

National Emergency Technology Guard Pilot Program Summary

City of Chesapeake, Virginia

NET Guard Program Description

NET Guard is a program that develops teams of volunteers with verified relevant expertise to support IT and communications systems and services. NET Guard programs are tested as local assets and deployed through pre-disaster agreement with local Emergency Management for public and nonprofit entities providing essential services. Teams are established and maintained by governmental or private sector sponsors or both. Service examples include: mobile capability for shelters, volunteer reception center sites, evacuation staging areas, public internet access for recovery; local support for using new technologies for disaster preparedness, response, recovery including social media for public communication and situational awareness and crisis mapping; liaison with virtual volunteers for new technology tools and resources for response and recovery; temporary systems and communication back up for EOC or critical government functions. The NET Guard Team is designed as a local asset following the Citizen Corps partner program model and as a means to surge additional resources into impacted areas through mutual aid.

The City of Chesapeake

The City of Chesapeake is located in the southern quadrant of the Commonwealth of Virginia and encompasses 353 square miles of land within its jurisdictional boundaries. Chesapeake is the second largest city in Virginia, and the 13th largest city in the United States in terms of land area. Chesapeake is located within the Norfolk Urban Area Security Initiative (UASI) region.

Chesapeake NET Guard: A Snapshot

Purpose: The Chesapeake NET Guard team consists of citizen volunteers with highly refined information technology and communications experience and expertise that will assist in supporting critical infrastructure, systems, and applications as identified in various emergency planning documents for the City's Emergency Operations Procedures. NET Guard is chartered to help preserve, restore, and sustain critical communications and technology infrastructure in support of emergency operations.

Organization: The Chesapeake NET Guard Program is overseen by the Department of Information Technology within the Public Safety Technology Division. The program aligns with policies and protocols stemming from the Chief Information Officer of the City.

Citizen Corps Affiliation: The program is a component of an already-robust Citizen Corps program. Chesapeake has a Citizen Corps Council that is one of the most active in the Commonwealth of Virginia, having fully integrated Community Emergency Response Team (CERT), Fire Corps, Medical Reserve Corps (MRC), and Volunteers in Police Service (VIPS) into emergency planning processes as well as enterprise business operations.

Operational Support: With reference to emergency operations, Chesapeake NET Guard volunteers support Emergency Support Function #2 – Communications. The NET Guard volunteers will be placed on stand-by when the City's Emergency Operations Center (EOC) is activated. Their primary areas of involvement will be municipal government entities and private non-profit entities - such as the Red Cross – providing support to local government.

Roles and Responsibilities

The needs assessment by the Chesapeake NET Guard Program leadership was undertaken with three major objectives:

- Identify critical elements of the City's technology and communications infrastructure
- Determine most efficient and effective means of sustaining and restoring those critical elements in an emergency scenario
- Identify critical skill sets, volunteer experience, and personnel gaps to be addressed in order to provide services and support during emergency situations

During the needs assessment it became evident that many needs had already been assessed by other programs in existing emergency management plans and procedural documents.

The primary needs to be serviced by Chesapeake NET Guard were identified as follows:

- Rapid response when alerted to facilitate identification and deployment of available volunteer and equipment resources
- Expeditious deployment of equipment and support services to designated emergency shelters to enhance processing and services to displaced citizens/evacuees
- Expeditious deployment of equipment and services to critical municipal facilities which may have lost normal communication and Information Technology operational capabilities
- Support to assigned City staff and contractors to enable them to concentrate on more critical issues
- Surge support as needed in addition to specific Information Technology and Communication (ITC) skills. This is known as support will be provided as directed by the Emergency Operations Coordinator or other City officials

The following needs were identified as underlying restoration of any essential City services and operations:

- Voice communications including landline, cellular and radio
- Network connectivity for voice and data communications
- Technical support to server, PC and laptop hardware
- Network administration and support
- Data base administration

Strengthening communications capabilities was identified as a top priority for the NET Guard Team. The communications infrastructure addressed by the cadre includes the following:

- Traditional landline telephone services via the City's PBX; VOIP (Voice Over Internet Protocol);
- Cellular, satellite or other wireless communications capabilities;
- 700Mhz/800Mhz Public Safety/Public Services radio communications; and
- Amateur radio communications.

Training

Chesapeake NET Guard volunteers were required to complete the following trainings:

- ICS 100/700 – Introduction to the Incident Command System (ICS) and National Incident Management System

- ICS 200 - ICS for Initial Action Incidents
- ICS 800 - National Response Plans, An Introduction

To satisfy the basic capabilities of the program, Chesapeake NET Guard volunteers were encouraged to complete training in the use of the following software and equipment:

- CISCO IOS Operating System
- TCP/IP routing and switching
- Check Point FireWall-1
- Palo Alto Enterprise Firewall Solutions
- Wireless infrastructure
- Radio Communications
- IBM Mainframe
- Windows Server 2003 – 2010
- Windows Vista, XP and 7 Operating Systems

Program Implementation

Recruitment: The NET Guard program in Chesapeake advertised the opportunity through local TV ad boards, messaging on the public programming TV channel, volunteer websites, and e-networking.

Selection: Candidates were first phone- screened to gauge interest and competencies. They were then asked to complete an application and an interview with team members.

Credentialing: All volunteers are subject to comprehensive background checks. Upon clearance, they receive a NET Guard picture ID badge. In order for a badge to remain active, the volunteer must complete all requisite training, participate in the annual exercise, sign a confidentiality agreement, and remain an active member in response/recovery activations.

NIMS modeling: Chesapeake NET Guard aims to align with the National Incident Management System (NIMS) Incident Command Structure (ICS) structural model. Currently, the program runs on a “tree” team model with the following positions – NET Guard Coordinator, Assistant Coordinator, Team Captains (Technology, Communications, and Logistics), Team Leaders, Assistant Team Leaders, and Volunteers. Teams are additionally planned to be grouped by the six boroughs making up the City of Chesapeake.

Integration: The NET Guard program is currently being integrated into appropriate local emergency plans. Continuing efforts are being made to educate local emergency managers (and their respective advisory and working groups) of the cadre’s capabilities and purpose.

Partnerships

Chesapeake NET Guard benefitted from the following strategic partnerships:

- Chesapeake Amateur Radio Service Club
- Local Emergency Planning Committee (LEPC)
- ECP I Technical College
- WHRO- TV
- ECTV- TV
- MITRE

- UASI Hampton Roads Working Group

Activity to Date

In addition to exercises, the NET Guard all-volunteer Team was asked to provide tower inspection support assistance in the anticipation of hurricane Irene, and to fill the Communication support seat at the Emergency Operations Center during the event. The Chesapeake NET Guard is chartered to support communication infrastructure, and the volunteers were willing and properly trained to manage these efforts.

Lessons Learned/ Recommendations

The following are recommendations for those localities considering starting a NET Guard program:

- Elicit top level leadership support throughout the evolution of the program
- Develop a core team with varying skills, experiences and decision-making authorities
- Ensure the NET Guard program is developed and implemented within the larger contexts of emergency management and technology support
- Plan for funding and other resources support to sustain the NET Guard program
- Strive to develop public-private partnerships in support of mutually beneficial NET Guard objectives
- Develop a plan for sustaining volunteer interest and involvement over time
- Keep volunteers abreast of current functions and capabilities in the supported municipality infrastructure and potential emergency operations

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