

## II. Preliminary Alternates

### A. Introduction

Each of the Master Plan concepts was further evaluated by the Maryland Transportation Authority during the initial stage of the Section 200 project planning study. In addition to the two mainline preliminary build alternates developed during this planning study, interchange options were developed for the four interchanges in the study area for each build alternate. The preliminary alternates and interchange options outlined below were presented to the public at focus group meetings held on April 5, 2006 and May 24, 2006 and a public workshop held on June 22, 2006.

### B. No-Build Alternate

#### 1. Mainline

The No Build alternate maintains the I-95 mainline configuration as it is today. Under this alternate, I-95 in each direction would maintain:

- Four GPLs from north of MD 43 to MD 24,
- Three GPLs from MD 24 to the project limits north of MD 22.

I-95 from New Forge Road to MD 24



I-95 from MD 24 to MD 22



Figure 1 – No-Build Alternate - Typical Roadway Section

## ***2. Interchanges***

Under the No-Build option the existing MD 152, MD 24, MD 543 and MD 22 interchanges will remain the same. Routine maintenance and safety upgrades will be done as needed. The following list details the existing configuration of each interchange:

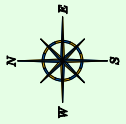
Figure 2: I-95/MD 152 Interchange: Diamond

Figure 3: I-95/MD 24 Interchange: Partial Cloverleaf – Triple Loop

Figure 4: I-95/MD 543 Interchange: Diamond

Figure 5: I-95/MD 22 Interchange: Partial Cloverleaf – Double Loop

Necessary traffic and safety improvements to the MD 24 interchange were identified prior to the Section 200 project. These improvements were broken into two phases, with phase 1 being constructed prior to Section 200. The phase 1 improvements were designed to minimize improvements that would be lost from the Section 200 improvements, minimize delay to motorists along I-95 and provide cost effective interim improvements that could be transitioned to the Section 200 improvements. The scheduled completion of the phase 1 improvements is 2010. The phase 1 improvements will temporarily address the following issues: back-ups that occur along I-95 northbound with traffic exiting onto MD 24, the heavy congestion at the at-grade MD 24 intersection with MD 924/Tollgate Road, and the difficult weave movement from I-95/MD 24 ramps to Tollgate Road.



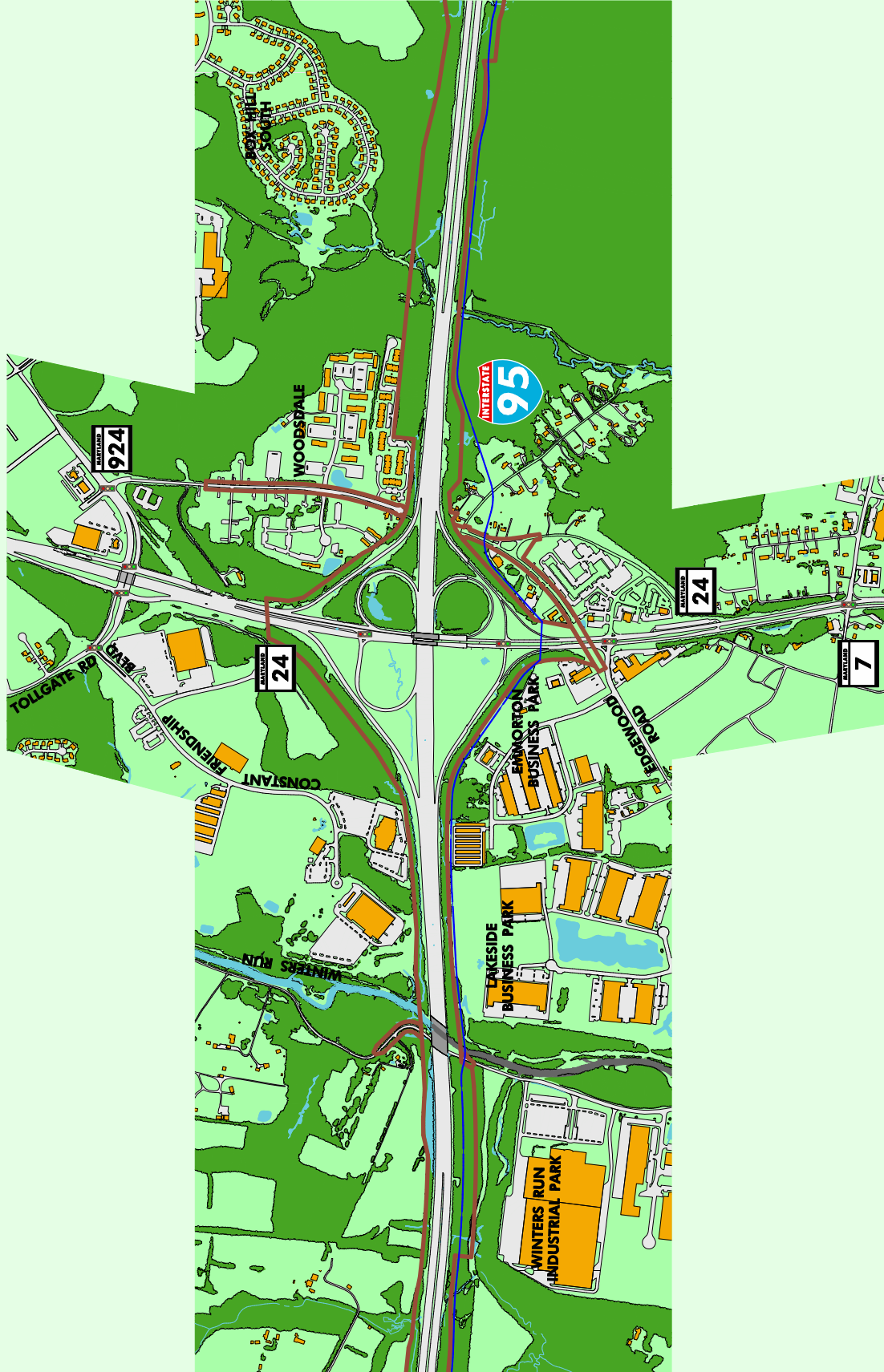
- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 106-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



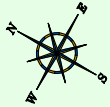
**FIGURE 2 – GENERAL PURPOSE LANE – I-95 AT MD 152 INTERCHANGE NO-BUILD: DIAMOND**



- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 106-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



**FIGURE 3 – GENERAL PURPOSE LANE – I-95 AT MD 24 INTERCHANGE  
NO-BUILD: PARTIAL CLOVERLEAF – TRIPLE LOOP**

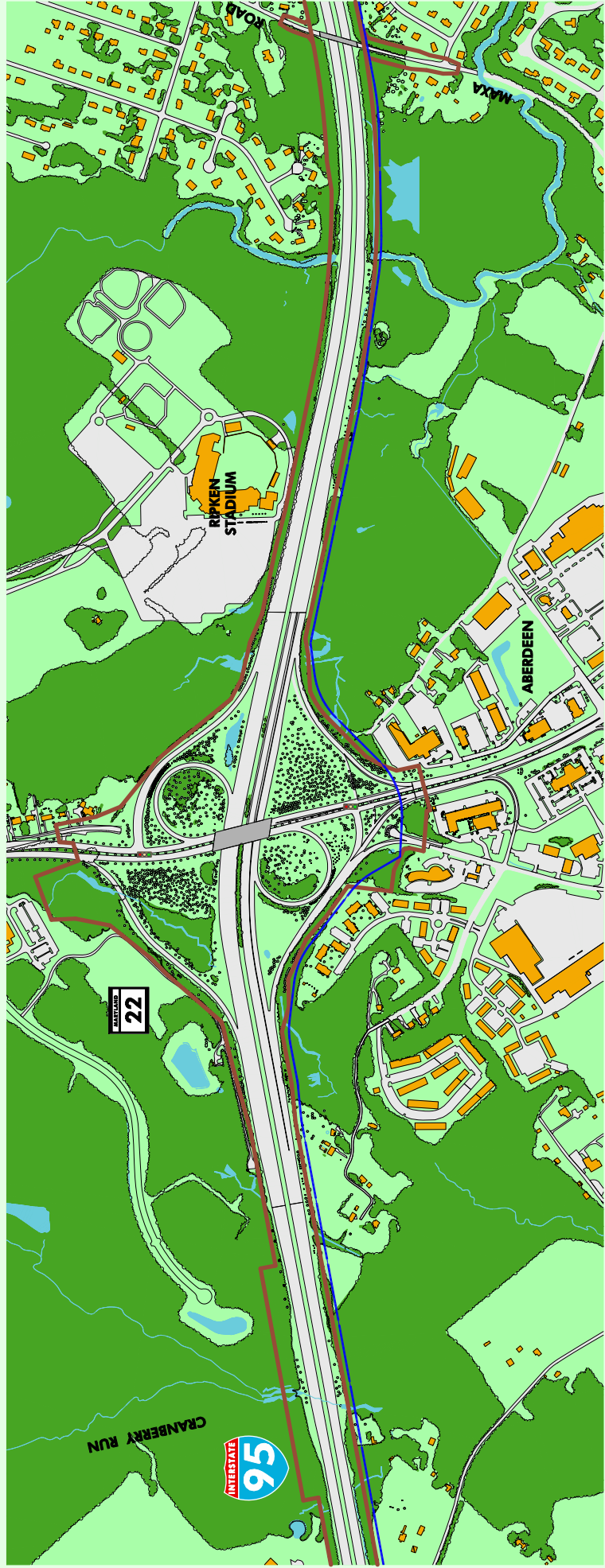


- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 106-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



**FIGURE 4 – GENERAL PURPOSE LANE – I-95 AT MD 543 INTERCHANGE NO-BUILD: DIAMOND**

- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 106-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



**FIGURE 5 – GENERAL PURPOSE LANE – I-95 AT MD 22 INTERCHANGE  
NO-BUILD: PARTIAL CLOVERLEAF – DOUBLE LOOP**

## C. General Purpose Lanes Alternate

### 1. Mainline

Additional General Purpose Lanes (GPLs) would be added to I-95 to accommodate the projected increase in traffic. Under this alternate, I-95 in each direction would have:

- Six GPLs from north of MD 43 to MD 152,
- Five GPLs between MD 152 and MD 543, and
- Four GPLs from MD 543 to the project limits north of MD 22.

I-95 from New Forge Road to MD 152



I-95 from MD 152 to MD 543



I-95 from MD 543 to MD 22



Figure 6 – Preliminary General Purpose Lanes Alternate - Typical Roadway Section

### 2. General Purpose Lane Interchange Options

#### a. I-95/MD 152 Interchange

Figure 7 - Option 1: Diamond

Figure 8 - Option 2: Tight Diamond

Figure 9 - Option 3: Single Point Urban Diamond

Figure 10 - Option 4: Partial Cloverleaf – Single Loop

Figure 11 - Option 5: Partial Cloverleaf – Double Loop

#### b. I-95/MD 24 Interchange

Figure 12 - Option 1: Modifications to structure and ramps

c. I-95/MD 543 Interchange

Figure 13 - Option 1: Diamond

Figure 14 - Option 2: Tight Diamond

Figure 15 - Option 3: Single Point Urban Diamond

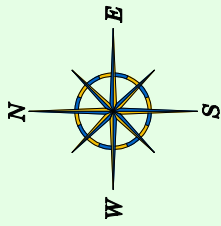
Figure 16 - Option 4: Partial Cloverleaf – Single Loop







Figure 17 - Option 5: Partial Cloverleaf – Triple Loop with  
CD Roads

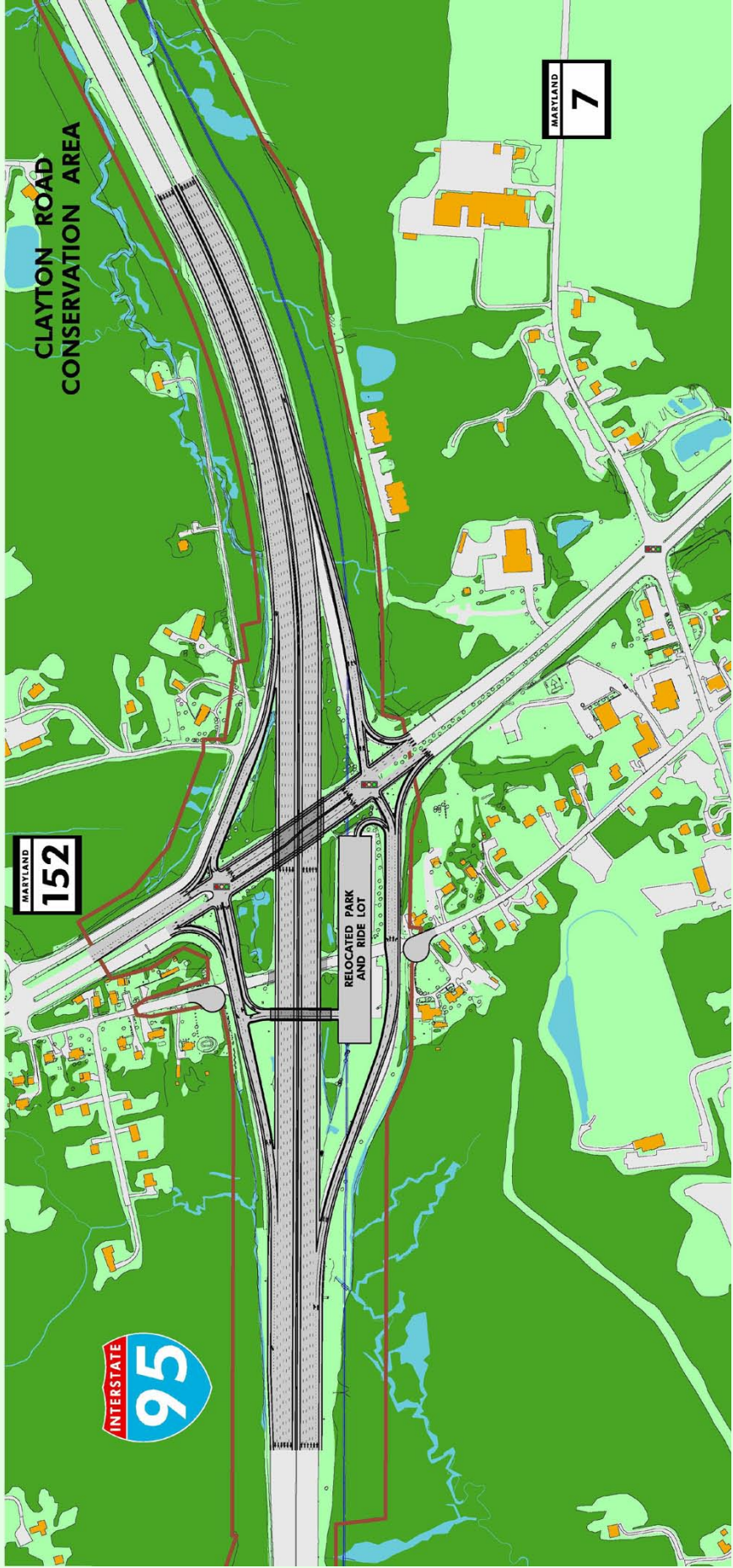
d. I-95/MD 22 Interchange

Figure 18 - Option 1: Partial Cloverleaf – Double Loop with  
Modifications to CD roads

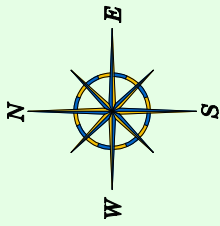










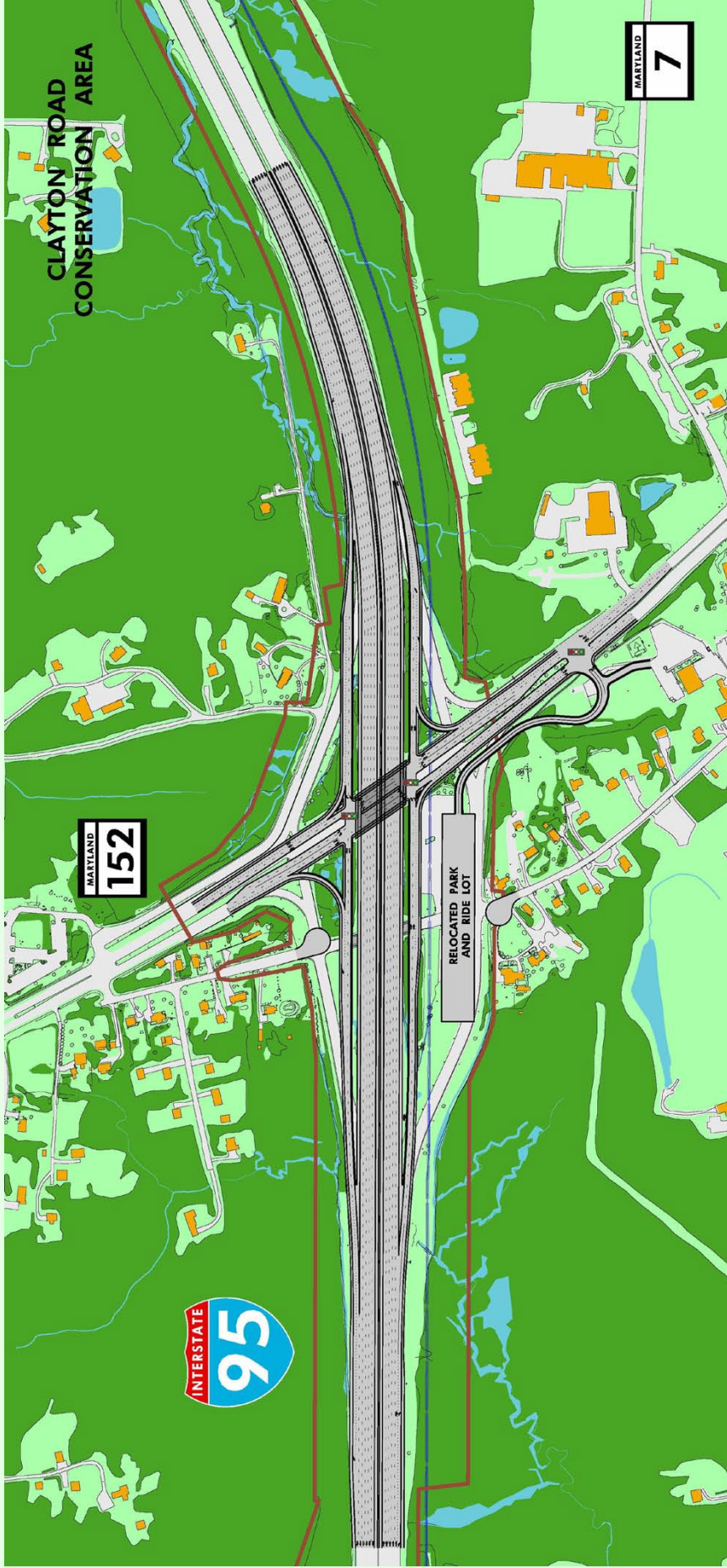
-  GENERAL PURPOSE LANES
-  PROPOSED BRIDGE / OVERPASS
-  EXISTING 108-INCH WATER MAIN
-  TRAFFIC FLOW
-  TRAFFIC SIGNALS
-  APPROXIMATE RIGHT-OF-WAY LINE



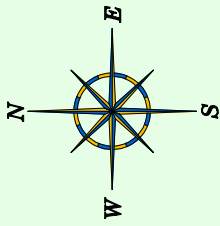
**FIGURE 7 - GENERAL PURPOSE LANE - I-95 AT MD 152 INTERCHANGE  
OPTION 1: DIAMOND**









-  GENERAL PURPOSE LANES
-  PROPOSED BRIDGE / OVERPASS
-  EXISTING 108-INCH WATER MAIN
-  TRAFFIC FLOW
-  TRAFFIC SIGNALS
-  APPROXIMATE RIGHT-OF-WAY LINE



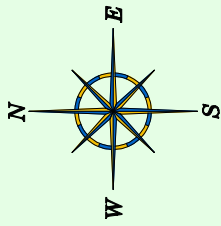
**FIGURE 8 - GENERAL PURPOSE LANE - I-95 AT MD 152 INTERCHANGE  
OPTION 2: TIGHT DIAMOND**









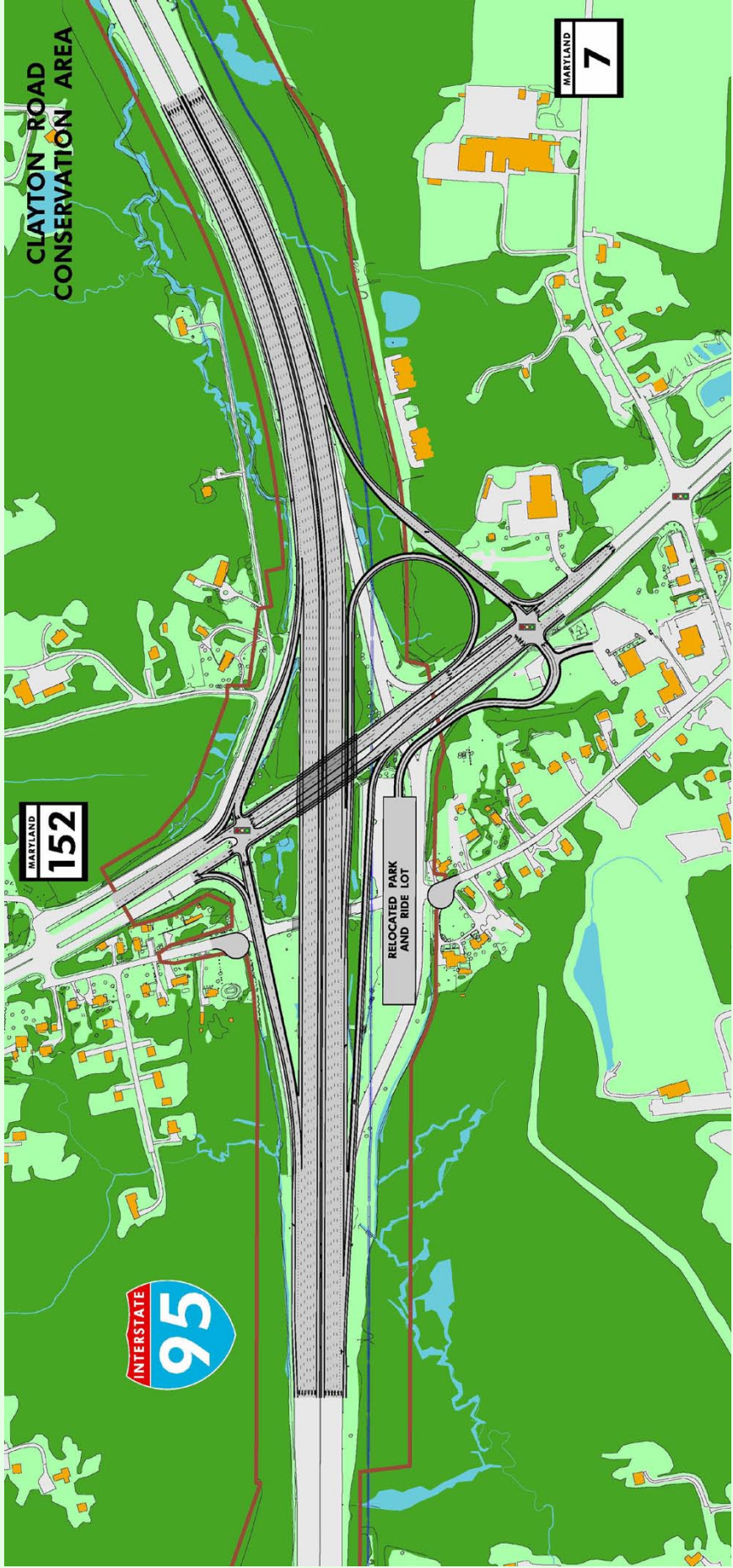
-  GENERAL PURPOSE LANES
-  PROPOSED BRIDGE / OVERPASS
-  EXISTING 108-INCH WATER MAIN
-  TRAFFIC FLOW
-  TRAFFIC SIGNALS
-  APPROXIMATE RIGHT-OF-WAY LINE



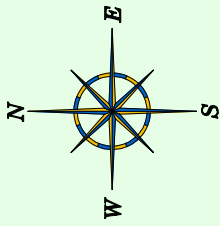
**FIGURE 9 - GENERAL PURPOSE LANE - I-95 AT MD 152 INTERCHANGE  
OPTION 3: SINGLE POINT URBAN DIAMOND**









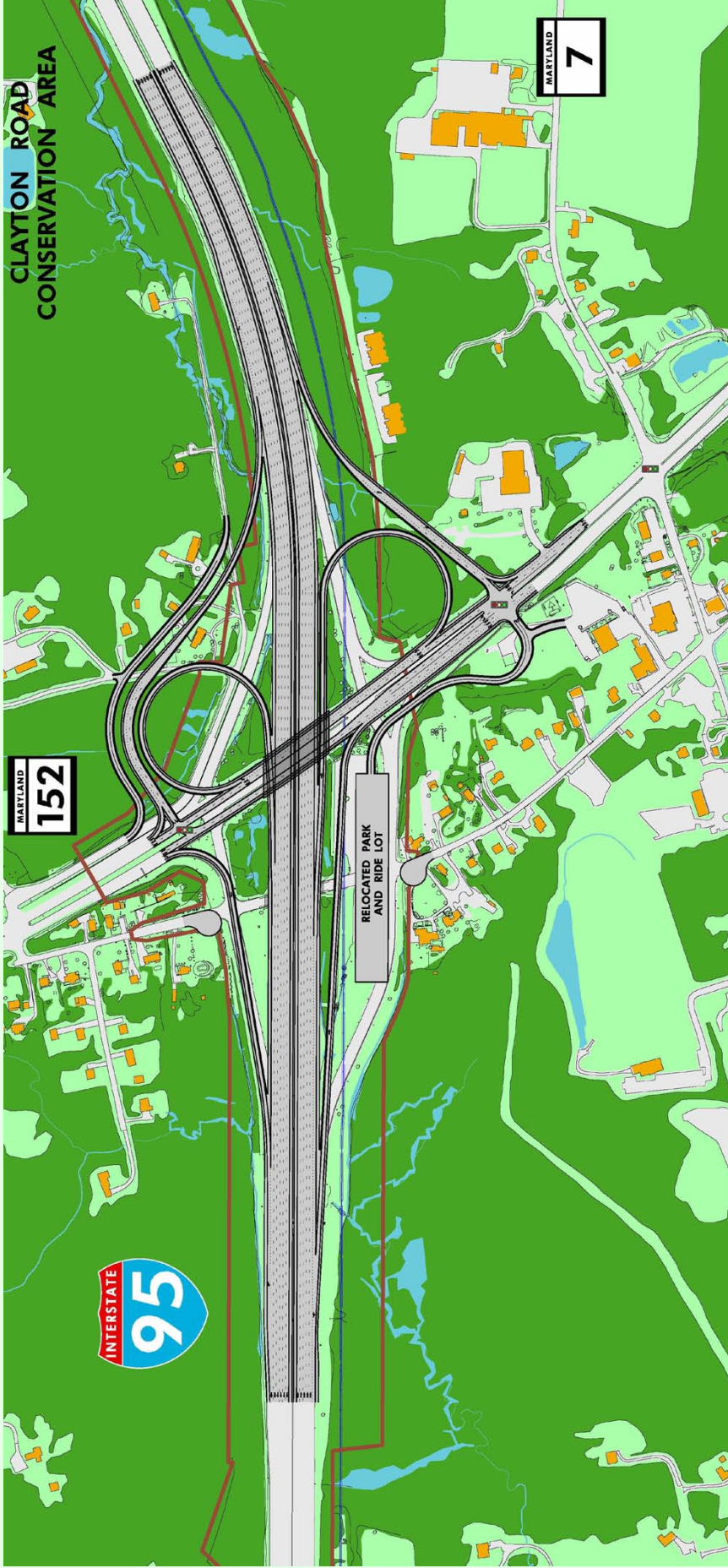
-  GENERAL PURPOSE LANES
-  PROPOSED BRIDGE / OVERPASS
-  EXISTING 108-INCH WATER MAIN
-  TRAFFIC FLOW
-  TRAFFIC SIGNALS
-  APPROXIMATE RIGHT-OF-WAY LINE



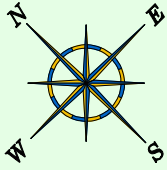
**FIGURE 10 - GENERAL PURPOSE LANE - I-95 AT MD 152 INTERCHANGE  
OPTION 4: PARTIAL CLOVERLEAF - SINGLE LOOP**



-  GENERAL PURPOSE LANES
-  PROPOSED BRIDGE / OVERPASS
-  EXISTING 108-INCH WATER MAIN
-  TRAFFIC FLOW
-  TRAFFIC SIGNALS
-  APPROXIMATE RIGHT-OF-WAY LINE



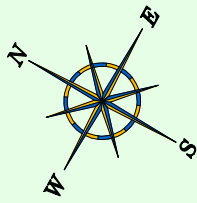
**FIGURE 11 - GENERAL PURPOSE LANE - I-95 AT MD 152 INTERCHANGE  
OPTION 5: PARTIAL CLOVERLEAF - DOUBLE LOOP**



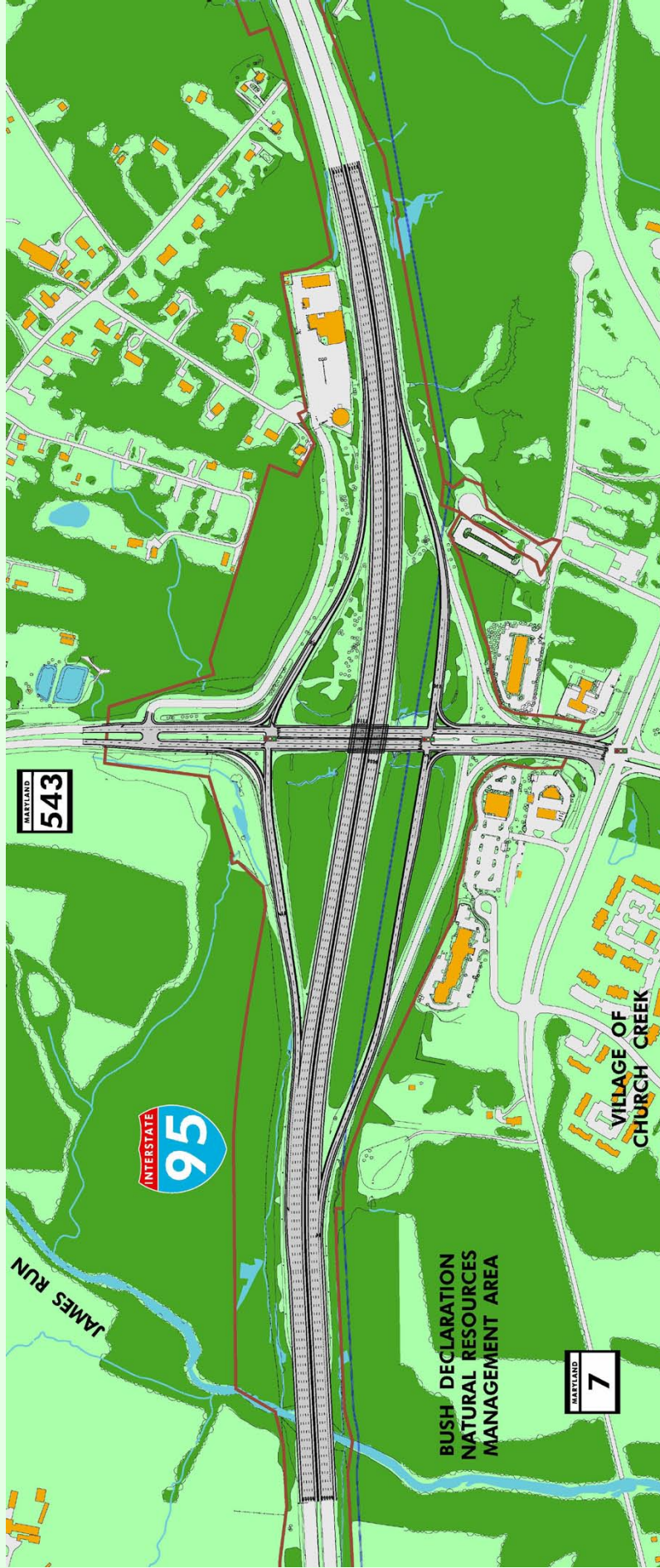
- GENERAL PURPOSE LANES
- PHASE 1 MD 24 / MD 924 IMPROVEMENTS
- PHASE 2 MD 24 / MD 924 IMPROVEMENTS
- EXISTING 108-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



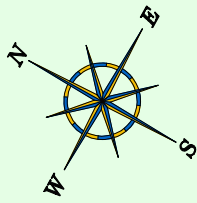
**FIGURE 12 - GENERAL PURPOSE LANE - I-95 AT MD 24 INTERCHANGE  
OPTION 1: MODIFICATIONS TO STRUCTURE AND RAMPS**



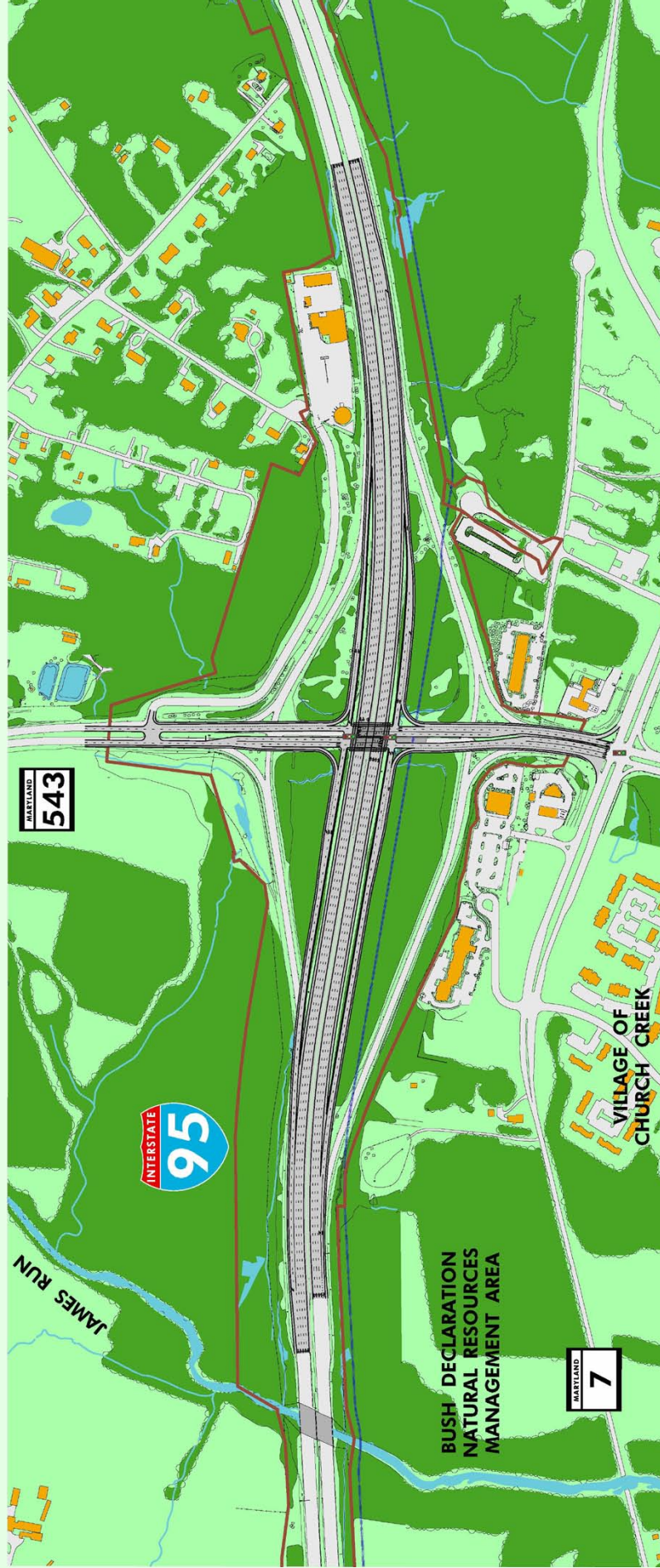
- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 108-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



**FIGURE 13 - GENERAL PURPOSE LANE - I-95 AT MD 543 INTERCHANGE  
OPTION 1: DIAMOND**



- GENERAL PURPOSE LANES
- PROPOSED BRIDGE / OVERPASS
- EXISTING 108-INCH WATER MAIN
- TRAFFIC FLOW
- TRAFFIC SIGNALS
- APPROXIMATE RIGHT-OF-WAY LINE



**FIGURE 14 - GENERAL PURPOSE LANE - I-95 AT MD 543 INTERCHANGE  
OPTION 2: TIGHT DIAMOND**