



COMMONWEALTH of VIRGINIA
Office of the
SECRETARY of TRANSPORTATION

Transform66: Inside the Beltway

Nick Donohue
Deputy Secretary of Transportation
December 8, 2015



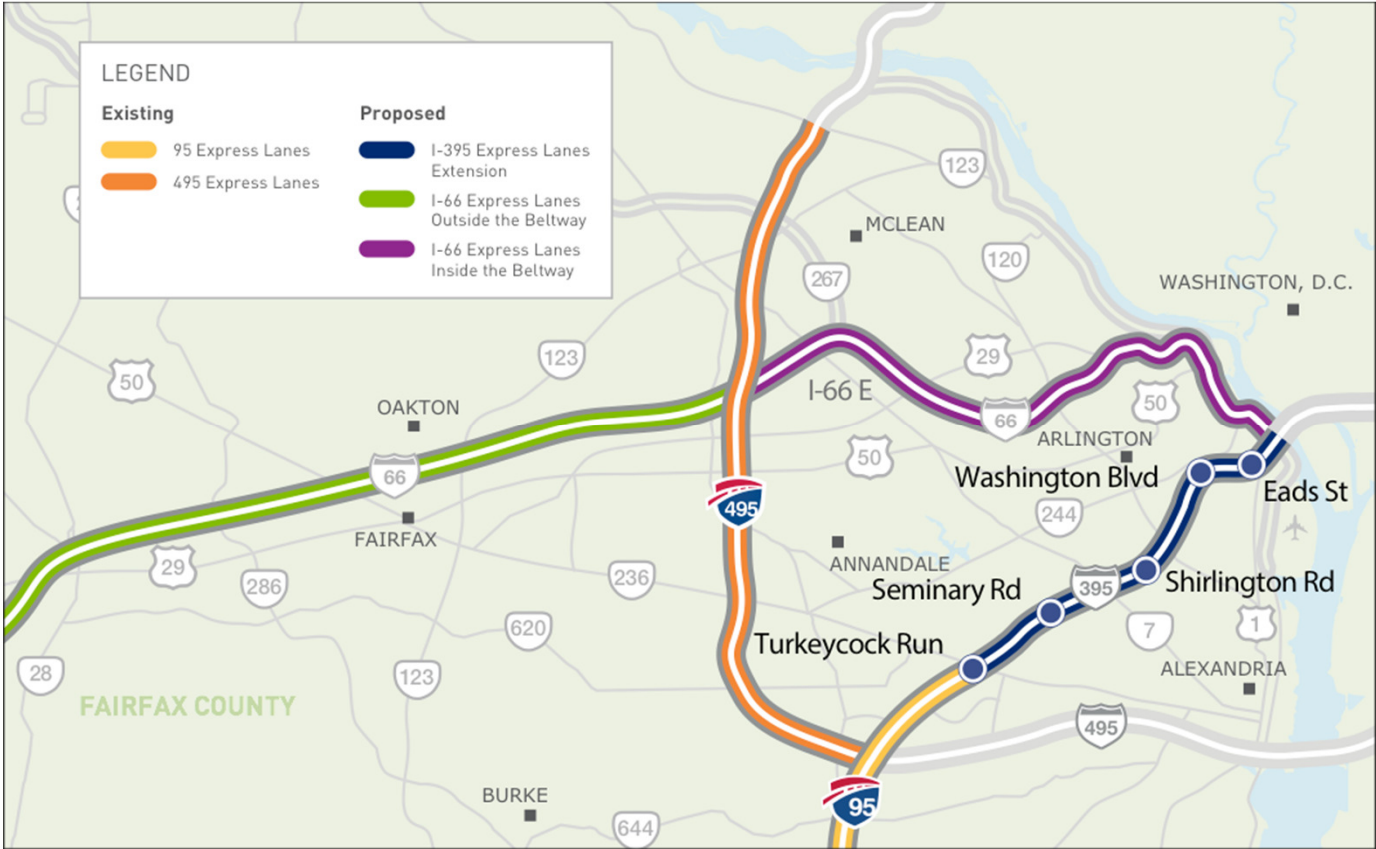
TRANSFORM 66

Outside the Beltway
MULTIMODAL SOLUTIONS - 495 to HAYMARKET

Inside the Beltway
INVESTING IN MULTIMODAL SOLUTIONS



Transform66: Growth of a Regional Express Lanes Network [update graphic]



History of I-66 Inside the Beltway

- **1959: I-66 included on National Interstate map**
- **1967: Construction is delayed while Metro is planned for the median of the highway**
- **1970: Lawsuit is filed to block construction of I-66, case is dismissed by district court**
- **1972: US Circuit Court bars construction until a NEPA document is completed**
- **1974: EIS is completed**

History of I-66 Inside the Beltway

- **1975: VA preferred design is rejected by USDOT**
- **1977: Coleman Decision establishing criteria for construction of I-66**
- **1982: Opened to traffic as HOV-4**
- **1983: HOV requirements reduced to HOV-3**
- **1995: HOV requirements reduced to HOV-2**
- **1999: Coleman decision effectively repealed**

Studies of I-66 in Northern Virginia

- **1995-1999: Major Investment Study**
- **2004-2005: Idea66**
- **2012-2013: I-66 Multimodal Study**

Upcoming Changes to I-66

- **Transportation Planning Board at MWCOCG adopted plan in 2009 to modify HOV rules on I-66 both inside and outside the Beltway**
 - **Increase occupancy requirements from 2 to 3**
- **Federal rules require ‘limiting or discontinuing’ use of HOV lanes by hybrids when lanes are degraded**
 - **I-66 corridor has been degraded for a number of years from Beltway to Route 234**
- **Bus on-shoulder pilot program underway to allow buses to bypass significant congestion points**
- **Spot improvements in westbound direction**
 - **Spot improvements #1 and #2 are open to traffic and provide additional lane along many portions of westbound I-66**

Transform66: Inside the Beltway

- **First major improvements proposed for I-66 Inside the Beltway in 15-20 years**
- **Proposed project is result of detailed multi-year study undertaken in 2011 to 2013**
 - **Convert I-66 to dynamic tolling during rush hours in the peak direction**
 - **Enhance bus service throughout the corridor**
 - **Support carpooling and other transportation demand management strategies**
 - **Widen I-66 EB from Dulles Connector Road to Ballston**

Benefits of Transform66: Inside the Beltway

- **Move 40,000+ more people through the corridor by 2040**
- **Improve travel time reliability**
- **Reduce congestion**
- **Increase travel choices for SOV drivers and transit users**
- **Improve travel conditions on local roads**

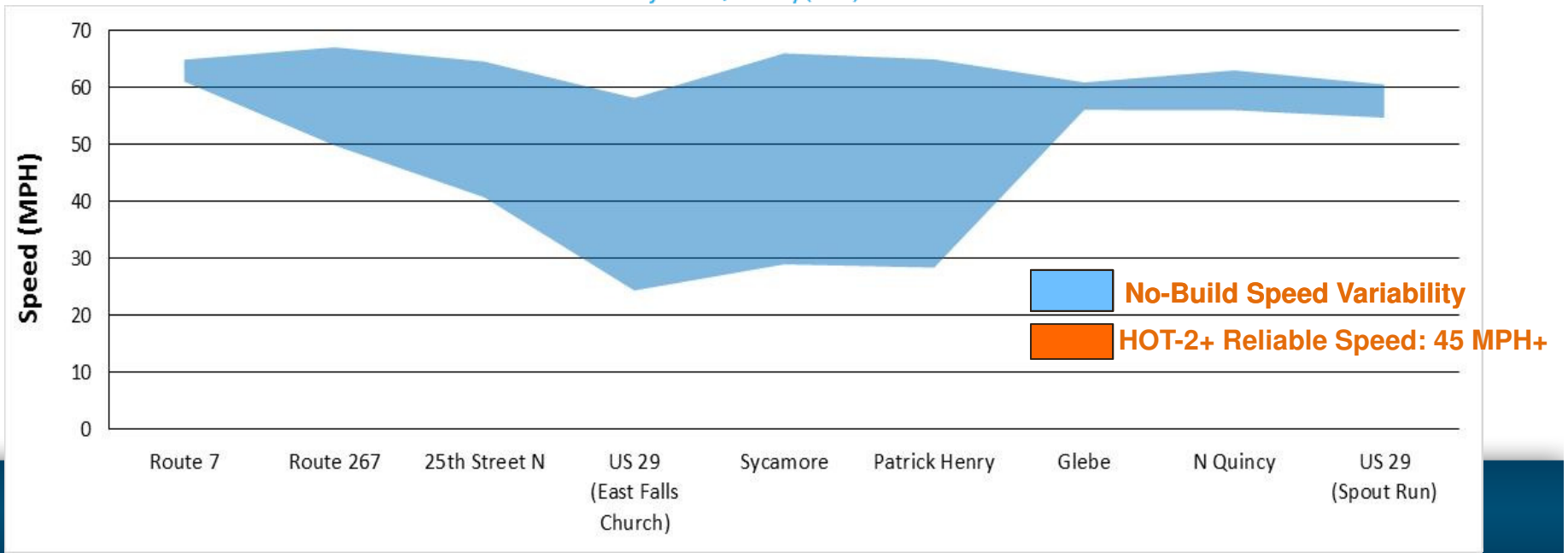
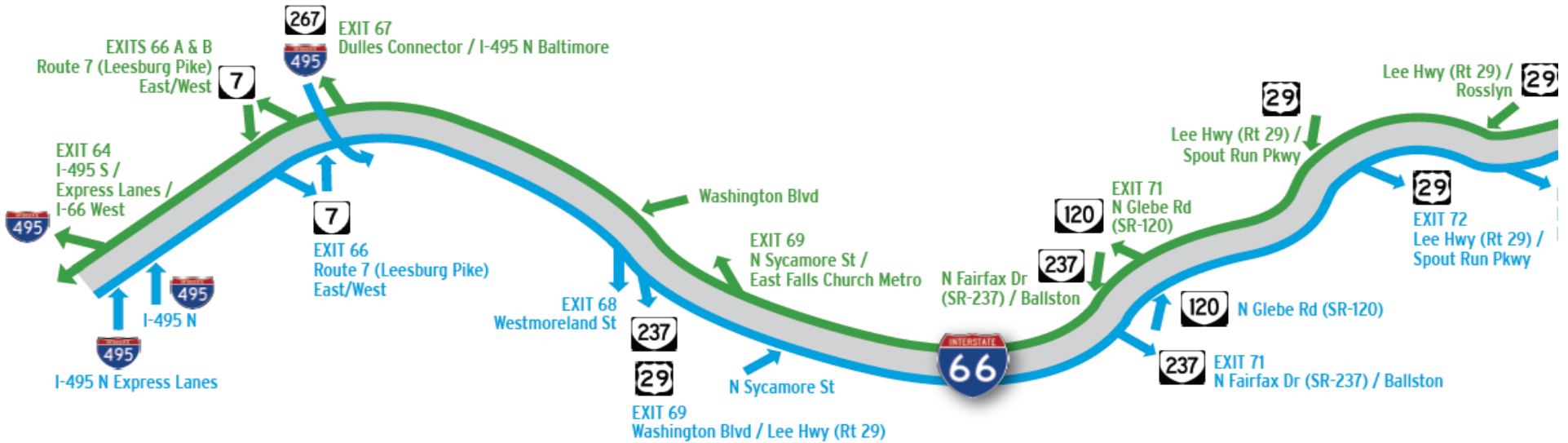
Transform66: Inside the Beltway

Person Throughput

	CLRP+	Refined Package	<i>Increase</i>
Beltway	321,522	359,022	<i>37,500+</i>
West of Glebe	462,658	534,835	<i>72,177+</i>
Clarendon	526,562	577,448	<i>50,886+</i>
Potomac River	496,015	510,463	<i>14,448+</i>

Travel Time Reliability

No-Build vs. Build
 Eastbound AM Toll Period
 2017 HOV-2+ rides for free



Congestion Reduction – HB599 Analysis

- **HB599 is a Northern Virginia specific process to determine the congestion mitigation impacts of various surface transportation projects**
- **Northern Virginia Transportation Authority may only use funds on projects evaluated through this process**
- **Result of legislation sponsored by Delegate LeMunyon in 2012**

Congestion Reduction – HB599 Analysis

Factors included in HB599 are as follows:

- **27.9% reduce congestion duration**
- **20.3% reduce person hours of delay**
- **15.4% reduce congested person hours in autos**
- **11.8% reduce congested person hours in transit**
- **11.5% reduce transit crowding**
- **9.5% increase access to jobs within 45 minutes by car and within 60 minutes by transit**
- **3.6% improve emergency mobility**

Congestion Reduction – HB599 Analysis

- **VDOT NoVA staff and consultants analyzed top scoring projects from first round of NVTA evaluations along with the following:**
 - **Transform66: Outside the Beltway**
 - **8-car Metrorail trains**
 - **Widening I-66 EB from Dulles Connector Road to Ballston**

Project	HB599 Score
Transform66: Outside the Beltway	80.4
Fairfax County Parkway widening for approximately 23 miles	60.3
8-car Metro trains	47.2
Transform66: Inside the Beltway	31.5
Godwin Drive Extension	23.4
Route 7 Widening	20.3
I-66 Inside the Beltway widening from Dulles Connector to Ballston	9.0

Project	Public Funding	599 Benefit / Cost
Transform66: Outside the Beltway	\$600M	0.13
Fairfax County Parkway	\$396.1M	0.15
8-car Metro trains	TBD	
Godwin Drive Extension	\$400M	0.06
I-66 Inside widening	\$100M	0.09

Project	599 Benefit / Cost
Transform66: Inside the Beltway	0.57
Fairfax County Parkway	0.15
Transform66: Outside the Beltway	0.13
I-66 Inside widening	0.09
Route 7 widening	0.07
Godwin Drive Extension	0.06

Congestion Reduction – HB599 Analysis

- **Reduction in person hours of delay**
 - Transform66: Outside – 62,700 hours a day
 - Transform66: Inside – 26,200 hours a day
 - Widen I-66 Inside – 5,700 hours a day
- **Reduction in person hours of delay per \$1M**
 - Transform66: Outside –104.5 hours per \$1M
 - Transform66: Inside – 476.4 hours per \$1M
 - Widen I-66 Inside – 57 hours per \$1M

Congestion Reduction – HB599 Analysis

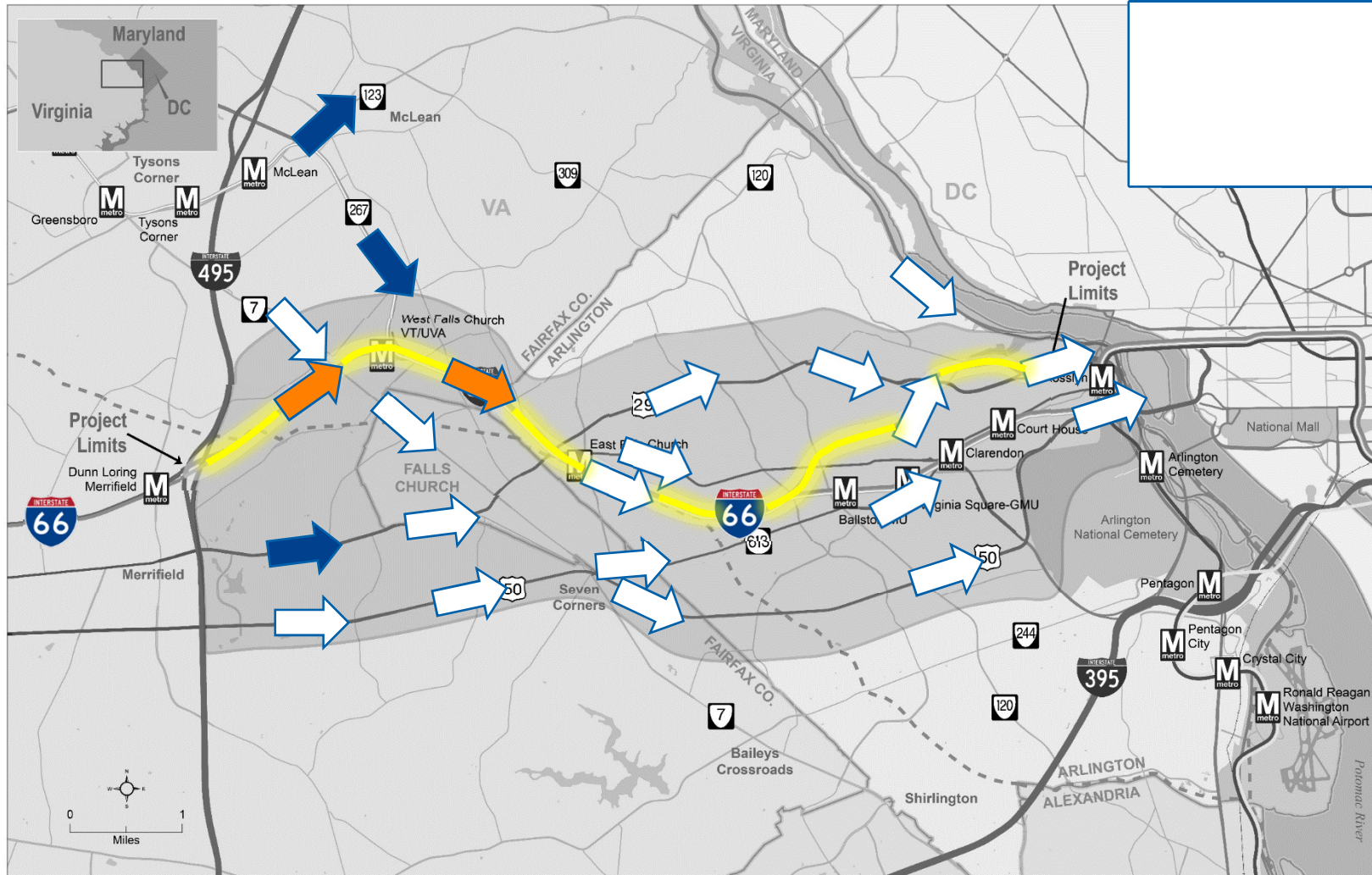
- **Transform66: Inside the Beltway significantly improves the effectiveness of Transform66: Outside the Beltway**
 - Reduction in person hours of delay increases by ~5,000 hours a day
- **Overall Transform66: Inside the Beltway is projected to reduce person hours of delay by 31,205 hours a day**
- **Reduces more than 567.3 person hours of delay per \$1M in cost – more than 4X any other evaluated project**

Improved Travel Choices

- **Allows any single-occupant drivers to legally access I-66 during rush hours in the peak directions**
 - **HOV requirements have been in place since road opened to traffic in 1982**
- **Provides expanded local and commuter bus routes and service along I-66 corridor**
 - **Includes service to Loudoun, Fairfax and Prince William outside of the Beltway**
- **Provides support for carpooling and transportation demand management**

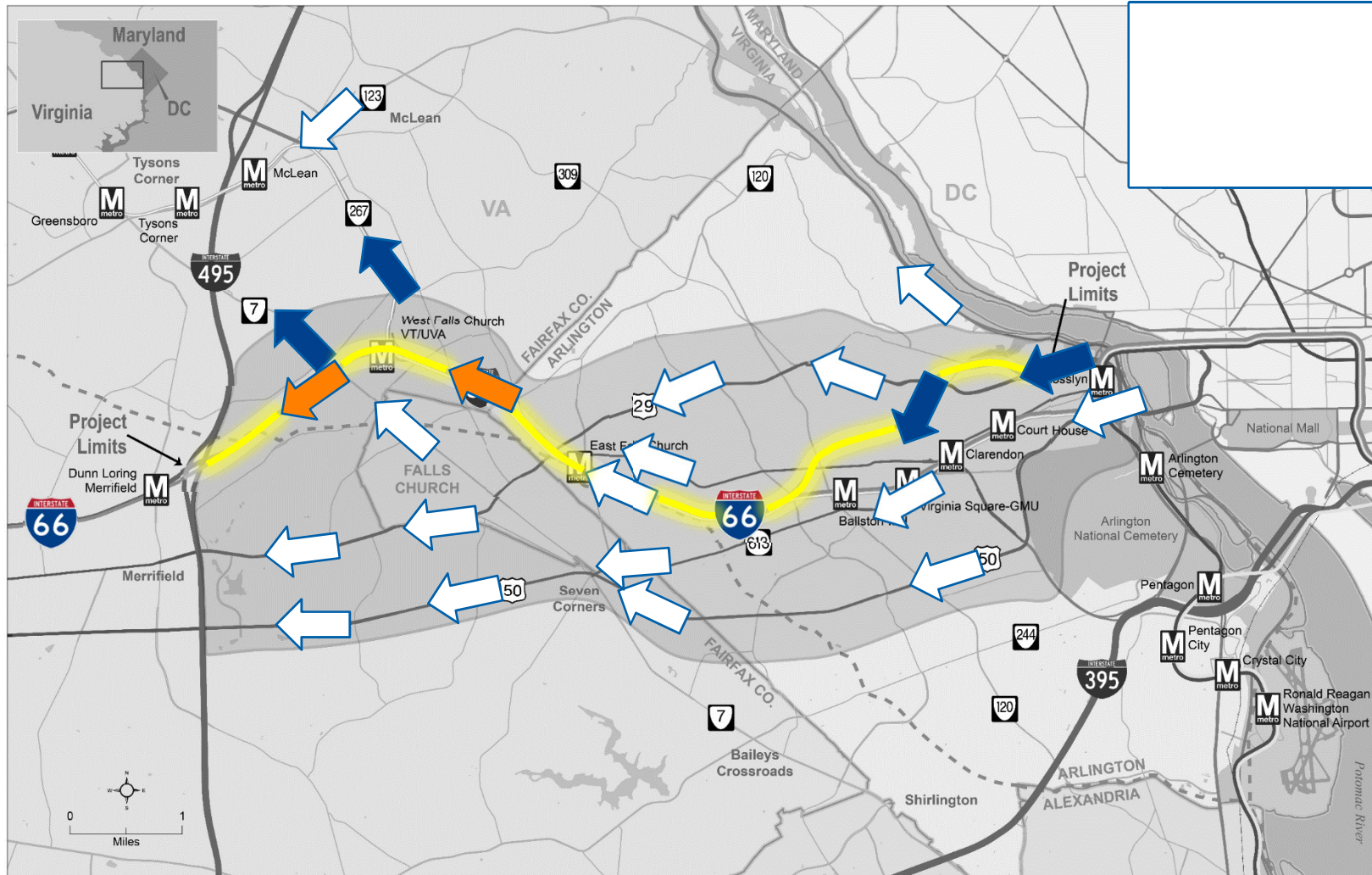
Conditions on Local Streets

No-Build vs. Build - Eastbound AM 2017 HOV-2+ Rides for free



Conditions on Local Streets

No-Build vs. Build – Westbound PM 2017 HOV-2+ Rides for free



Tolling Component

- **Tolls apply on weekdays during the following periods:**
 - **Eastbound from 5:30am to 9:30am**
 - **Westbound from 3:00pm to 7:00pm**
- **Average toll is expected to be ~\$6 a trip**
- **Toll applies to all users except for:**
 - **Carpoolers meeting applicable occupancy requirements**
 - **Vanpools**
 - **Transit buses**
 - **Motorcycles**

Project Implementation

- **Agreement for 40 years between CTB and NVTC**
- **Implemented jointly by VDOT and NVTC**
- **VDOT will be responsible for:**
 - **Operations and maintenance**
 - **Tolling**
 - **Roadway improvements**
- **NVTC will be responsible for:**
 - **Selecting multimodal improvements**
 - **Ensuring compliance with law and agreement**
 - **Reporting on use of funds**

Framework Agreement

- **Estimated toll revenue in 2018 is \$18M**
- **Estimated net toll revenue in 2018 is \$8-10M and increases over time**
- **Provides that funds may be used for the following :**
 - **Cost and expenses of tolling operation and maintenance**
 - **Repayment of the Toll Facilities Revolving Account for the design and construction of tolling operation**
 - **Multimodal components selected by the Northern Virginia Transportation Commission, including financing costs (not to exceed 40% of net revenues) and operating cost of components (not to exceed 20% of net revenues)**
 - **Cost and expenses of widening I-66 eastbound from Dulles Connector Road to Ballston, if triggers are met**

Framework Agreement

- **NVTC may select multimodal improvements that:**
 - **Benefit the toll-paying users of I-66 inside the Beltway**
 - **Demonstrate the ability to move more people through the corridor**
 - **Serve users of I-66 inside the Beltway that reside both inside and outside the Beltway**
 - **Can be implemented within 5 years of funding**
- **Board has authority to determine whether components comply with terms of MOA and related laws**
- **If a component is selected in accordance with MOA then Board shall program the component**

Framework Agreement

- **NVTC is required to develop a process for selecting components that includes:**
 - **A Region-wide solicitation open to all local governments and transit operators within Planning District 8**
 - **Public hearings**
 - **An evaluation and prioritization process for component**
- **NVTC is required to report on the effectiveness of selected components after an initial ramp up period**
- **Components that under perform will be evaluated to determine actions to improve performance or redeploy assets**

Framework Agreement

- **Board may set aside up to 40% of net toll revenues to finance widening of I-66 eastbound between Dulles Connector Road and Ballston if evaluation finds one or both of the triggers are met**
- **Evaluations start at the later of 5 years after the start of tolling or 2 years after the increase in occupancy requirements**
- **If triggers are not met, evaluations will take place every two years until the triggers are met or the end of the MOA term**

Framework Agreement

Widening triggers will be evaluated between 5am and 10am on weekdays over 180 day period

- **Average vehicle operating speed eastbound on I-66 between Dulles Connector Road and Ballston does not maintain 50 mph for 90% of the time**
- **Average travel times increase 10% or more on the following:**
 - **Route 50 from I-495 to Glebe Road**
 - **Route 29 from I-495 to Glebe Road**
 - **Route 7 from I-66 to Route 50**
 - **Washington Boulevard from I-66 to Glebe Road**

Framework Agreement

- **Board retains the right to expand the hours of tolling during the term of the MOA**
- **VDOT will continue to provide for the existing operations and maintenance of the facility through HMOF revenues**
- **VDOT may suspend tolling during an emergency**

Public Outreach

Outreach Numbers

- 12 Public Information Meetings (since 2011)
- 76 presentations to elected officials, agencies and localities (in 2015)
- 17 presentations to Chambers of Commerce, homeowners and civic associations, and other community groups (in 2015)

Outreach and Communications Tools

- Briefings and coordination with key stakeholders
- Project website
- Email and Electronic Marketing to stakeholder database of more than 4,500
- Proactive media outreach

Support for Transform66: Inside the Beltway

- **Fairfax County Chamber of Commerce**
- **Loudoun County Chamber of Commerce**
- **Arlington County Chamber of Commerce**
- **Arlington County**
- **City of Falls Church**
- **Transportation Planning Board at MWCOG**

Transform66: Inside the Beltway

- **No formal position**
 - **Fairfax County**
 - **City of Alexandria**
 - **Metropolitan Washington Airports Authority**
- **Expressed concerns and/or opposition**
 - **Loudoun County**
 - **Prince William County**
 - **Fauquier County**
 - **City of Manassas Park**

Key Milestones	Begin Dates
Public outreach	Ongoing
Working Group/Technical Stakeholder Advisory Group meetings	Ongoing
Design Public Hearings	January 25, 26, 27 2016
Group 1 Multimodal Component Selection	Spring 2016
Tolling construction Start	Summer 2016
Begin Tolling	Summer 2017