



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

2012 Governor's Transportation Conference

Dulles International Airport: Economic Engine for Virginia

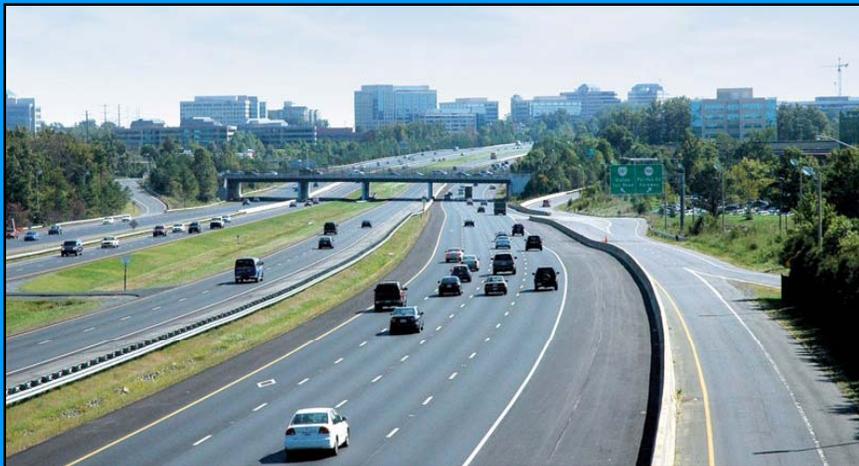
December 6, 2012



Ronald Reagan Washington National Airport



Dulles Corridor Metrorail Project



Dulles Toll Road



Washington Dulles International Airport



Ronald Reagan Washington National and Washington Dulles International Airports are major contributors of economic benefits, and together they created \$17.5 billion in economic activity in Virginia.

| | <i>Jobs</i> | <i>Annual Payroll (thousands)</i> | <i>Economic Activity (thousands)</i> |
|------------------------------------|-----------------------|--|--|
| <i>Dulles International</i> | <i>96,980</i> | <i>\$3,991,000</i> | <i>\$10,123,254</i> |
| <i>Reagan National</i> | <i>82,675</i> | <i>\$3,371,400</i> | <i>\$7,324,919</i> |
| <i>IAD/DCA</i> | <i>179,655</i> | <i>\$7,362,400</i> | <i>\$17,448,173</i> |

Source: Virginia Air Transportation System 2010 Economic Impact Study



***Dulles is Positioned for Growth
and Ready for the next 50 years...***

Dulles Now



Dulles Future





Reagan National and Dulles International Operate as an Airport System

- ➔ The long-term future is bright for our Airport System
 - ➔ DCA – Convenience/Superior Performance/Land Constrained
 - ➔ IAD – International Gateway to the Nation’s Capital/Unconstrained Aviation-Aviation Support Growth Potential/Vast Opportunities For Commercial Real Estate Development



Dulles International (IAD)

- ➔ IAD Uniquely Positioned for Growth
 - ➔ Terminal Capacity
 - ➔ Robust Runway Capacity
 - ➔ Parking Capacity
 - ➔ Undeveloped Airfield-Accessible Land

- ➔ Surrounding High Income Customer Base On a Positive Growth Trajectory = More Travel

- ➔ Newly Expanded Facilities and Improvements = Improved Customer Service

- ➔ Upcoming Game Changer – METRO at Dulles in 2018



Air Service Development Objective

Raise Awareness of the Strengths of our Market/Airports to Drive Demand for Increased Air Service for the Washington Region's Passengers & Shippers

Air Service Development Objectives for Dulles

Retain and Support Current Domestic & International Air Service
All Top 50 Domestic Markets Served - 44 International Markets Served

Identify, Pursue & Obtain New Air Service to Destinations Highly
Travelled to and from the Washington Region

In 2012: 3 New Foreign Flag Airlines & 7 New or Competitive Service Destinations

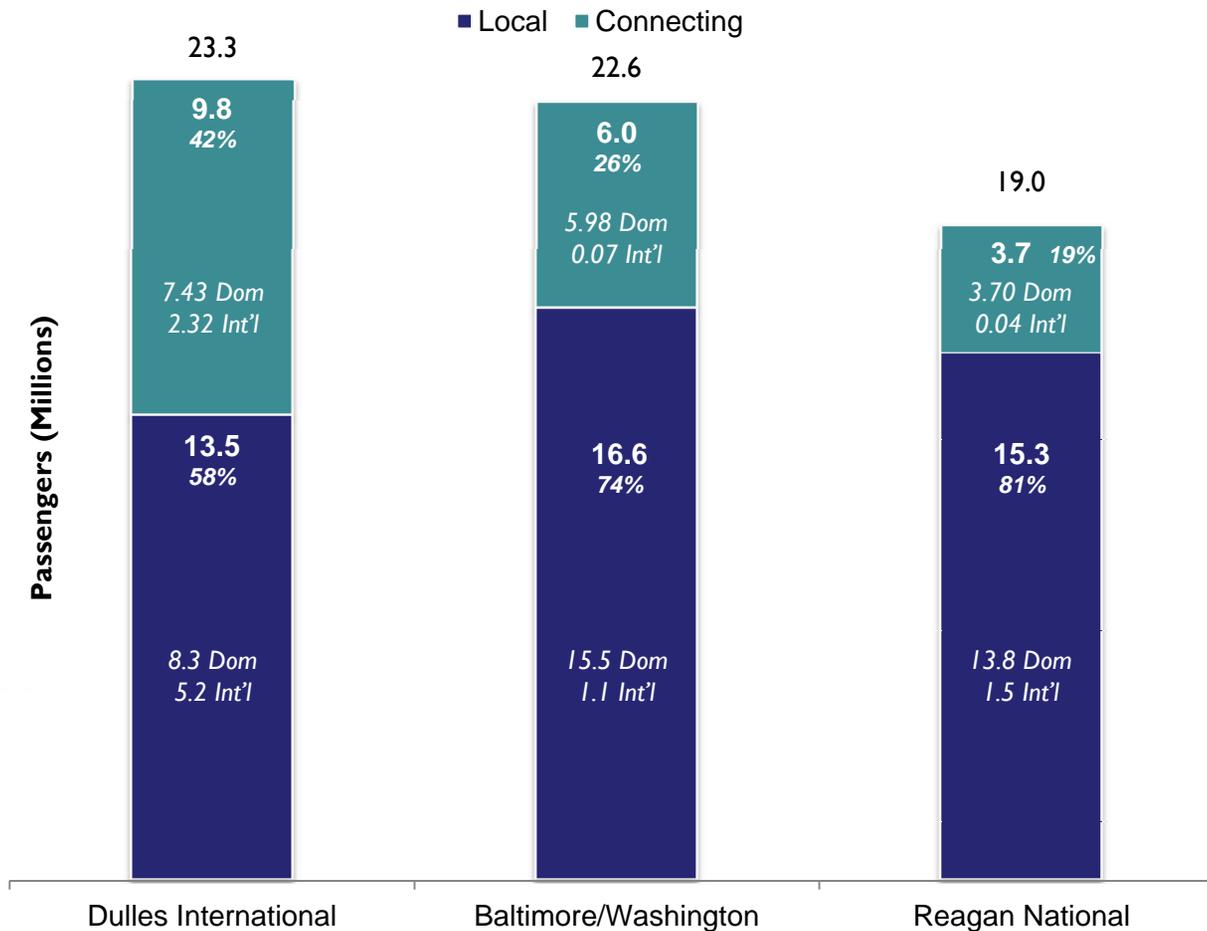
Establish Dulles International as a Major U.S. Air Cargo Gateway
Freighter service to Europe on track for Q3 2013

Niche markets under development: Flowers and other perishable air cargo



Dulles International as a Major Hub Airport Serves More Total Passengers Than Reagan National or BWI

Dulles' Unique Strength is 7.5M International Passengers Compared to DCA's 1.5M or BWI's 1.2M





Air Service Advantage of Dulles International

The U.S.' Strongest Local Major Market
in the Heart of the Washington Regions' Economy

| METRO REGION | TOTAL RANK ¹ | 2010 POPULATION (000S) | 2000-2010 POPULATION GROWTH | 2010 MEDIAN HOUSEHOLD INCOME (000S) | SEPT. 2012 UNEMPLOYMENT RATE (%) | FIVE-YEAR ² JOB GROWTH (000S) | 2011 GROSS REGIONAL PRODUCT PER CAPITA (000S) |
|---------------|-------------------------|------------------------|-----------------------------|-------------------------------------|----------------------------------|--|---|
| Washington | 1 | 4 | 5 | 1 | 1 | 2 | 2 |
| Houston | 2 | 9 | 1 | 10 | 4 | 1 | 4 |
| Boston | 3 | 5 | 11 | 3 | 2 | 4 | 5 |
| Dallas | 3 | 7 | 3 | 9 | 3 | 3 | 6 |
| San Francisco | 4 | 6 | 8 | 2 | 6 | 8 | 1 |
| New York | 5 | 1 | 12 | 4 | 11 | 6 | 3 |
| Denver | 6 | 13 | 4 | 5 | 5 | 5 | 7 |
| Philadelphia | 7 | 8 | 9 | 6 | 9 | 7 | 9 |
| Chicago | 8 | 3 | 10 | 7 | 7 | 12 | 8 |
| Atlanta | 9 | 10 | 2 | 11 | 8 | 9 | 11 |
| Los Angeles | 10 | 2 | 7 | 8 | 12 | 13 | 10 |
| Miami | 11 | 11 | 6 | 13 | 10 | 11 | 12 |
| Detroit | 12 | 12 | 13 | 12 | 13 | 0 | 13 |

Notes:

1. Composite score is based on sum of individual category ranks

2. Job growth is non-annualized and compares June 2012 to June 2007

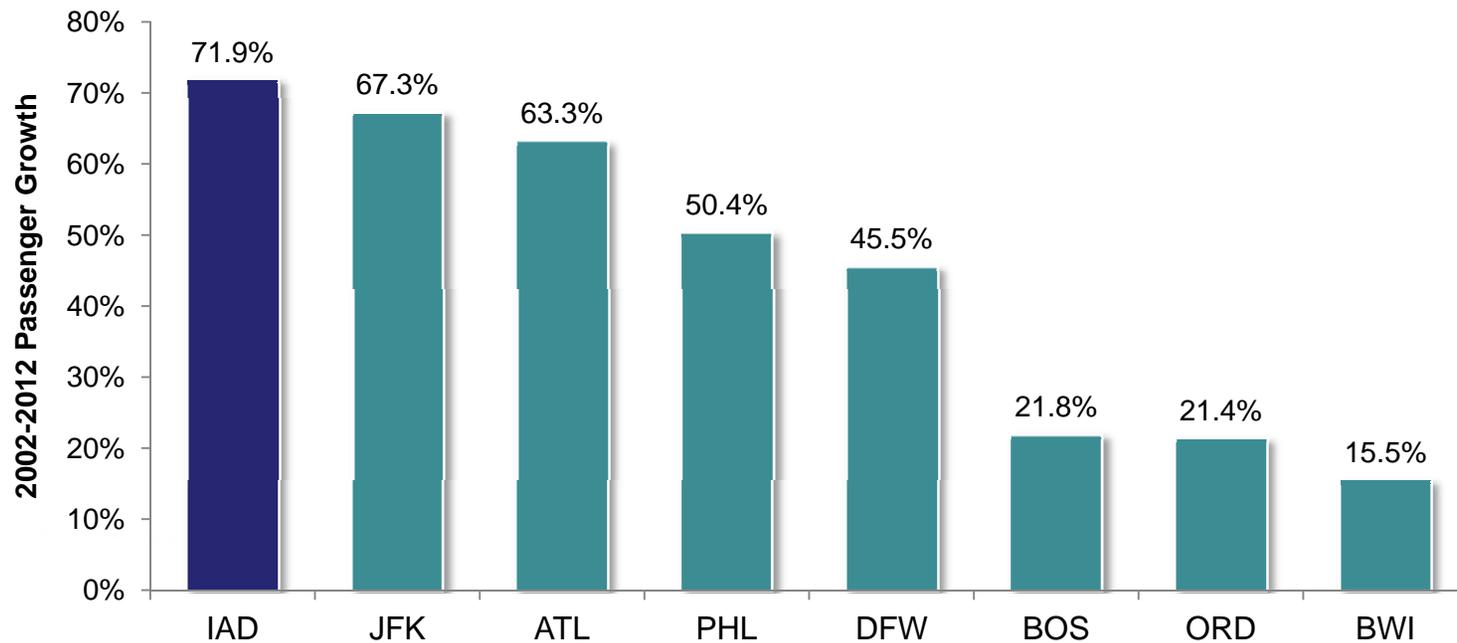
Sources: U.S. Census Bureau, 2010 American Community Survey; U.S. Bureau of Labor Statistics; Woods & Poole Economics, CEDDS 2012



International Passenger Growth at Washington Dulles Has Outperformed Its Peers

Dulles International Passenger Traffic Has Grown 72% over the Past 10 Years

Comparison of 10-Year Growth in International Passengers
(YE May 2012 vs. YE May 2002)



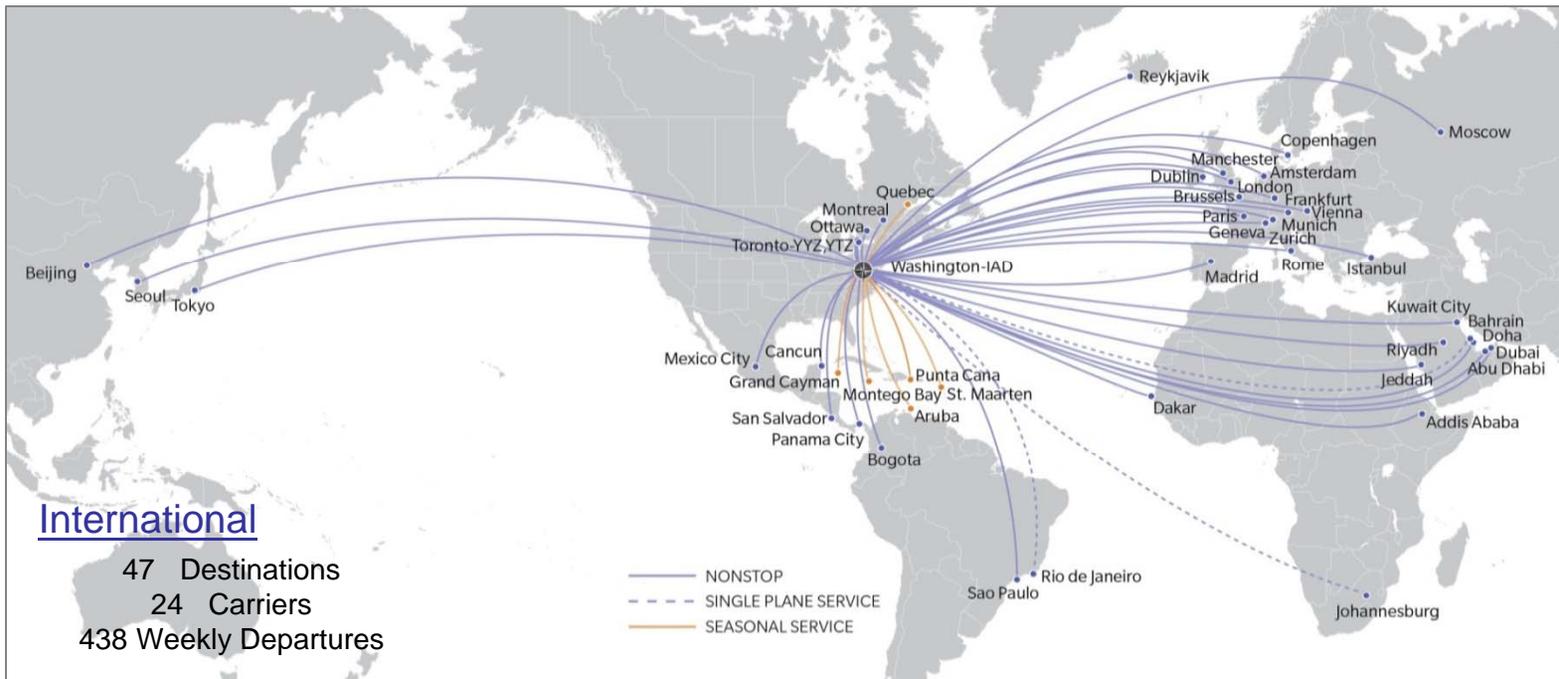
| Growth by Number (million) | IAD | JFK | ATL | PHL | DFW | BOS | ORD | BWI |
|----------------------------|------|------|------|------|------|------|------|------|
| | 2.64 | 9.57 | 3.65 | 1.27 | 1.69 | 0.71 | 1.80 | 0.06 |



International Air Service at Dulles International

New markets: Dublin, Ireland; Manchester, England; and Toronto City, Canada

Additional service by new carriers: Dubai, UAE; Mexico City, Mexico and San Salvador, El Salvador



- Abu Dhabi
- Addis Ababa
- Amsterdam
- Aruba
- Bahrain
- Beijing
- Bogota
- Brussels
- Cancun
- Copenhagen
- Dakar
- Doha
- Dubai
- Dublin
- Frankfurt
- Geneva
- Grand Cayman
- Istanbul
- Jeddah
- Johannesburg
- Kuwait City
- London
- Madrid
- Manchester
- Mexico City
- Montego Bay
- Montréal
- Moscow
- Munich
- Ottawa
- Panama City
- Paris
- Punta Cana
- Quebec City
- Reykjavik
- Rio de Janeiro
- Riyadh
- Rome
- San Salvador
- São Paulo
- Seoul
- St. Maarten
- Tokyo
- Toronto-YTZ
- Toronto-YYZ
- Vienna
- Zürich

| Airlines | | | | | |
|------------|-----------------|-----------|------------|---------------|-----------------|
| Aeroflot | Austrian | COPA | Icelandair | Porter | South African |
| AeroMexico | Avianca/TACA | Emirates | KLM | Qatar Airways | Turkish |
| Air France | British Airways | Ethiopian | Korean Air | SAS | United |
| ANA | Cayman Airways | Etiihad* | Lufthansa | Saudi Arabian | Virgin Atlantic |

Note: Etihad has announced to launch daily nonstop service to Abu Dhabi on March 31, 2013, subject to regulatory approvals.
 Source: OAG, October 2012



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

New Airline Porter Airlines – Dulles/Toronto City – April 16



- ➔ **4 Daily Roundtrips**
- ➔ **Bombardier 70-Seat Q400 Aircraft**



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

New Airline Aeromexico – Dulles/Mexico City – May 21



→ Daily Roundtrip



New UNITED Air Service at Dulles International



- ➔ **Daily Service to Manchester, U.K. – May 2012**
- ➔ **Daily Service to Doha, Qatar via nonstop Dubai, U.A.E.
– May 2012**
- ➔ **Daily Service to Dublin, Ireland – June 2012**
- ➔ **Daily Fayetteville, NC – Nov 2012**



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

New Airline Emirates – Dulles/Dubai, UAE – September 12



→ Daily Roundtrip



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

New Airline *On The Way*
Etihad – Dulles/Abu Dhabi, UAE – March 31, 2013

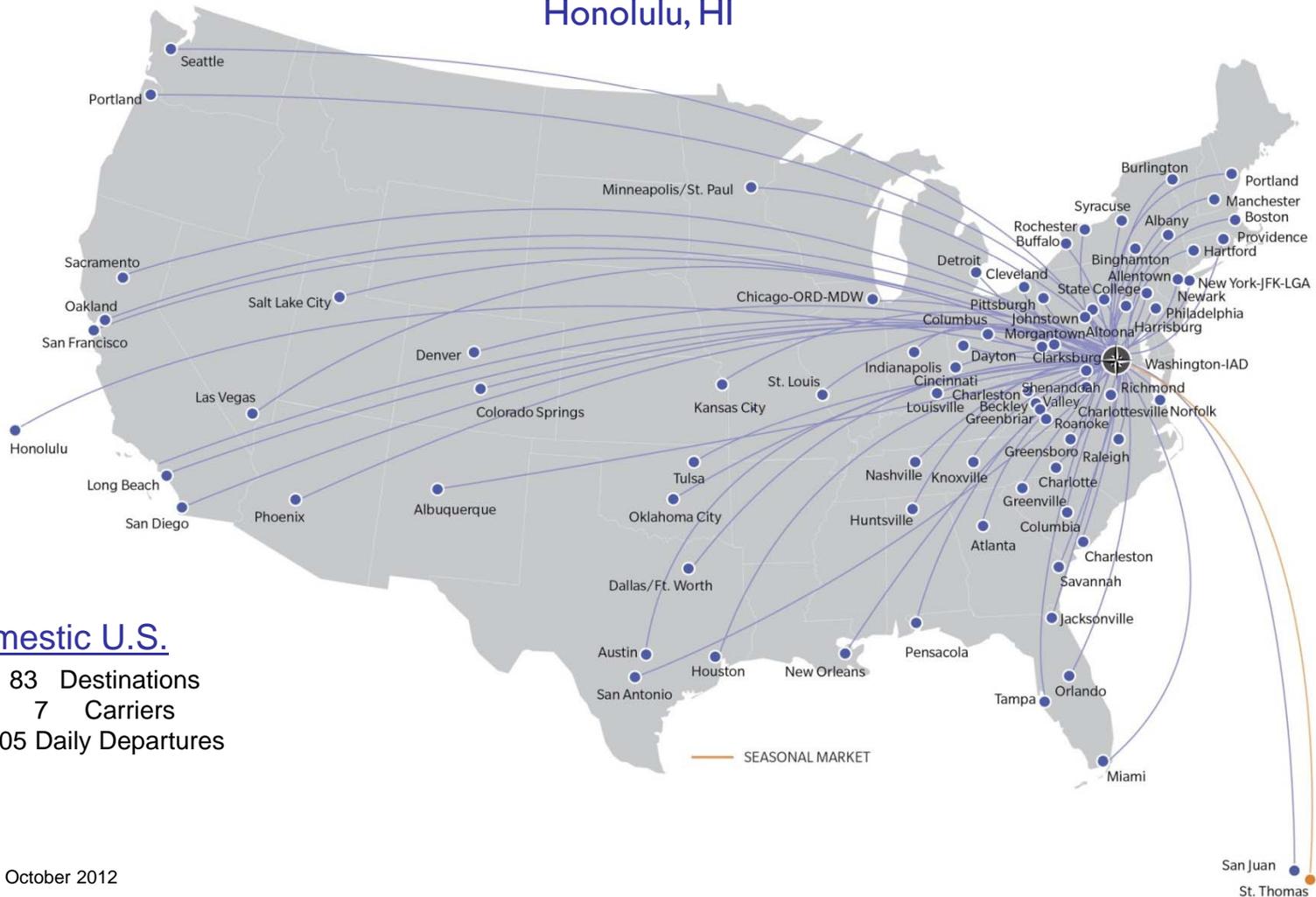


→ **Daily Roundtrip**



Domestic Air Service at Dulles International

Despite reductions on some routes, United added service to Ft. Lauderdale, FL, Greenbrier, WV, and Honolulu, HI





Dulles International's Cargo Advantages

- World-class facilities
- Cost advantages compared to other East Coast cargo hubs
- Catchment area which covers entire east coast within one-day drive, combined with extensive nonstop international network
- Cooperative work environment with State and local governments and Economic Development Agencies
- Promotional Cooperative Program for airlines
- Freightler Incentive Program (FIP)



Why Cargo Development?

- Supports New International Markets
- Builds Demand for Cargo Space
- Supports Regional Economy
- Increases IAD Market Share of Air Cargo
- Supports Niche Market Development



Air Cargo Service Priorities

- Increase Cargo Flow to Dulles International within the Catchment Area
- Grow Belly Cargo
- Encourage Expansion and Promote Dedicated All-Cargo Freighter Service
 - Work with Shippers and Freight Forwarders that Influence Service Decisions
 - Continuation of the Freighter Incentive Program (FIP)
- Develop Infrastructure Including Cold Storage and Handling Equipment
- Develop Investor Interest in the Dulles Air Cargo Expansion Initiative



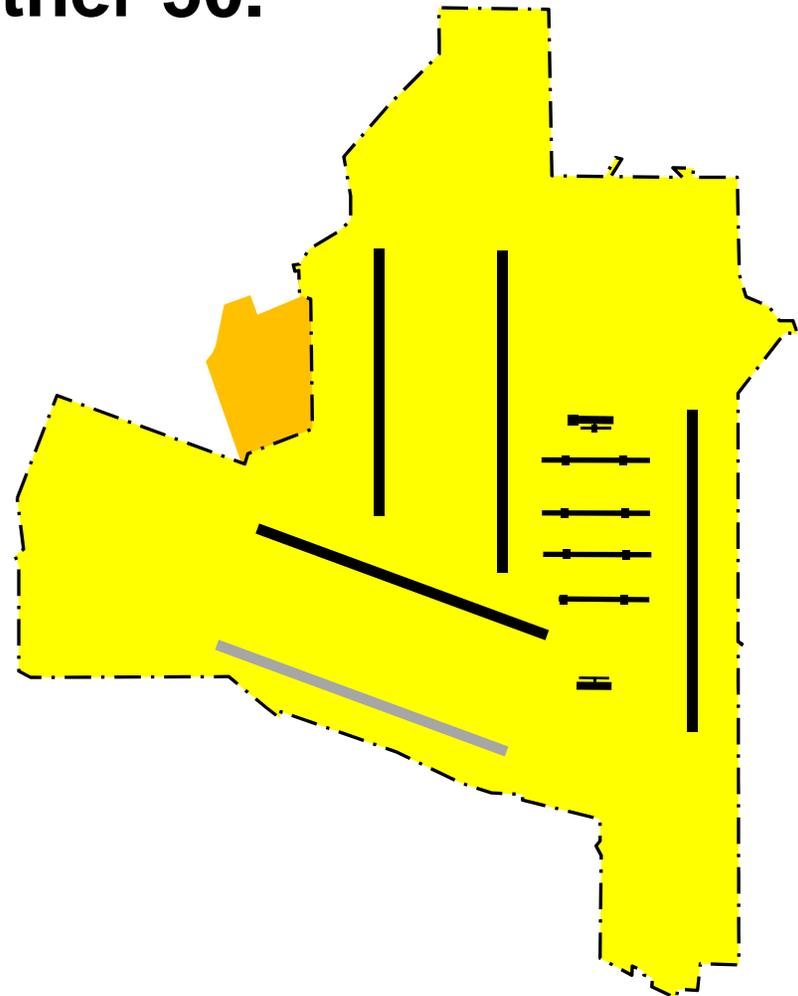
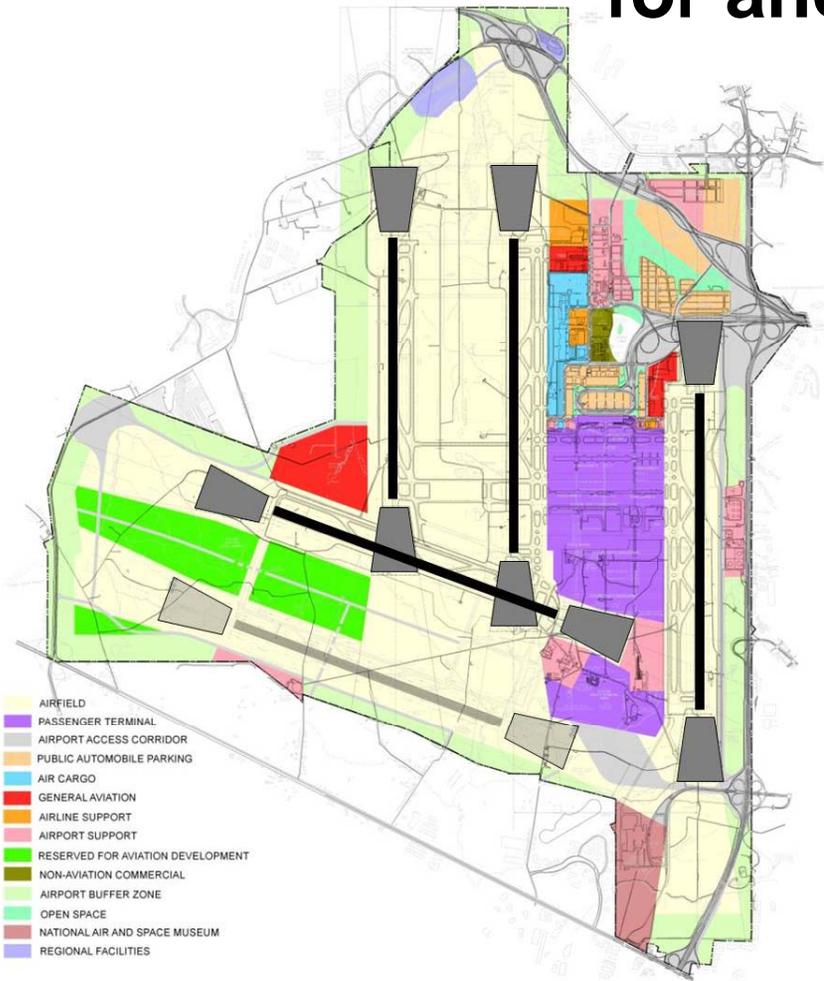


Dulles International's Aviation Support Opportunities

- Fixed Base Operator (FBO)
- Maintenance Repair Overhaul (MRO)
 - Allows Airlines to Conduct Periodic Maintenance Checks at Varying Levels and Cut Time Aircraft is Out-of-Service
 - Increases Landed Weights Thereby Increasing Revenues
 - Facilitates Air Service Growth
 - United Airlines Facility Approved
 - Additional MRO



Dulles, at 50 years, can keep growing for another 50.



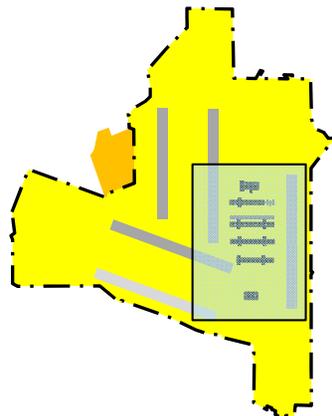
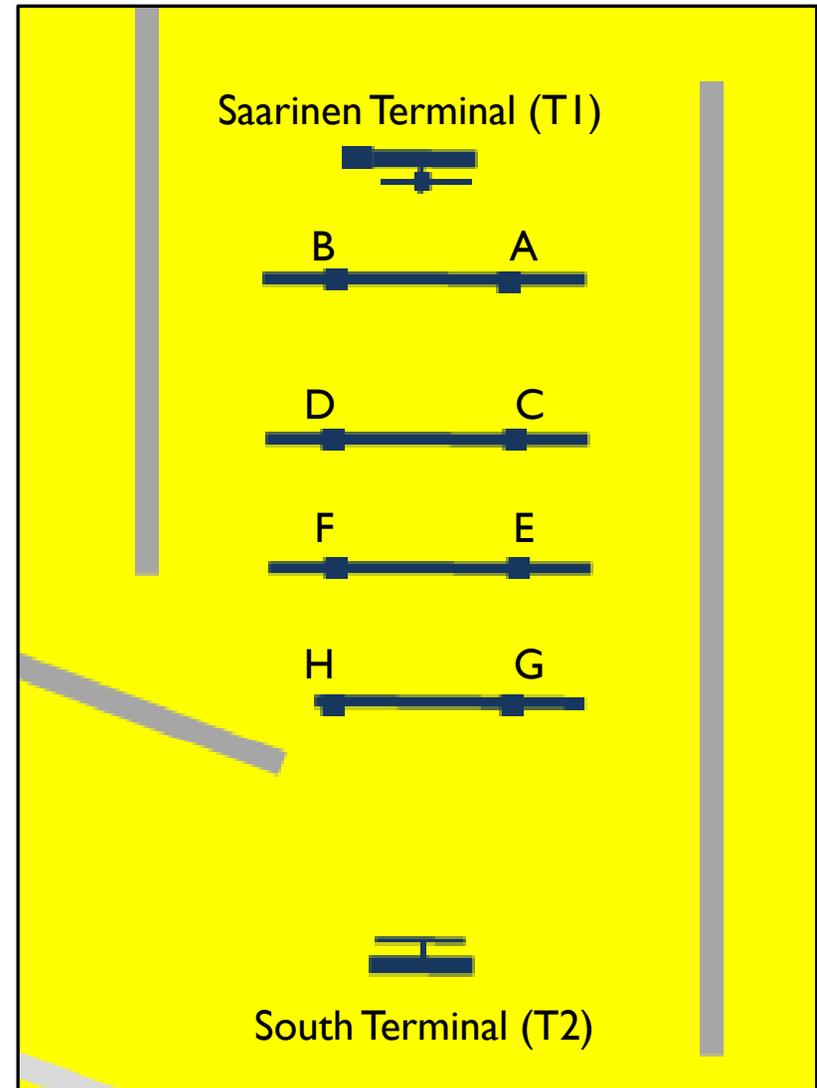
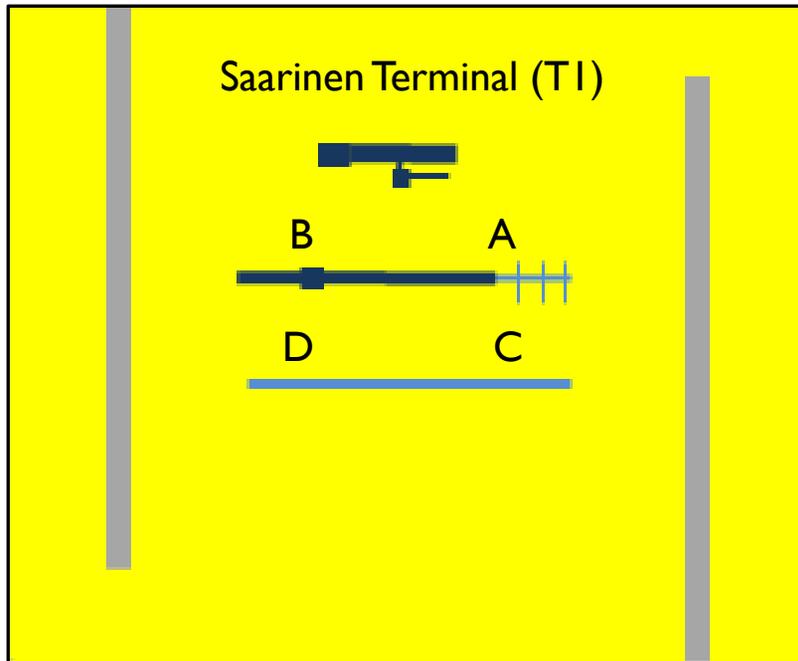


IAD Potential

| | <u>Current</u> | <u>Future</u> |
|----------------------------------|----------------|-------------------|
| Runways | 4 | 5 |
| Annual Aircraft Operations | 320,000 | 1,000,000 |
| Terminals | 1 | 2 |
| Concourse Tiers | 2 | 4 |
| Gates | 135 | >250 |
| International Passenger Arrivals | 4,000 per hour | >8,000 per hour |
| Annual Passengers | 23,300,000 | 75,000,000 |

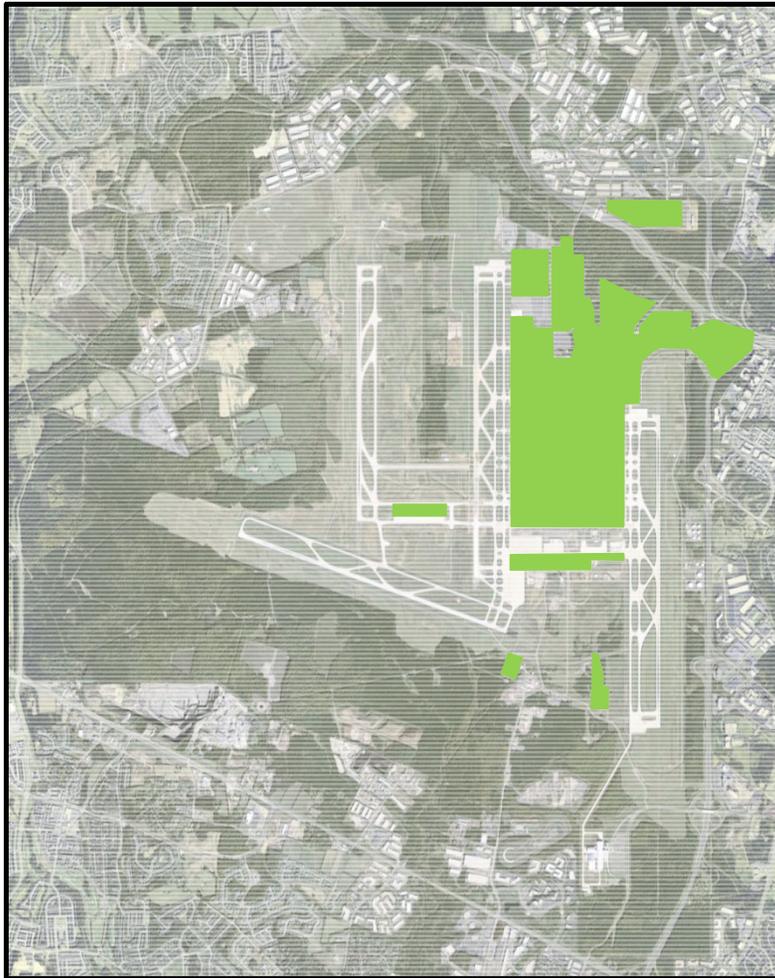


Existing/Future Terminals and Concourses:





Land for Development



1,200 Developed Acres

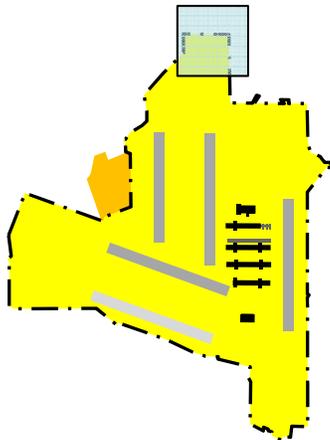


3,000 Undeveloped Acres



Land for Development

**Commercial
Development –
North Side**





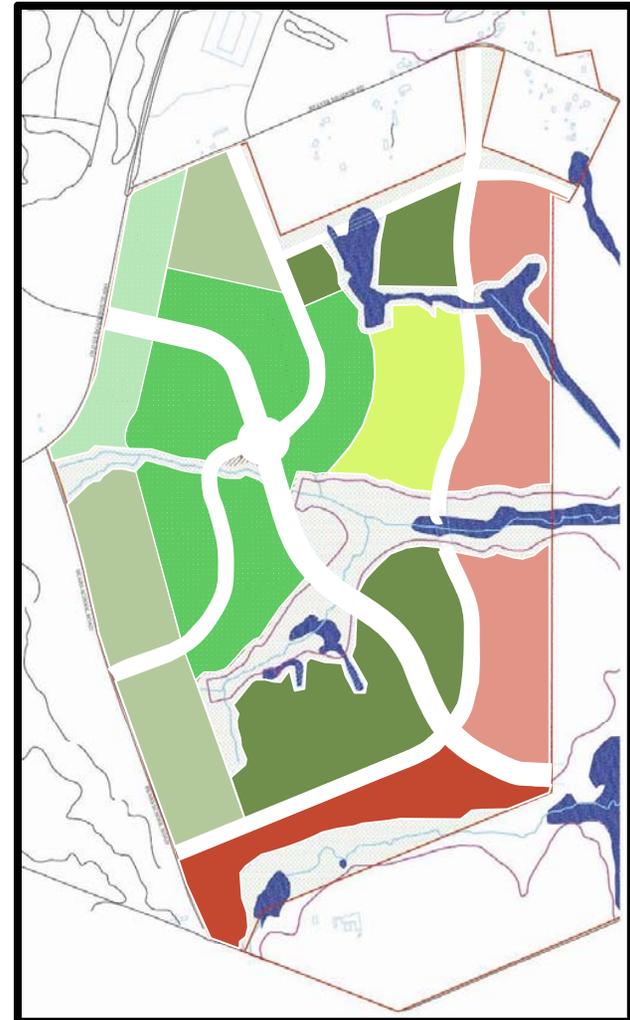
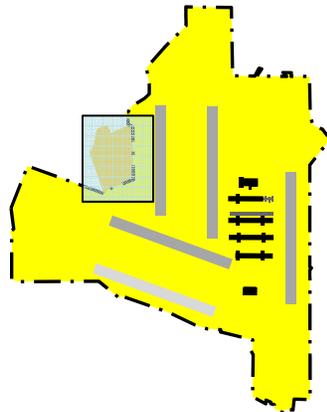
Land for Development

Commercial Development – West Side:

430 acres along Route 606

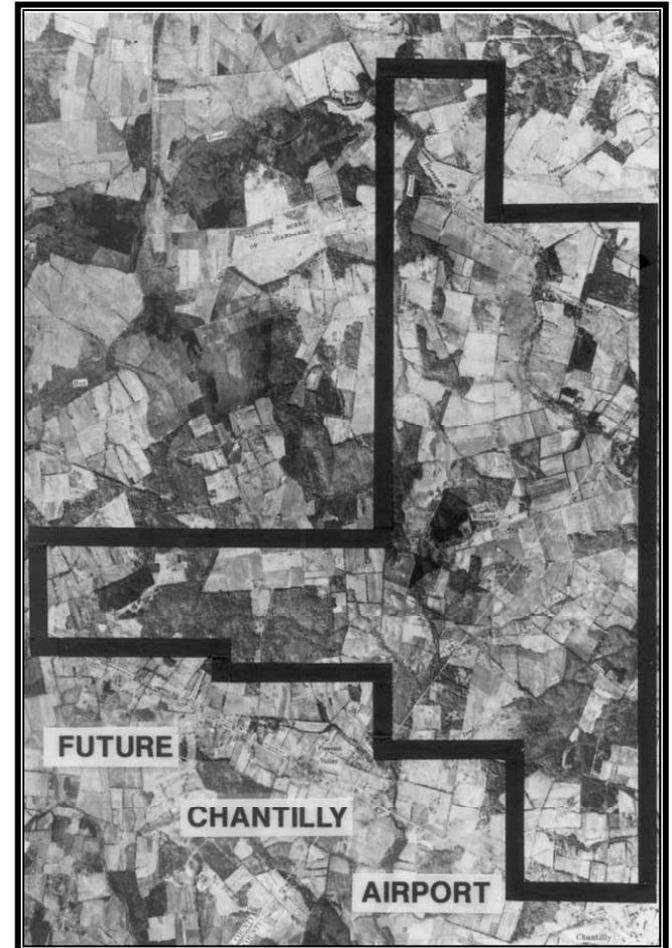
Illustrative Site Plan shows
land uses:

- Commercial  
- Office  
- Conference  
- Industrial  





Planning and investment in Dulles 50 years ago has significantly influenced the growth, transportation network, and commerce of our region today.





Dulles has reserve capacity to lead the regional and state economies for another 50 years...if access planning and investment can match that potential.

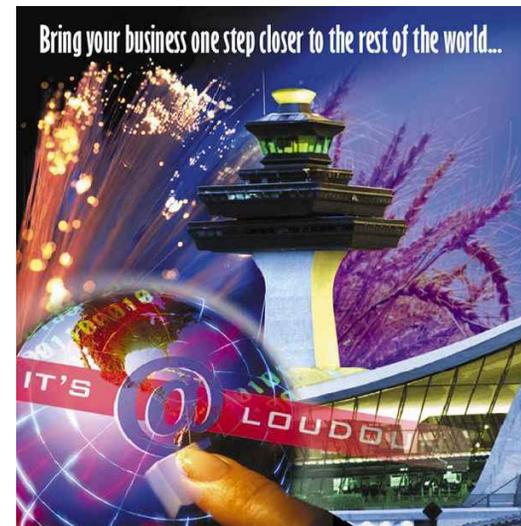




“The Dulles Name Takes Off”

The Washington Post: Loudoun Extra; April 6, 1999

- “Companies within a 20-mile range of Dulles International Airport are incorporating Dulles into their names”
- “Dulles name has come to enjoy a certain cachet”
- “international name recognition, as well as its association with economic growth and technology...area’s high-tech reputation”
- “[Dulles] sounds more metropolitan”

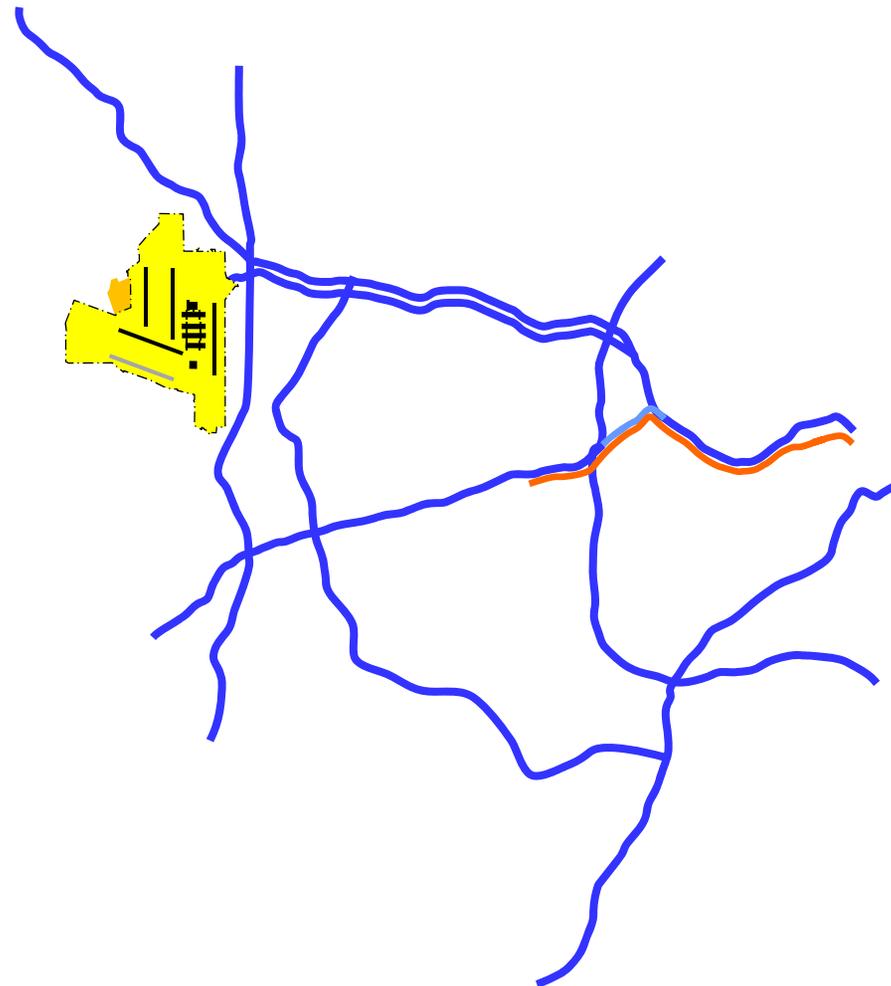




Shaping the Region

1962 to 2012

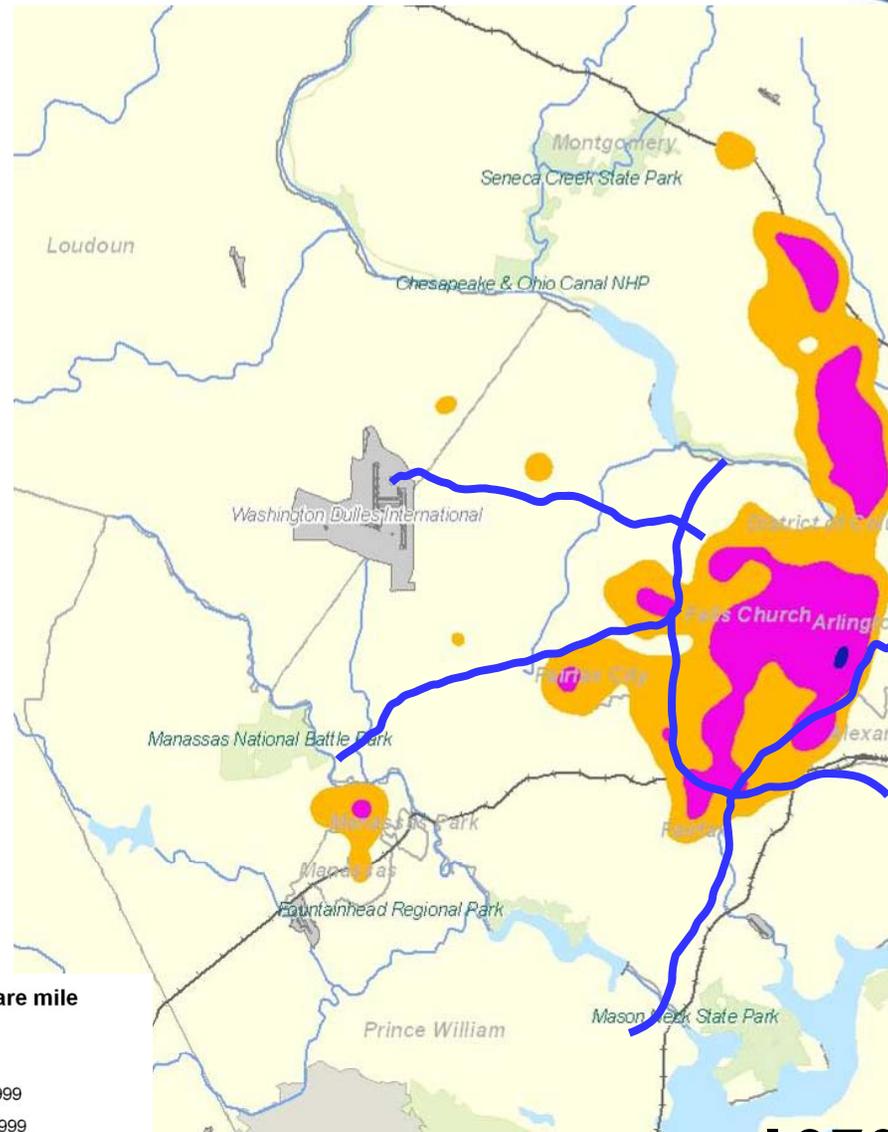
- Dulles Airport
- Dulles Corridor
- Route 28
- Greenway





Surface transportation improvements in the 1960's:

- Dulles Access Highway
- Capital Beltway
- I-66 (outside the Beltway)
- I-395



People per square mile

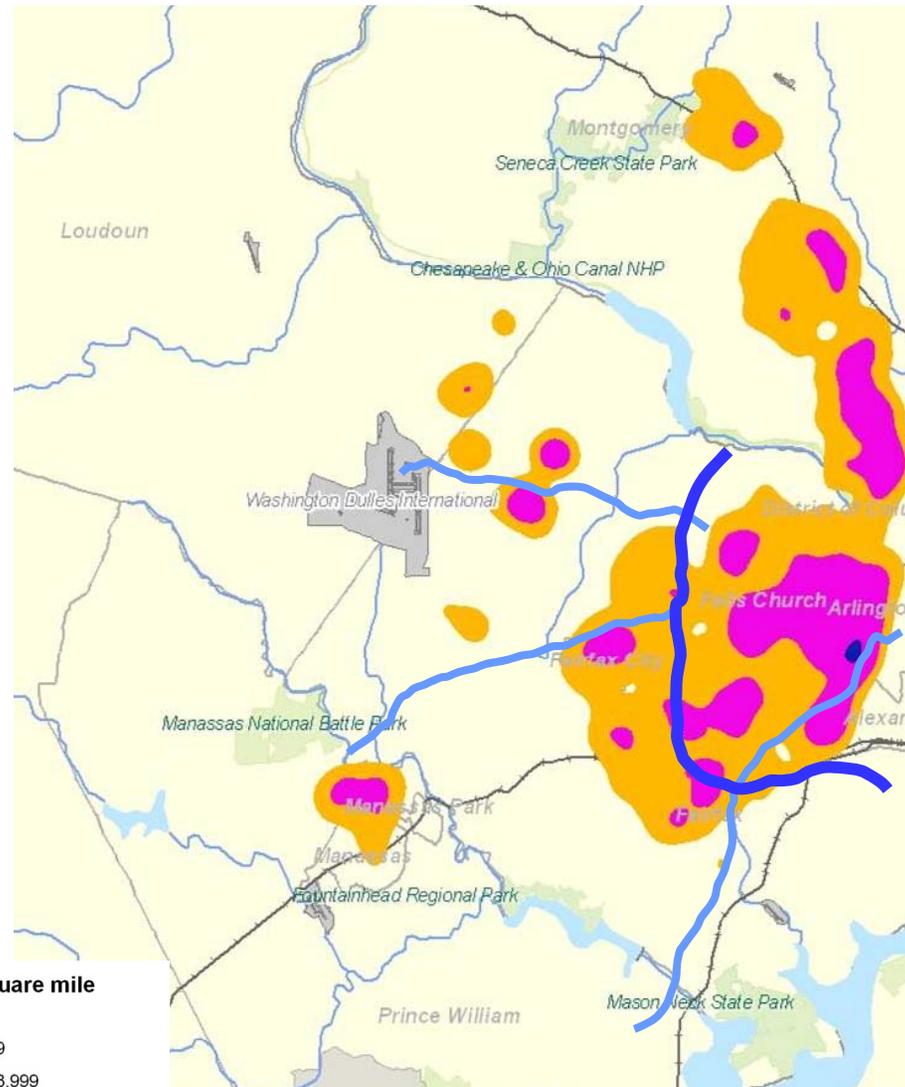


1970



Surface transportation improvements in the 1970's:

- Metrorail opens Downtown
- Beltway widens



People per square mile

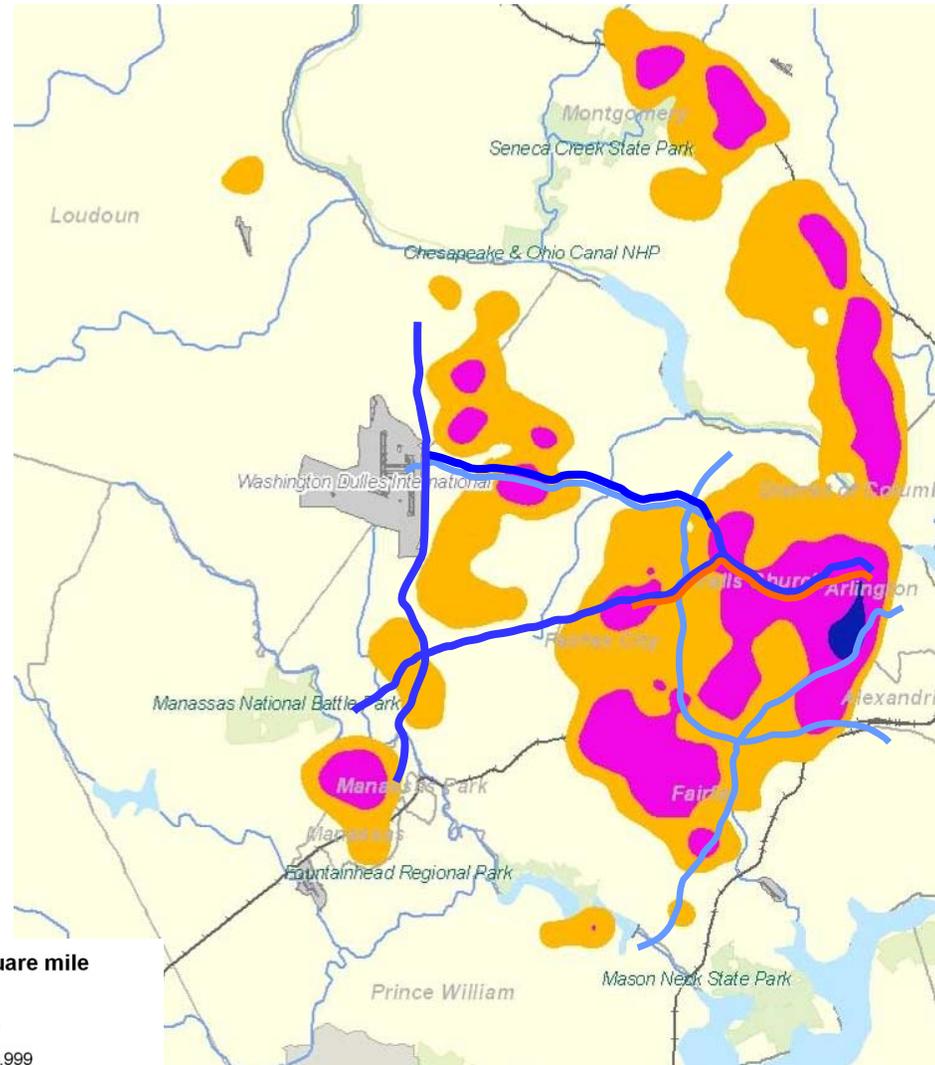


1980



Surface transportation improvements in the 1980's:

- I-66 and Dulles Connector completed inside the Beltway
- Dulles Toll Road opened
- Orange Line of Metrorail opens to Vienna
- Route 28 Special Improvement Tax District established
- I-66 widened outside the Beltway



People per square mile

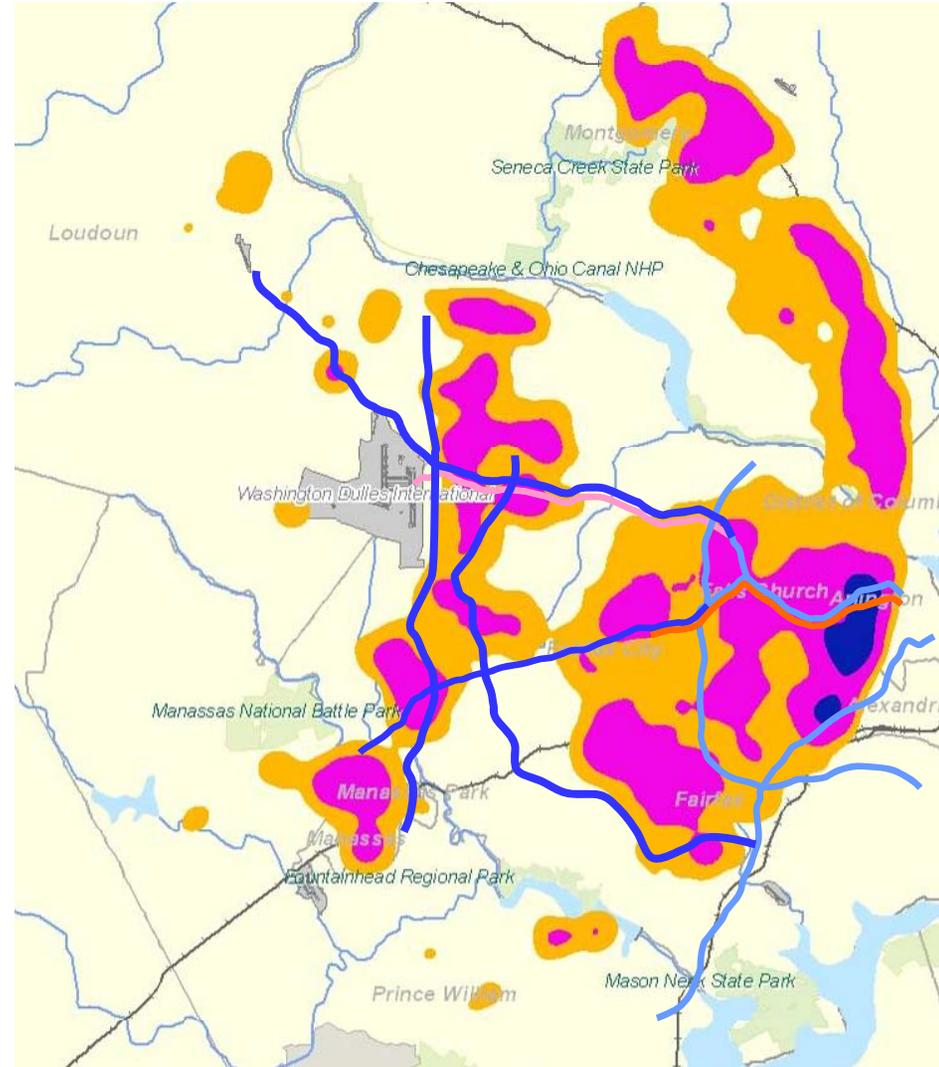


1990



Surface transportation improvements in the 1990's:

- Route 28 widened to six lanes and evolving to a freeway
- Dulles Toll Road widened...twice...with HOV
- Bus transit and carpooling facilities created
- Toll Road is extended as the Greenway
- Fairfax County Parkway opens
- I-66 widened outside the Beltway

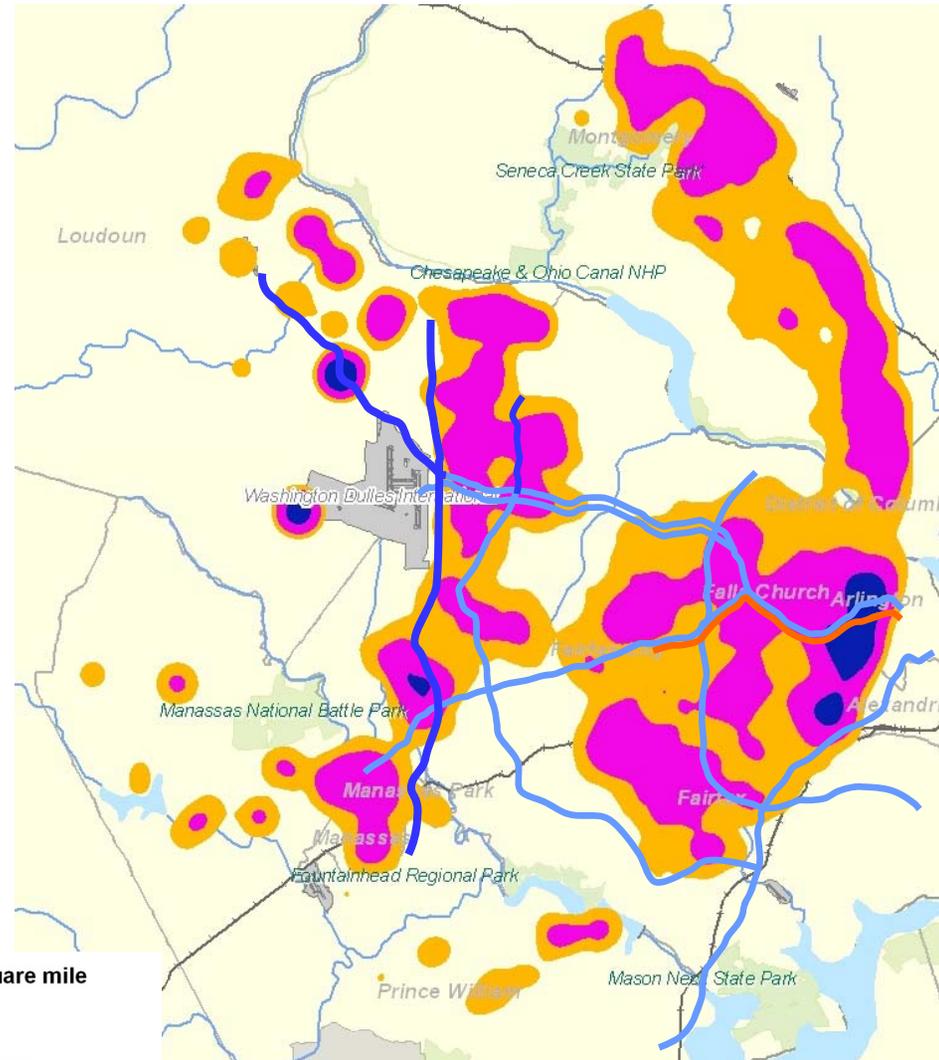


2000



Surface transportation improvements in the 2000's:

- Route 28 interchanges added
- Dulles Greenway is widened
- Fairfax County Parkway is extended north of the Dulles Corridor



People per square mile

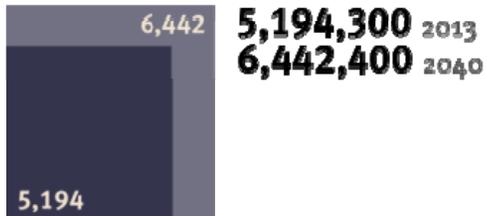


2007



Shaping the Region

Regional Population (↑24%)



Montgomery County (↑21%)



Loudoun County (↑43%)



Arlington County (↑17%)

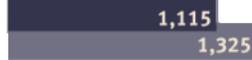


City of Alexandria (↑31%)



Fairfax County (↑19%)

(Incl. Fairfax City + Falls Church)

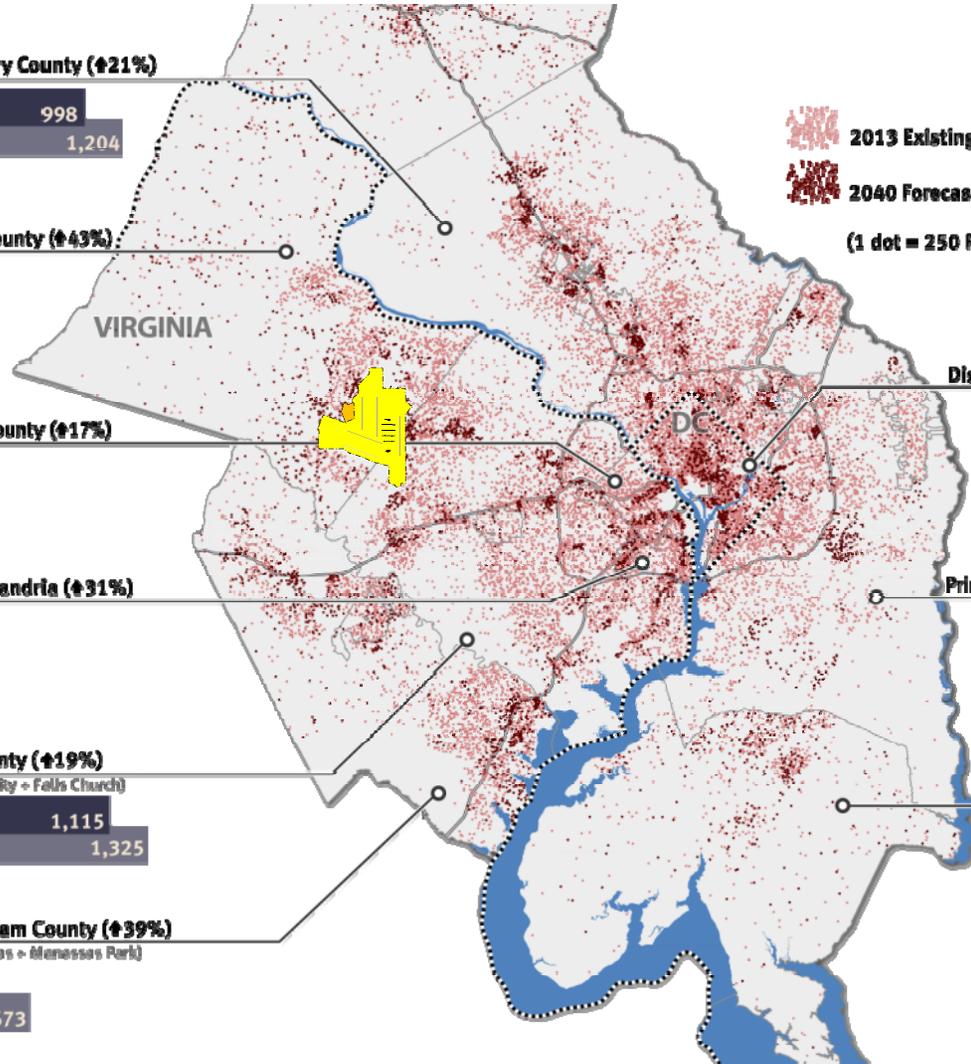


Prince William County (↑39%)

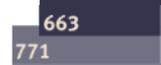
(Incl. Manassas + Manassas Park)



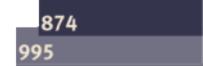
2013 Existing Population
 2040 Forecast Population Growth
 (1 dot = 250 People)



District of Columbia (↑22%)



Prince George's County (↑14%)



Charles County (↑46%)



THE FINANCIALLY CONSTRAINED

LONG-RANGE TRANSPORTATION PLAN

FOR THE NATIONAL CAPITAL REGION

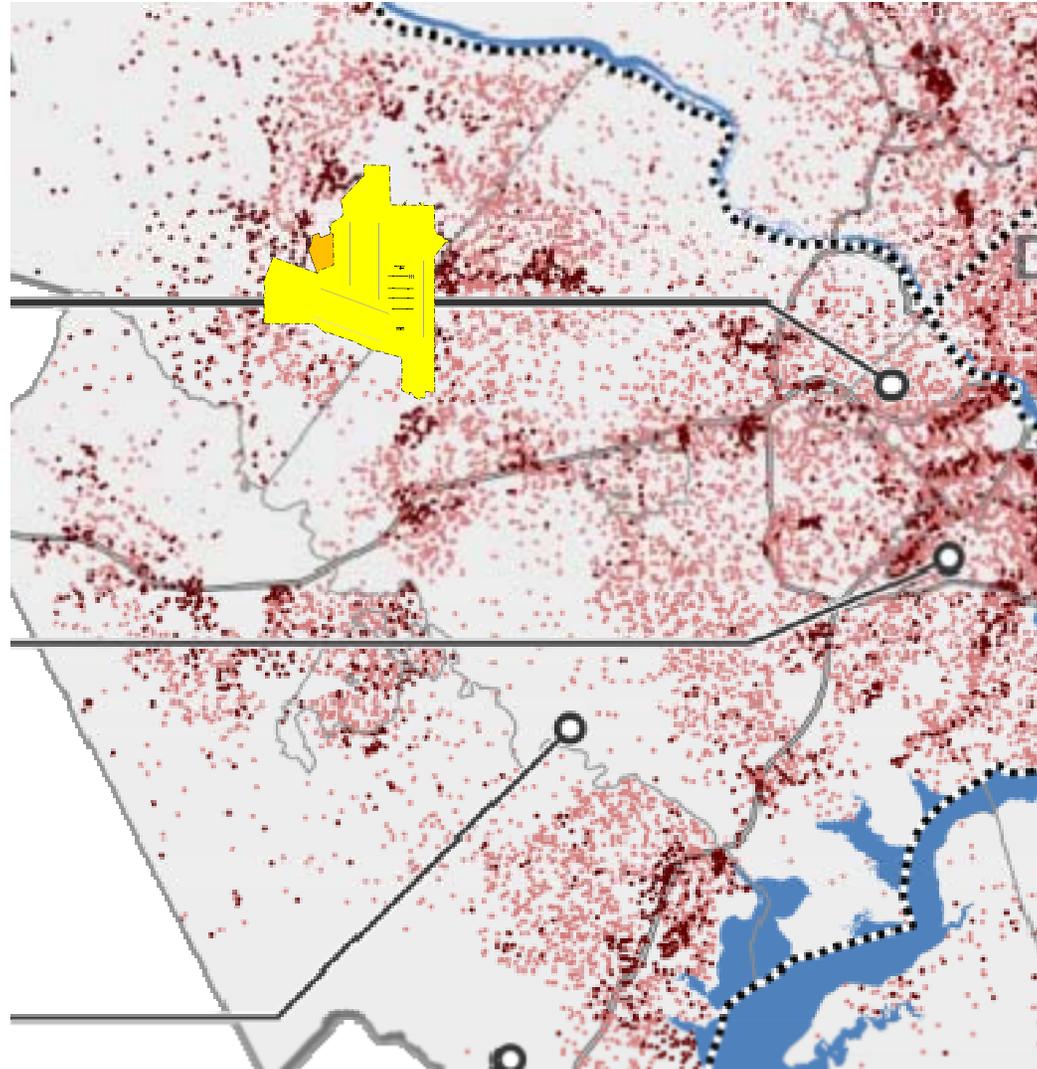
Adopted July 18, 2012

Source:
MWCOG Transportation Planning Board



Shaping the Region

Population Change
from 2013 to 2040



THE FINANCIALLY CONSTRAINED

LONG-RANGE TRANSPORTATION PLAN

FOR THE NATIONAL CAPITAL REGION

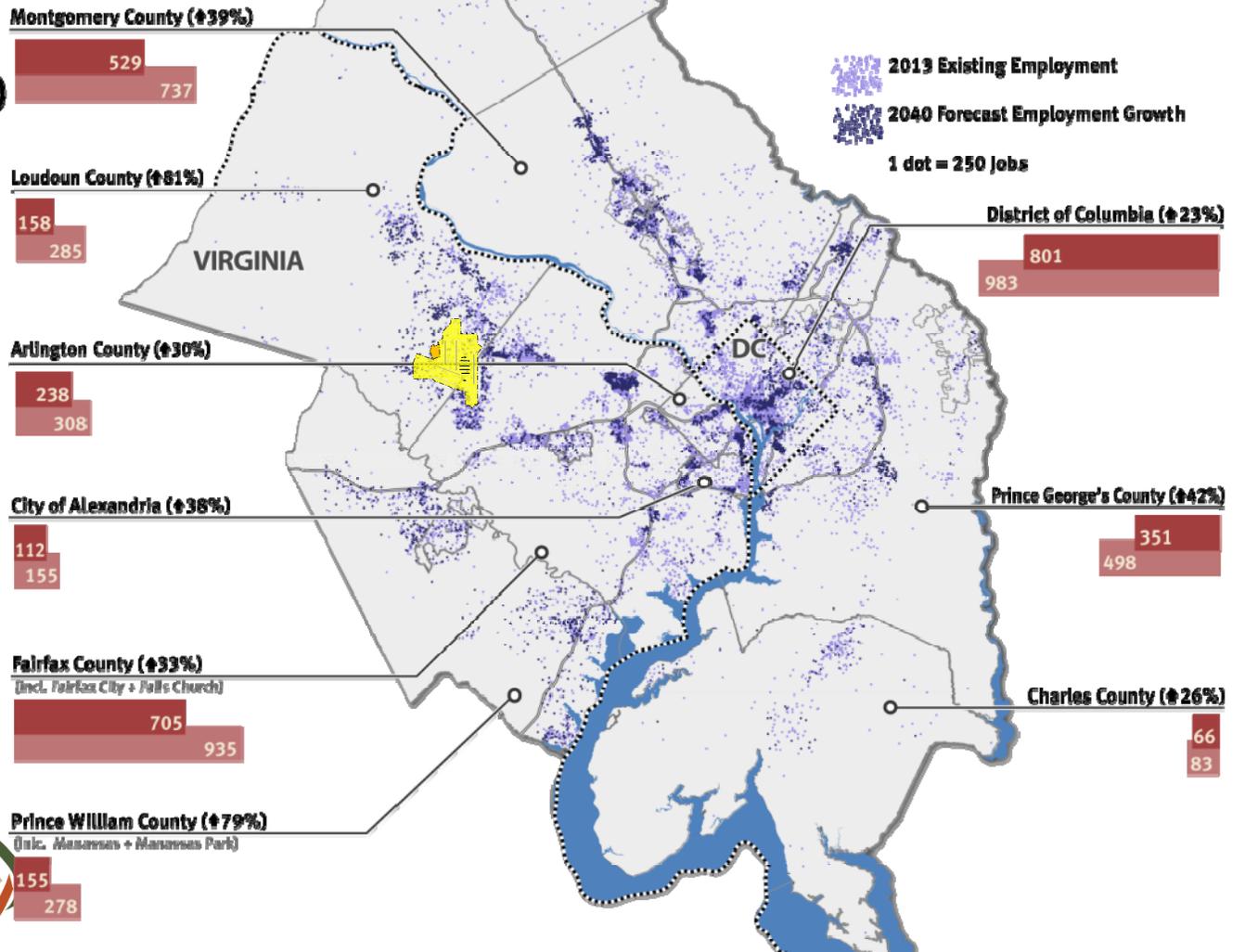
Adopted July 18, 2012

Source:
MWCOG Transportation Planning Board



Shaping the Region

Regional Employment (↑36%)



THE FINANCIALLY CONSTRAINED

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FOR THE NATIONAL CAPITAL REGION

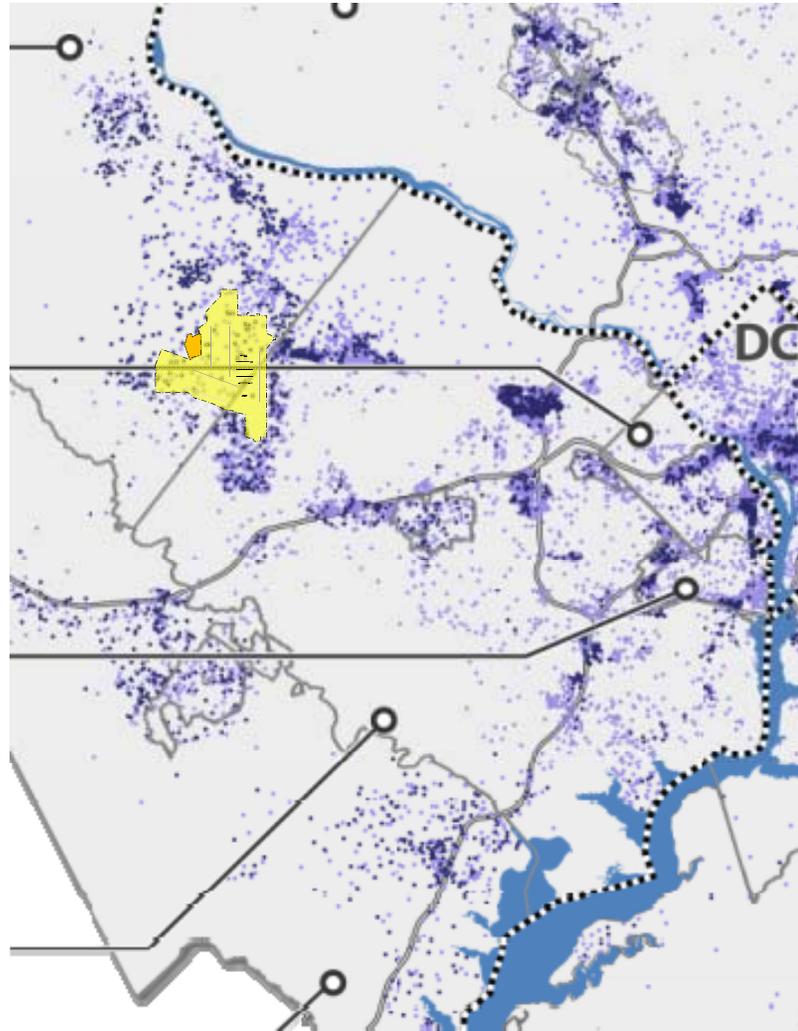


Adopted July 18, 2012



Shaping the Region

Regional Employment (↑36%)



THE FINANCIALLY CONSTRAINED

LONG-RANGE TRANSPORTATION PLAN

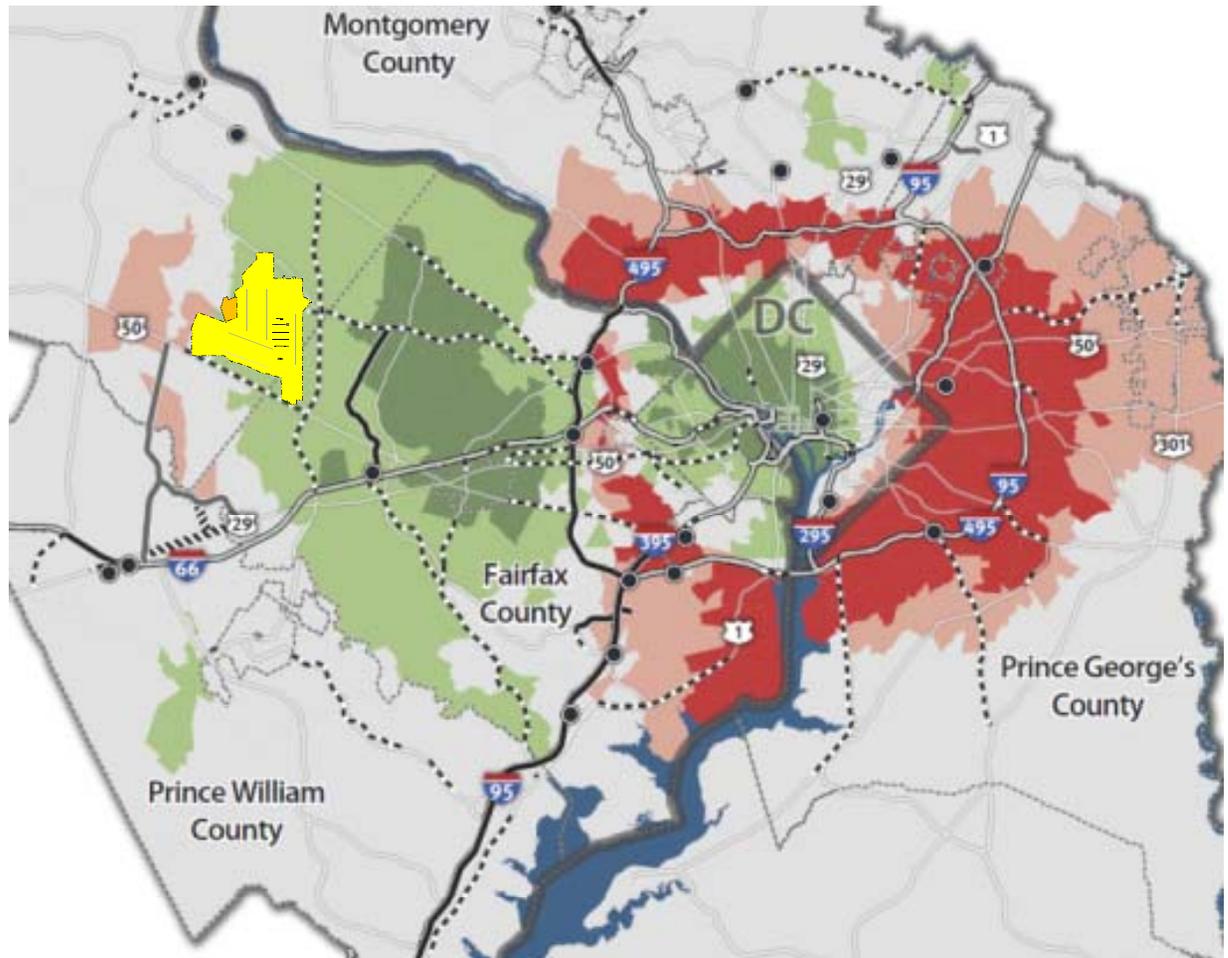
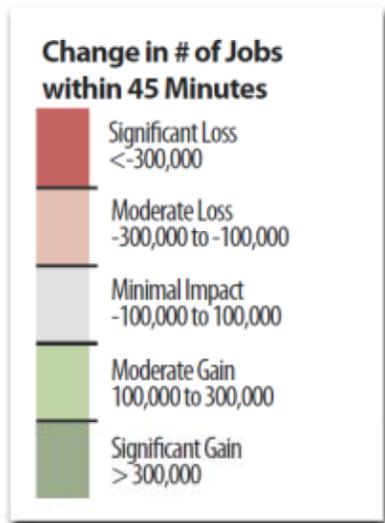
FOR THE NATIONAL CAPITAL REGION



Adopted July 18, 2012



Change in Access to Jobs: 2013 to 2040



THE FINANCIALLY CONSTRAINED

LONG-RANGE TRANSPORTATION PLAN

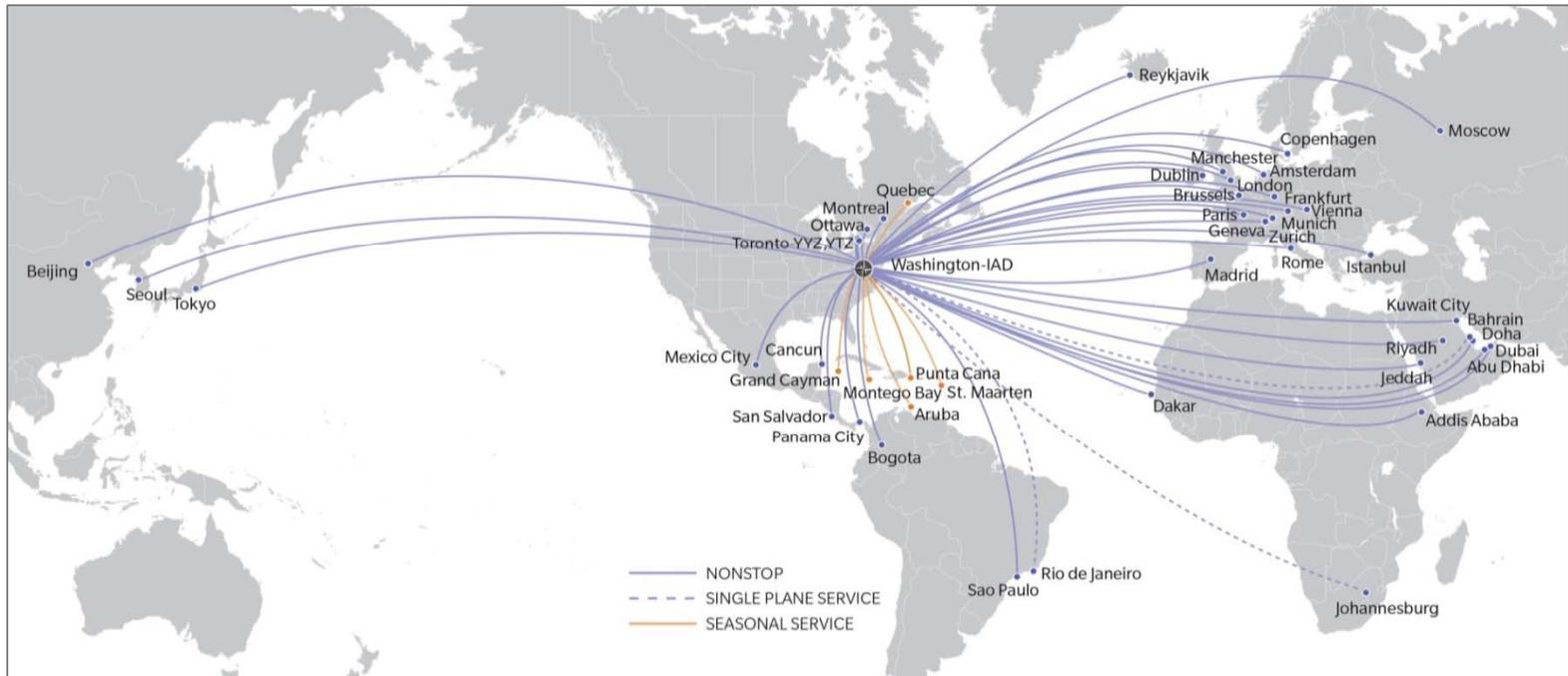
FOR THE NATIONAL CAPITAL REGION



Adopted July 18, 2012

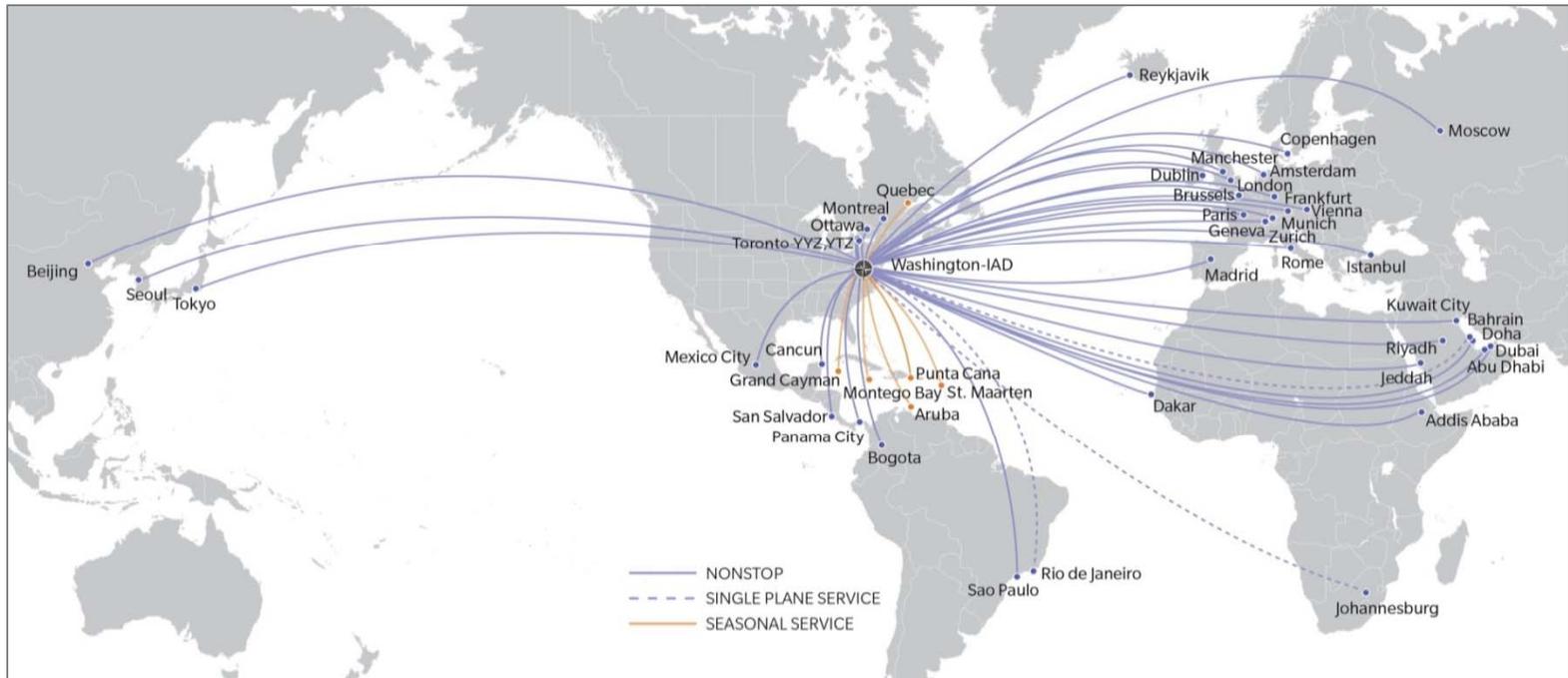


To access the potential of Washington Dulles International Airport and the world beyond you need...



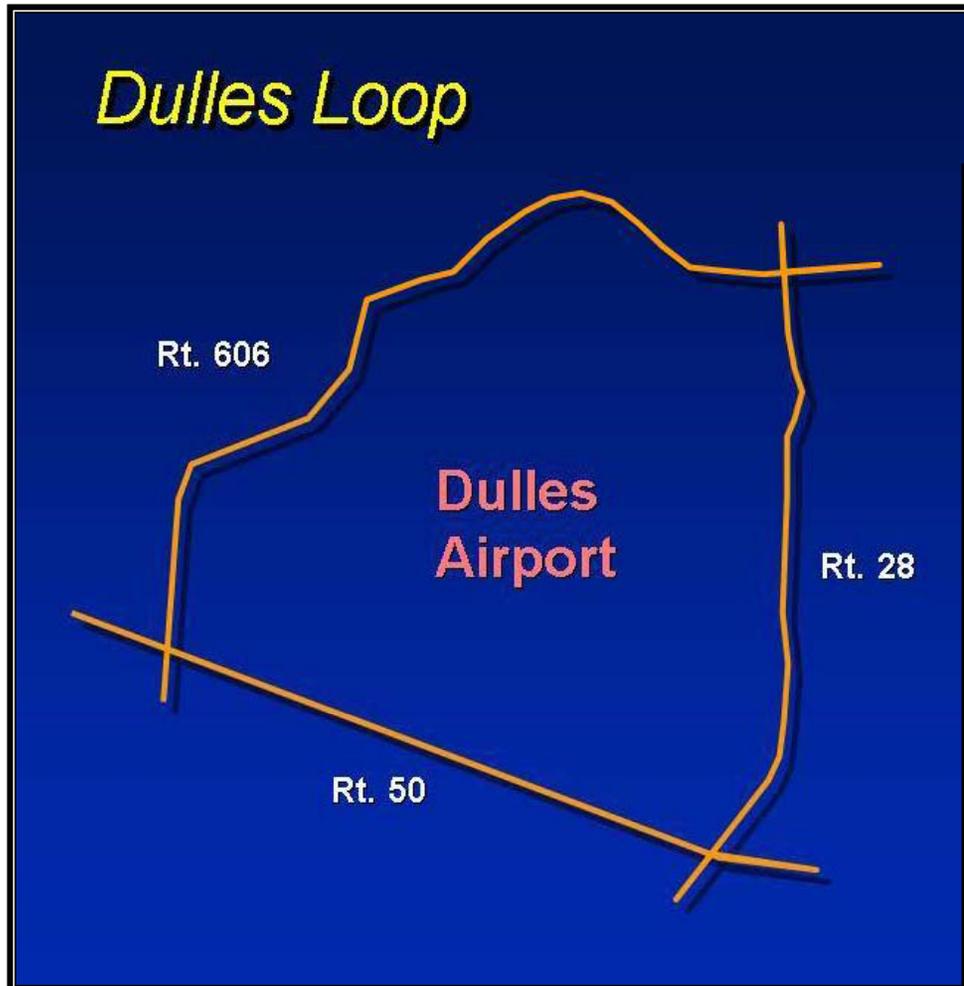


To access the potential of Washington Dulles International Airport and the world beyond you need... *access.*



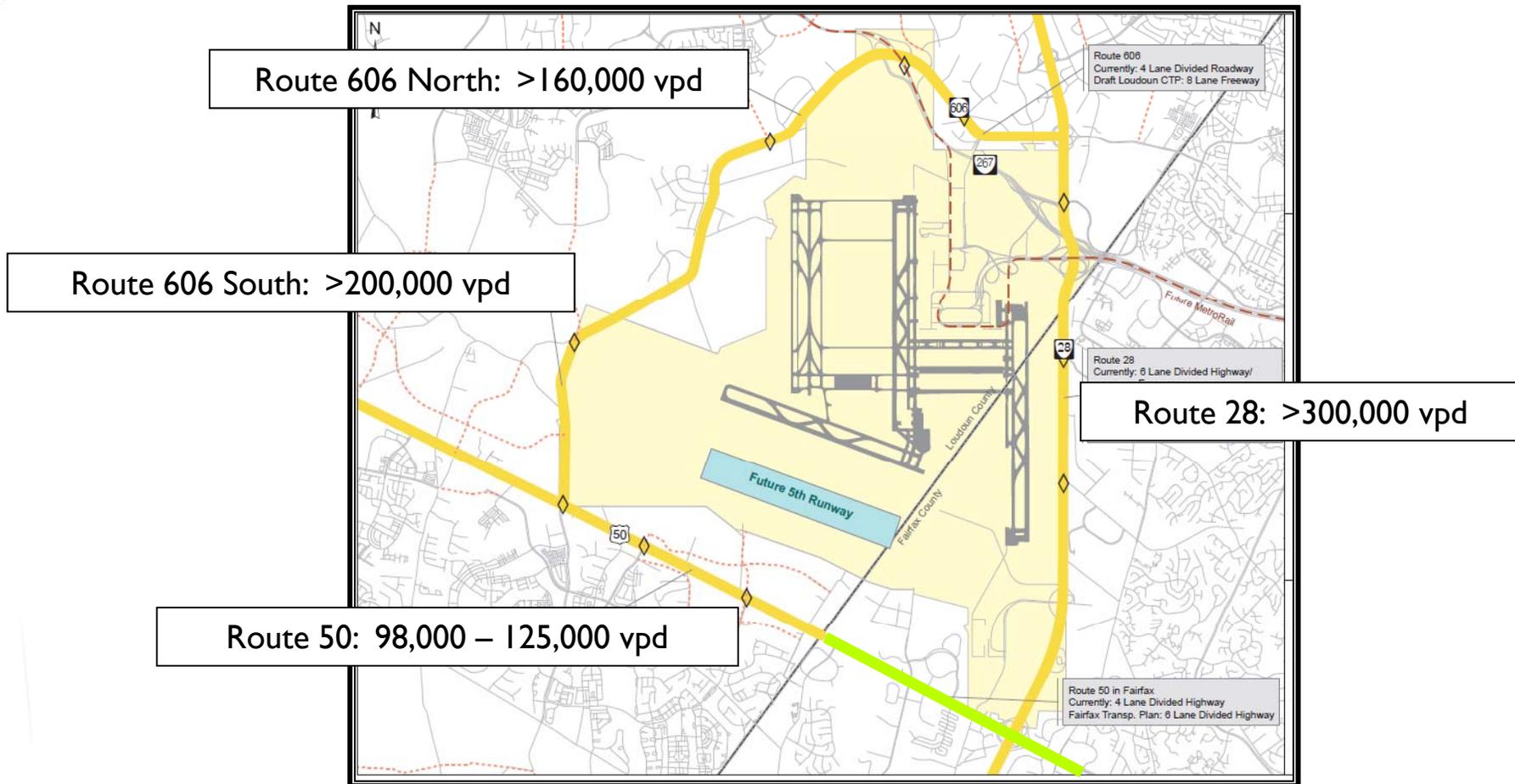


Transportation Needs for Continued Growth: Local Access





Dulles Loop: 2030 Demand

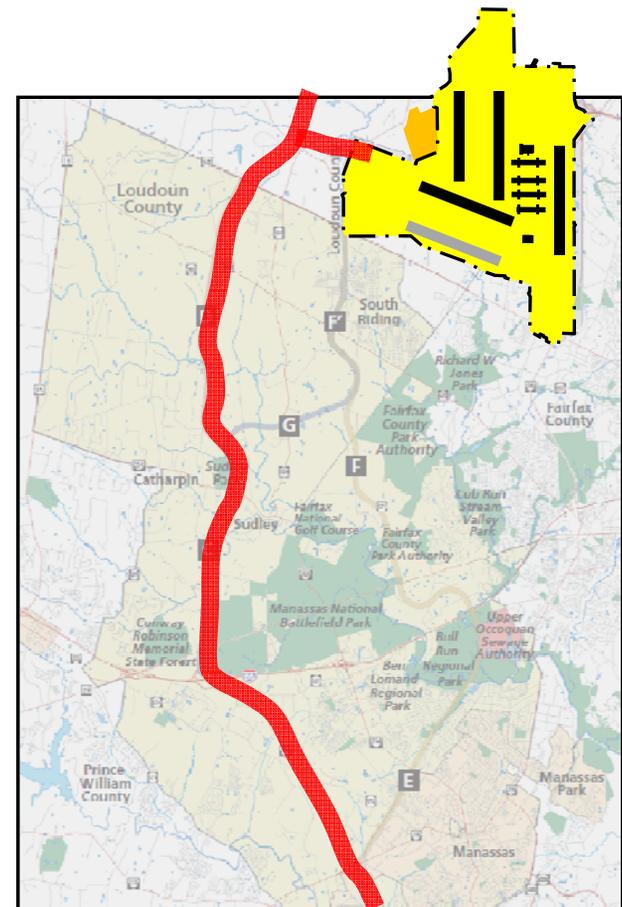
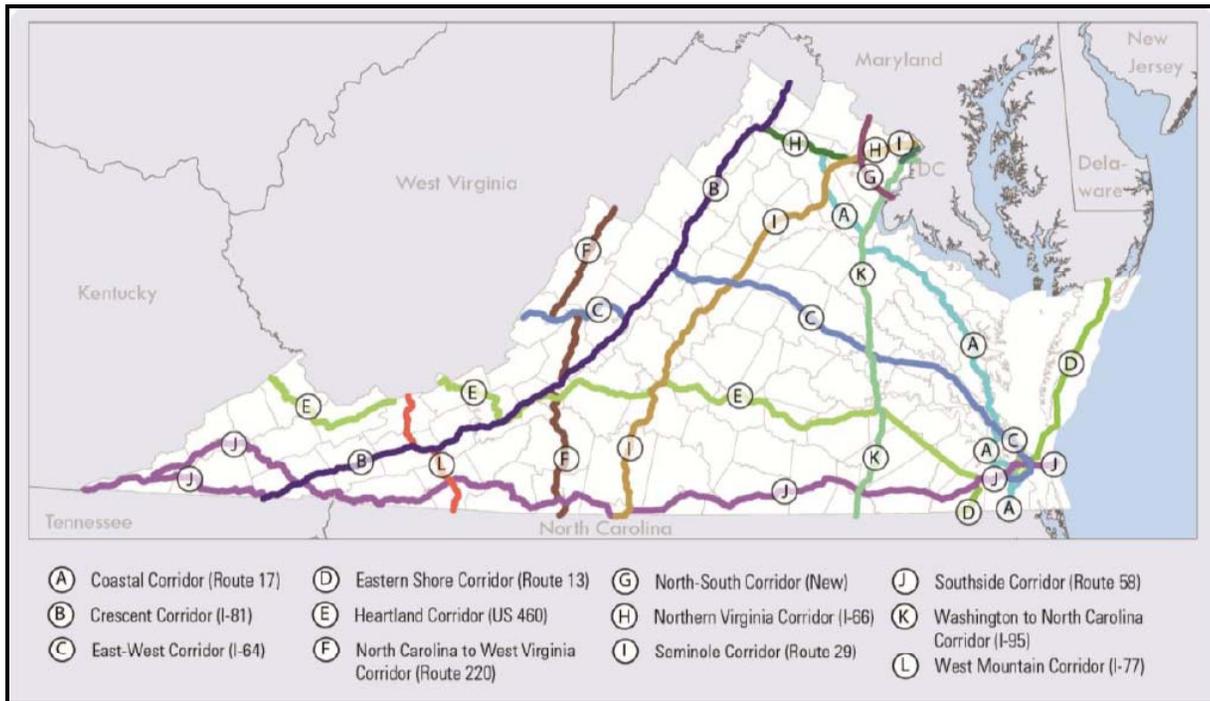


Source: Dulles Loop Implementation Plan; May 2009, Michael Baker Jr., Inc. for WATA, DATA, Loudoun County, Fairfax County, MWAA, VDOT/CTB



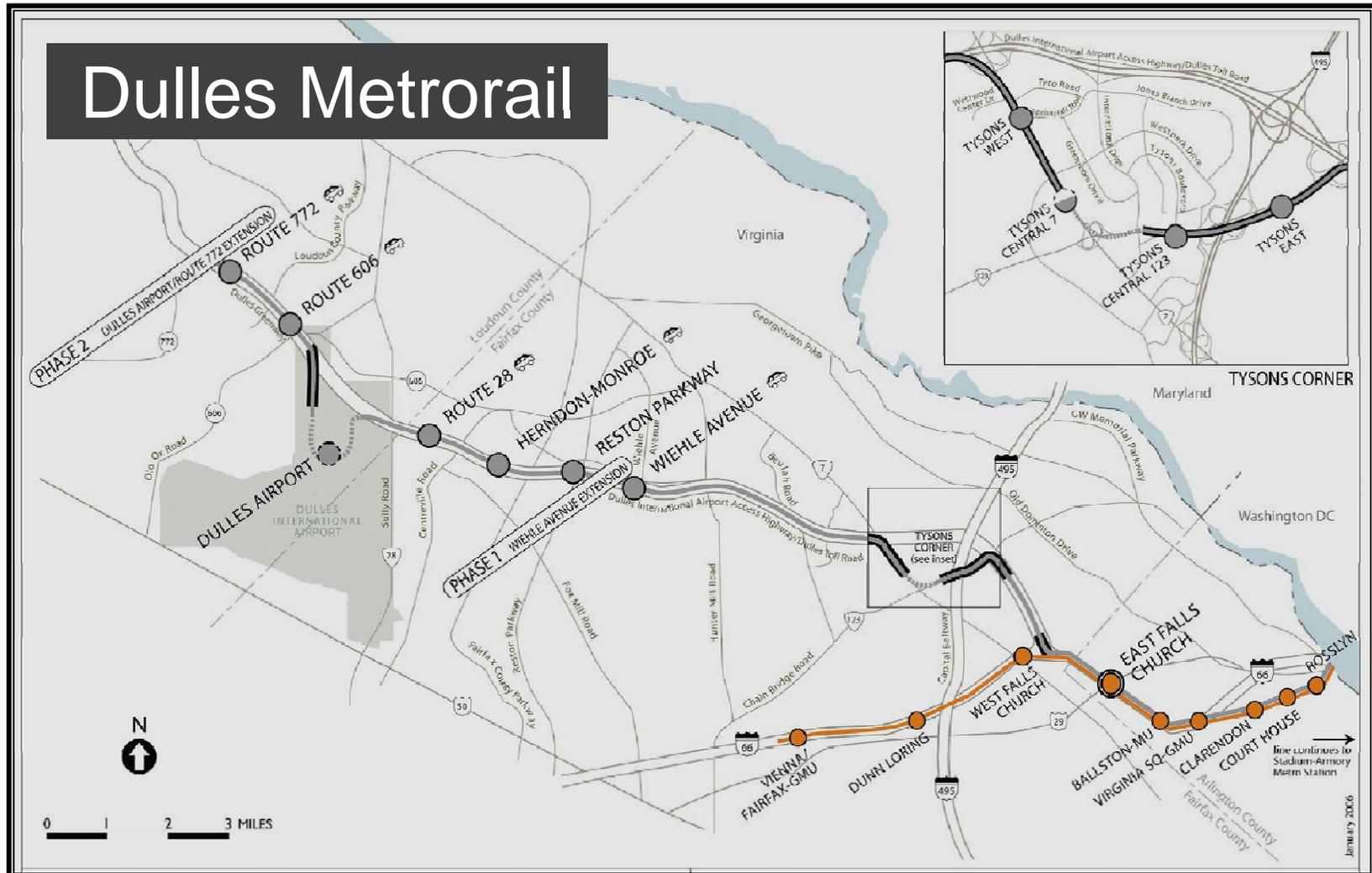
Transportation Needs for Continued Growth: Interstate Access

Northern Virginia North-South Corridor of
Statewide Significance (G)





Transportation Needs for Continued Growth: Transit Access



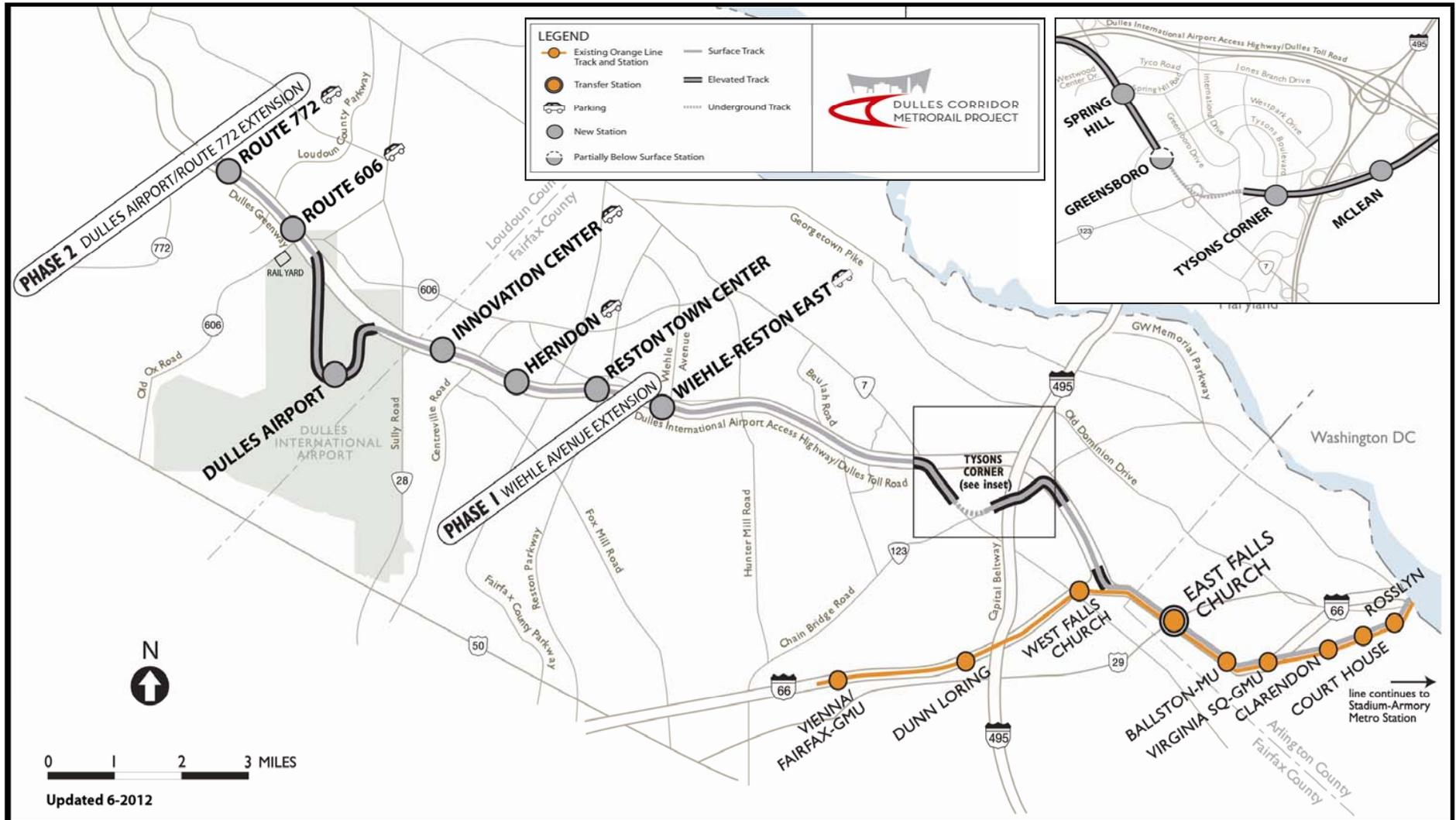
METROPOLITAN WASHINGTON AIRPORTS AUTHORITY



DULLES CORRIDOR METRORAIL PROJECT



Route Map





McLean Station



McLean Station Pedestrian Bridge Installation



Route 7 and Route 123 Tunnels



Route 7 at Greensboro Station



Wiehle –Reston East Station



Phase 2

- 11.4 –mile extension from Wiehle Avenue in Reston to Ashburn
 - 6 stations:
 - Reston Town Center
 - Herndon
 - Innovation Center
 - Dulles Airport
 - Route 606
 - Route 772/Ashburn
 - Rail Yard & Maintenance Facility
 - 5 Parking Garages





Phase 2 Package A

**Completed Preliminary Engineering
Qualifications Information Received
Short-list Phase 2 Teams Selected**

**February 2012
September 2012
October 2012**

Bechtel Transit Partners
Bechtel Infrastructure Corporation

Capital Rail Constructors
*Clark Construction Group, LLC
Kiewit Infrastructure South Co.*

Dulles APC Railbuilders
*Archer Western Contractors, LLC
PCL Civil Constructors, Inc.
Corman Construction, Inc.*

Dulles Metrorail Connectors
*Skanska USA Civil Southeast / Granite Construction Company
G.A. & F.C. Wagman, Inc. / Trumbull Corporation
Facchina Construction Company, Inc.*

Silver Line Constructors
Fluor Enterprises, Inc. / Tutor Perini Corporation / Stacy and Witbeck, Inc.

**Price Proposals Due
Contract Awarded**

**April 2013
May 2013**



METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

Dulles Airport Rail





Dulles Airport Station





METROPOLITAN WASHINGTON AIRPORTS AUTHORITY

Phase 2 Station Prototype



Actual Wiehle-Reston East Station



Ronald Reagan Washington National Airport



Dulles Corridor Metrorail Project



Dulles Toll Road



Washington Dulles International Airport



METROPOLITAN WASHINGTON
AIRPORTS AUTHORITY