

## 2011 Regional Priorities for Bus

In developing an updated list of priority projects for bus across the region, the TPB Regional Bus Subcommittee focused on eight major themes that meet regional bus customer and agency needs:



- 1. Serving Customers
- 2. Connecting the Region
- Bottlenecks and Hot Spots Bus Access to Regional Hubs / Activity Centers
- 4. The DC Core Downtown DC Bus Center & Bus Stops
- 5. Regional Transit and Intermodal Transfer Centers
- 6. Providing the Fleet Bus Facilities
- 7. Service Needs and Changes
- 8. Federal Relocation & BRAC

## 1. Serving Customers

Improving the quality of service for customers is the number one priority. Quality improvements include: information, accessibility, security, and safety. Traveler needs also need to be identified.



Improve the quality of bus service: information, accessibility, security, and safety.

- 1. Bus stop lighting.
- 2. Bus stop ADA accessibility.

Improve coordination of regional information:

- 1. WMATA trip planner real-time information,
- 2. RITIS applications for public,
- 3. 511,
- 4. Bus rider survey outer suburban travelers,
- 5. Regional market analysis.

## 2. Connecting the Region

Develop an integrated network of regional bus service, including commuter bus and routes connecting regional hubs

Service connecting to / extending Metrorail at:

- 1. Branch Ave,
- 2. Shady Grove,
- 3. Franconia-Springfield,

#### Intra-regional service:

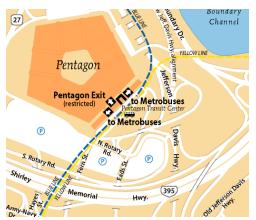
- 1. Tysons-Bethesda,
- 2. Frederick-Dulles,
- 3. Alexandria-Woodbridge.

Integrated corridor management systems

1. I-66 integrated corridor management system

# 3. Bottlenecks and Hot Spots – Bus Access to Regional Hubs and Activity Centers

Bus priority treatments are needed along major arteries and at the access points to activity centers / transit hubs, including transit signal priority (TSP), queue jumps, and busonly or transit/HOV lanes.



#### Managed lanes (HOV/HOT) include:

- 1. I-270
- 2. I-66
- 3. I-395
- 4. US-15
- 5. US-1 (in Maryland, the District, and Virginia)
- 6. MD-5
- 7. MD-373 (Accokeek Road)
- 8. MD-210 (Indian Head Highway)
- 9. 14th Street Bridge (I-395).

#### Dedicated bus access

- Duke Street / King St Metro,
  - 1. (eastbound, left turn) at Callahan in Alexandria,
  - 2. (eastbound) at Telegraph Road.
- 2. Fern / Joyce Streets (Pentagon City),
- South Eads / exit from Pentagon,
- 4. Vienna Metro.

#### **Urban roadways**

- 1. H & I Streets NW Paired Bus Lanes,
- 2. 14th Street NW Bus-Only Lane,
- 3. K Street NW.

# 4. The DC Core – Downtown DC Bus Center& Bus Stops



As the urban center, downtown DC has the highest demand for transit service, with hundreds of local, commuter, tour and intercity buses.

- Central DC Bus Storage / Layover Sites
  - Critical need for mid-day commuter and tour bus storage / layover location.
  - Joint development projects that incorporate transit needs, with street-level bus centers and air rights used for office or other commercial activities are a potential solution (e.g., Friendship Heights).
- Bus Stop Rationalization & Improvements
  - DDOT Commuter Bus Management Plan is combining 312 stops to 220.
    - ❖ This will lead to unimproved bus stops such as 7th & Maryland (L'Enfant Plaza) growing from 500 to 700 daily boarders.
- Intercity Bus Center
  - Previous locations in downtown DC are being developed, while Union Station cannot accommodate some current vehicle types (height/size).
  - Need to establishing new bus centers for the fast-growing intercity bus operators, with connections to local transit.

### 5. Regional Transit and Intermodal Transfer Centers

As travelers increase their use of transit across the region, customer facilities are needed to improve trip connections and quality of service:

- Transit Centers are needed at regional hubs to provide customers with access to local activity centers and to connecting bus services
  - Union Station, Fort Totten, Frederick Town Mall, Ballston Common Mall, Crystal City.
- Park & Ride Lots for long-distance commuters are needed in outer suburban locations and neighboring jurisdictions.
  - Springfield, Davidson, Monocacy, Myersville, Frederick City, and Potomac Mills; Calvert and St. Mary's Counties.
- I-66 Improvements could include Park & Ride lots or transfer centers at:
  - Haymarket, Gainesville, VA 234 Bypass, Bull Run, Centerville,
    Stringfellow, Fairfax Corner



#### 6. Providing the Fleet – Bus Facilities

Bus fleets require adequate facilities for servicing and maintenance to keep in a state of good repair.

 Half of public bus agencies are already exceeding intended facility capacity, imposing additional costs.



- Facilities are needed for current buses as well as to meet plans for future growth and regional goals for transit mode share.
- Facilities need to keep pace with changes in propulsion technology (e.g., Natural Gas, Hybrid, Hydrogen), and
- Future fleet needs (e.g., articulated buses, BRT vehicles).

Agencies requiring greater bus facility capacity include:

- 1) DC Circulator
- 2) Ride On
- 3) ART
- 4) PRTC
- 5) Frederick TransIt
- 6) WMATA
- 7) Fairfax Connector



## 7. Service Needs and Changes

Customer demand for transit service is increasing, both generally and in response to specific land use and transportation developments.



- Restructuring for Silver Line: 11 new bus routes, modifications to 27 routes, discontinuation of 8 routes.
- New bus service on the ICC; to expand once eastern portion opens.
- Virginia HOT Lanes opening will lead to service changes.
- Metrobus skip-stop express service is planned for more of the Priority
  Corridor Network. Funding has yet to be identified, but corridors include:
  - Veirs Mill Road (Q9), connecting two branches of Red Line.
  - White Oak-Fort Totten Metro (K9), serving FDA site and proposed transit centers.
  - Dupont Circle-Anacostia (99), serving many urban activity centers.
  - Proposed Anacostia-Congress Heights line, serving St. Elizabeth's development.
- More requests for increased Saturday and reverse-commute service.

### 8. Federal Relocation & BRAC

Federal office and military base moves are expected to significantly impact regional travel patterns. Transit service will be restructured, but investment in service and facilities are needed if the region hopes to make transit a mode of choice for these locations.

#### Base Realignment and Closing (BRAC)

- Mark Center/BRAC-133 (I-395 and Seminary Road)
- Medical Center (NIH & New Walter Reed)
- Arlington Hall (Arlington Blvd and George Mason)
- Andrews AFB, Ft. Meade, Ft. Detrick, Ft. Belvoir

#### DHS / St. Elizabeth's – 14,000 planned employees

- The DHS campus development already has dense transit service in proximity:
  25 bus routes serve nearby Metrorail stations while two adjacent corridors are among the top 10 in DC bus ridership.
- A transit center is needed to integrate restructured bus service with the development. Roadway bus priority treatments (traffic signal priority, queue jump lanes) are also needed if transit is to be effective in attracting customers.





# 2011 Regional Priorities for Bus Data Collection Update



- Spreadsheet Form distributed
- Still looking for several updates

#### Submitters requested to provide the following:

- 1. Cost of proposed projects (best estimates, ranges, etc.)
- 2. Identify following benefits:
  - a) Numbers of: passengers per day, buses per day, other
  - b) Estimates of benefits provided: travel time & reliability, improved quality & safety, # buses that can be maintained....

## Data Collection Analysis



Fifty-six projects submitted to date; 43 with enough cost/impact data to rank.

- 1. Study Projects
- 2. Projects ranked by scoring system of buses, customers, costs, and type of project
- 3. Projects ranked by cost
- Further refinements will consider project purpose, safety, and other elements.

# Study Projects (ranked in priority)



- Regional Bus Rider Surveys collect information on service needs and customer preferences.
- Connecting Regional Activity Centers study needs and options for service between suburbs and reverse commute from core.
- Rider Information Coordinate real-time arrival/departure information for transit and make available to the region.
- 4. Downtown DC and Key Gateway Access improve bus access between EDC, MD, and VA through this critical area.

# Top Improvement Projects (composite score)

Bus Stops Crystal City / Pentagon City –
 Improve bus access and stop amenities



- 2. H & I Street Paired Bus Lanes improve downtown circulation
- **3.** Pentagon / Eads Street Access Improve bus access and stop amenities
- **4. Anacostia / St. Elizabeth's Campus Access** New transit stations, stops, shuttle service to DHS campus.
- 5. Park & Ride Lots MARC lots, Frederick Towne Mall, Montgomery Mall
- 6. I-395 / 14<sup>th</sup> Street Bus Only Lanes.

## Top Projects by Cost

- 1. K Street NW Busway Proposed in 2008; plan is still needed. Construct full-time dedicated bus lanes on K Street NW between 9th and 21st Streets for use by Metrobus, DC Circulator, and commuter buses from the Maryland and Virginia suburbs.
- 2. Union Station Transit Center. Improvements to enhance the interconnectivity of modes (Metrorail, regional bus service, local bus service, commuter bus, intercity bus, Amtrak, VRE, MARC to name a few), wayfinding, and passenger areas.
- 3. Metrobus K9 White Oak Fort Totten. New limited stop express Route K9 between White Oak and Fort Totten serving 9 major bus stops along the New Hampshire Avenue corridor with 10-minute headway in both directions during peak periods.
- 4. MD New Hampshire from University Ave to I-495. K6 bus route, which runs from Ft. Totten Metro Station to the White Oak area of Montgomery County. With a peak hour, peak direction bus only lane at this location, a bus trip could be reduced by as much as 6 minutes for the entire corridor affecting both District and Maryland riders.
- 5. BRT on I-270 through Frederick and Montgomery Counties. MD I-270 has long been identified as a congested route through Frederick and Montgomery counties. Dedicated bus rapid transit lanes each direction on I-270 would improve the speed and convenience of Commuter Bus service.
- 6. PRTC Transit Center Bus Storage Additional Western Facility. Establishing a storage and maintenance facility on the western end of PRTC's service area will help alleviate capacity issues at current facility and improve service reliability and efficiency.

