



# DC GIS Steering Committee Meeting

## March 16, 2006

Barney Krucoff  
GIS Director  
Office of The Chief Technology Officer  
[Barney.Krucoff@dc.gov](mailto:Barney.Krucoff@dc.gov)  
202-727-9307





# Agenda

- Introductions – Barney Krucoff
- DC GIS News – Barney Krucoff
  - Web Site Update
  - Planimetric Map Update
  - Regional Geospatial Interoperability Update
- Data Report – Mario Field & Group
- Training Report – Tim Abdella
- GIS Systems consolidation update – Zhen Lo
- GIS Program Restructuring – Barney Krucoff / Adam Rubinson
- Agency Presentation:
  - DC EMA – Joshua Jack

Our Next DC GIS Steering Committee Meeting has been scheduled  
Thursday, May 11, 2006, at 1:00 p.m., Conference Room 1117  
441 4th Street NW.



# News Items

- GIS Liaisons are now OCTO Liaisons report to the PMO (Sandra Borden)
  - David Seidman
  - Ed Wells
  - Caroline Molivadas
  - Robert Horne
  - Mike Clifton
- David's duties are changing the most
- Other liaisons will continue to perform similar functions and have the opportunity to provide broader support.



# News Items

- GIS Budget

- Capital funding of GIS has been generous in the past.
- For 2007 The Budget Review Team (BRT) recommended that the capital budget (N1602B and ZA143C) be cut/deferred by 90%. This was not an enhancement request. Last year's capital budget book had \$3.5M for GIS in 2007. Now we will have \$350,000.
- Neither OCTO GIS nor this committee was asked to defend what was in the budget book, nor were we asked about the effect of the cuts.
- GIS continues to have a very thin operating budget within OCTO's Egov account. For 2006 that budget pays for:
  - Three FTEs
    - Barney Krucoff, GIS Director
    - Cheryl Harris, Project Coordinator
    - Mario Field, Data Team Lead
  - Approximately \$200,000 for other non-personnel service items
- A \$905,000 operating budget enhancement request was made
- More about this later in the meeting



# News Items

- <http://dcdgis.dc.gov> remake approved yesterday
  - Moves site to DSF content management system and content similar to our intranet site (<http://dcdgis.in.dc.gov>) for the public.
  - Urban Area Security Initiative Concept Paper requests \$1M with focus on regional data development
  - Coordination needed with various software packages and standards with both complementary and overlapping capabilities are vying to be the regional geospatial data clearing house and or map viewer.
    - MEGAN, EMA (ArcIMS, State of Maryland)
    - Mapping within WebEOC
    - CapStat
    - VR3 (ArcIMS, State of Virginia)
    - Others



# News Items

- MAR Web Service Change April 7
  - Adds Redundant hardware
  - Allows DCGIS.dc.gov to go to DSF
- You will need to make the following code change to every application that calls the MAR Web Service.
  - From: “<http://dcgis.dc.gov/newwebservices/locationverifier.asmx>”
  - To: “<http://citizenatlas.dc.gov/newwebservices/locationverifier.asmx>”
- Path to the Mobile Video images will also change
- The new version is live and ready to use now.
- For assistance please contact [Tianpu.Liang@dc.gov](mailto:Tianpu.Liang@dc.gov).
- This change will also be announced/processed through Remedy and the Change Control Board.



# News Items

- Proceeding enterprise software solution
  - OCTO uses consortium funds to buy a sufficient number of licenses and makes them available in a central pool and make them available to agencies.
  - Use is monitored and additional licenses added as needed
  - Agencies buy their own serve side licenses and mobile licenses
  - Agencies that already have significant pools of licenses may chose to be consolidated into the central pool.
    - If you do this, the Consortium account pays annual maintenance
    - Agencies in the process of migrating licenses
      - DCRA
      - FEMS
      - OTR
    - Agencies now encouraging the use of Citrix
      - MPD
      - DDOT



# News Items

- MWCOG GIS Committee update
  - Urban Area Security Initiative Concept Paper requests \$1M with focus on regional data development
  - Coordination needed with various software packages and standards are being evaluated to be the regional geospatial data clearinghouse and or map viewer.
    - MEGAN, EMA (ArcIMS Maryland)
    - WebEOC
    - CapStat
    - VR3 (ArcIMS Virginia)
    - Others



# News Items

- National States Geographic Information Council Spring (NSGIC) Meeting
  - State level GIS coordinators meet in Annapolis next week.
  - Agenda items of interest to NSGIC and DC
    - Imagery for the nation
    - National addressing standards
    - Census Title XIII reform
    - Next generation E911
    - Federal Geospatial Enterprise Architecture



# DC GIS Data Status Report

Mario Field

DC GIS Data Team Lead



# Updated DC GIS Data

- **Address Point (MAR)**
- **Air Emission**
- **CAMA**
- **Certificate Of Occupancy**
- **Digital Globe Satellite Imagery (10/05)**
- **Fire Alarm District**
- **GSA Federal Building**
- **Hazardous Waste**
- **Heliport**
- **Historic District**
- **Landmark**
- **Other Bus Line**
- **Other Bus Stop**
- **Overlay Zoning**
- **Owner Point**
- **Sale Point**
- **Toxic Release Inventory**
- **Water Discharge**
- **Zip Code**
- **Zoning**



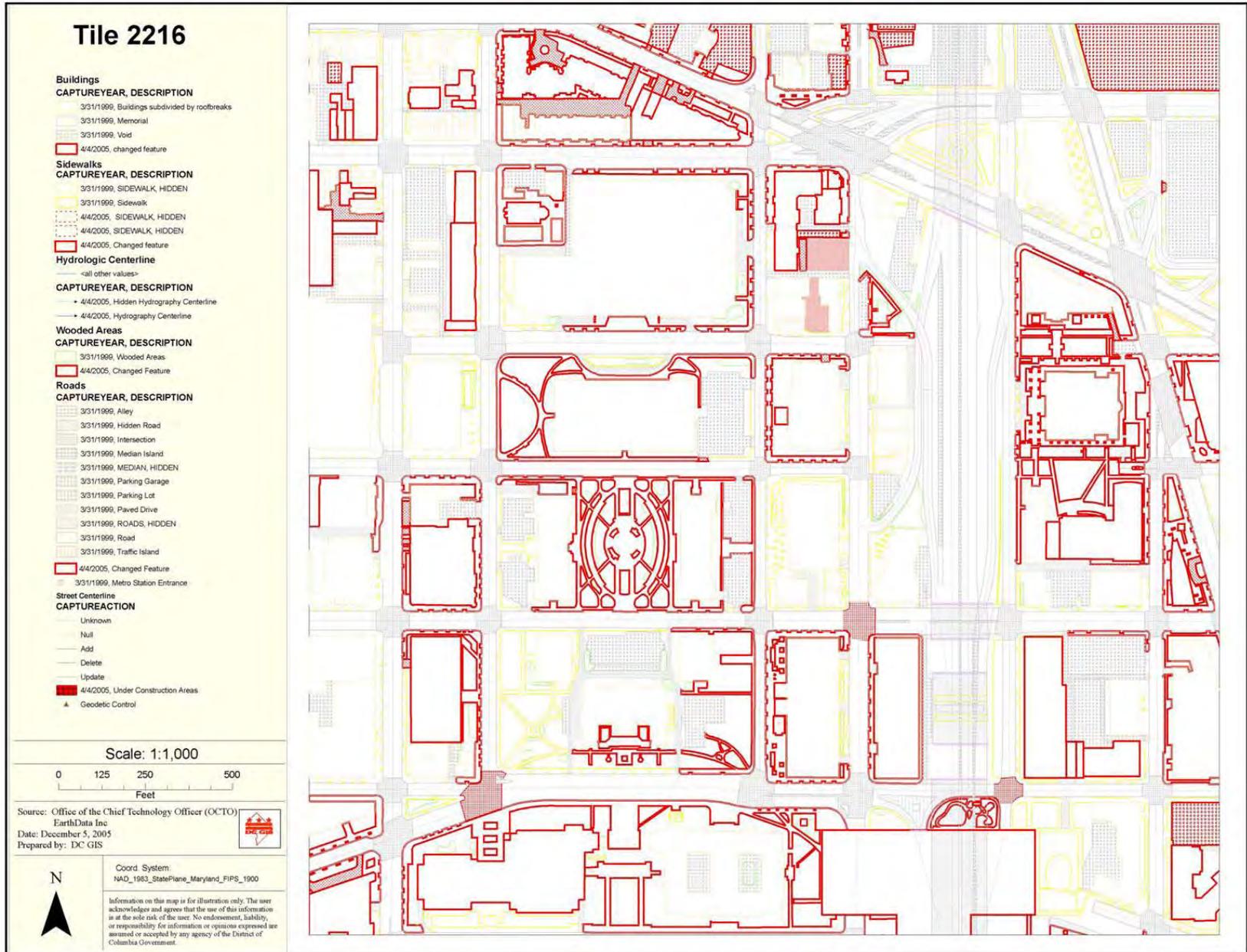
# Current DC GIS Data Update

- **BIDPly**
- **Bike Lane**
- **Bike Trail**
- **Fire Station**
- **Signed Bike Route**
- **Digital Globe Satellite Imagery (2/06)**
- **Fire Alarm District**
- **Fire Battalion**
- **Homeless Service**
- **No Fly Zone**
- **Waterbody**

➤ **April 2006 publication**



# Planimetric Data Update



## Tile 2216

### Buildings

- CAPTUREYEAR, DESCRIPTION**
- 3/31/1999, Buildings subdivided by roofbreaks
  - 3/31/1999, Memorial
  - 3/31/1999, Void
  - 4/4/2005, changed feature

### Sidewalks

- CAPTUREYEAR, DESCRIPTION**
- 3/31/1999, SIDEWALK, HIDDEN
  - 3/31/1999, Sidewalk
  - 4/4/2005, SIDEWALK, HIDDEN
  - 4/4/2005, SIDEWALK, HIDDEN
  - 4/4/2005, Changed feature

### Hydrologic Centerline

- <all other values>
- CAPTUREYEAR, DESCRIPTION**
- 4/4/2005, Hidden Hydrography Centerline
  - 4/4/2005, Hydrography Centerline

### Wooded Areas

- CAPTUREYEAR, DESCRIPTION**
- 3/31/1999, Wooded Areas
  - 4/4/2005, Changed Feature

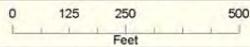
### Roads

- CAPTUREYEAR, DESCRIPTION**
- 3/31/1999, Alley
  - 3/31/1999, Hidden Road
  - 3/31/1999, Intersection
  - 3/31/1999, Median Island
  - 3/31/1999, MEDIAN, HIDDEN
  - 3/31/1999, Parking Garage
  - 3/31/1999, Parking Lot
  - 3/31/1999, Paved Drive
  - 3/31/1999, ROADS, HIDDEN
  - 3/31/1999, Road
  - 3/31/1999, Traffic Island
  - 4/4/2005, Changed Feature
  - 3/31/1999, Metro Station Entrance

### Street Centerline

- CAPTUREACTION**
- Unknown
  - Null
  - Add
  - Delete
  - Update
  - 4/4/2005, Under Construction Areas
  - ▲ Geodetic Control

Scale: 1:1,000



Source: Office of the Chief Technology Officer (CTO)  
 EarthData Inc  
 Date: December 5, 2005  
 Prepared by: DC GIS



Coord. System  
 NAD\_1983\_StatePlane\_Maryland\_FIPS\_1900

Information on this map is for illustration only. The user acknowledges and agrees that the use of this information is at the sole risk of the user. No endorsement, liability, or responsibility for information or opinions expressed is assumed or accepted by any agency of the District of Columbia Government.



# ESRI National Data

- **70 Feature Classes**
  - Boundary
  - Census
  - Landmark
  - Recreation
  - Transportation
  - Water
- **Layers not loaded yet:**
  - Rivers
  - Census Block Centroids
- **Available on Citrix: DC GIS Tool Bar**



# DC GIS Bi-Annual Training Report

Tim Abdella  
GeoSpatial Education Director



# Objective

- Improve the quality and lower the cost of GeoSpatial Education provided by the District of Columbia to its personnel
- Fulfill DC GIS Service Line Mission
- Disseminate and Demystify GIS across DC Government



# Meeting the Objective

From September 2005

## Goal

Custom Classes

CWD

Marketing

Web Site

Online Training

e-Newsletter

Student Registry

Doctors Office

Semi-Annual Report

## Status

Several courses written

3 continuing classes

Literature & digital media

Training page & Documentation

Course material available

Sent Monthly

Framework in place

Informal, something to improve

Presented today



# Bi-Annual Review

- Internal Improvements of Central GIS
- Dissemination & Demystification of GIS
- Cooperative outreach with established DC Government training Institution (CWD)
- Training & User Guide documentation development
- Monthly DC GIS Education Newsletters
- Website development and maintenance



# Improvements needed

- Class attendance
  - Intro classes full
  - Other classes suffer
  - “Managers” class should be considered Intro class
- Course material
  - Refined to reduce workload?
  - 25% finish, 50% complete most tasks, 25% left behind
- Students
  - Basic computer skills needed: (typing, mouse-ing, GUI interaction)
  - GIS is an Advanced IT, users need baseline skills

What more do we need to do?



# Agency Support

- Education & Demonstration of Integrated GIS Technology to support established Business Process
- Development of custom applications & Training
  - DCEO – underway this month
  - DOH – momentum gaining
  - MPD – embracing Central repository
  - DCRA – establishing business process
  - OAG – symbiotic relationship
  - DDOT – Spotlight on next slide

Thank you: Tianpu Lang, Zhen Lo, Jennifer Mack, Patrick Nowlan & GIS Data Team



# DDOT Spotlight

- Collaborative Integration
- Direct Connection to DDOT Data Repository
- Customized Citrix user Experience
- Focused Training planned
- Example model for other agencies

## Demonstration



# 6-Month Outlook

- VPM Maintenance Tool training – OTR
- MAR Maintenance Tool training – DCRA
- UFA Trees transactional System – DDOT
- DOH – Growing administration interest
- Outreach to NGO's (non-government organizations)
  - WMATA
  - WASA
  - Utilities
  - Vocational education
- Continued Improvements of support Infrastructure



# Q&A

**Timothy L Abdella**

**GeoSpatial Education Director**

*Office of the Chief Technology Officer*

*441 4th Street, NW*

*Washington, DC 20001*

*tim.abdella@dc.gov*

*202-727-4946 Office*

*716-308-0000 Cell*

**Thank you**



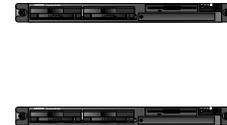
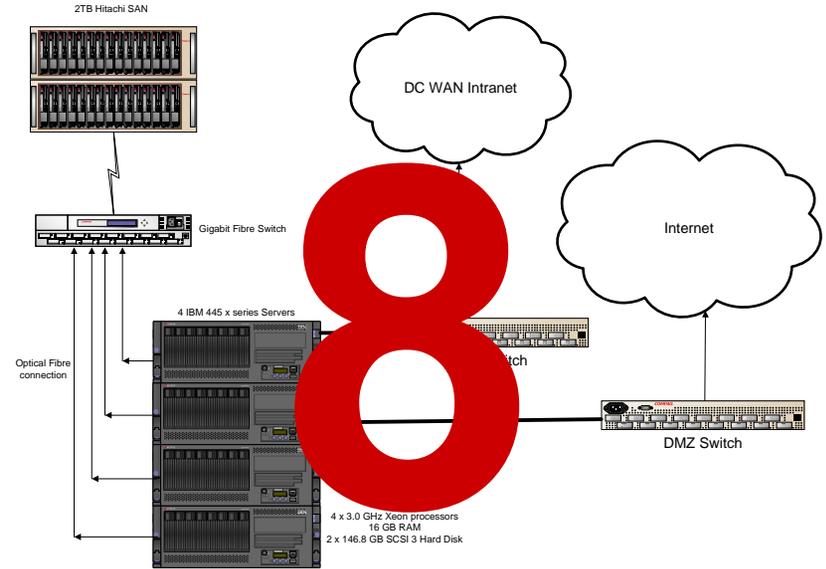
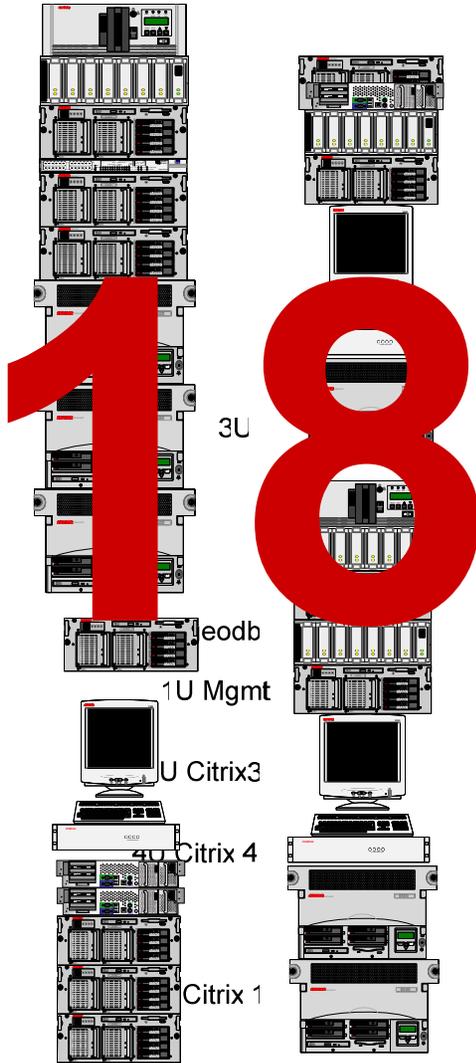
# GIS Systems Consolidation Update

Zhen Lo

GIS Systems Lead



# Server Consolidation





# Overall View

- All Hardware has been procured and delivered
- Geodatabase cluster is in testing and design phase
- 2 of 4 ESX servers are racked and ready for deployment at a Datacenter
- Migration efforts have started for phase 1
- Portal development has kicked off
- WMS and WFS service has been deployed
- Metadata repository and service in development



# Project Phases

- Phase 1
  - Consolidate and update Intranet Services
    - Citrix
    - Metadata service
    - Imagery
    - Geodatabase Cluster
- Phase 2
  - Consolidate and update Internet Services
  - DCGuide, WMS, WFS, MAR
- Phase 3
  - New Services (GIS Portal)
  - Agency Participation in enterprise data management
  - ArcServer applications, Common GIS services



# Phase 1 (April 1<sup>st</sup>)

- **Citrix**
  - Drastic increase in performance
  - 50-100 megabytes of dedicated space under each user profile
  - Deployment of ArcGIS 9.1 SP1 with supporting tools
- **Geodatabase**
  - Versioning and topology
  - High availability and performance
  - Rasters and imagery
  - Direct connect support for all ArcIMS 9.1
  - Metadata service (preliminary)
- **Active Directory**
  - Migration to 2003



# GIS Program Restructuring

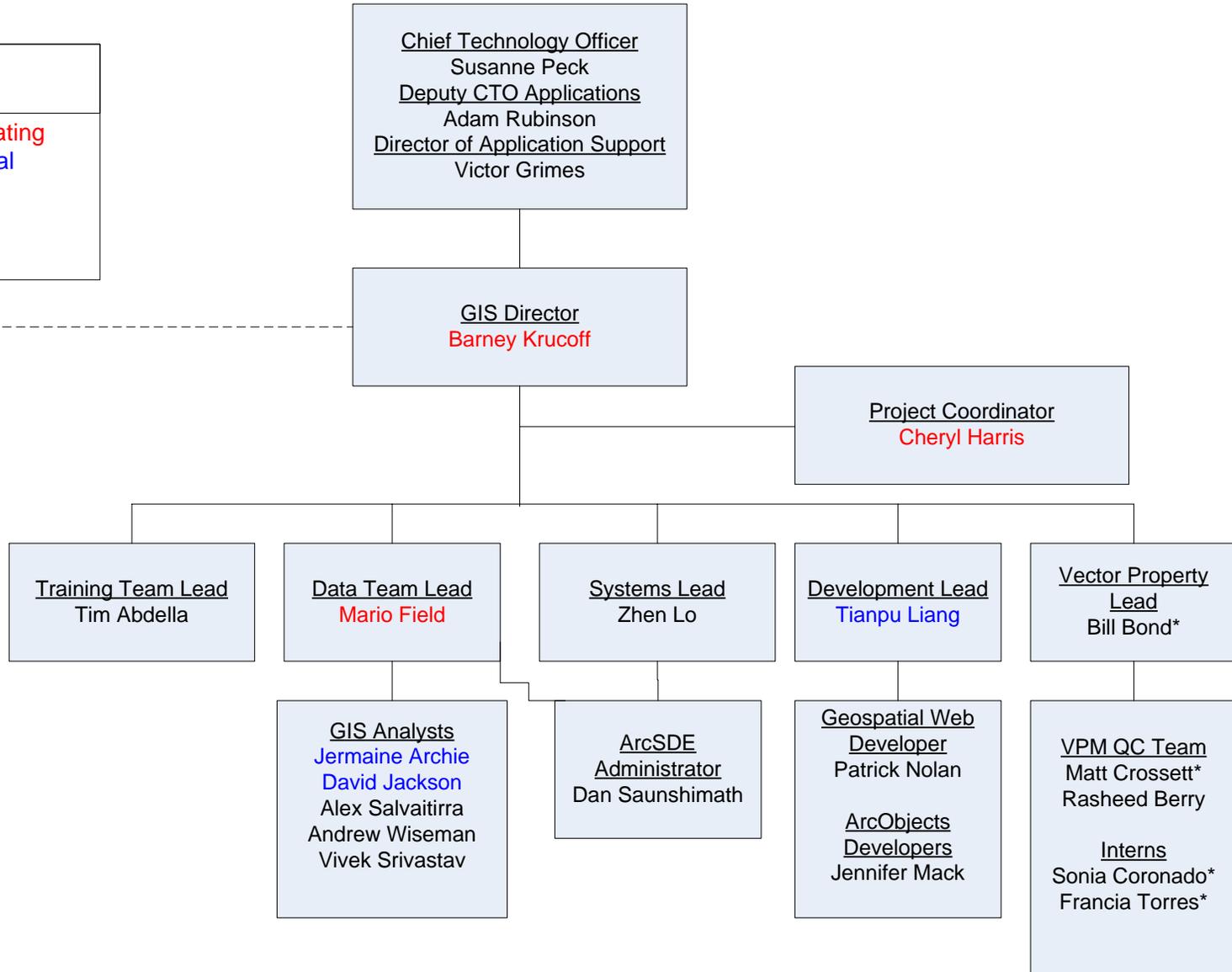
Barney Krucoff



# Current Organization

## Legend

Full Time Employee Operating  
 Full Time Employee Capital  
 \* Part Time

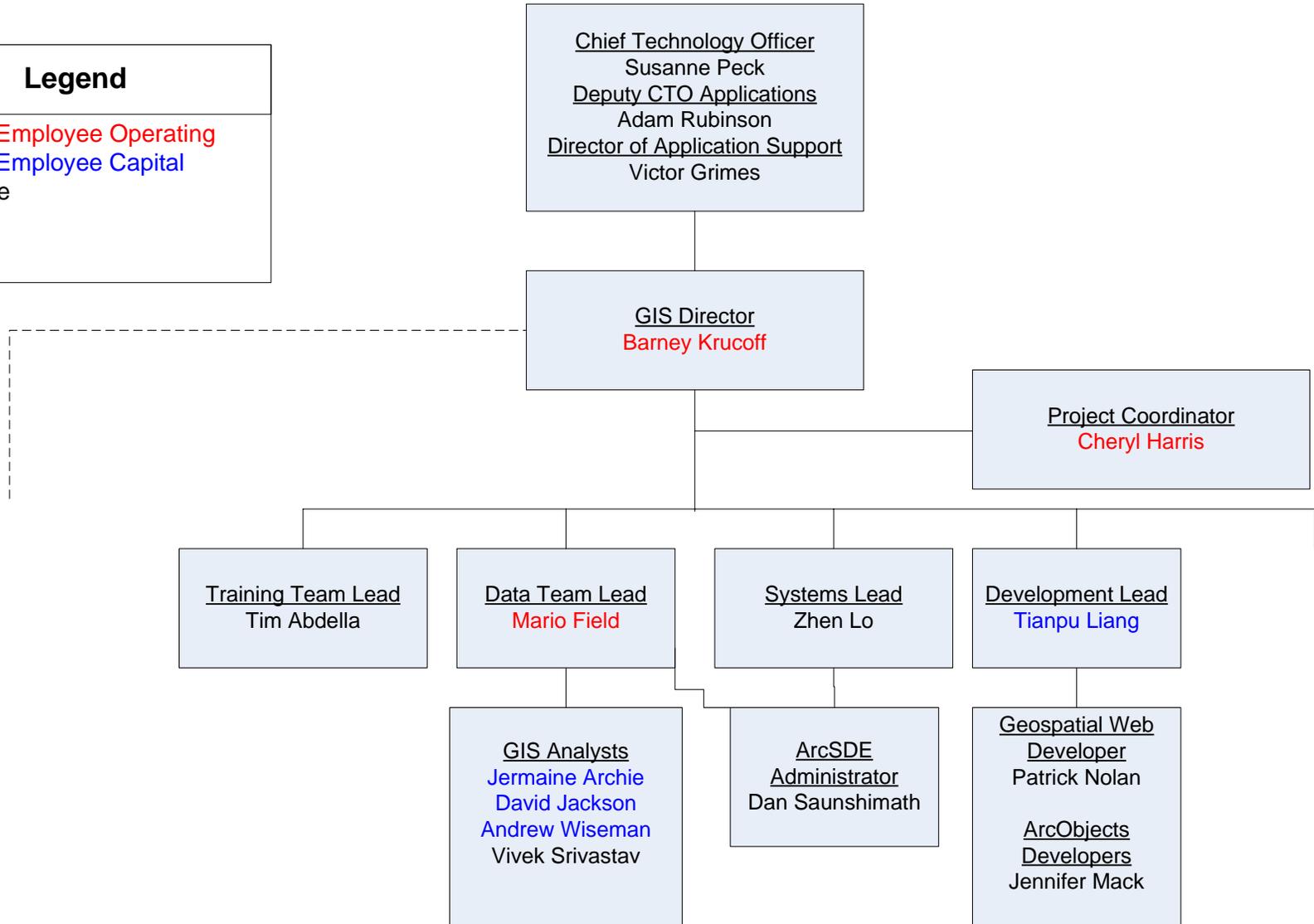




# Sustainable Organization (Hopefully)

**Legend**

Full Time Employee Operating  
Full Time Employee Capital  
\* Part Time





# Revenue and Spending YTD

<b><u>FY 2006 GIS Associated Revenue (10/1/05)</u></b>	
N1602B cary over	\$ 620,933.59
N1602B load	\$ 1,000,000.00
ZA143C carry over	\$ 980,672.00
ZA143C load	\$ 1,500,000.00
<b>Total</b>	<b>\$ 4,101,605.59</b>
<b><u>FY 2006 GIS Obligations</u></b>	
OCTO PMO for 2006 & 2007 (16%)*	\$ (656,256.89)
OCTO Reserve For Next Year (50%-350000)*	\$ (1,700,802.80)
Capital FTEs (several non-GIS)	\$ (680,000.00)
Capital Obligations YTD	\$ (545,880.00)
<b>Total</b>	<b>\$ (3,582,939.69)</b>
<b>Maximum Available To Spend Rest of 2006</b>	<b>\$ 518,665.90</b>
*OCTO Sustainability Budget Policy	



# Spending Remainder of 2006

<u>Procurement Name</u>	<u>Commodity Type</u>	<u>RQ# (if Established)</u>	<u>Estimated Value of Action</u>	<u>Keep</u>	<u>Cost</u>	<u>\$</u>	<u>518,655.00</u>
Multiple GIS Analysts	Augmentation	RQ230821	\$495,000	n	\$ -	\$	518,655.00
Add Public Land to Vector Property Map	Service		\$200,000	n	\$ -	\$	518,655.00
ESRI Software Maintenance	Software		\$120,000	y	\$ 120,000.00	\$	398,655.00
OTR GIS Support	Augmentation	RQ190203	\$118,482	n	\$ -	\$	398,655.00
ArcObjects Developer 2	Augmentation	RQ208025	\$95,000	y	\$ 95,000.00	\$	303,655.00
ArcObjects Developer 1	Augmentation	RQ208019	\$80,000	y	\$ 80,000.00	\$	223,655.00
Business Data for DC Guide	Service	RQ247041	\$80,000	n	\$ -	\$	223,655.00
GIS Systems Lead	Augmentation	RQ245272	\$80,000	Y	\$ 80,000.00	\$	143,655.00
Additional Bridges to soften cuts	Augmentation		\$75,000	n	\$ -	\$	143,655.00
Oracle Software Maintenance	Software		\$30,000	y	\$ 30,000.00	\$	113,655.00
Operational Staff	Service		\$60,000	n	\$ -	\$	113,655.00
Master Address Repository Maint	Augmentation		\$60,000	y	\$ 60,000.00	\$	53,655.00
Zhen Lo Bridge	Augmentation		\$25,000	y	\$ 25,000.00	\$	28,655.00
Regional Data	Data		\$15,000	n	\$ -	\$	28,655.00
Citrix Software Maintenance	Software		\$10,000	y	\$ 10,000.00	\$	18,655.00
Satellite Imagery	Service		\$10,000	y	\$ 10,000.00	\$	8,655.00
Routing Data	Data		\$10,000	y	\$ 10,000.00	\$	(1,345.00)
			\$1,563,482.00		\$520,000.00		



# Projects we can still finish

- Infrastructure Consolidation
  - System Operations
  - 2005 Planimetric Update
  - MAR Maintenance
  - Embed GIS on more agency web sites
  - Training Program
  - Smaller Data Sets Maintenance
  - New data catalog and web services
- 
- Vector Property Map (Transfer to DCRA)



# What won't happen in 2007

- Onsite Agency Support
- New mapping in 2007
  - Orthos (with USGS)
  - Planimetric Update
  - Pictometry
  - Business data
  - Mobile Video
- Major Projects falling off the radar
  - Contour/Digital Terrain Model Upgrade
  - 3D Mapping
  - Adding units to the MAR
  - Underground Mapping (with DDOT)



# The Memo

- Why
  - If they cut and no one complains, they cut the right thing.
  - We have a good story to tell
- What we hope gain
  - Recognition for what we have accomplished
  - Go on the record that DC GIS needs/deserves operating money
  - Head off a cumbersome charge back system
  - Maybe get some money



# District of Columbia

## Emergency Management Agency



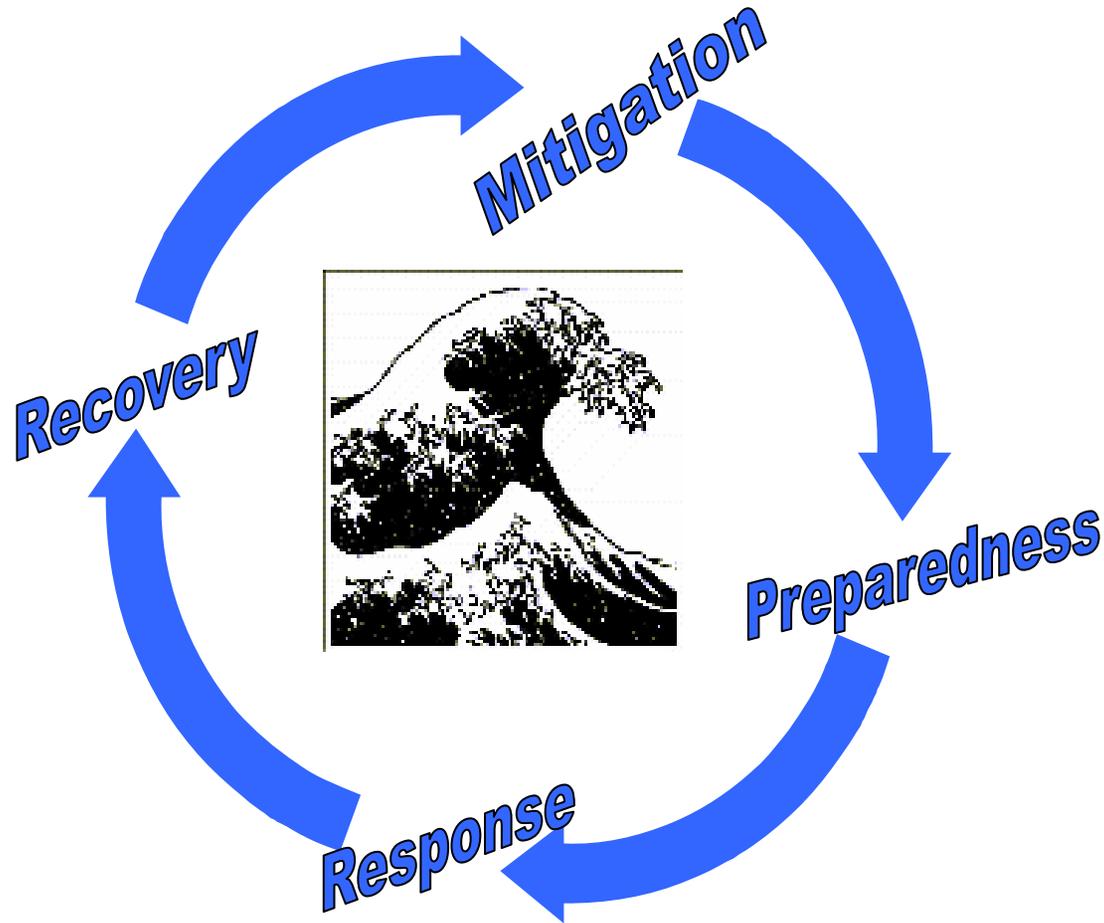
**Anthony A. Williams**  
**Mayor**



**Barbara Childs-Pair**  
**Director**



# DCEMA Participates in the 4 Phases of Comprehensive Emergency Management





# The 15 District Emergency Support Functions (ESFs)

- |          |   |           |  |
|----------|---|-----------|--|
| <b>1</b> | <b>Transportation</b><br>District Department of Transportation    | <b>9</b>  | <b>Urban Search and Rescue</b><br>DC Fire and EMS Department                                 |
| <b>2</b> | <b>Communications</b><br>Office of the Chief Technology Officer   | <b>10</b> | <b>Hazardous Materials</b><br>DC Fire and EMS Department                                     |
| <b>3</b> | <b>Public Works and Engineering</b><br>Department of Public Works | <b>11</b> | <b>Food</b><br>Department of Human Services  |
| <b>4</b> | <b>Fire Fighting</b><br>DC Fire and EMS Department                | <b>12</b> | <b>Energy</b><br>DC Energy Office  |
| <b>5</b> | <b>Information and Planning</b><br>Emergency Management Agency    | <b>13</b> | <b>Law Enforcement</b><br>Metropolitan Police Department                                     |
| <b>6</b> | <b>Mass Care</b><br>Department of Human Services                  | <b>14</b> | <b>Community and Media Relations</b><br>Office of Communications                             |
| <b>7</b> | <b>Resource Support</b><br>Office of Contracting and Procurement  | <b>15</b> | <b>Donations and Volunteer Management</b><br>DC Commission on Community and National Service |
| <b>8</b> | <b>Health and Medical Services</b><br>Department of Health        |           |  |



# DCEMA Mission Statement

**The Mission of the *Emergency Management Agency*...**

**is to administer a comprehensive community-based emergency management program**

**in partnership with the residents and businesses of the District of Columbia**

**so that together we can reduce the loss to life and property and protect the environment.**

**EMA executes its mission in coordination with District, Regional, Federal and private sector agencies to meet new and continuing challenges**

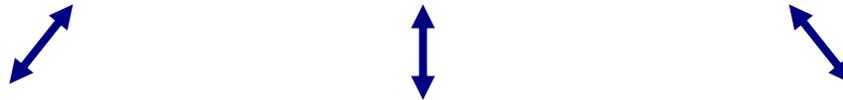


# Regional and National Coordination

- **FRP**
- **DRP**
- **Virginia EOP**
- **Maryland EOP**



- **Regional Plan**
- **Terrorism Annex**
- **County Plans**



**Maryland**



**District of Columbia**



**Virginia**





# DC's List of Top 18 Hazards

- Terrorism (WMD and Conventional)
- Winter Storms
- Urban Fires
- Transportation Accidents
- Special Events Demonstrations
- Urban Floods
- Water Supply Failure
- Critical Resources Shortages
- Utility and Power Failures



# DC's List of Top 18 Hazards *(cont.)*

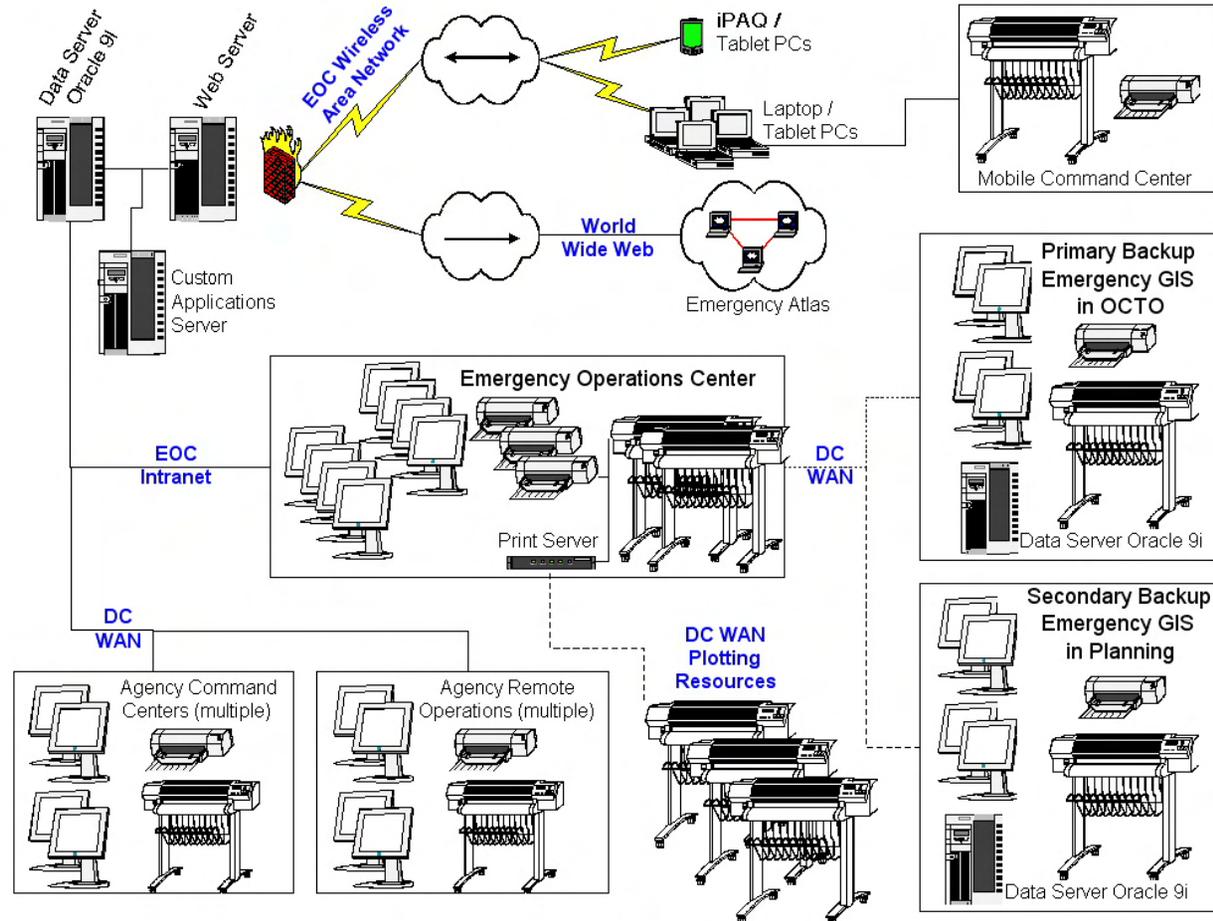
- Human Viruses and Epidemics
- Hurricanes
- Thunderstorms/Tornados
- Radiological and Hazardous Materials Incidents
- Prison/Jail Incidents
- Civil Disorders
- Explosions
- Earthquake
- Extreme Heat/Cold





# GIS Architecture

- Wholly contained within EMA
- Full Redundancy
- Field Deployable
- Remotely Accessible





# Objective

*To save lives and protect property and the environment in the District of Columbia by focusing on the following emergency management priorities:*

- Emergency Operations Center (EOC)
- Emergency Communications Center (ECC) Functions – 24 hour
- Planning and Training Functions
- Special Events and Public Information
- Mitigation and Recovery Services



# Situational Awareness Support

**In situational awareness, real-time or near real-time information is key. GIS integrated with:**

- Traffic Cameras
- Mayor's Call Center
- Weather
- Other Emergency Service Providers
- CIMS \*

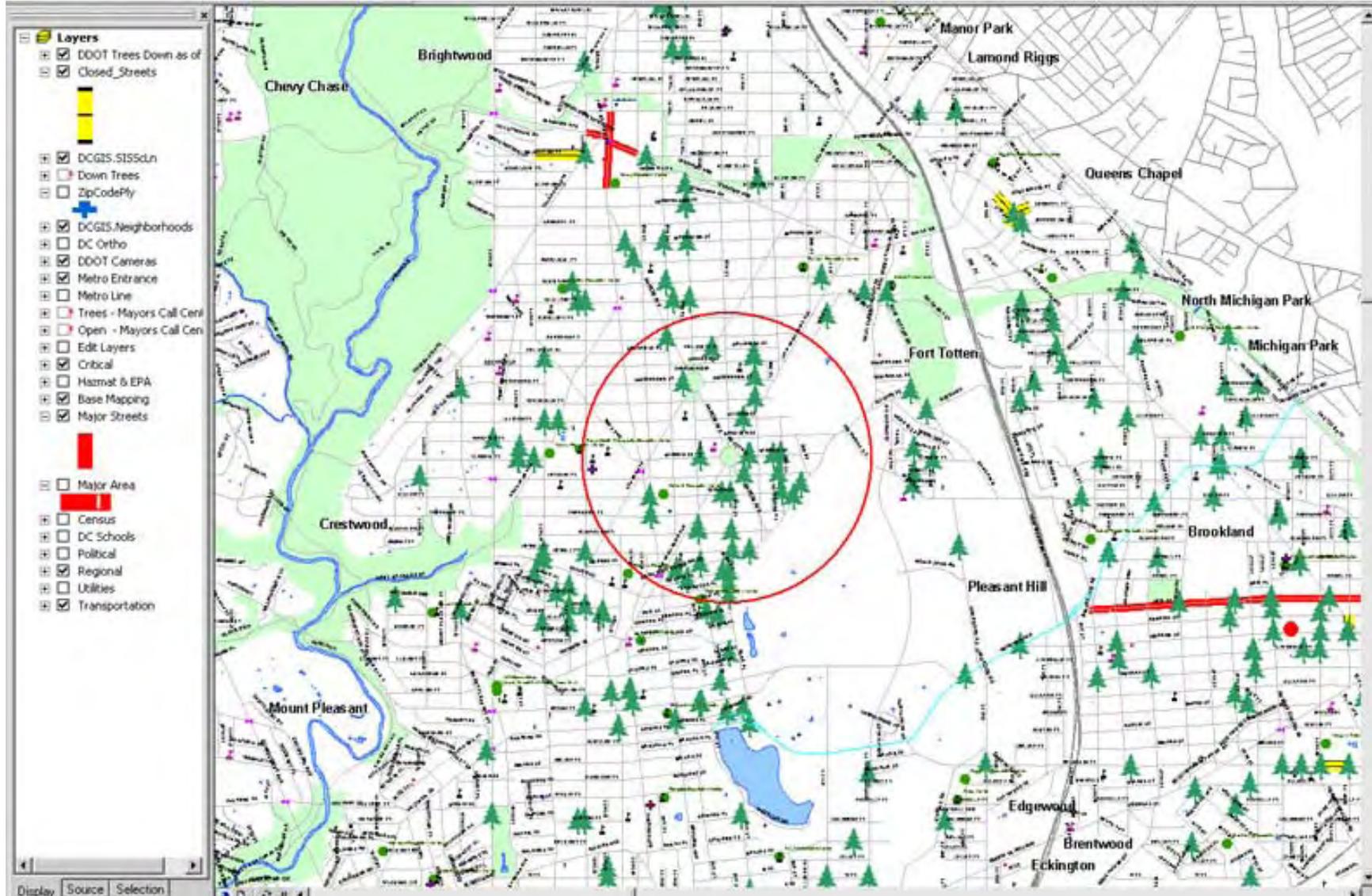


# DDOT Traffic Cameras

The map displays the Metro system routes in red, blue, and yellow, with purple 'M metro' icons indicating camera locations. Major streets shown include Massachusetts Ave, New York Ave, and Constitution Ave. A 'DDOT Camera Viewer' window is overlaid on the map, showing a live video feed of a street scene with cars and a white truck. The window title is 'DDOT Camera Viewer' and the camera name is 'Camera: 12th St NW & Constitution Ave NW'. A 'CLOSE' button is visible at the bottom of the window.

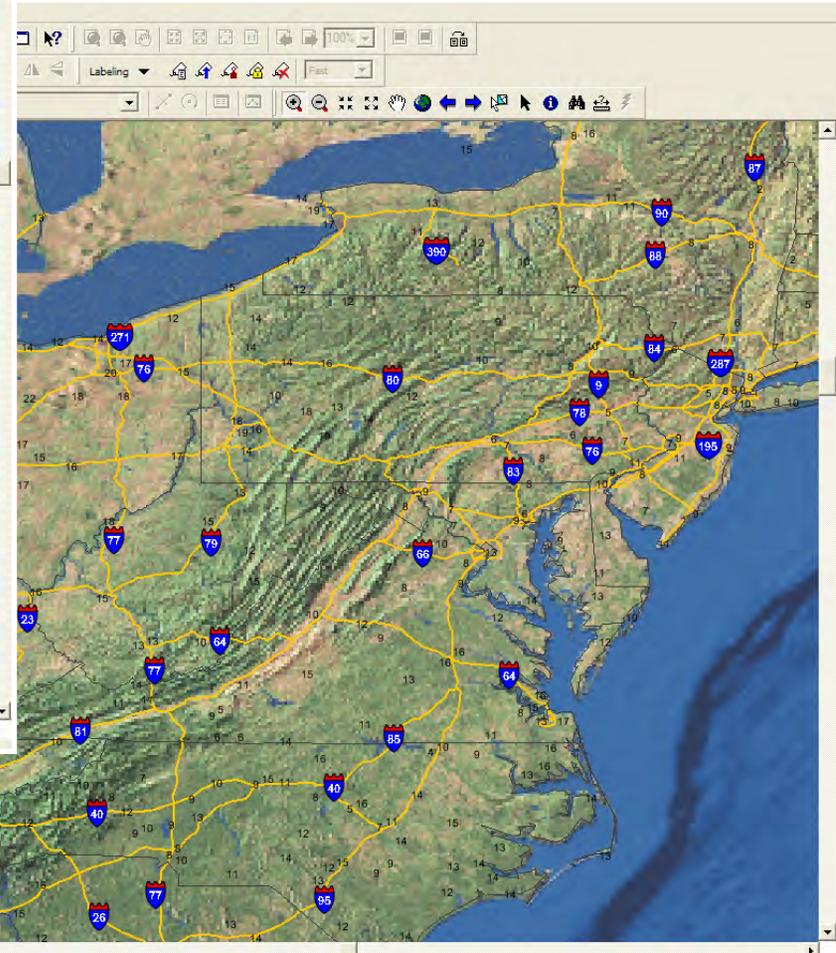
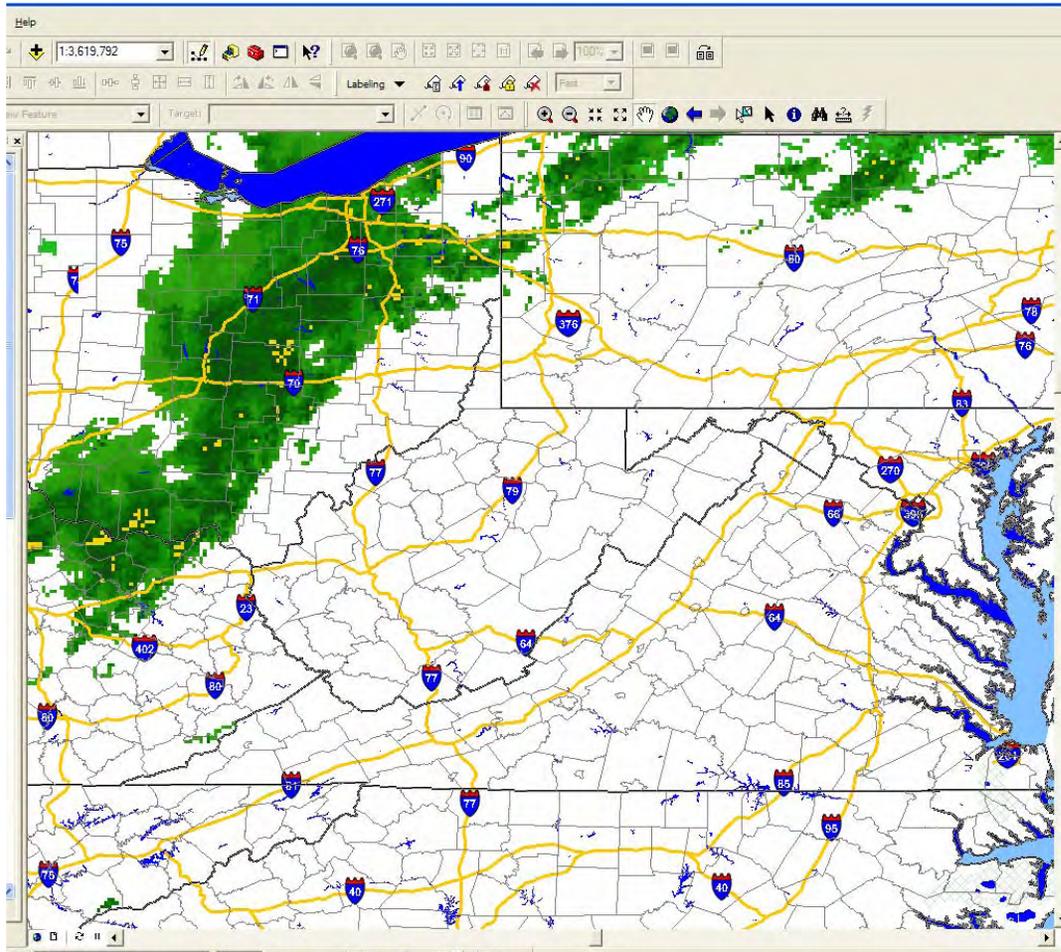


# Mayor's Call Center



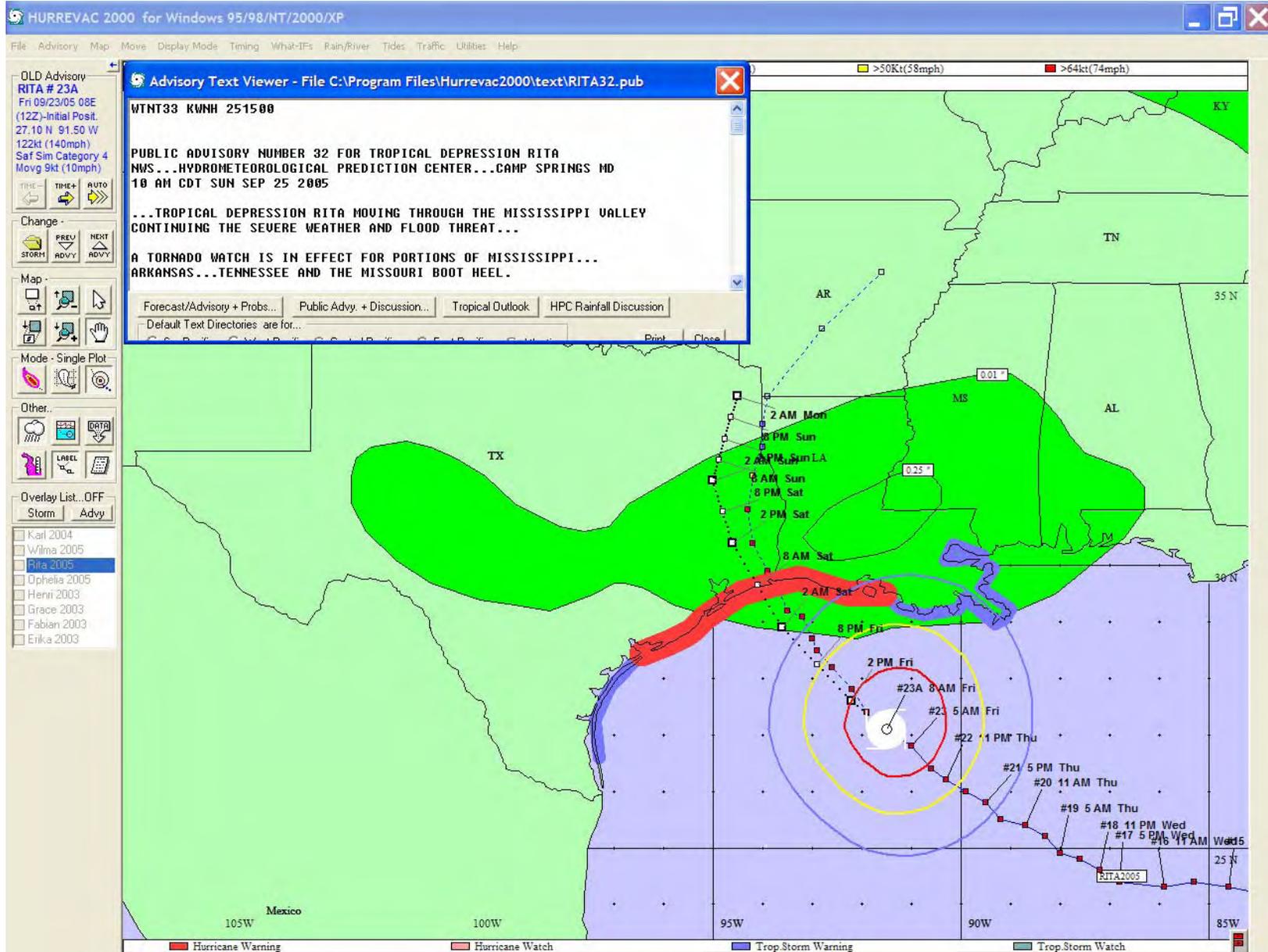


# Weather





# Weather cont.





# Other Emergency Service Providers

Location: Database Connections\SDEAdmin.sde

Stylesheet: FGDC ESRI

Name	Type
Address Locators	Locators Folder
EMADATA.Critical_Infrastructure	SDE Feature Dataset
EMADATA.DHS	SDE Feature Dataset
EMADATA.FCC	SDE Feature Dataset
EMADATA.Homeland_Security_Operations	SDE Feature Dataset
EMADATA.Incident_Template	SDE Feature Dataset
EMADATA.Incidents	SDE Feature Dataset
EMADATA.Regional	SDE Feature Dataset
FEMSDATA.FEMS	SDE Feature Dataset
MPDDATA.MPD	SDE Feature Dataset
SDE.ABRA_LAYERS	SDE Feature Dataset
SDE.Business	SDE Feature Dataset
SDE.CBRF	SDE Feature Dataset
SDE.Census	SDE Feature Dataset
SDE.CensusTracts	SDE Feature Dataset



# Emergency and Non-Emergency Incident Support

- Templates
- National Security Events
- Severe Weather
- Special Events
- Modeling
- WebEOC



# Templates

The screenshot displays the ArcMap interface for a project named "SevereWeather.mxd". The map shows a geographic area including parts of Arlington, Alexandria, and Fairfax counties, with the Potomac River and the Washington Beltway (I-495) visible. A red line outlines a specific geographic area, likely a template boundary. The "Layers" panel on the left lists various data layers, with several checked:

- EMADATA.Template\_Incident
- EMADATA.Template\_Natural\_Event
- EMADATA.Template\_Operations
- EMADATA.Template\_Infrastructure
- NOAASites Events
- DDOT Cameras
- Metro Entrance
- Metro Line
- Trees - Mayors Call Center
- Open - Mayors Call Center
- Edit Layers
- Critical
- Hazmat & EPA
- Base Mapping
- Census
- DC Schools
- Weather Related Map Services
- Political
- Regional
- Utilities
- Transportation
- DC Ortho

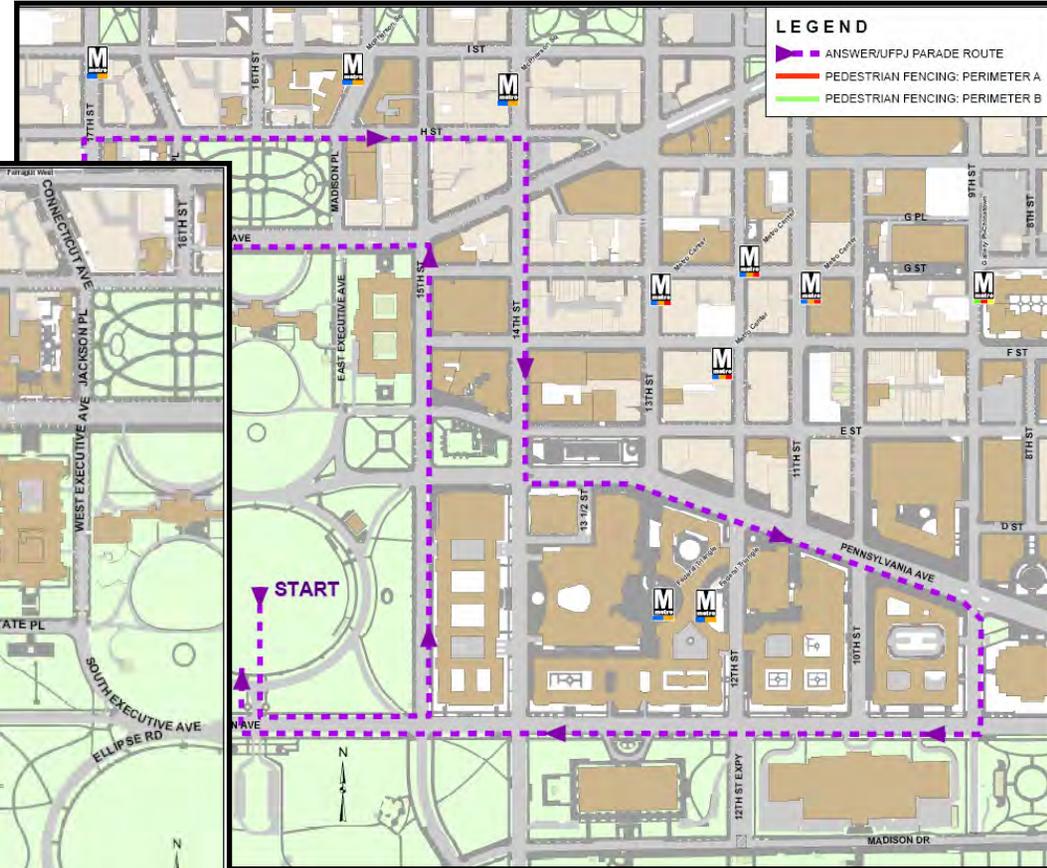
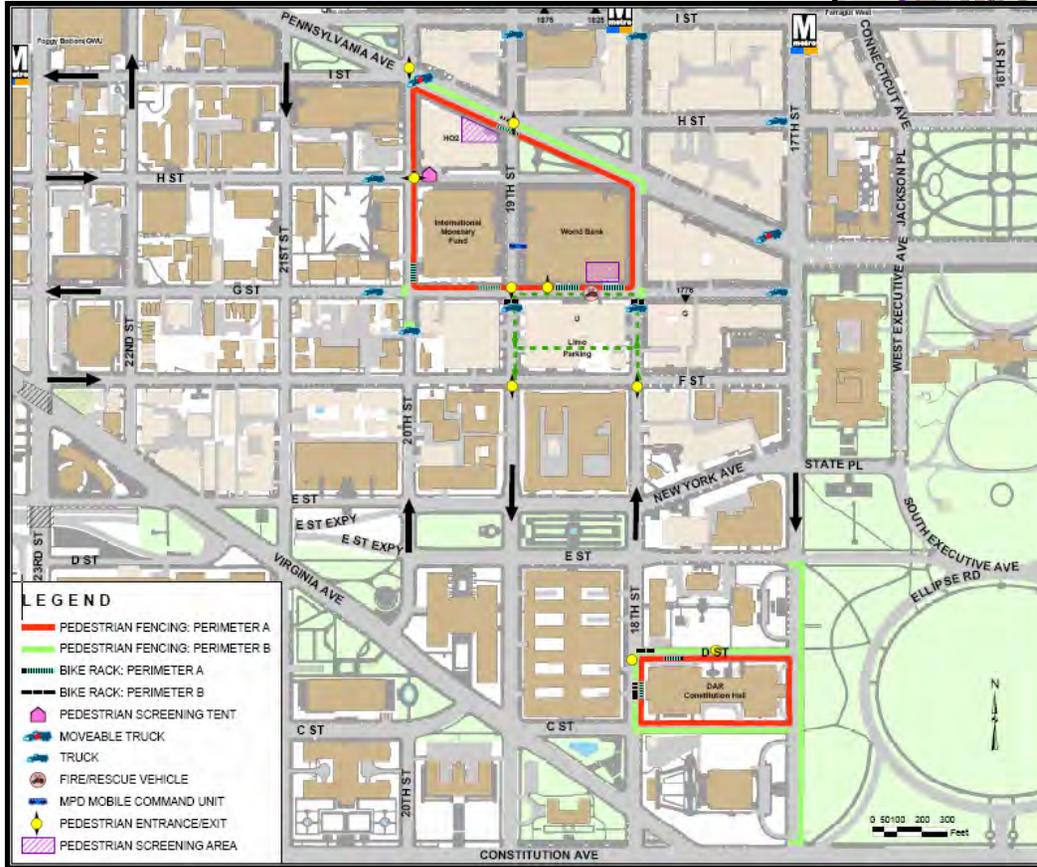
The interface includes a menu bar (File, Edit, View, Insert, Selection, Tools, Window, Help), a toolbar with various mapping tools, and a status bar at the bottom showing the drawing toolbar and scale (72).





# Emergency and Non-Emergency Incident Support

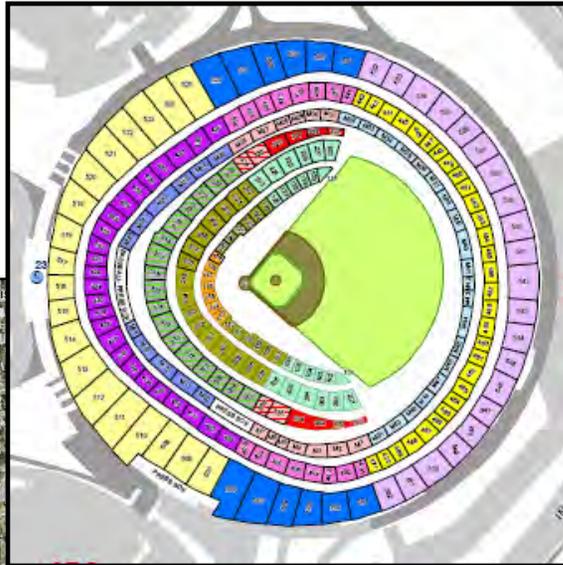
## National Security Events



IMF



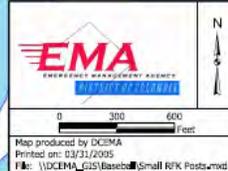
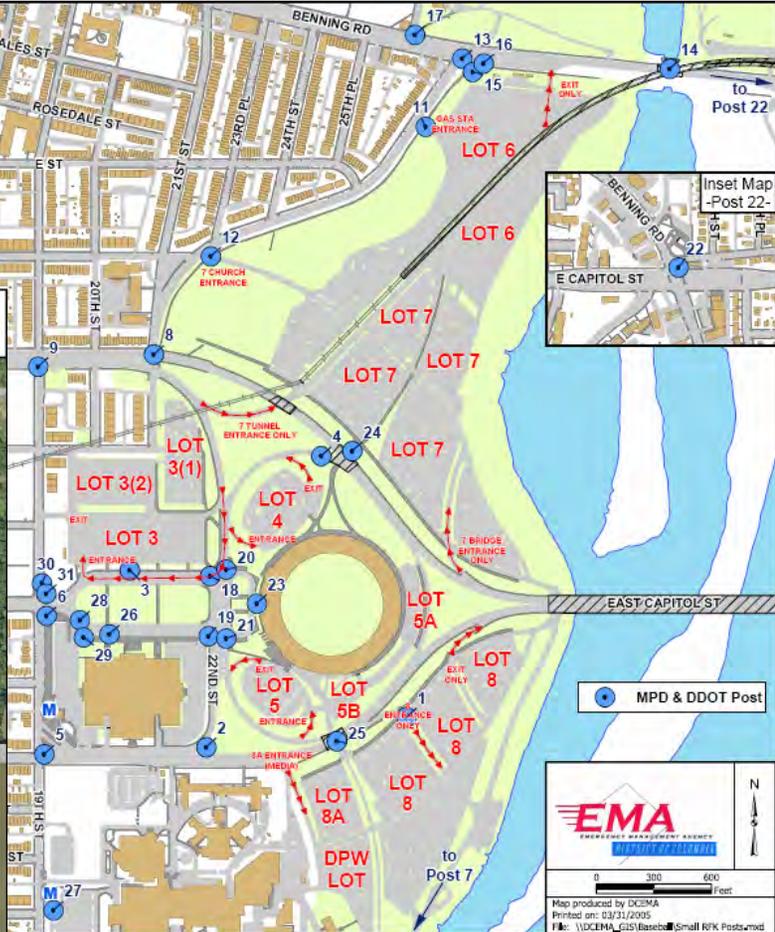
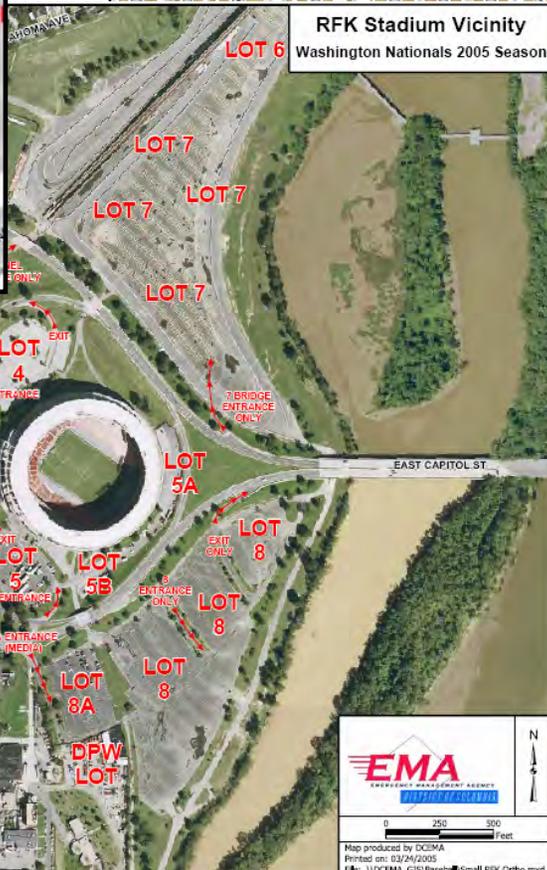
# National Security Events



**MPD and DDOT Traffic Postings**  
Washington Nationals 2005 Season



**RFK Stadium Vicinity**  
Washington Nationals 2005 Season

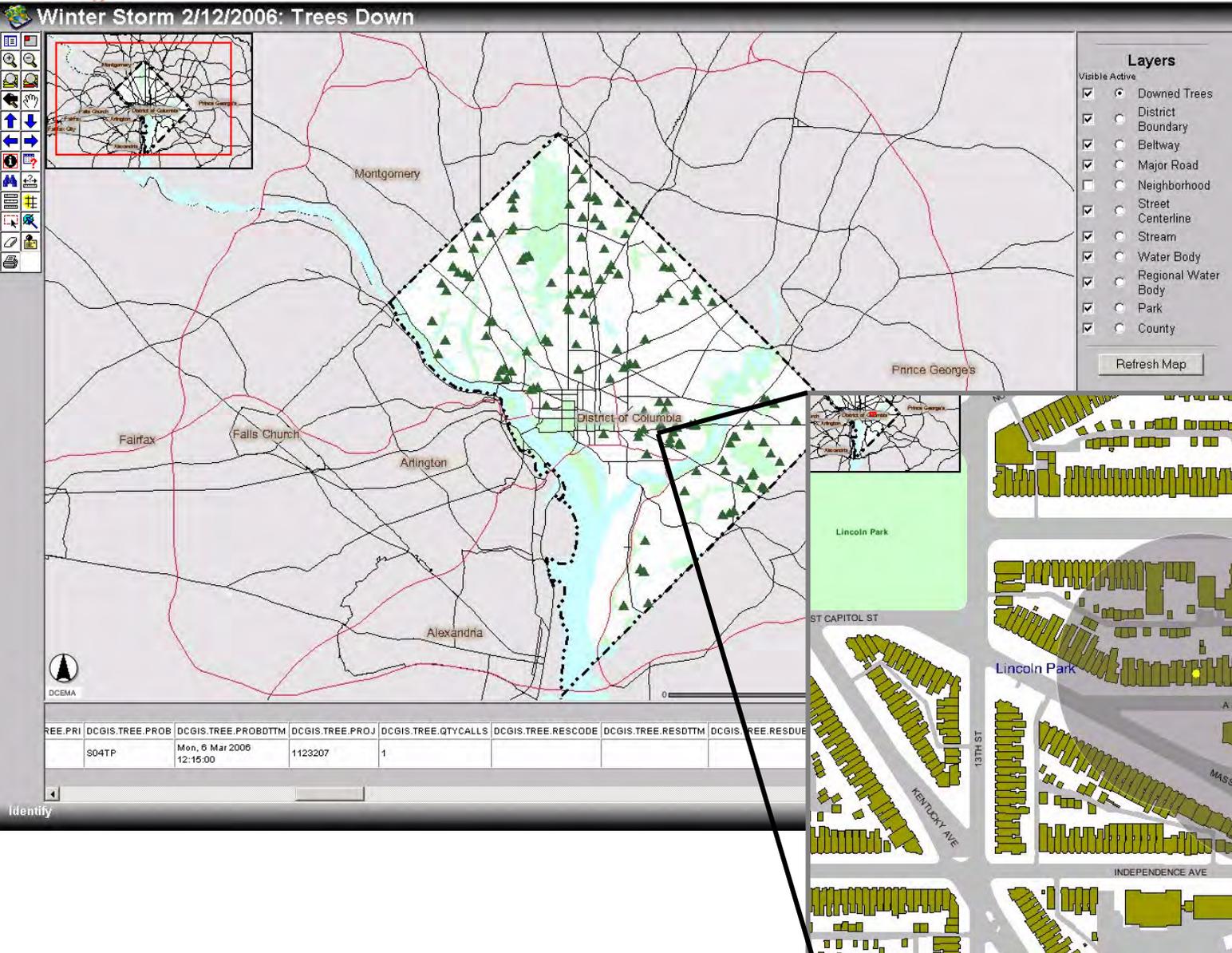


*National's  
Inaugural Game*

Map produced by DC/EMA  
Printed on: 03/31/2005  
File: \\DC\EMA\_GIS\Baseball\Small RFK Postings

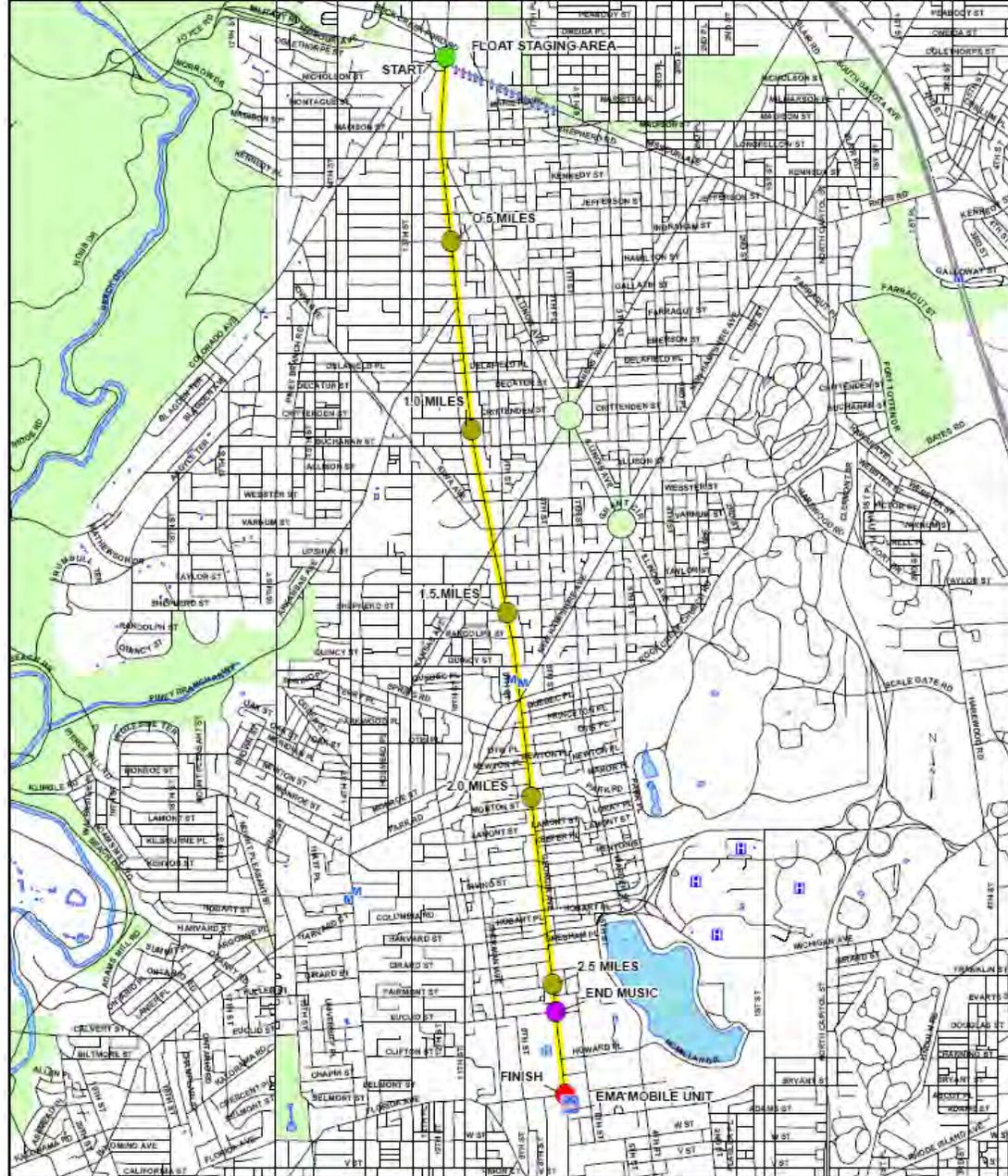


# Severe Weather





# Parades & Festivals



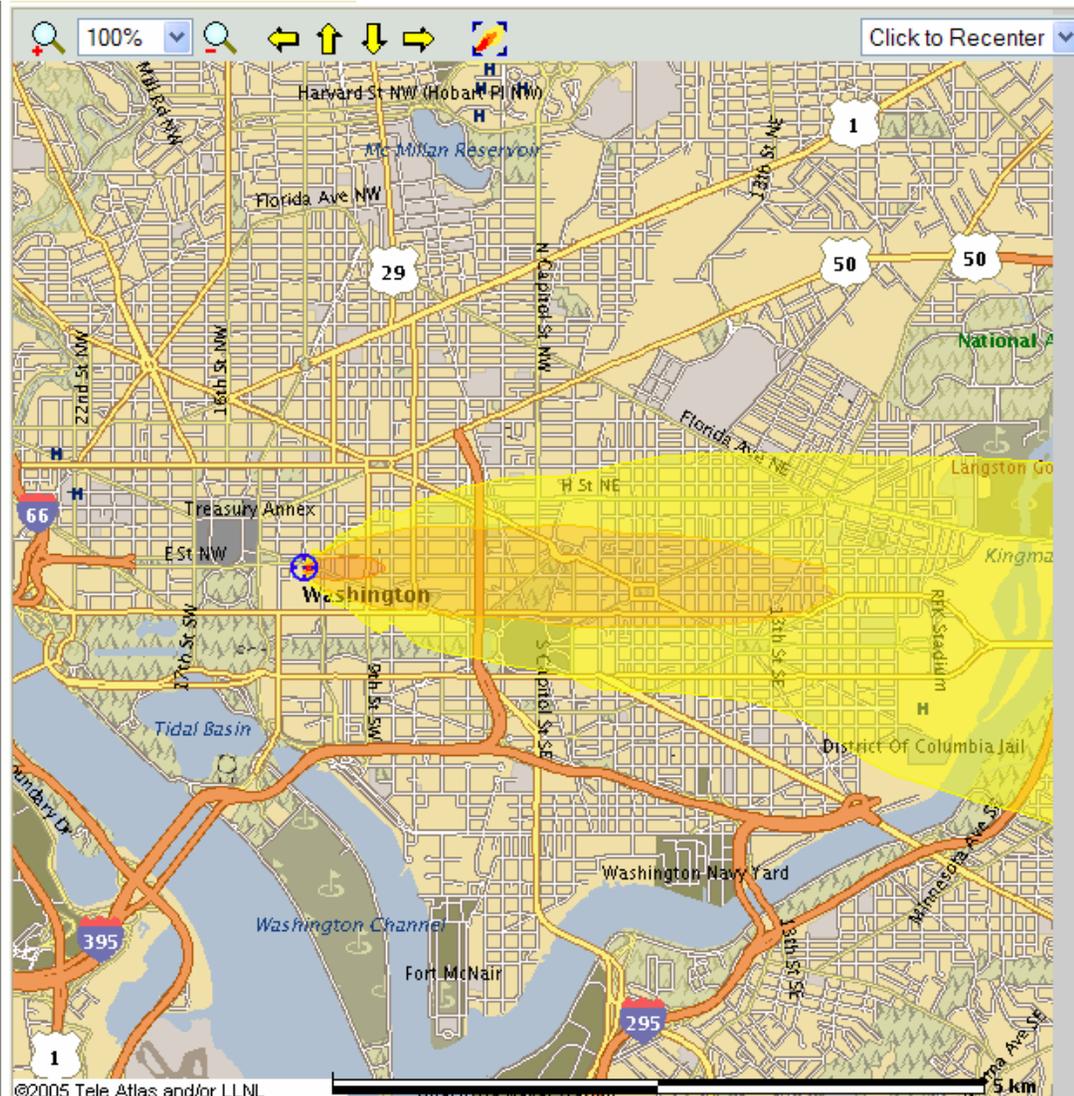
**2005 Caribbean Festival Planning Map**  
**Parade Route**  
 District of Columbia  
 Emergency Management Agency  
 Coordinated Response Planning  
 0 250 500 1,000 1,500 2,000 Feet  
 Map Produced by DCEMA-GIS  
 Revised Date: May 24, 2005  
 Production Date: June 7, 2005

LEGEND	
	EMA Mobile Unit
	End Music
	Parade Route
	Metro Entrance
	Festival Start
	Mile Marker
	Street Centerlines
	Park
	Festival Finish
	Float Staging
	Hospital
	Hydrology



# Atmospheric Release Modeling

## NARAC



©2005 Tele Atlas and/or LLNL  
 MapSize: 8.21 km by 8.21 km  
 Map Center: (38.894268 N, 77.009377 W)  
 Scale: 13.679 m/pixel

### Integ. Air Conc. of ANTHRAX-DRY

#### Acute (Short-Term) Effects

(CFU-min/m <sup>3</sup> ) Extent Area	Population Fatalities Casualties	Description
>1.60E7 0.06km 0.001km <sup>2</sup>	392 340 N/A	>85% of the exposed population could receive a lethal dose.
>530,000 0.6km 0.09km <sup>2</sup>	2,716 1,848 N/A	>50% of the exposed population could receive a lethal dose.
>18,000 4.1km 2.5km <sup>2</sup>	59,118 17,001 N/A	>15% of the exposed population could receive a lethal dose.
>620 28.7km 94.7km <sup>2</sup>	175,244 24,737 N/A	>2% of the exposed population could receive a lethal dose.

**Note:** Areas and counts in the table are cumulative. Casualties include both Fatal and Non-Fatal effects.

Layer Control:

Scale Bar:

Center Lat:

Center Lon:

Scale (m/pixel):

Image Width:

Image Height:

Map Selection:



# WebEOC

https://webeoc.dcema.dc.gov - WebEOC

**WebEOC**

[Admin](#) [Log Off](#)

DC DDOT-ESF 1 Lead  
Test Incident

[Chat](#) [Messages](#)

- 01. ELO Position Log
- 02. ESF-01 Lead Review
- 03. ESF-01 Draft Situation Report
- Completed Sit Reps
- Mission/Task
- Significant Events
- EOC Links
- Incident Scene

https://webeoc.dcema.dc.gov - Significant Events Display - Microsoft Internet Explorer

01/23/2006 13:20:00	DCEMA test
<a href="#">629</a>	Test Incident 1465 - OPM verifies notification and on scene response by OPM PSD, Facility Mgmt Building Engineer & Property Mgr to incident
EL01	
Darnell Dunson	
01/24/2006 11:56:00	
EOC6	
<a href="#">628</a>	Crew have been notified not enter the area until this info. can be confrimed ALL ELOs: THIS INCIDENT IS A POSSIBLE WEAPONS OF MASS DESTRUCTION (WMD) EVENT. CHECK CURRENT WEATHER AND WIND CONDITIONS. VIEW INCIDENT SCENE AND PLAN ACTIONS ACCORDINGLY
Ronnie Givens	
01/24/2006 11:49:00	
<a href="#">627</a>	****Comm Training Test**** Please Submit your SITREPs to ESF 5.
Body Bags	
01/24/2006 22:38:39	
EOC	
<a href="#">626</a>	****Comm Training Test**** ALL ELOs: THIS INCIDENT IS A POSSIBLE WEAPONS OF MASS DESTRUCTION (WMD) EVENT. CHECK CURRENT WEATHER AND WIND CONDITIONS. VIEW INCIDENT SCENE AND PLAN ACTIONS ACCORDINGLY.
Possible WMD	
jack	
01/24/2006 22:34:02	
EOC	
<a href="#">625</a>	****Comm Training Test**** A bomb explosion reported in front of the XYZ School. Fire and police are on the scene. Additional Units responding.
Explosion	

Page 1  Disable Refresh

https://webeoc.dcema.dc.gov - Regional Awareness Display - Microsoft Internet Explorer

**Daily Log**

**NCR Regional Awareness**

<b>TEST: Training Incident</b>	This is a system test
<b>03/01/2006</b>	
<b>TEST: MEMA</b>	
<b>Andrea Miller</b>	
<b>SUBMITTED BY:</b> MEMA RegBrd	<b>Contact:</b> Andrea Miller 443 319-5328
<a href="#">Return To List</a>	
<b>IED</b>	Montgomery County PD/FD operating at scene of potential IED IAO Rachel Carson Elementry School. Andrews AFB EOD on scene as requested via FBI.
<b>02/03/2006; 12:30</b>	
<b>Montgomery County: Gaithersburg</b>	
<b>J. Hamilton</b>	
<b>SUBMITTED BY:</b> MEMA RegBrd	<b>Contact:</b> Montgomery County
<a href="#">Return To List</a>	
<b>State of Union</b>	Per NORTHCOM via DHS Jabber: State of the Union Speech has concluded w/ NSTR.
<b>01/31/2006; 22:13</b>	
<b>DC</b>	

Page 1  Disable Refresh



# WebEOC

https://webeoc.dcema.dc.gov - ESI GIS Test Display - Microsoft Internet Explor...

Daily Log

### Significant Events

Z	There is an explosion in the basement of 441 4th St, NW. Fire and MPD are on scene and evacuation is in progress.
Joshua Jack	
03/15/2006	
22:56:00	
Explosion	
EXPLOSION	441 4 st nw <span style="float: right;">OPEN</span>

<<<< << Page 1  Disable Refresh >> >>>>

Done Trusted sites

http://164.82.100.8 - Laye...

Refresh List

Visible

- County
- Regional Street Centerline
- Park
- Regional Water Body
- Water Body
- Stream
- Street Centerline
- Street Centerlines
- Street Names
- Road ROW
- Neighborhood
- Major Road
- Beltway
- Building
- District Boundary

Trusted sites

http://164.82.100.8/webeocgise/main\_viewpoints.aspx - Microsoft Internet Explorer

Ready

Coords: 208 , 48

Trusted sites



# Daily Operation Support

- Neighborhood Viewer
- Event Licensing
- Training
- Exercises
- Analysis
- Map Production



# Neighborhood Viewer

**Neighborhood Selection Viewer**

Layers

- Neighborhoods
- Police Station
- Fire Station
- Hospital
- Metro Entr
- Zip Code E
- Ward Boui
- Street Nar
- Street Cen
- Major Rou
- Named Pla
- Rail Line
- County Bc
- Bridge
- Building
- Sidewalk
- Road
- Hydrograp
- Park
- University
- District Bo
- Regional R

**Create Buffer**

Enter buffer distance:

Address Or Intersection:

Example: 441 4th St., NW or 441 4th St., NW and D St., NW for locating street intersection

City:  State:

Done

**Neighborhood Selection Viewer**

Layers

- Neighborhoods
- Police Station
- Fire Station
- Hospital
- Metro Entrance
- Zip Code Boundary
- Ward Boundary
- Street Names
- Street Centerlines
- Major Routes
- Named Places
- County Boundary
- Rail Line
- County Boundary
- Bridge
- Building
- Sidewalk
- Road
- Hydrography
- Park
- University/College
- District Boundary
- Regional Roads

Address Or Intersection:

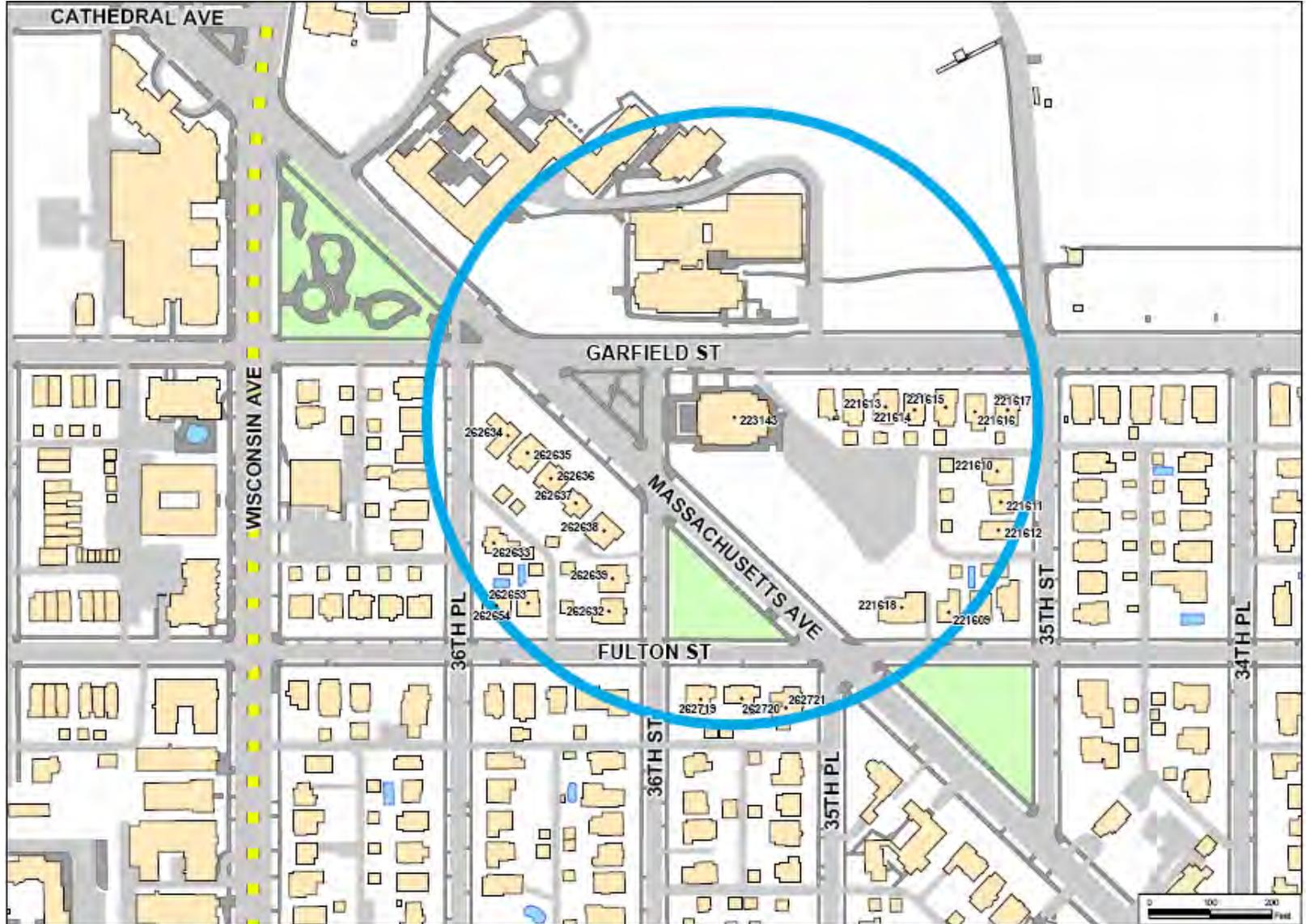
Example: 441 4th St., NW or 441 4th St., NW and D St., NW for locating street intersection

City:  State:

Done



# Event Licensing



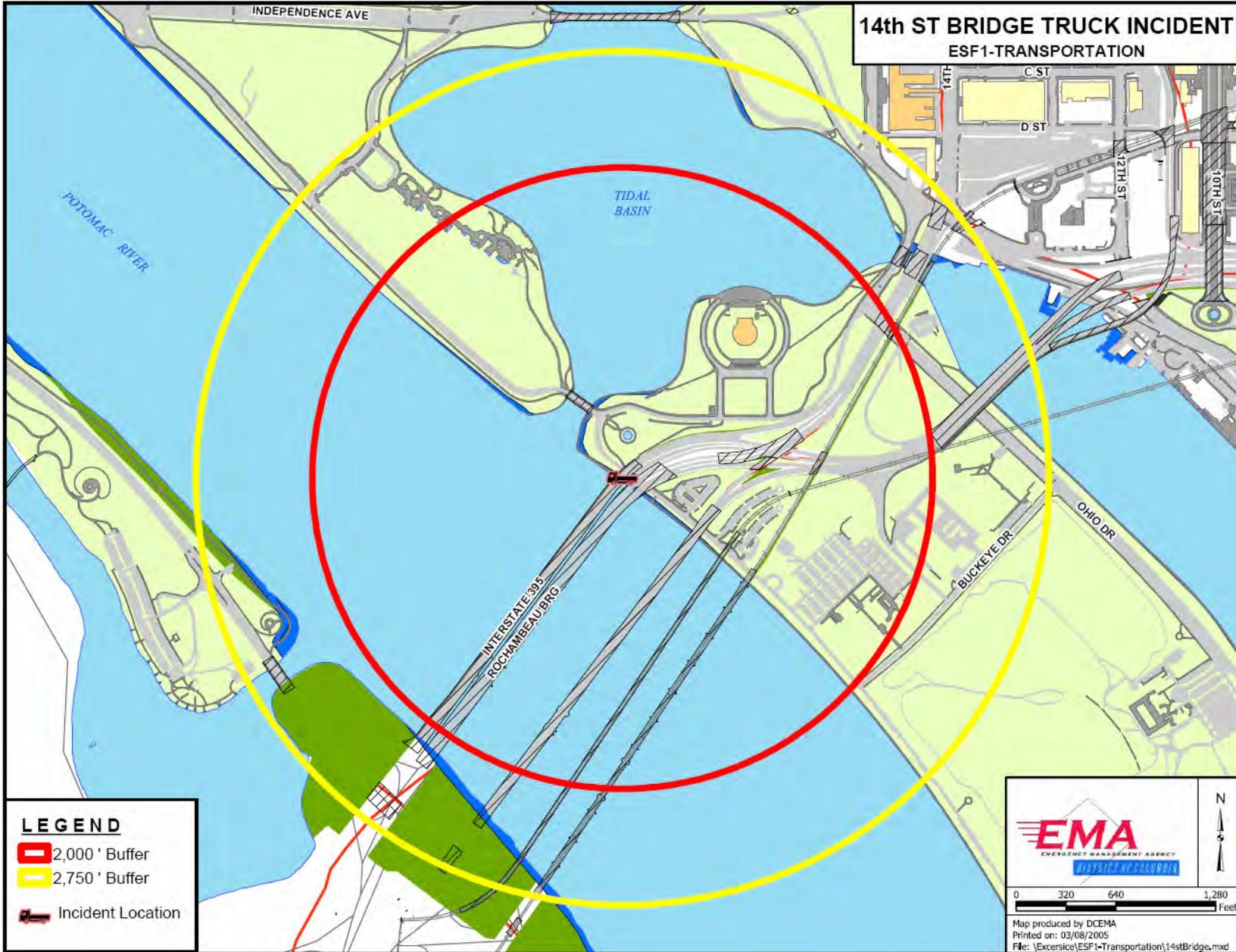
**SPECIAL EVENT LICENSE**  
**500' BUFFER MAP**  
2815 36th St, NW

LEGEND			
	Buffered Street		Road
	Building		Slideshow
	500_Buffer		Park

Map Produced by DCMA-GIS | Production Date: October 20, 2009 | File: S\_0015\_380\_01\_NW.mxd  
DISCLAIMER: Neither the DCMA or Columbia Government nor the Emergency Management Agency make any claims as to the completeness, accuracy or content of any data contained in this application, or make any representation of any kind, including, but not limited to, warranty of the accuracy or fitness for a particular use, for any use and transaction to be applied or entered with respect to the information or data contained herein. The data are subject to change as modifications and updates are complete. It is understood that the information contained in the data is being used at user's own risk.



# Training





# Exercise

## ST. ELIZABETH'S WEST CAMPUS

### LEGEND

- Emergency Event
- Casualty Treatment Area
- Media Area
- Fire Truck
- Building
- Road
- Sidewalk
- Bridge
- Grassy Area
- Wooded Area
- Hydrography



Map Produced by DC/EMA-GIS  
 Production Date: July 22, 2009  
 File: S:\gis\workspace\st\_elizabeths.mxd  
 Scale: 1 inch = 50 feet

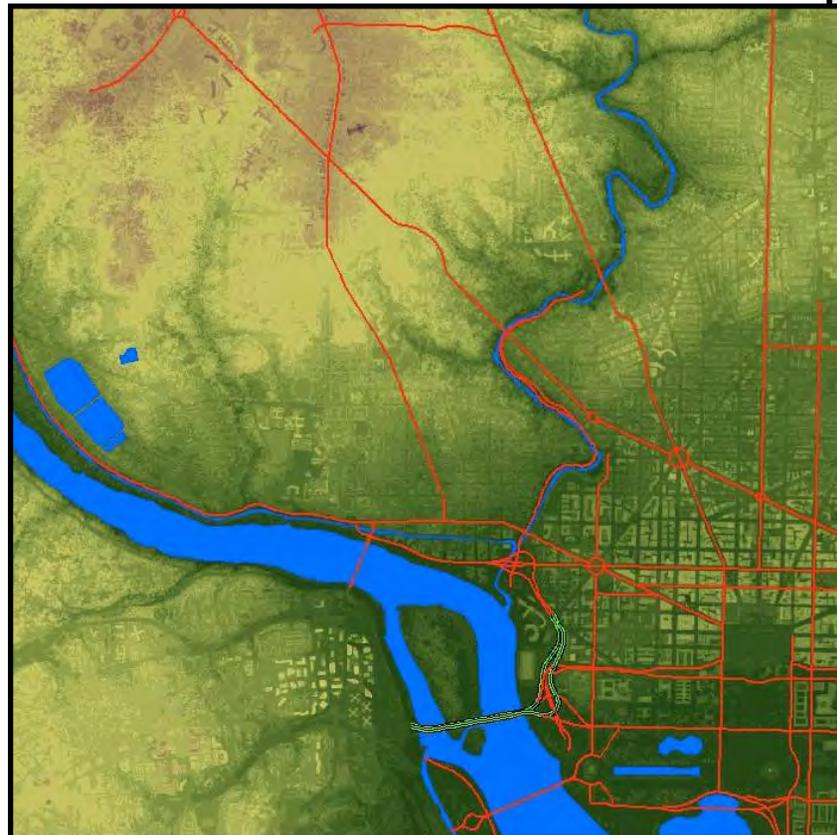
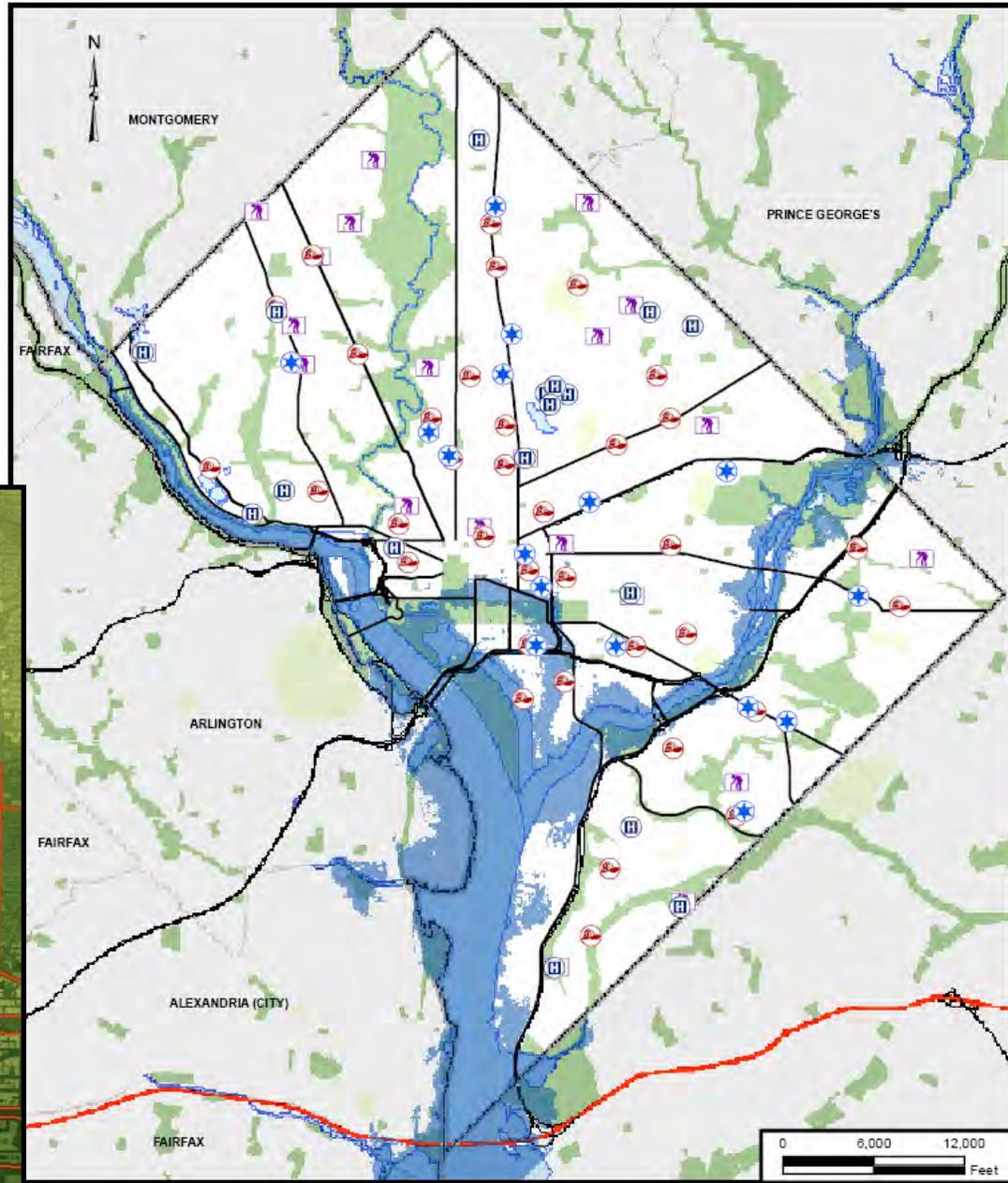


**DISCLAIMER**  
 Neither the District of Columbia Government, nor the Emergency Management Agency, makes any warranty as to the completeness, accuracy, or timeliness of any data, including, but not limited to, the location of any building, road, or other feature, and any such data is provided as is. The user is advised to verify the information and data used in this map. The user is advised to verify the information and data used in this map. The user is advised to verify the information and data used in this map.





# Analysis



**Identified Low-lying Areas**  
5 Meters or Lower

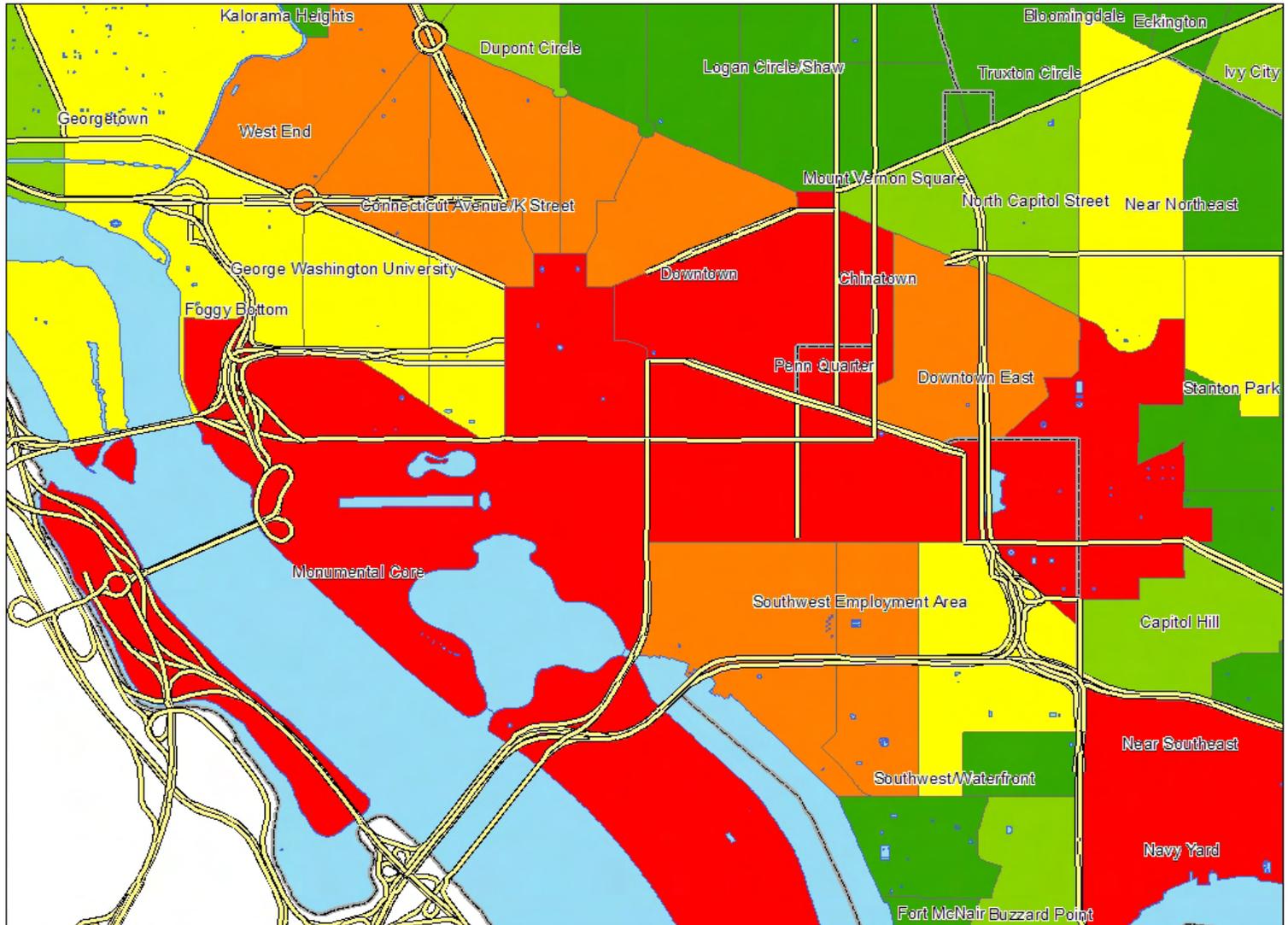
- |  |                         |  |               |  |           |
|--|-------------------------|--|---------------|--|-----------|
|  | Potential Flooding Area |  | Nursing Home  |  | Park Area |
|  | Hospital                |  | Fire Station  |  | Cemetery  |
|  | Police Station          |  | SDE.WaterPoly |  |           |

Produced on: September 30, 2005 | Produced by: DC EMA  
DC/EMASD is under the District of Columbia Government and the Emergency Management Agency. It does not make any claims as to the completeness, accuracy or content of any data contained in this application, or make any representation of any kind, including but not limited to, warranty of the accuracy or fitness for a particular use, nor use any such warranties to the extent of which they may be applicable to the information or data furnished herein. The data are subject to change as modifications and updates are complete. It is understood that the information contained in this data is being used at one's own risk.



# Analysis

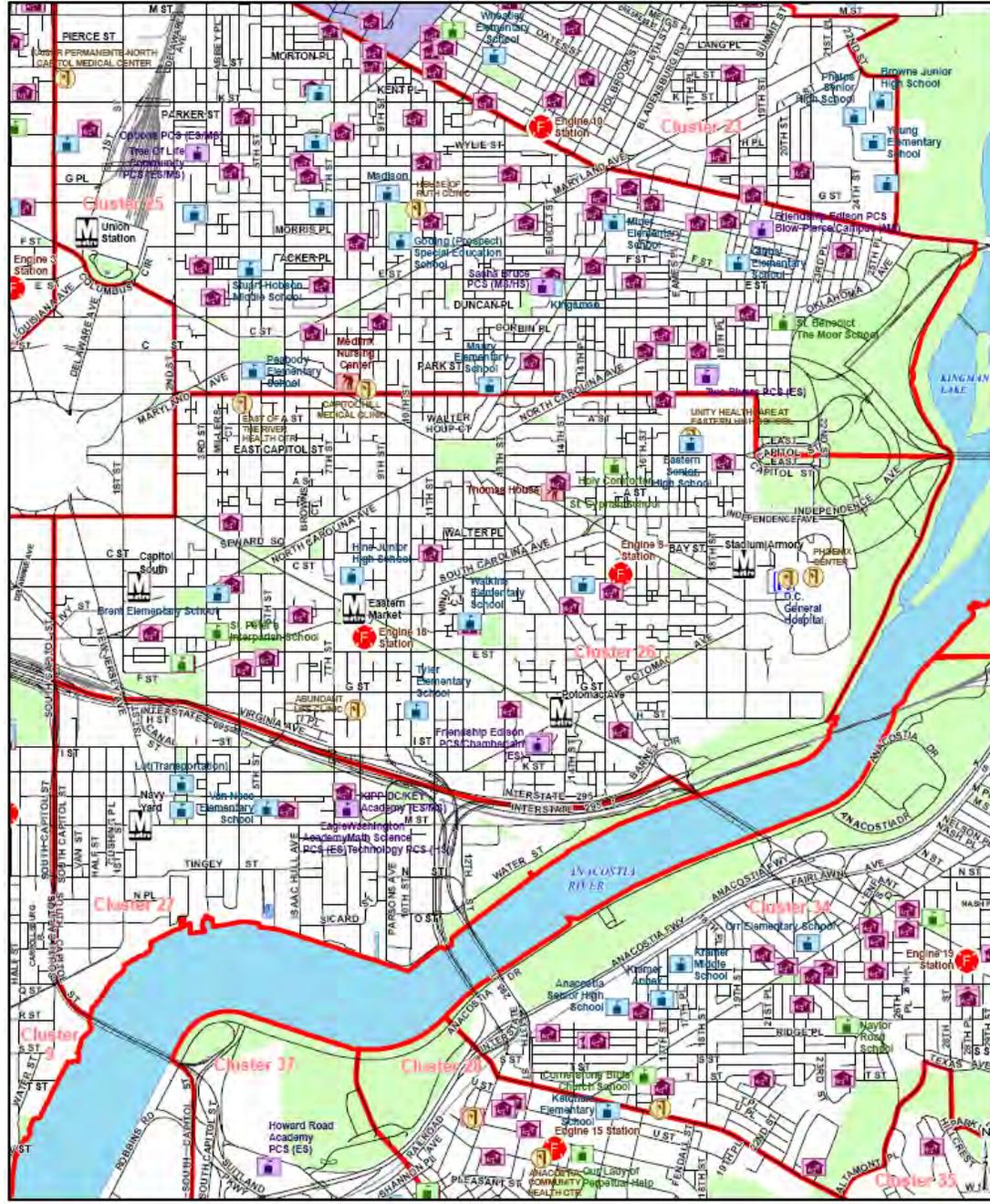
## Evacuation Planning with Daytime Population Model





# Map Production

## Critical Infrastructure Neighborhood Cluster



**CRITICAL INFRASTRUCTURE NEIGHBORHOOD CLUSTER 26**  
 District of Columbia  
 Emergency Management Agency **EMA**

**LEGEND**

	Fire Station		Public School		Child Care
	Police Station		Charter School		Nursing Home
	Primary Care		Independent School		Hospital

© 2015 DCI 1:000 Feet  
 Map Produced by DCI/EMA GIS  
 Production Date: Cluster 26 2015  
 File: 1\_1\_Arta\_Cluster26.mxd



# Map Production

## Homeless Encampment Sites

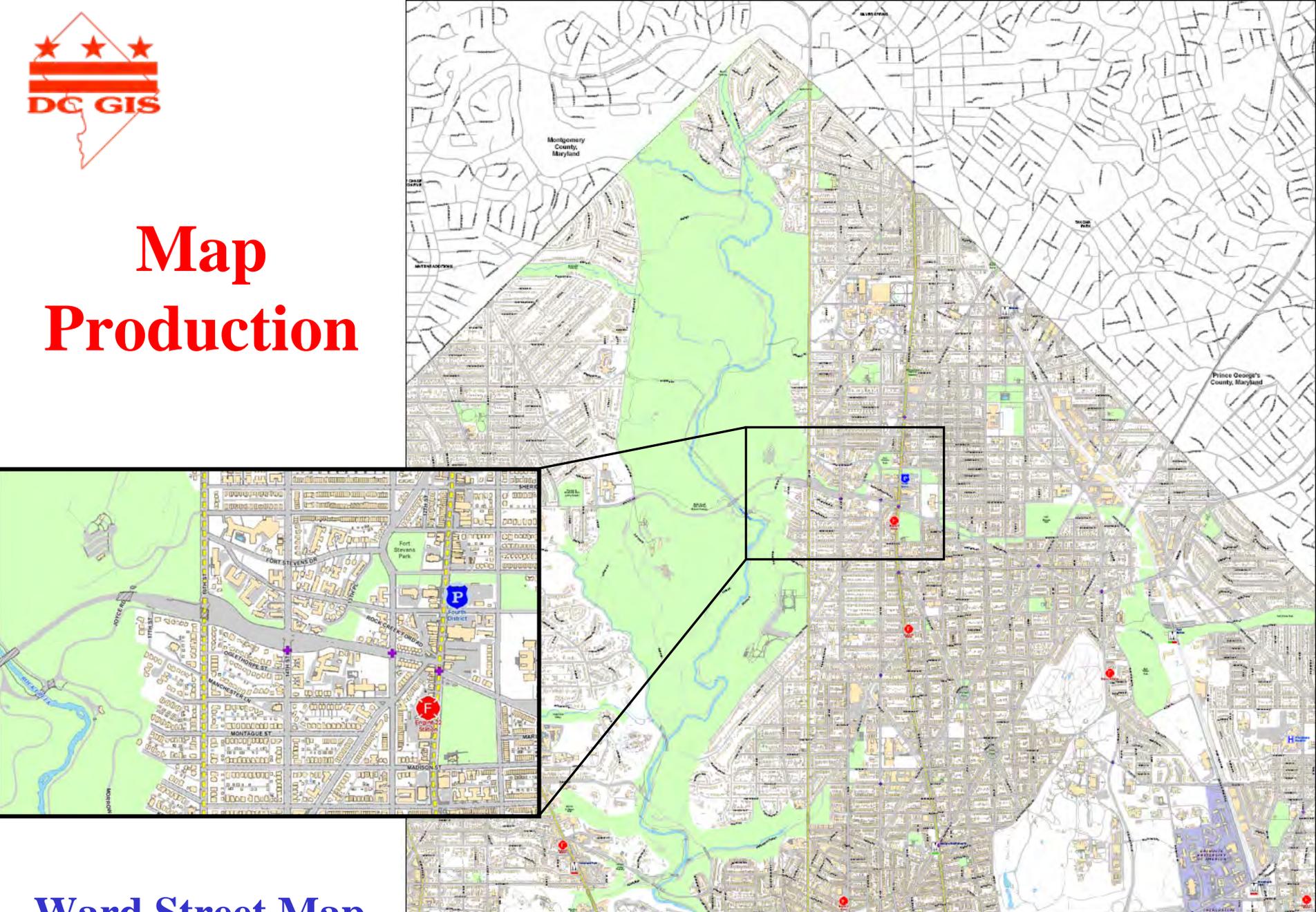


Homeless Encampment Sites  
2600 Block of K street NW  
District of Columbia  
Emergency Management Agency

0 75 150 300 Feet  
Map Produced by DC/EMA-GIS  
Production Date November 28, 2006



# Map Production



## Ward Street Map

### STREET MAP: WARD 4

District of Columbia  
Emergency Management Agency  
Coordinated Response Planning



#### LEGEND

- Metro Entrance
- Hospital
- Controlled Intersection
- Ward Boundary
- Evacuation Route
- Police Station
- University/College
- Building
- Road
- Bridge
- Park
- Hydrology
- Sidewalk
- Rail Line
- County Boundary

0 300 600 1,200 1,800 Feet

Map Produced by DC/EMA-CRS  
Production Date: November 4, 2008  
File: X\_GIS\_Map/Ward04\_NCroad  
Scale: 1 inch = 600 feet

DC/EMA-CRS  
District of Columbia Department on the Environment  
Production Date: November 4, 2008  
File: X\_GIS\_Map/Ward04\_NCroad  
Scale: 1 inch = 600 feet



# Future Enhancements

- **More sophisticated/capable integrated GIS for WebEOC**
- **Additional real-time/near-real time information**
  - **DDOT camera view angle**
  - **911 information**
  - **Traffic Conditions**
  - **24/7 Call Center information**
  - **Detailed weather information**
  - **METRO Cameras**
  - **HazMat Sensors**



Thank you

Next DC GIS Steering Committee Meeting:

Thursday, May 11, 2006

at 1:00 p.m.

Conference Room 1117

441 4th Street NW

