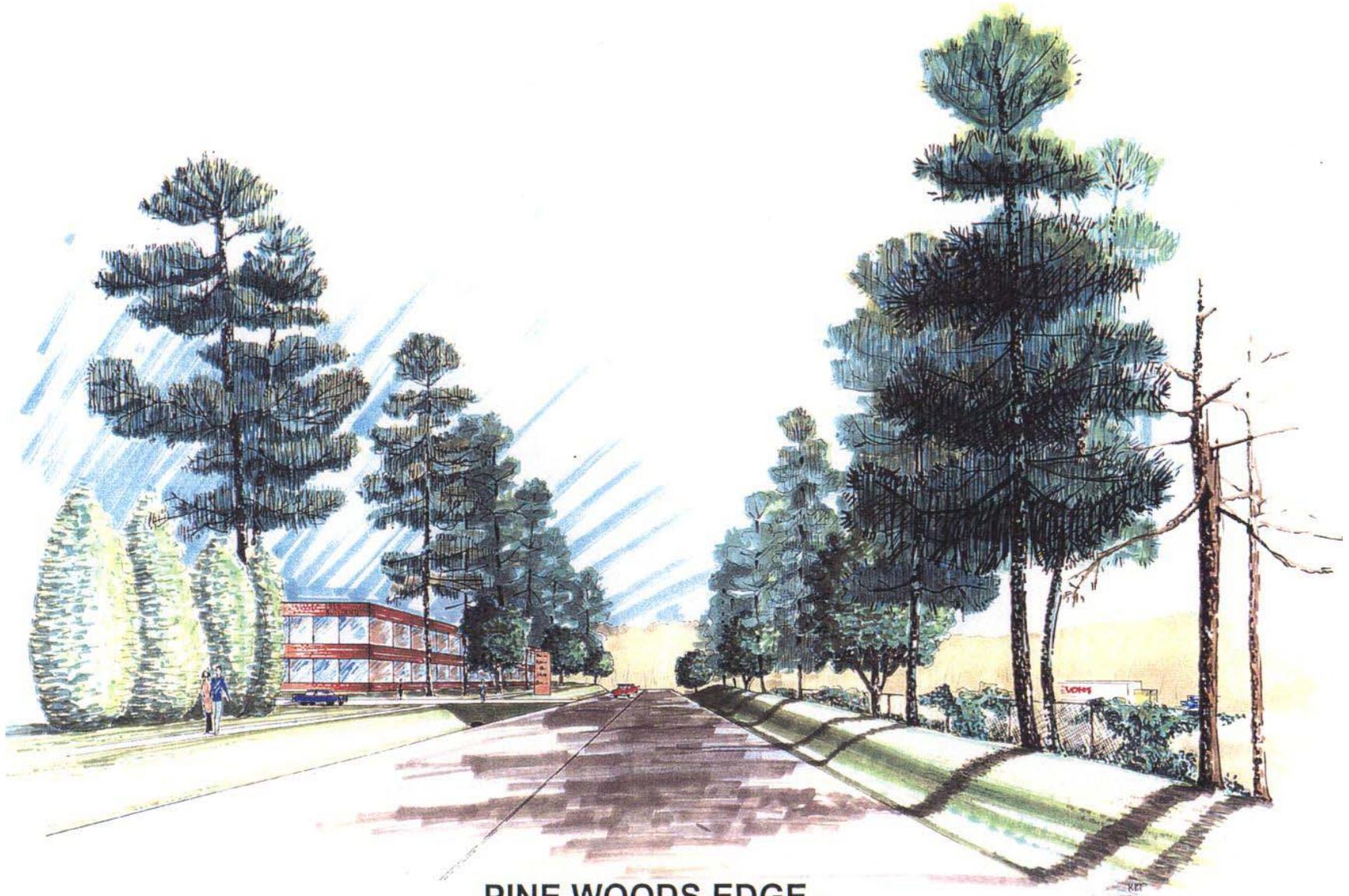
SECTION - OPTION 1



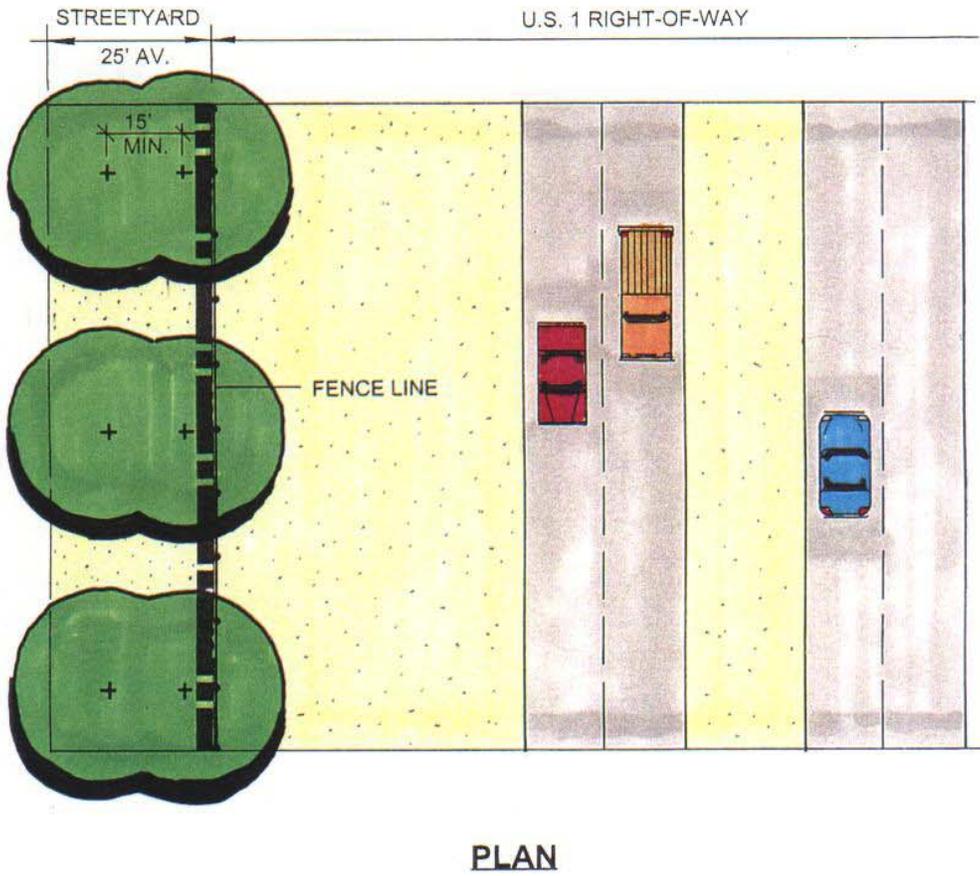
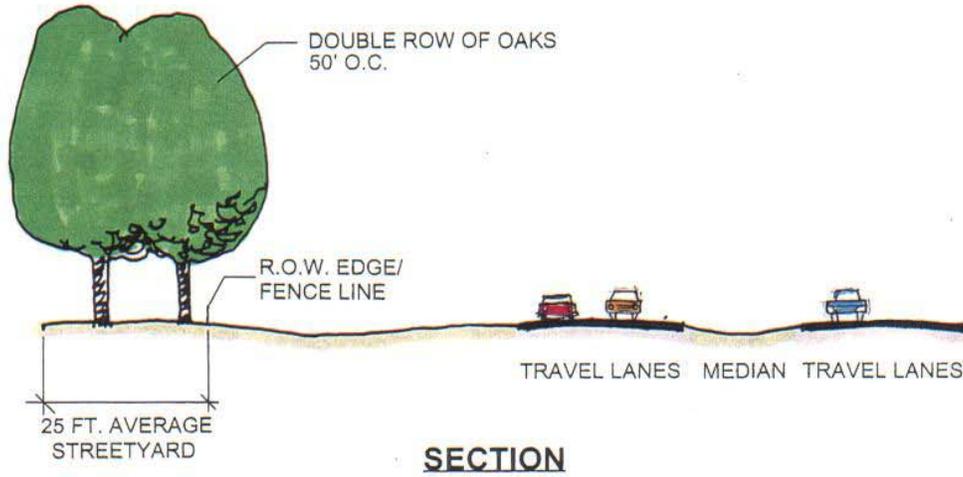
SECTION - OPTION 2



**PINE WOODS EDGE
U.S. 1 FRONTAGE WITH SERVICE ROAD**



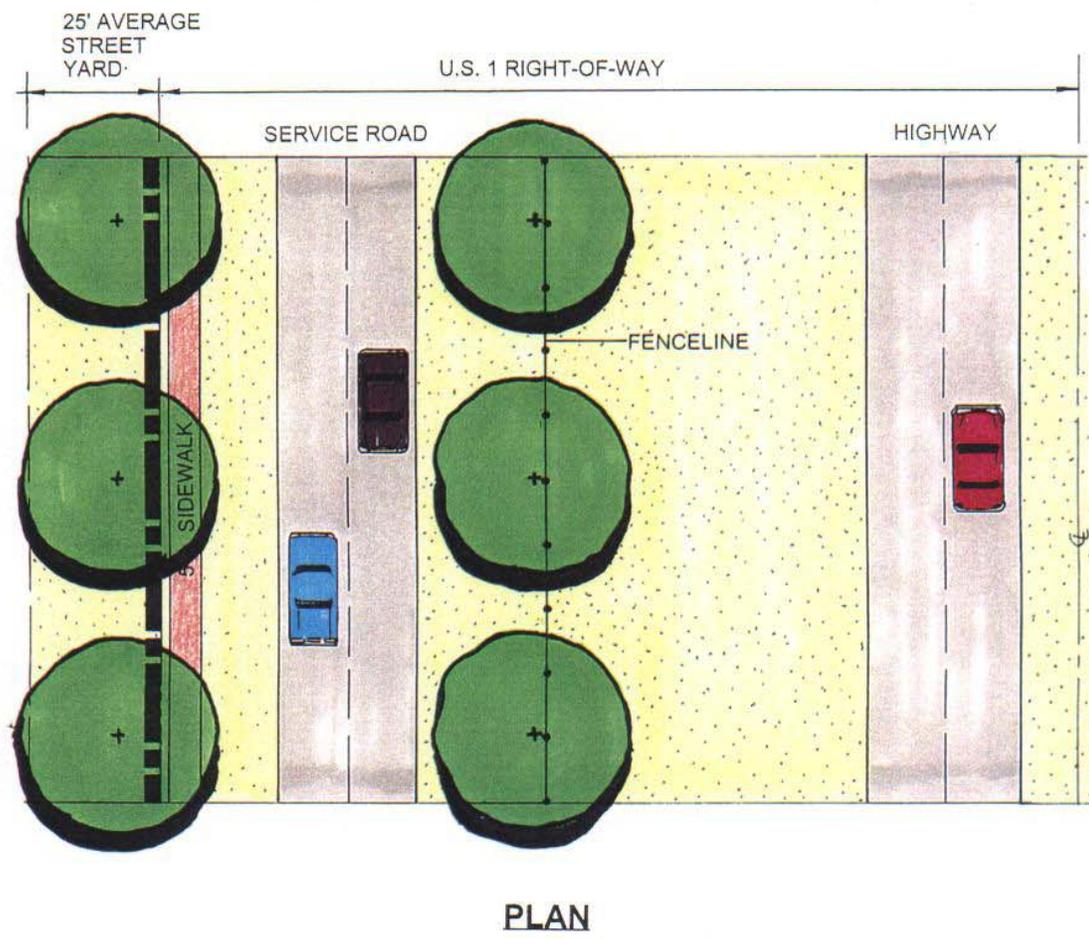
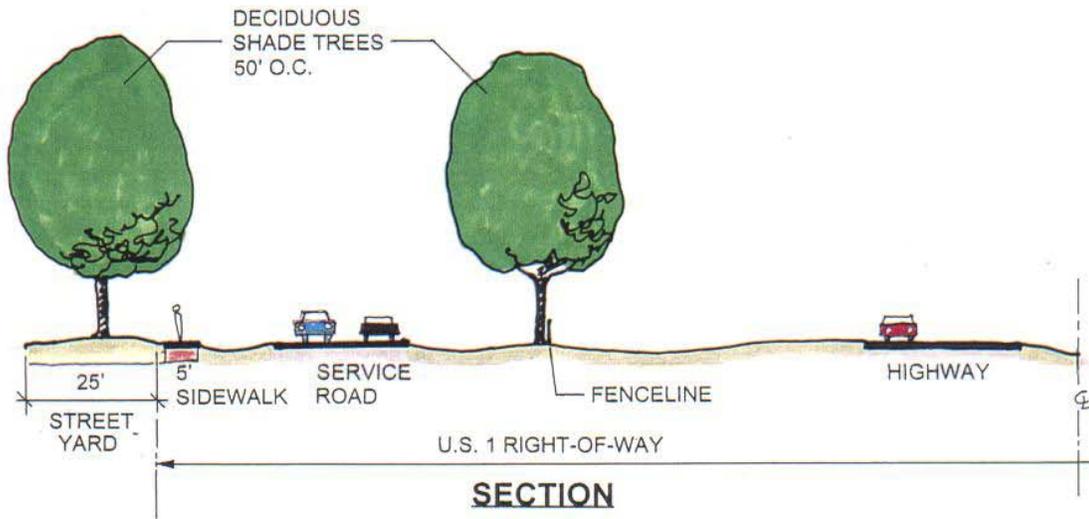
**PINE WOODS EDGE –
U.S. 1 FRONTAGE WITH SERVICE ROAD**



**STREET EDGE OAKS
U.S. 1 FRONTAGE – NO SERVICE ROAD**



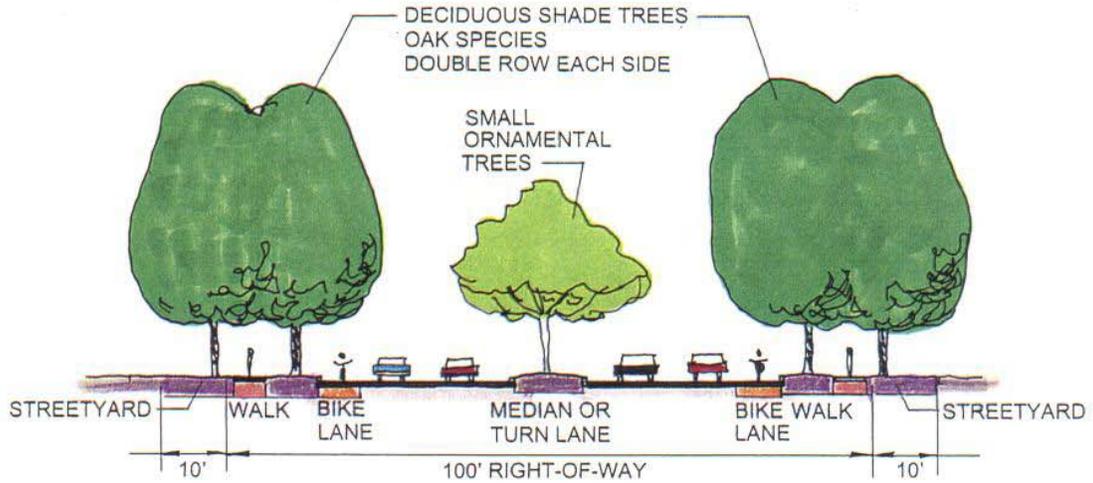
**STREET OAKS EDGE –
U.S. 1 FRONTAGE – NO SERVICE ROAD**



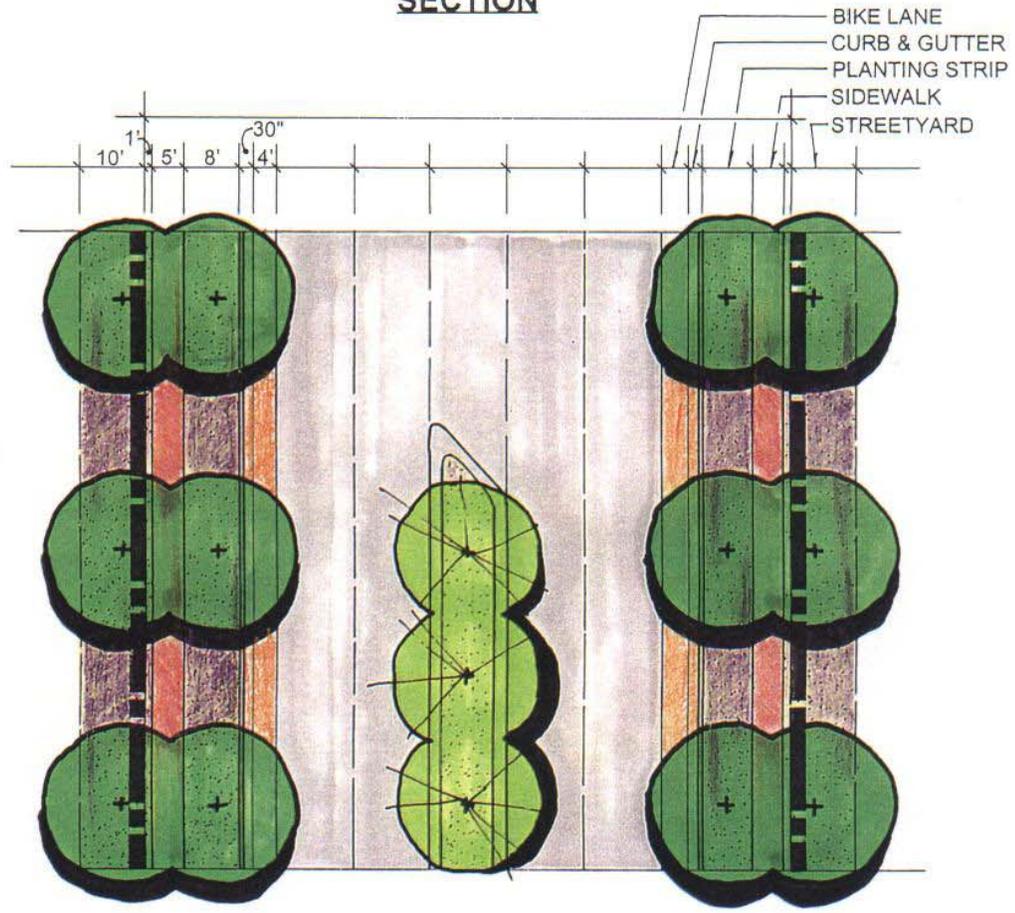
**STREET EDGE OAKS
U.S. 1 FRONTAGE WITH SERVICE ROAD**



**STREET OAKS EDGE –
U.S. 1 FRONTAGE WITH SERVICE ROAD**

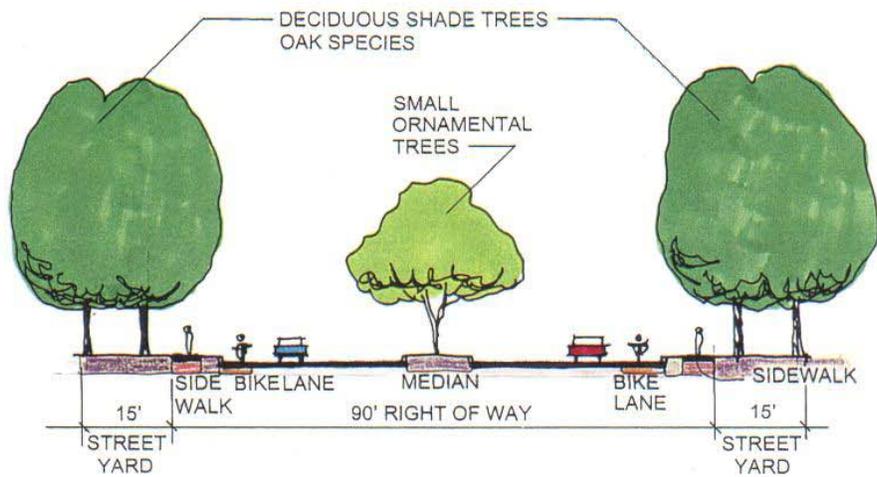


SECTION

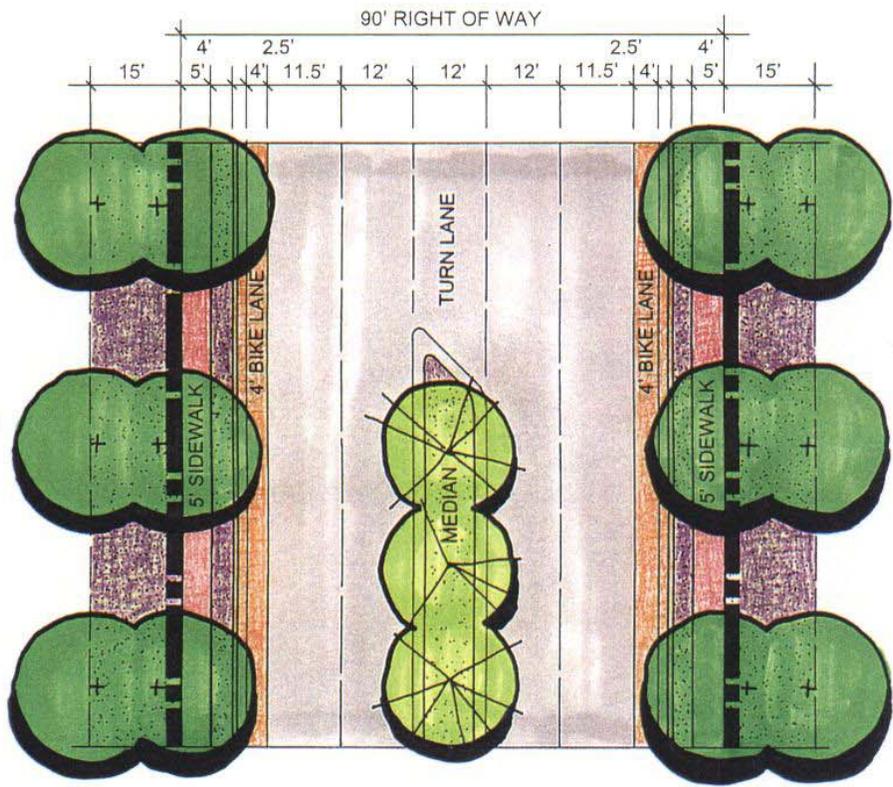


PLAN

**LIGON MILL PARKWAY
100' RIGHT-OF-WAY**

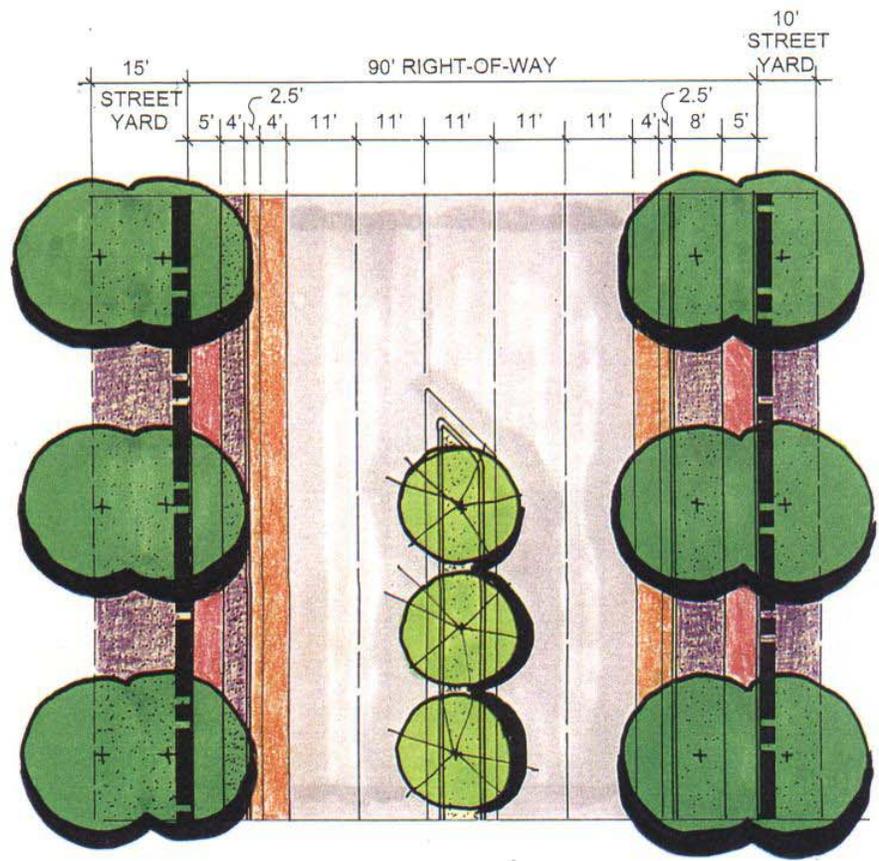
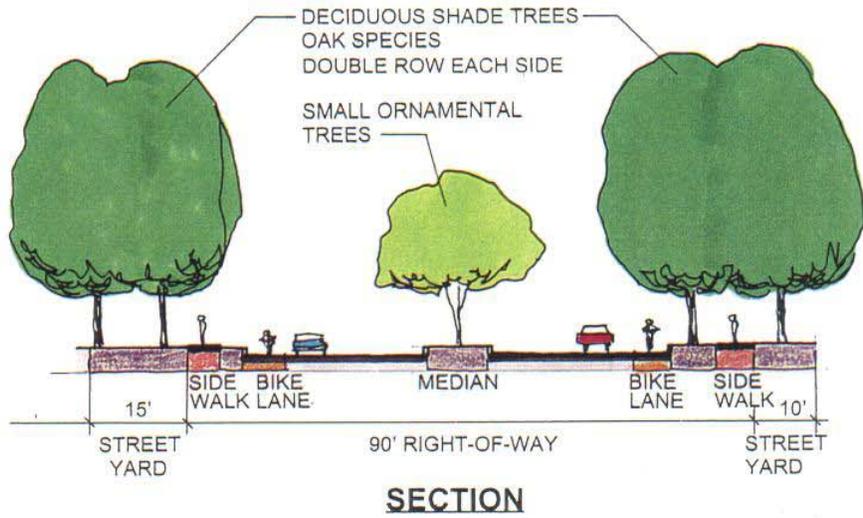


SECTION



PLAN

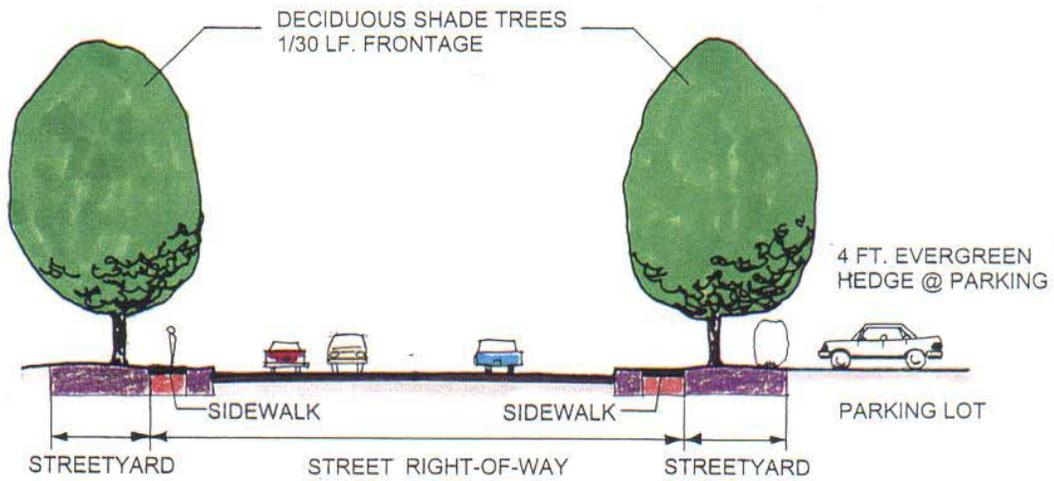
**LIGON MILL PARKWAY
90' RIGHT-OF-WAY – OPTION A**



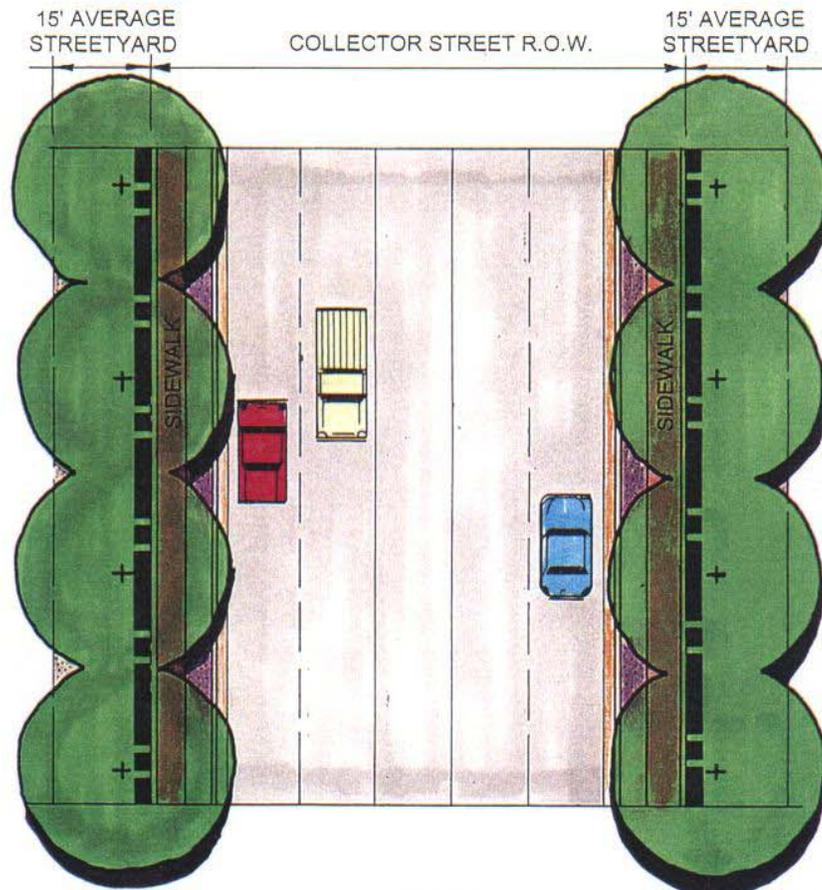
**LIGON MILL PARKWAY
90' RIGHT-OF-WAY – OPTION B**



LIGON MILL PARKWAY STREETScape



SECTION

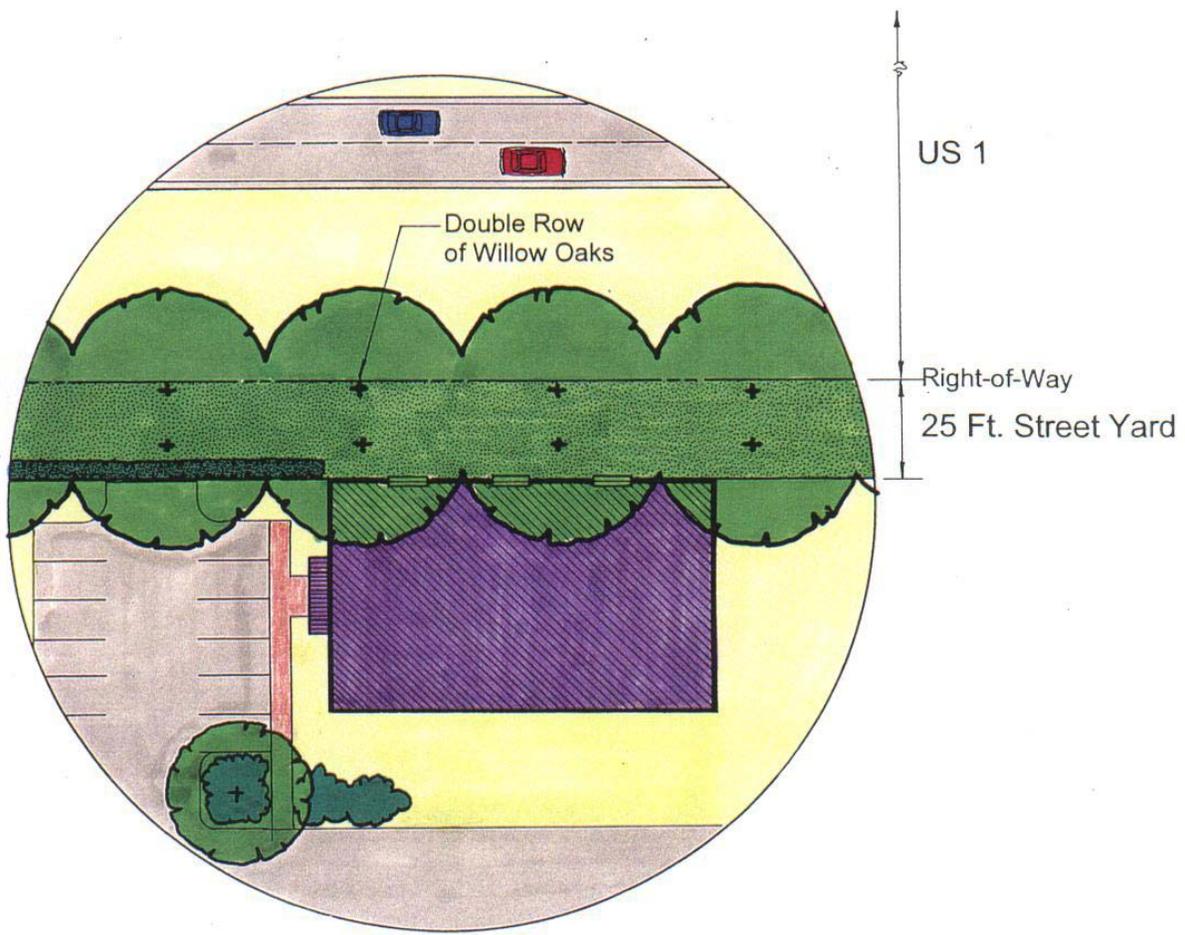


PLAN

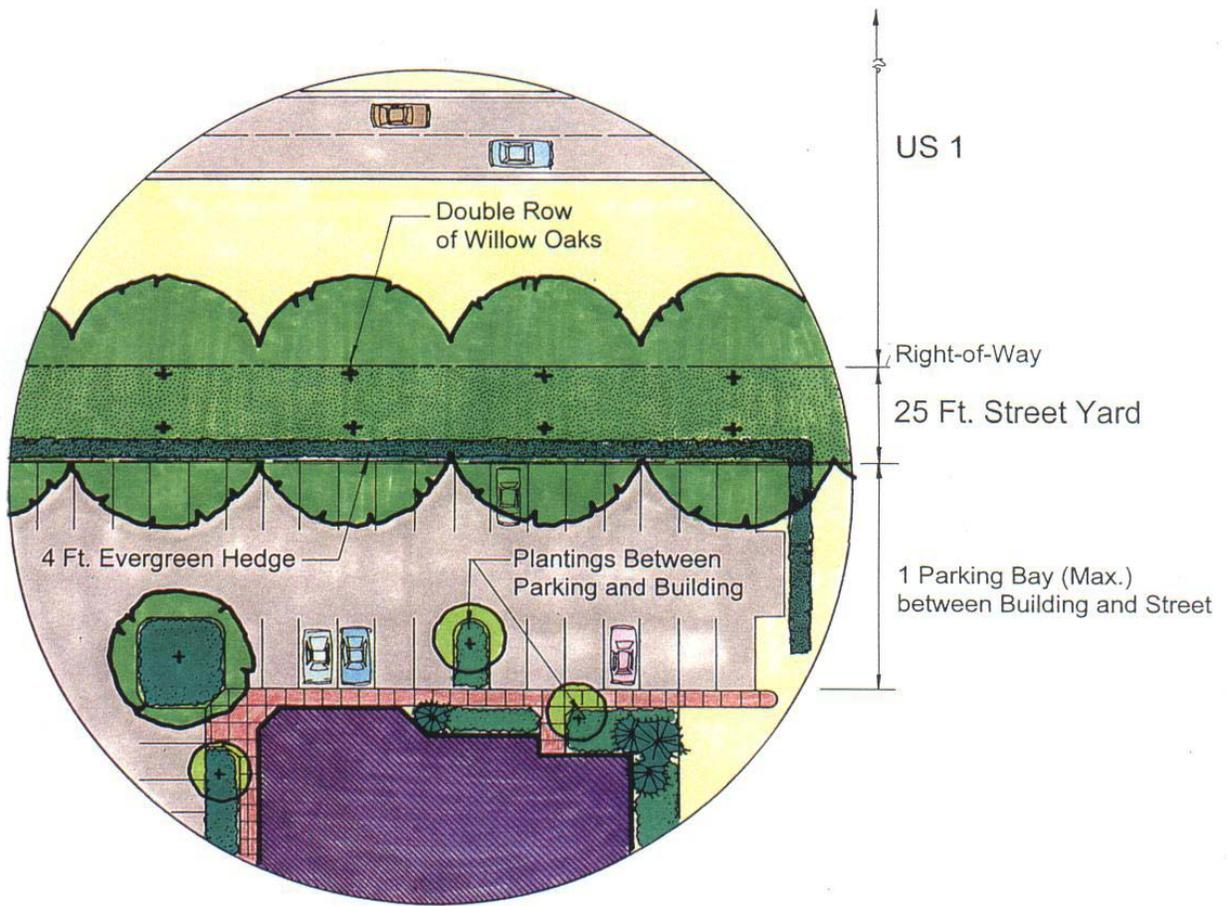
COLLECTOR STREET



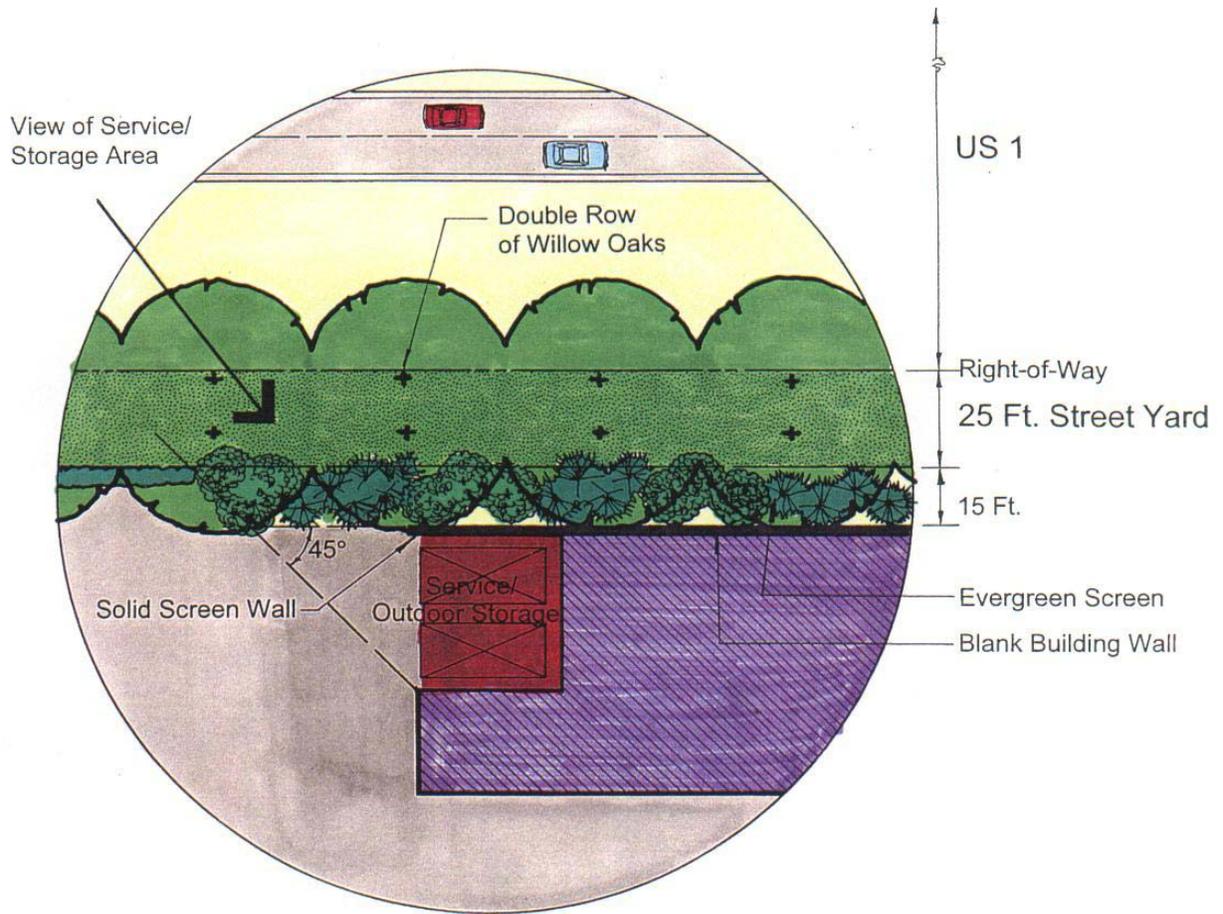
COLLECTOR STREET STREETScape



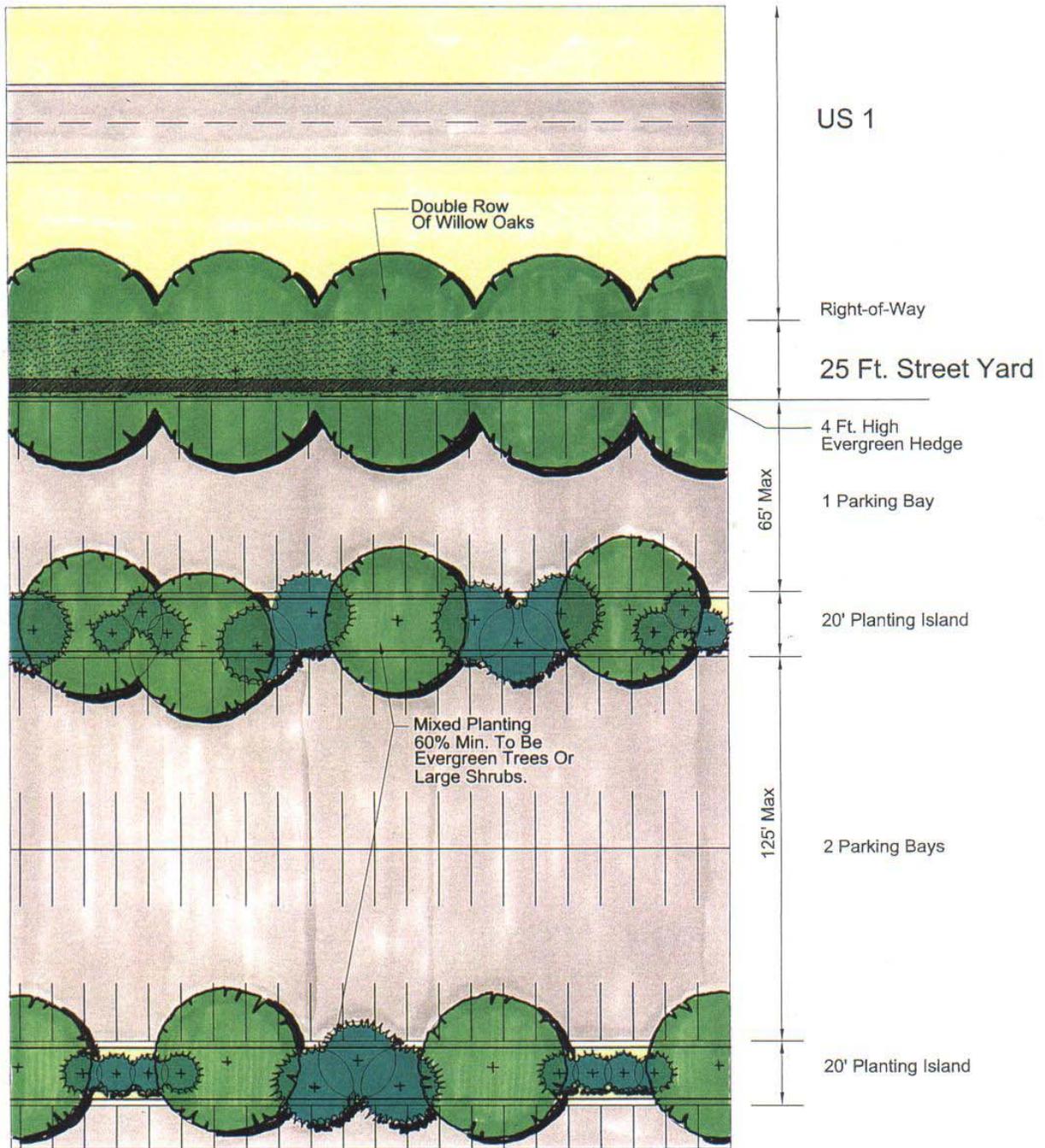
**OPTION A:
BUILDING NEXT TO STREET YARD**



**OPTION B:
PARKING NEXT TO STREET YARD**



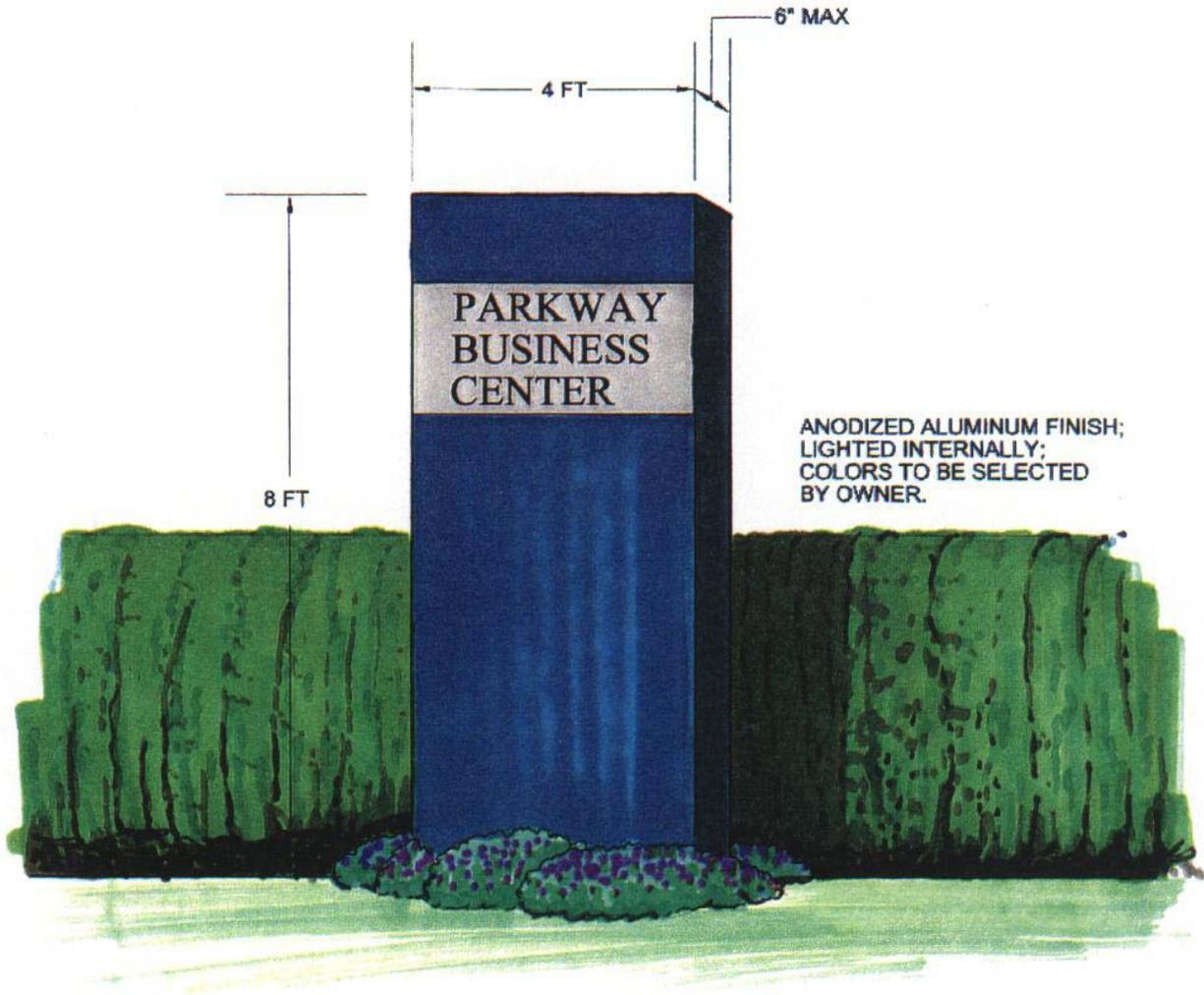
**OPTION C:
SERVICE/STORAGE NEXT TO STREET YARD**



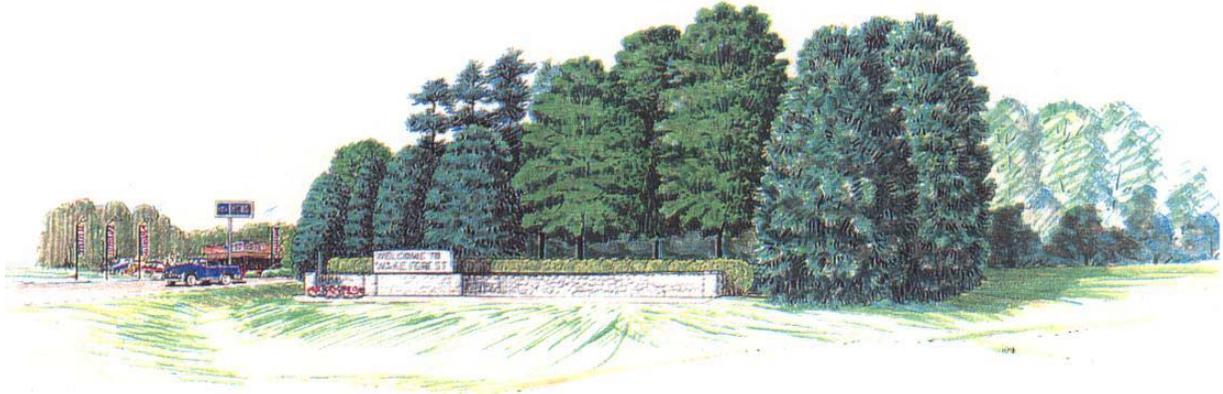
OPTION D:
PARKING LOT NEXT TO STREET YARD



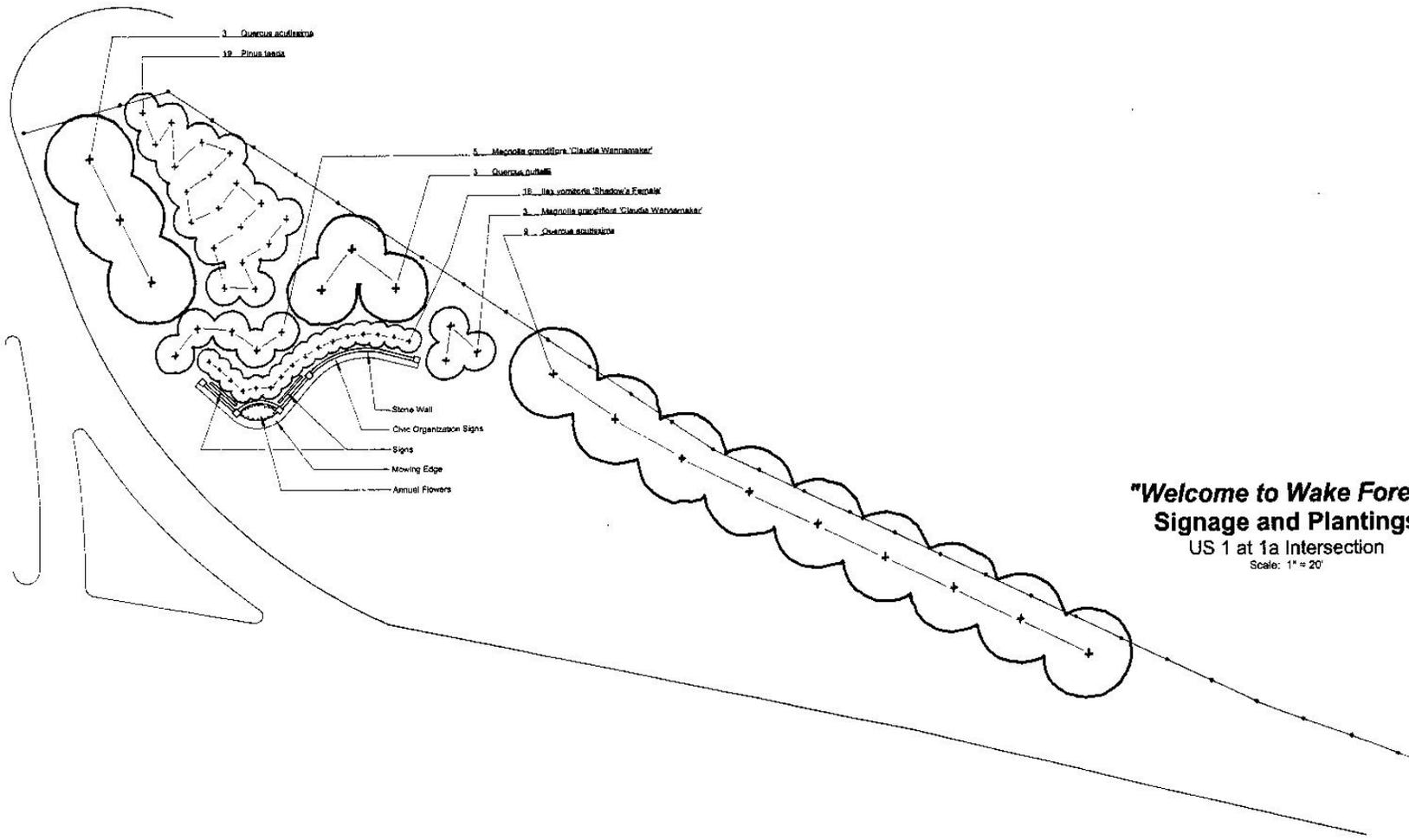
STANDARD U.S. 1 BUSINESS SIGN



LIGON MILL PARKWAY BUSINESS SIGN



**TOWN IDENTITY SIGN –
1A INTERSECTION**



"Welcome to Wake Forest"
Signage and Plantings
 US 1 at 1a Intersection
 Scale: 1" = 20'

APPENDIX B

CONCEPTUAL LAND USE EXAMPLES

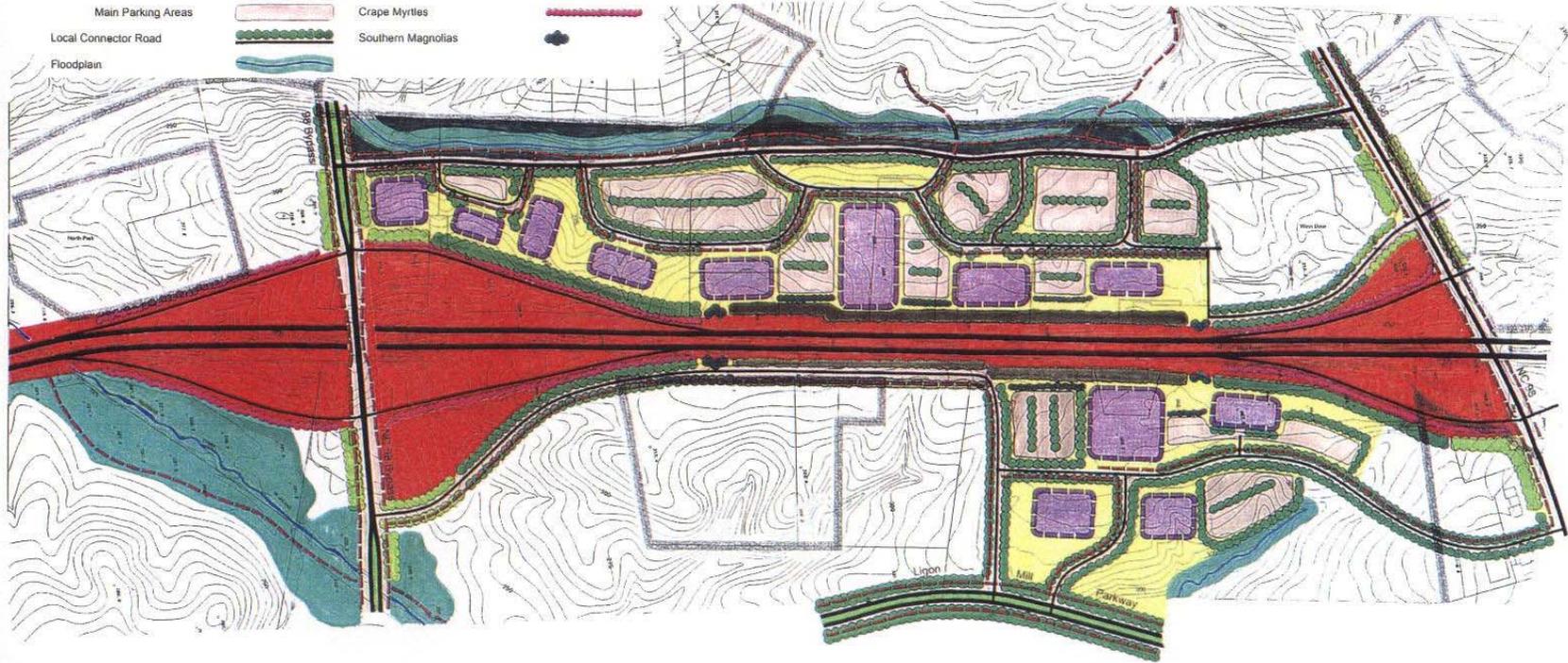
- N.C. 98 Bypass to N.C. 98
- N.C. 98 to Stadium Drive

U.S. 1 Corridor Study

Town of Wake Forest
Scale: 1" = 100' North

Legend:

- | | | | |
|--------------------------------------|--|-----------------------------|--|
| U.S. 1 – Freeway Status | | Pedestrian Access | |
| U.S. 1 – Non-Freeway Status | | Pine Woods Edge Streetyard | |
| U.S. 1 – Access Oriented Focus Area: | | Street Edge Oaks Streetyard | |
| Building Envelope | | Intersection Trees | |
| Main Parking Areas | | Crape Myrtles | |
| Local Connector Road | | Southern Magnolias | |
| Floodplain | | | |



**CONCEPTUAL LAND USE EXAMPLE:
N.C. 98 BYPASS TO N.C. 98**

U.S. 1 Corridor Study

Town of Wake Forest

Scale: 1" = 100' North

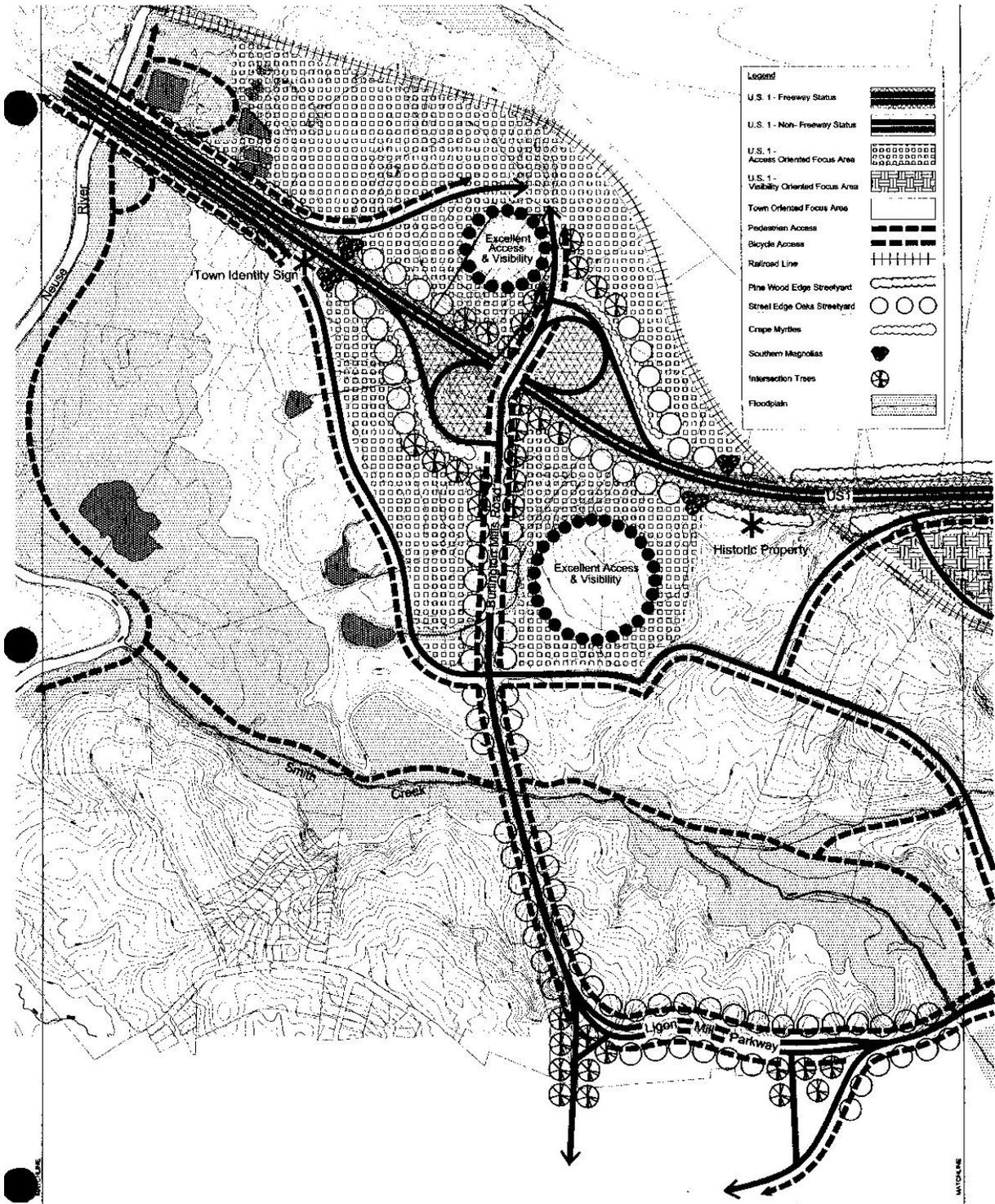


**CONCEPTUAL LAND USE EXAMPLE:
N.C. 98 TO STADIUM DRIVE**

APPENDIX C

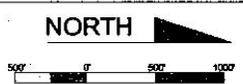
U.S. 1 CORRIDOR PLAN

- Sheets 1 – 5

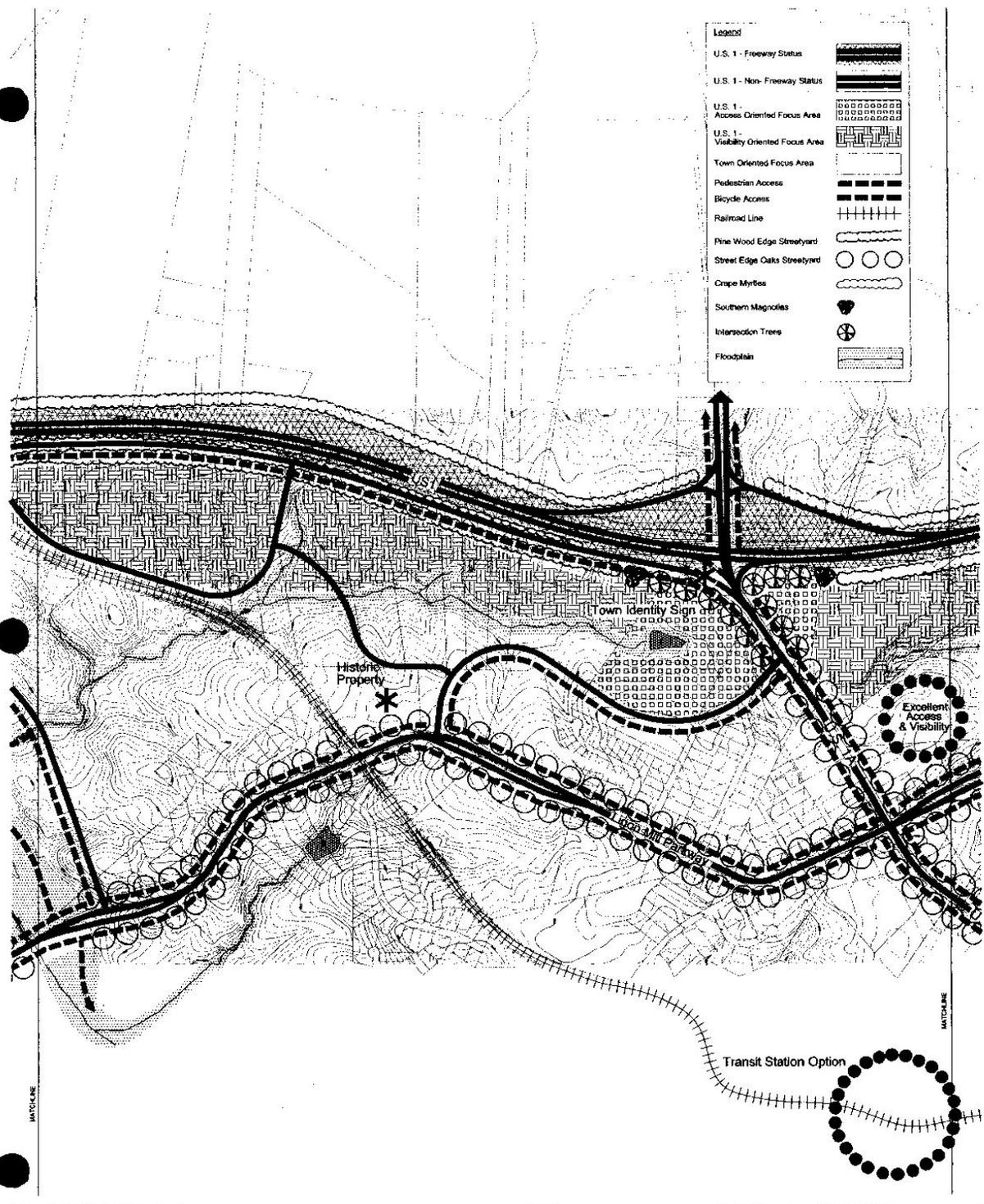



Mark Robinson & Associates
 LANDSCAPE ARCHITECTS
1000 W. Hargett Street, Suite 200, Raleigh, NC 27601

US 1 CORRIDOR PLAN
 ADOPTED NOVEMBER 18, 1999
 TOWN OF WAKE FOREST, NORTH CAROLINA



SHEET
1
 OF 5

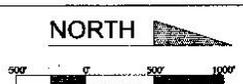


Legend

- U.S. 1 - Freeway Status
- U.S. 1 - Non-Freeway Status
- U.S. 1 - Access Oriented Focus Area
- U.S. 1 - Visibility Oriented Focus Area
- Town Oriented Focus Area
- Pedestrian Access
- Bicycle Access
- Railroad Line
- Pine Wood Edge Streetyard
- Steel Edge Oaks Streetyard
- Crape Myrtles
- Southern Magnolias
- Intersection Trees
- Floodplain

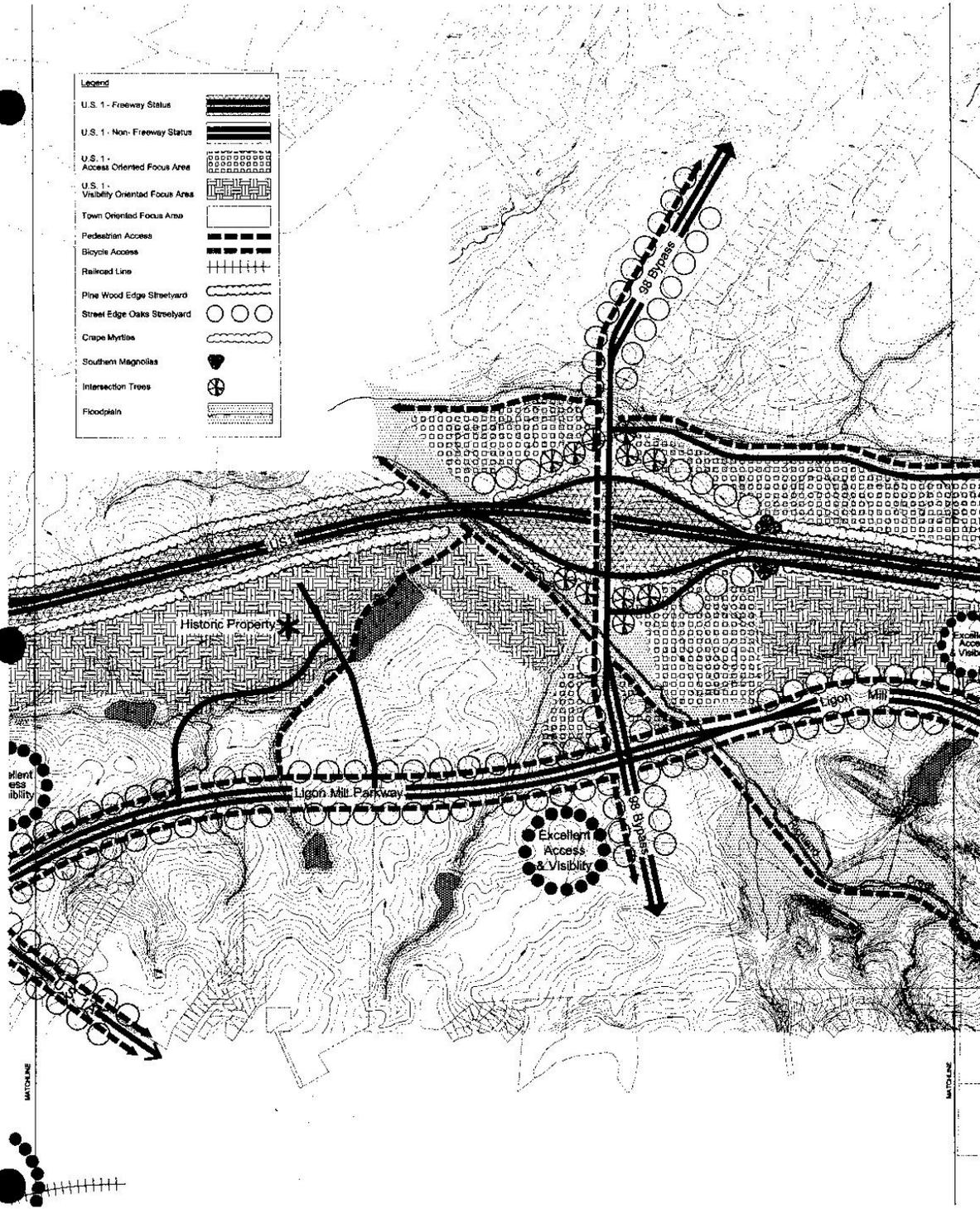

Mark Robinson & Associates
 LANDSCAPE ARCHITECTURE PLANNING
1000 W. HARRIS STREET, SUITE 100, WAKE FOREST, NC 27587

US 1 CORRIDOR PLAN
 ADOPTED NOVEMBER 16, 1999
TOWN OF WAKE FOREST, NORTH CAROLINA



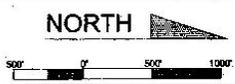
SHEET
2
OF 5

Legend	
U.S. 1 - Freeway Status	
U.S. 1 - Non-Freeway Status	
U.S. 1 - Access Oriented Focus Area	
U.S. 1 - Visibility Oriented Focus Area	
Town Oriented Focus Area	
Pedestrian Access	
Bicycle Access	
Railroad Line	
Pine Wood Edge Streetyard	
Street Edge Oaks Streetyard	
Crape Myrtles	
Southern Magnolias	
Intersection Trees	
Floodplain	

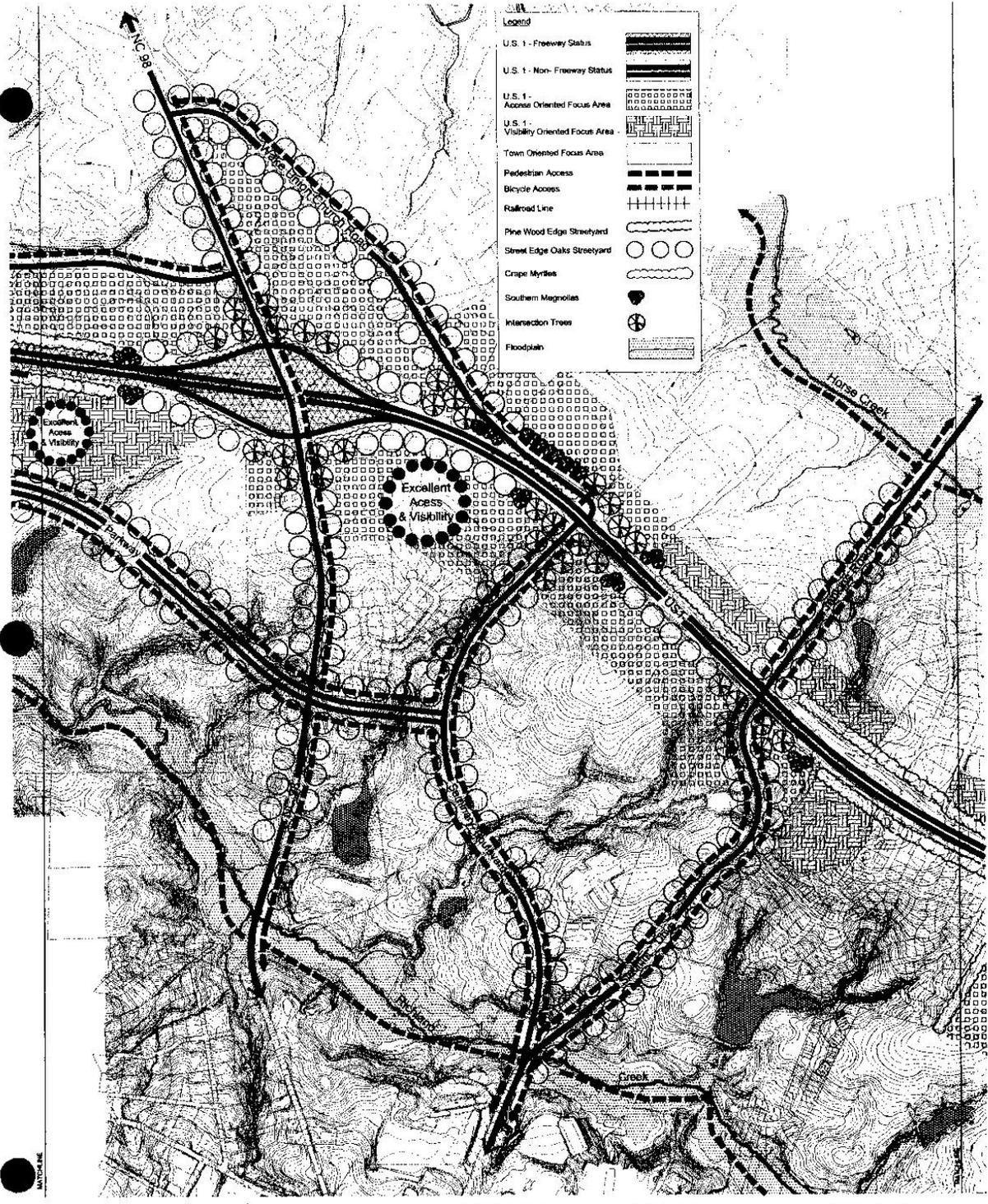



Mark Robinson & Associates
 ARCHITECTS AND PLANNERS
1000 W. Hargett Street, Suite 200, Raleigh, NC 27601
 Phone: 919.833.8881 Fax: 919.833.8882
 www.mrkra.com

US 1 CORRIDOR PLAN
 ADOPTED NOVEMBER 16, 1999
TOWN OF WAKE FOREST, NORTH CAROLINA

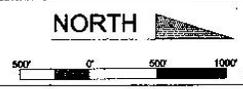


SHEET
3
OF 5

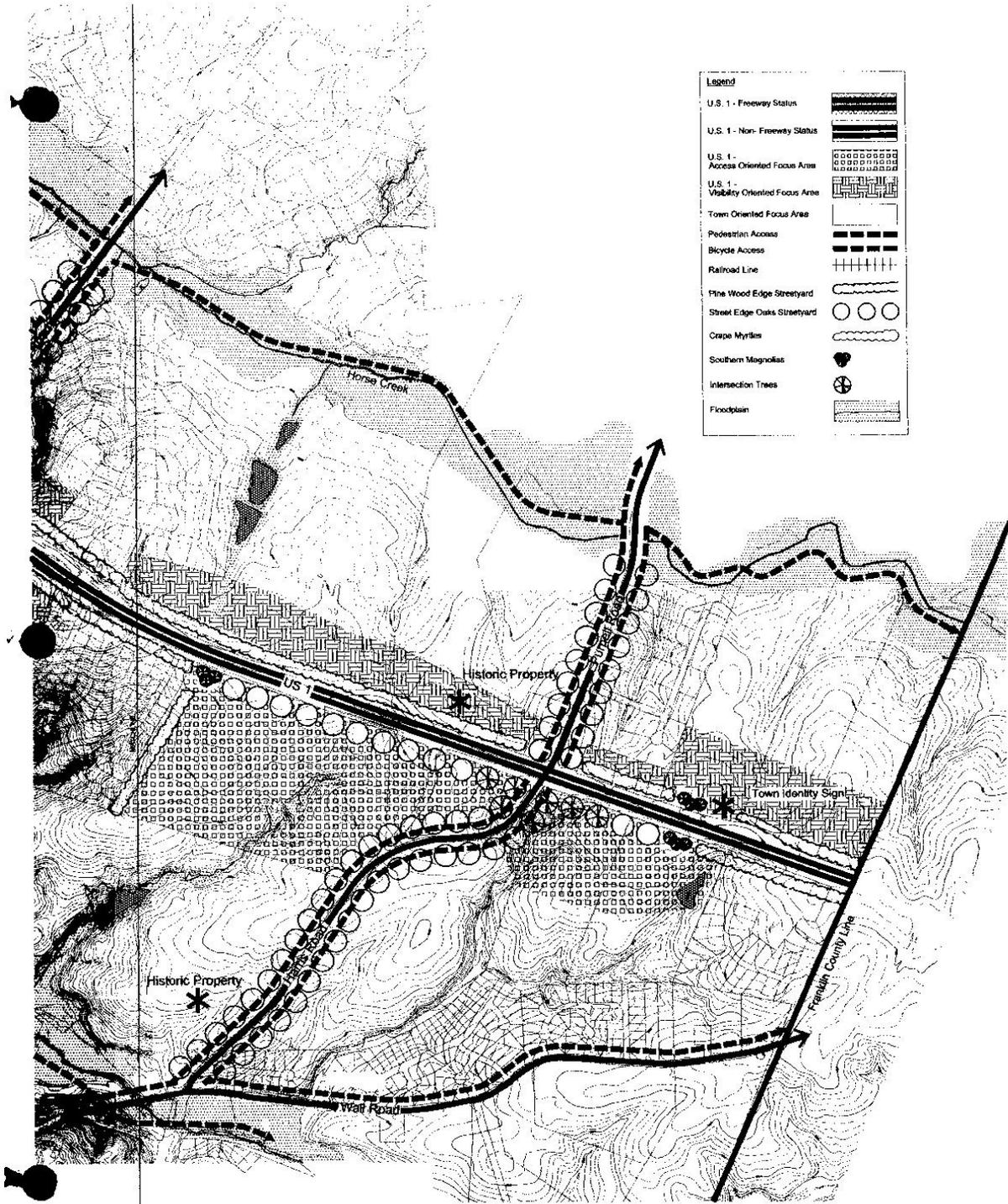



Mark Robinson & Associates, Inc.
 10000 Wake Forest Road, Suite 100
 Wake Forest, NC 27587
 Phone: 919.790.1000 Fax: 919.790.1001

US 1 CORRIDOR PLAN
 ADOPTED NOVEMBER 16, 1999
 TOWN OF WAKE FOREST, NORTH CAROLINA

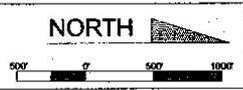


SHEET
4
 OF 5




Mark Robinson
 Associates
PLANNING ARCHITECTURE ENVIRONMENTAL

US 1 CORRIDOR PLAN
 ADOPTED NOVEMBER 18, 1999
 TOWN OF WAKE FOREST, NORTH CAROLINA



SHEET
5
 OF 5