

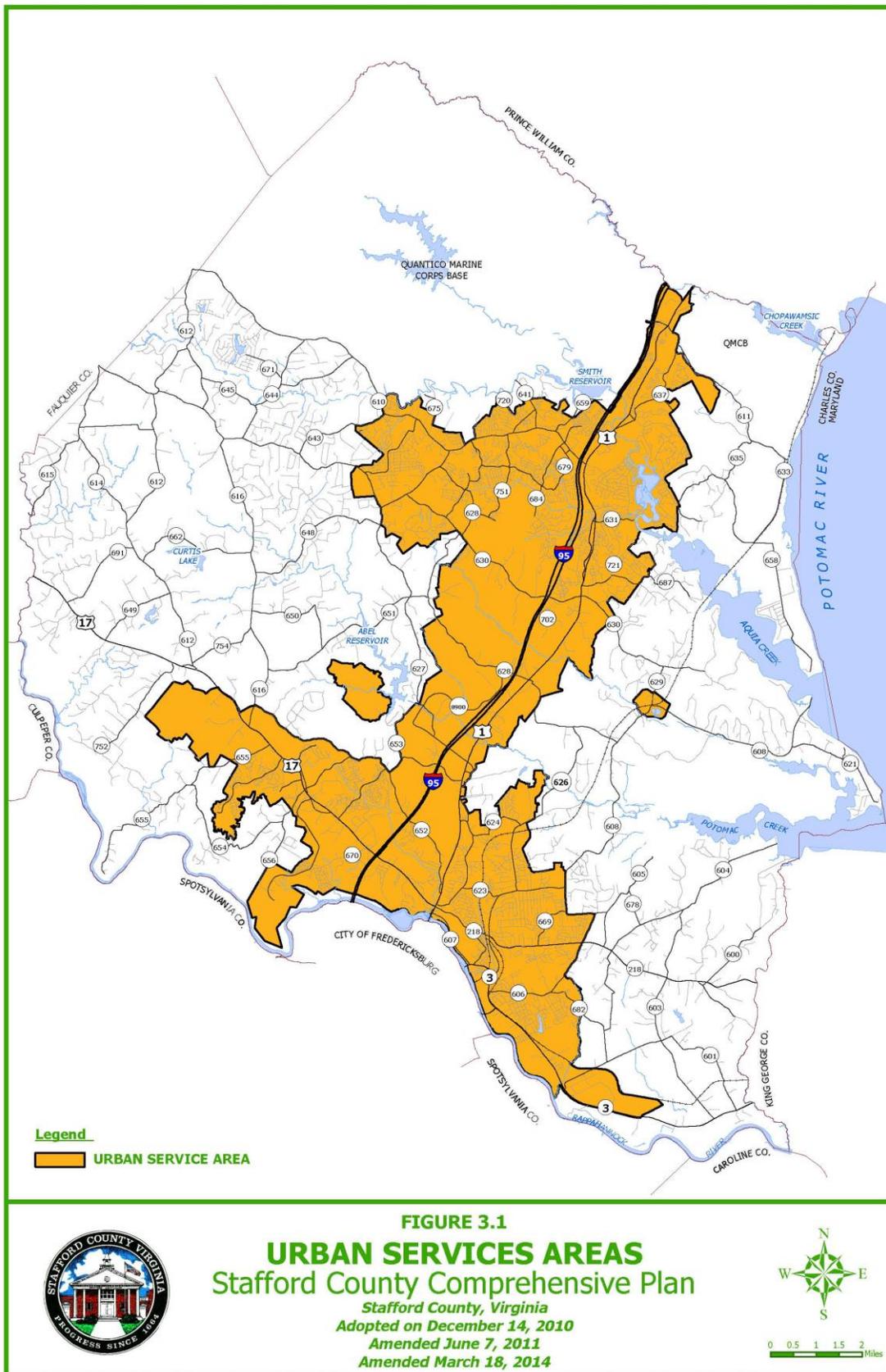
## 3.0 The Land Use Plan

### 3.1 Overview

The Land Use Plan for Stafford County is a key element of the Comprehensive Plan, guiding the physical form of the County by directing the location, type, and intensity of land uses. The Plan has been developed after taking into account factors such as existing development patterns and conditions, the potential for existing land use regulations to accommodate projected growth, and opportunities and constraints.

The key points of the Plan are:

- The Land Uses within the Urban Services Area (USA) have been generalized as Urban, Suburban, and Business and Industry.
- The USA boundary has been designated to promote infill development to access public water and sewer in the established suburban and industrial areas. The majority of future residential and commercial development is being recommended along the I-95 and U.S. Route 1 corridors.
- Establishes seven (7) Urban Development Areas located in the vicinity of primary road networks, transportation hubs, and along the rail corridor to maximize the use of public transportation.
- The USA boundary eliminates for the most part bifurcated parcels, which were partially in and partially out of the USA.
- Establishes four Redevelopment Areas.
- Business and Industrial land uses are encouraged around established and developing business areas.
- Lot sizes in agricultural and rural areas outside of the USA shall be at least three (3) acres in size.



## **3.2 Basis for the Plan**

The Land Use Plan has been developed on the premise that the development potential available under existing zoning is adequate to accommodate 20 years of projected population growth. Because existing residential zoned lands are adequate to meet projected population growth, the Plan recommends future land use designations follow existing zoning district development criteria and with the exception of the Urban Development Area and Business Land Use, does not recommend increasing land use intensity.

## **3.3 Key Features of the Plan**

### 3.3.1. GROWTH MANAGEMENT AND URBAN SERVICES AREA

The Plan recognizes the need to direct growth into the Urban Services Area and discourage growth in the agricultural areas. This is accomplished, in part, by establishing the location of public water and sewer facilities. The location of the Urban Services Area generally dictates what land areas may be served by public water and sewer lines.

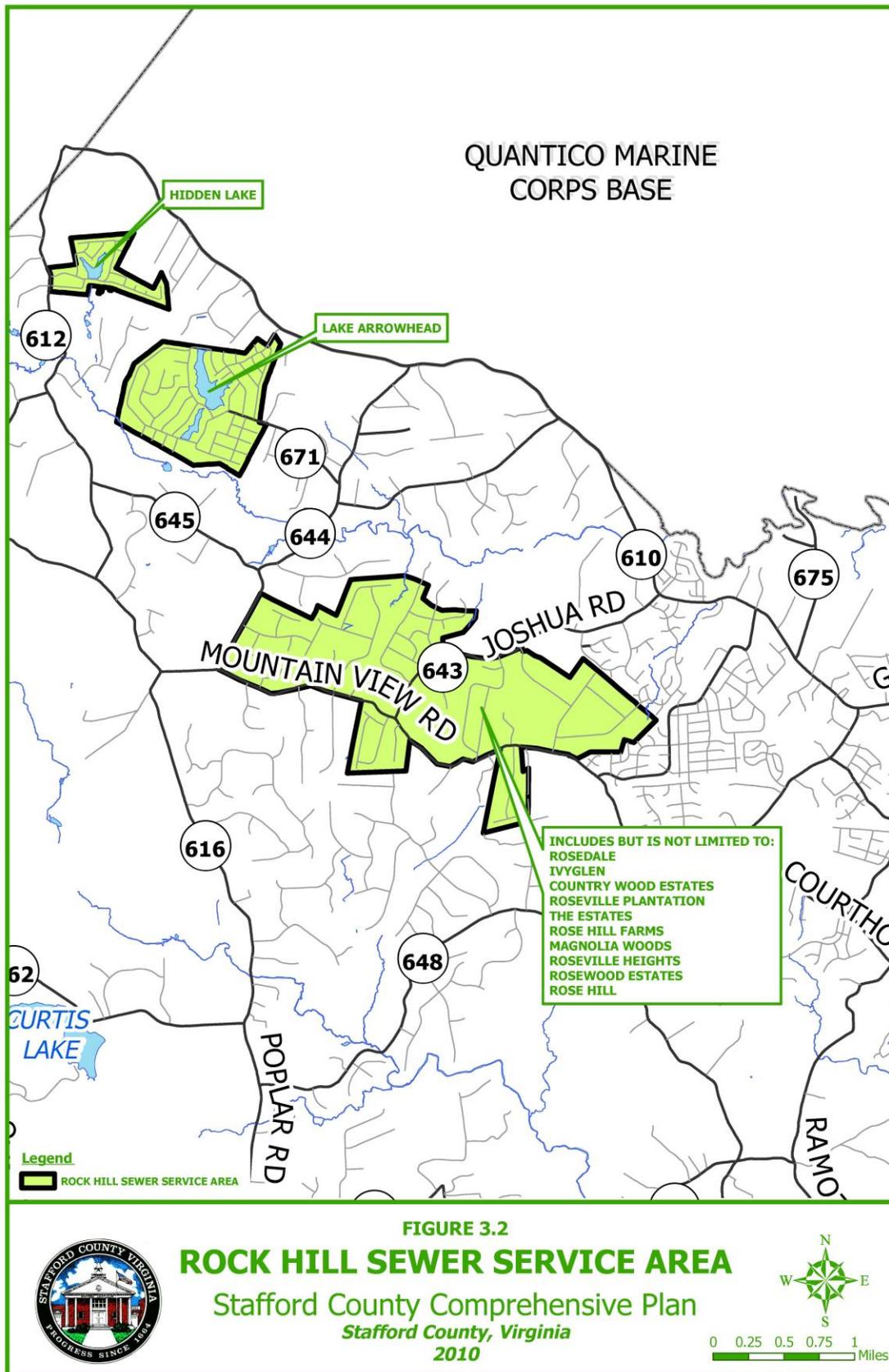
Within the Urban Services Area, newly constructed houses and buildings will be required to connect to the public water supply and the public sewer system.

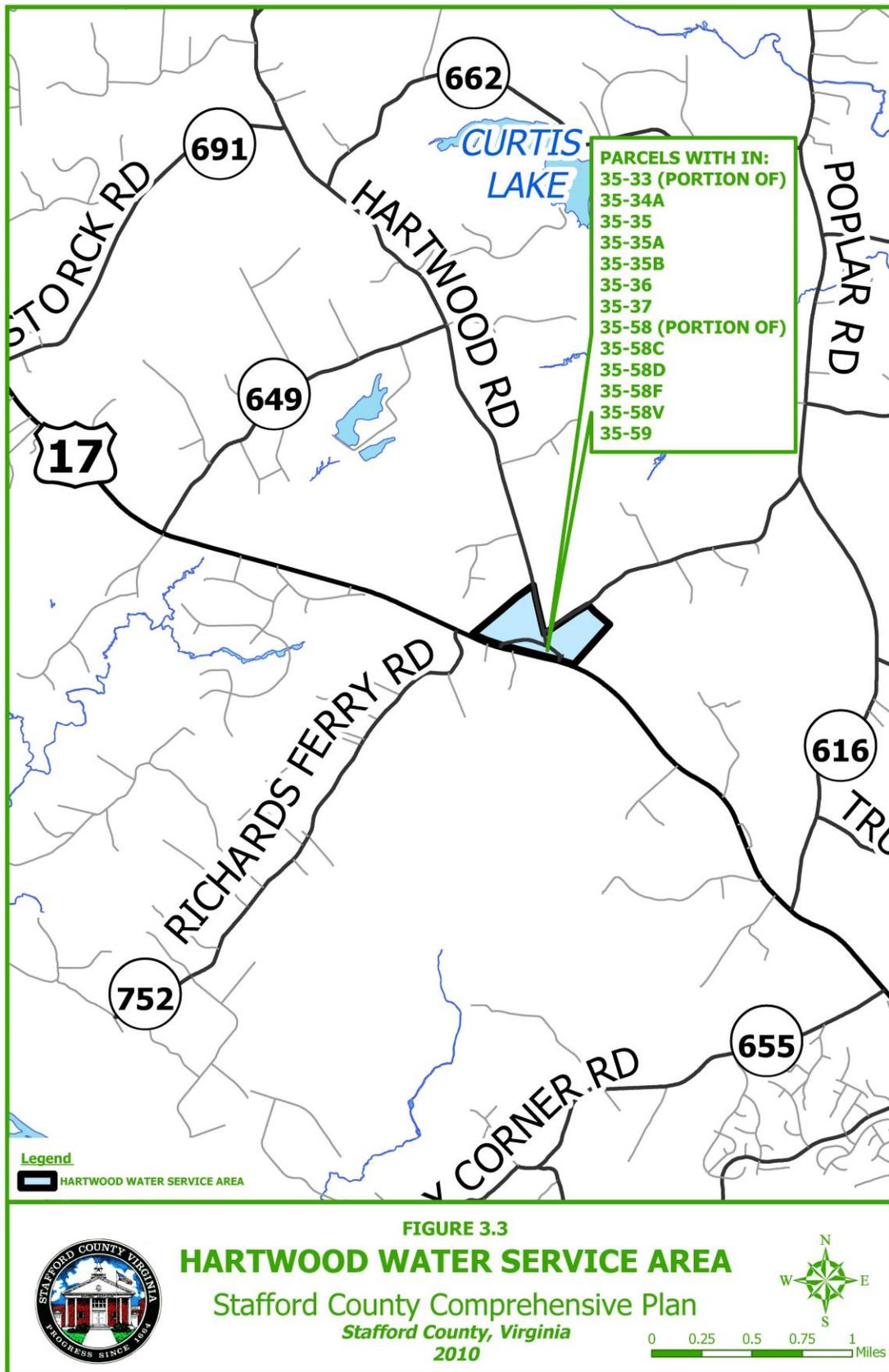
In several situations, existing or previously approved water and sewer lines may be located outside of the designated Urban Services Area. In these situations, the lines will be maintained in these locations, but new extensions and private connections to the lines will not be approved. Exceptions for private connections may be made when the property to be served abuts a street, alley, or right-of-way in which there is located an existing public sewer or water line, and the building drain (in the case of sewer) or the building (in the case of water) is located within 300 feet of the public sewer or water supply.

### LIMITED WATER AND SEWER UTILITY AREAS

Rock Hill Sewer Service Area – this area includes several rural residential communities in the northwest corner of the County. The area, identified in Figure 3.2, is primarily built out and is characteristic of older rural residential neighborhoods with 1 to 3 acre lots that utilize private wells and septic drainfields. Drainfield failures have occurred on several properties in this area. The purpose of this service area is to provide future sewer service to the existing residents and protect public health. The area includes, but is not limited to, the following subdivisions: Hidden Lake, Lake Arrowhead, Country Wood Estates, The Estates, Ivyglen, Rosedale, Roseville Plantation, Rose Hill Farm, Roseville Heights, and Rosewood Estates. The area is not intended for future higher intensity development.

Hartwood Water Service Area – this area is in the vicinity of the intersection of Warrenton Road and Hartwood Road, and includes Hartwood Elementary School and Hartwood Volunteer Fire Department. These facilities utilize well water. A future need is anticipated for water service upgrades in this area, specifically to Hartwood Elementary School. It is the intent of this area to be served by a future connection to the public waterline network. It is not the intent of this plan to promote higher intensity land uses in this service area. The geographic extent of this area is identified in Figure 3.3.





### 3.3.2. URBAN DEVELOPMENT AREAS

The Plan establishes Urban Development Areas in the County in accordance with a recently adopted state code provision that requires high growth localities, including Stafford, to designate Urban Development Areas that meet specified criteria. The exact location, number and development parameters for these areas are shown on the future Land Use Map (Figure 3.6) and are further described in Section 3.5 of this chapter.

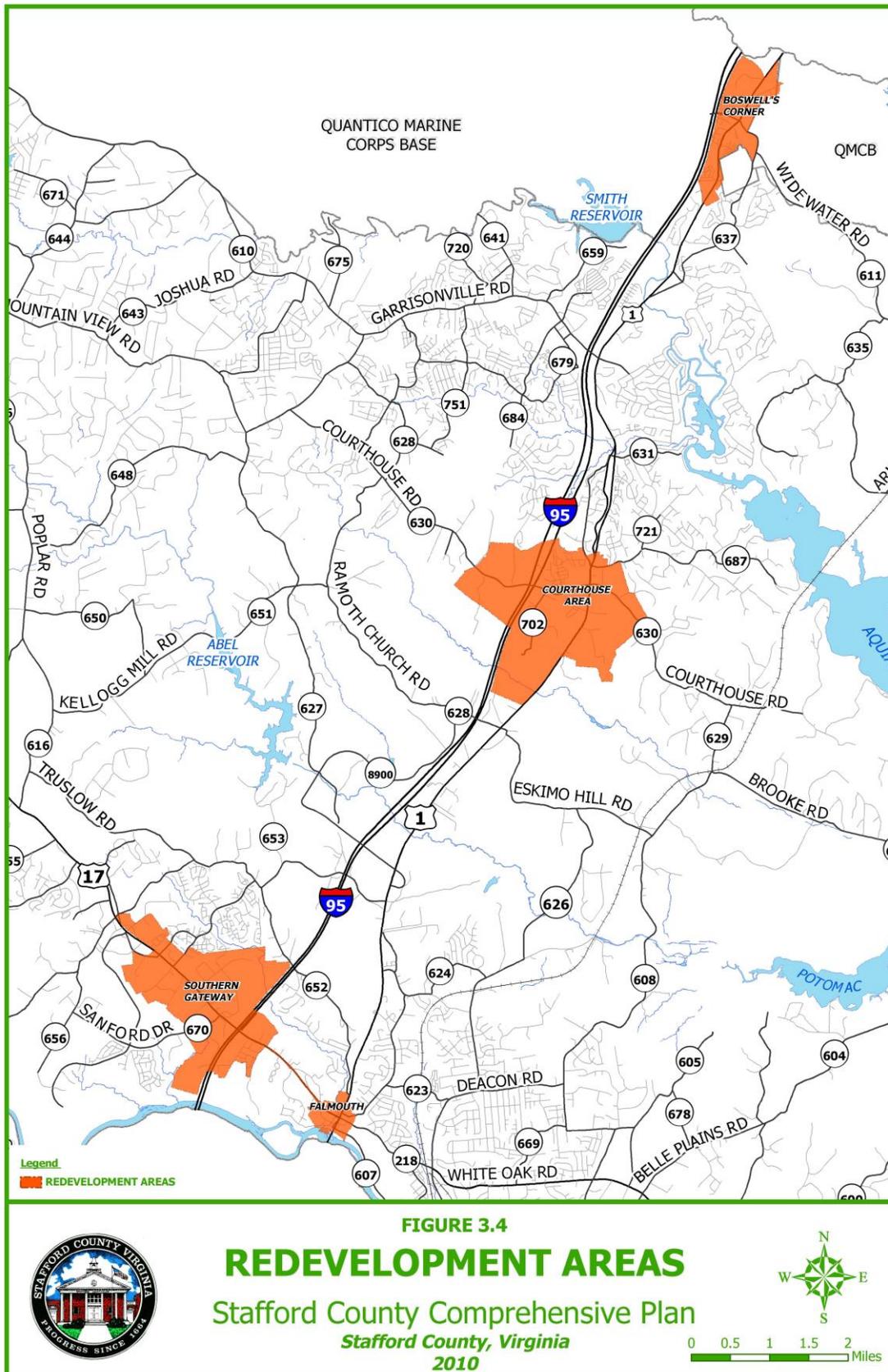
### 3.3.3 REDEVELOPMENT AREAS

The Plan identifies the locations of four Redevelopment Areas. These are areas that the County has identified in its 2006 Economic Development Strategic Plan as prime locations for redevelopment. These areas include Boswell's Corner, the Courthouse Area, Falmouth, and Southern Gateway, along Warrenton Road, west of Interstate 95.

Redevelopment efforts were initiated in the Fall of 2006. Public workshops have been conducted and plans were developed by a consultant retained by the County to conduct the work. These efforts have produced Redevelopment Area Master Plans for each location, providing detailed assessments and analysis of the areas and detailed action plans. These areas will be incorporated as elements of the Comprehensive Plan. These area plans, once adopted, will provide the basis for evaluating land use proposals. Summaries of these Plans are included in Chapter 3.5 of this document. Until such time, any land use proposals should be consistent with the Comprehensive Plan.



Stafford Courthouse Redevelopment Area  
Courtesy of Cunningham + Quill Architects



### 3.4 Military Facility Impacts

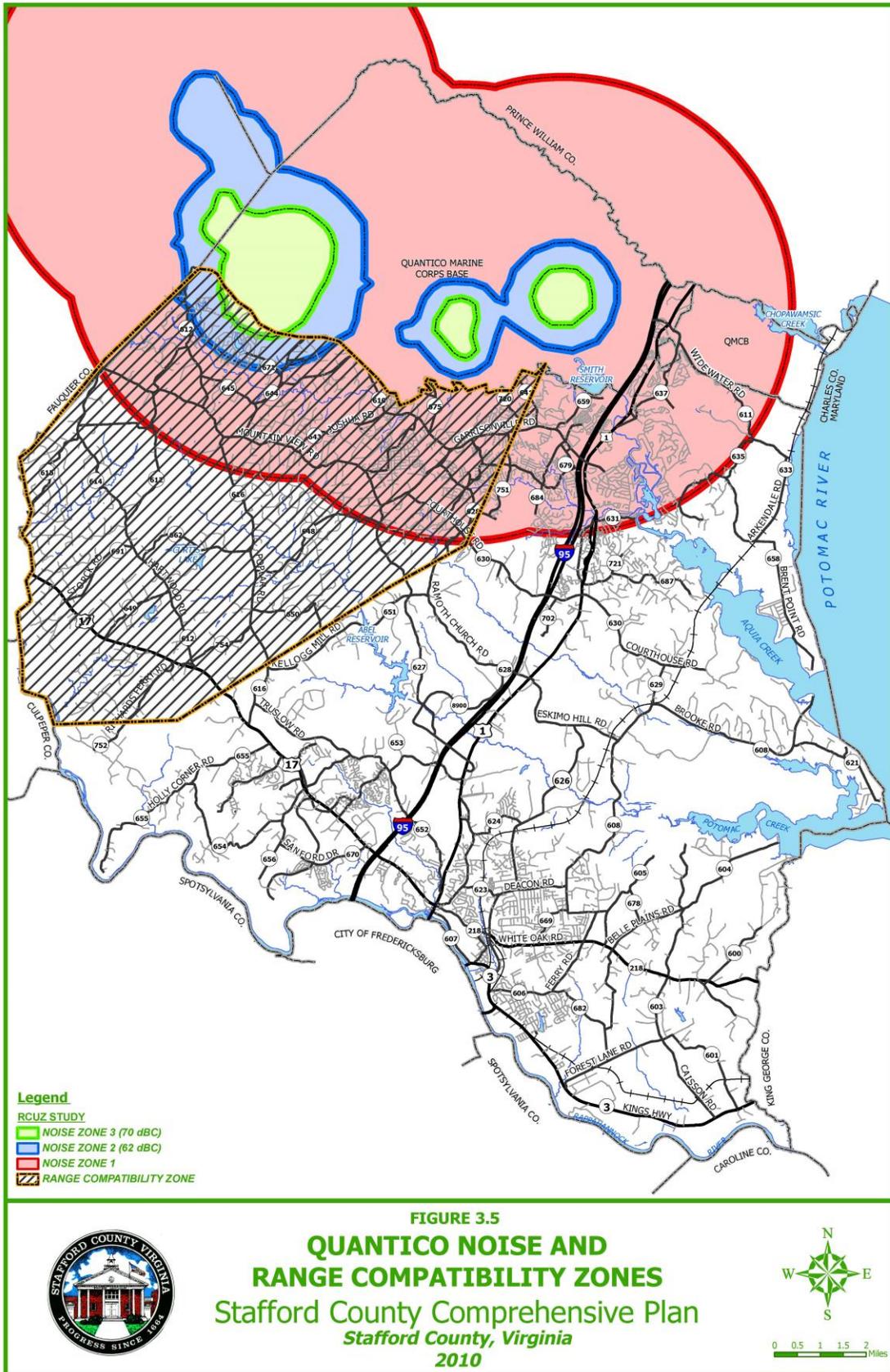
Quantico Marine Corps Base encompasses 33,000 acres (19%) of land area within the boundaries of Stafford County. This section of the Plan identifies areas in the County outside of the Base that may be impacted by military activities. Military activities on Quantico include realistic air and ground combat exercises and explosive ordnance demolition training. This training occurs on ranges located to the west of Interstate 95 near the Garrisonville Road corridor. Aircraft maneuvers that occur as part of this training extend off base into airspace over the Rock Hill and Hartwood Areas of the County. Noise impacts associated with both the ordnance demolition and aircraft extend well into the North Stafford, Hartwood, and Widewater areas of the County.

#### Range Compatibility Use Zone (RCUZ) Study

When the ranges were first established in the 1940's, the adjacent land was sparsely populated. Growth in this area has made the Garrisonville Road corridor the most heavily populated area in the County. Growth that has occurred around Quantico has the potential of compromising on-base operations. To protect the public health, safety, and welfare and safeguard mission capability of on-base activities, a Range Compatibility Use Zone (RCUZ) Study was developed. One of the objectives of the study is to encourage compatible land development near training range operations. The RCUZ Study identifies Range Safety Zones (RSZ's) and Noise Zones associated with the demolition training areas. In addition, the study provides land use compatibility tables for the RSZ's and Noise Zones. Figure 3.5 identifies the location of these areas in the County. Table 3.1 identifies suggested land use compatibility in noise zones and Table 3.2 identifies land use compatibility in RSZ's. These tables were modified for format and to reflect the areas applicable to land outside of the Base in Stafford County.

Range Compatibility Zones (RCZ) correspond with restricted airspace areas where aircraft maneuvers occur. RCZ III encompasses the northwestern part of the County outside of the Base.

Noise Zones are classified into 3 categories; Noise Zone 1 is an area of minimal impact where noise levels are less than 62 dB. The moderate and severe impact zones 2 and 3 include primarily rural residential subdivisions, including portions of Hidden Lake, Lake Arrowhead, Green Acres and Equestrian Estates. The area within a 5 mile radius of the munitions ranges are identified as they may experience high levels of peak event (short duration) noise and vibration under certain conditions.



**Table 3.1 Suggested Land Use Compatibility in Noise Zones (Source: Range Compatibility Use Zone Study for Marine Corps Base Quantico)**

LAND USE	Noise Zone 1 (5-mile radius)	Noise Zone 2		Noise Zone 3
	Heavy Weapons < 62 dB C	Heavy Weapons 62-66 dB C	Heavy Weapons 67-70 dB C	Heavy Weapons < 62 dB C
	Aircraft/Small Arms < 65 dB A	Aircraft/Small Arms 65-69 dB A	Aircraft/Small Arms 70-74 dB A	Aircraft/Small Arms < 65 dB A
Water Recreational Activities, Riding Stables, Golf Courses and Athletic Fields, Cemeteries, Outdoor Spectator Sports.		1	1	1
Wildlife Refuges, Group Camps, Hunting and Fishing Clubs, Parks.		1	1	
Educational Services (Schools) and Hospitals.		1	1	
Residential—Single Family, Multiple Family, Residential Hotels, Motels, Retirement Homes, Intermediate Care Facilities, and Nursing Homes.		1	1	
Mobile Homes.				
Auditoriums, Concert Halls, Indoor Areas, Churches.		1	1	
Office Buildings—Business, Education, Professional and Personal Services.		1	1	
Commercial/Retail, Shopping Centers, Restaurants, and Movie Theaters.			1	1
Commercial/Wholesale, Industrial, Manufacturing			1	1
Agriculture (except residences and livestock), Extractive Industry, Forestry, Utilities and Public Rights-of-Way		1	1	1
Outdoor Amphitheaters.	1			

	Compatible
	Compatible with Conditions
	Incompatible

**Notes:**

1. This table is for general illustrative purposes only. Please refer to *OPNAVINST 11010.36B*, 2002, Table 2 for detailed footnotes, specific situations, and actual use in analysis of potential compatibility in the Appendix.

Source: Adapted from U.S. Department of the Navy *OPNAVINST 11010.36B*, 2002.

**Table 3.2 Suggested Land Use Compatibility in Air-to-Ground Range Safety Zones (Source: Range Compatibility Use Zone Study for Marine Corps Base Quantico)**

Land Use	Range Safety Zones		
	A*	B*	C
Residential—Single Family, Duplex, Mobile Homes			1
Residential — Multiple Family			1
Transient Lodging			1
School Classrooms, Libraries, Churches			1
Hospitals, Nursing Homes			1
Auditoriums, Concert Halls			1
Office Buildings — Personal Business, Professional			
Commercial, Retail, Manufacturing, Utilities			
Playgrounds, Neighborhood Parks			1
Golf Courses, Riding Stables, Water Recreation		1	
Outdoor Spectator Sports			1
Industrial, Warehouse, Supplies			
Marine Craft Transportation		1	
Agriculture, Mining, Fishing		1	
Recreational, Wilderness Area		1	1

**\* - Zones A and B do not apply to land outside the limits of the Base.**

	Compatible
	Compatible with Conditions
	Incompatible

**Notes:**

1. This table is for general illustrative purposes only. Please refer to *OPNAVINST 3550.1*, 1998, Table 1, for detailed footnotes, specific situations, and actual use in analysis of potential compatibility included in the Appendix.

Source: Adapted from U.S. Department of the Navy *OPNAVINST 3550.1*. 1998.