Virginia Area Contingency Plan (VACP)

Response to Military Munitions

Annex HH

March 2025

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References

(a) National Response Framework
(b) National Contingency Plan, 40 CFR Part 300
(c) U.S. Coast Guard Marine Environmental Response and Preparedness Manual, COMDTINST M16000.14 (series)
(d) Contingency Preparedness Planning Manual, Volume 4: Incident Management and Crisis Response, COMDTINST M3010.24
(e) Policy for Countering Weapons of Mass Destruction, COMDTINST 3400.5
(f) Weapons of Mass Destruction and Catastrophic Hazardous Material Releases, COMDTINST 3400.3 (series)
(g) Critical Incident Communications, COMDTINST M16600.3
(h) Coast Guard Incident Management Handbook
(i) DoD Directive 6055.9M, Ammunition and Explosives Safety Standards
(j) DoD Directive 3025.18, Defense Support of Civil Authorities (DSCA)
(k) Department of the Army Memorandum of 21 April 2009: Munitions Response Terminology

Situation

This Military Munition Response Annex to the Virginia Area Contingency Plan provides guidance to Coast Guard Sector Virginia for coordinating a response to an incident involving sea-disposed conventional or chemical Discarded Military Munitions (DMM), as a result of the incidental recovery of such material during maritime activities. This includes the potential encountering of, and exposure to, chemical agents (CA), and the potential or known presence of chemical warfare material (CWM), described as chemical munitions or CA in containers. In response to a DMM incident, Sector Virginia will use all available resources, and conduct operations in concert with partner response agencies using risk informed decision making, to save or assist lives, mitigate and/or prevent further contamination of public/private property or the environment, contain the threat posed to public safety, stabilize the incident(s), and protect the environment and food supply

General

Brief History of Sea Disposal of Military Munitions

(1) The Department of Defense (DoD) disposed of excess, obsolete, unserviceable, and captured enemy munitions in deep water off the shores of the United States until 1970. Congress prohibited the practice with the passage of the Marine Protection, Research, and Sanctuaries Act of 1972. Prior to the 1970s, munitions disposal was generally limited to burning, burial on-land, or disposal at sea. At the time, sea disposal was considered one of the safest alternatives available to dispose of munitions.

(2) The U.S. Armed Forces established policies for munitions disposal beginning in 1917. These policies, which defined depths and locations of disposal sites, became more stringent over time in an effort to reduce the possibility of recovery and accidental contact by the public. In 1944, the War Department required the disposal of CWM to occur in water at least 300 feet deep and 10 miles from shore and established specific criteria for conventional munitions disposal. By December 1945, the Department increased the disposal depth requirement to 6,000 feet for CWM and 3,000 feet for explosives and ammunition. The Department also published disposal locations in a notice to mariners and on nautical charts.

(3) Although most sea disposal operations were to occur in deep water, research shows that at least one vessel (the USS Elinor) was known to have disposed of DoD military munition off the mid-Atlantic coast after World War I. The USS Elinor, which returned to the United States from Europe in 1919, subsequently transited from the mouth of the Chesapeake Bay to New York Harbor between 11 and 14 February 1919, disposing her cargo of CWM approximately 40 nautical miles beyond the mouth of the Chesapeake Bay in 102 feet of water along the way. The USS Elinor, which disposed of 75-mm munitions (mustard rounds), may be the source of recently recovered munitions in the both Sector Virginia's AOR and Sector Delaware Bay AOR, however, this is not known for certain.

Area of Concern

Area of Operation. In response to an incident involving DMM covered by this plan, primary areas of operation will include onboard the vessel, waters and port areas immediately surrounding the vessel, and vessel crewmembers. In some cases, the catch that was onboard a fishing vessel at the time the DMM was encountered may have been transferred off the vessel prior to initiation of response operations. In these cases, the area of operation will extend to a holding area onshore, the processing facility, and vehicles used to transport the catch from the vessel to the facility.

Area of Interest. Vessels that are particularly susceptible to recovering DMM from the sea floor include dredging type vessels engaged in clam and ocean quahog fisheries. Accordingly, areas of interest include clam and quahog fishing grounds off the coast of Virginia, Maryland, and North Carolina, transit routes between the coastline and the fishing grounds, vessel homeports and/or offloading facilities, and processing facilities. Enclosure (2) provides a geographical reference for areas of interest noted in this annex.

(1) As of the date of this plan, there were roughly 290 dredging type commercial fishing vessels on the regional Coast Guard Commercial Fishing Vessel Examiner's roster. Primary, homeports for these vessels in Sector Virginia's AOR include Norfolk, Newport News, Hampton, Virginia Beach, Portsmouth, Chincoteague, Cape Charles, and numerous other communities, however, fishing vessels homeported elsewhere in the mid-Atlantic or Northeast regularly fish in the Sector Virginia zone.

(2) Common companies involved in shellfish landing in VA:

a. The Shellfish Company: 3323 Shore Dr. Virginia Beach, VA 23451
b. Wanchese Fish Company: 48 Water St Hampton, VA 23663
c. Lynnhaven Oyster Company: 1444 Southern Blvd, Unit C-20 Virginia Beach, VA 23454
d. Goodwin Island Oyster Company: 118 Sandbox Lane, Yorktown, VA 23692
e. Ruby Salts Oyster Company: 234 Cherrystone Road, Cape Charles, VA 23310
f. Ship Point Oyster Company: 1115 Poquoson Avenue, Poquoson, VA 23662

(3) Primary shellfish *processing* companies/plants in VA:

a. Virginia Natural Fish Company: 200A Milnwood Rd, Farmville, VA 23901
b. Wanchese Fish Company: 48 Water St. Hampton, VA 23662
c. The Shellfish Company: 3323 Shore Dr. Virginia Beach, VA 23451
d. Sam Rust Seafood: 620 Regional Dr. Hampton, VA 23661
e. Ballard Fish & Oyster Company: P.O Box 347, 1588 Townfield Drive, Cheriton, VA 23361

Area of Responsibility. Coast Guard Sector Virginia Area of Responsibility (AOR) is described in 33 CFR 3.25-10. The Sector Virginia Marine Inspection and Captain of the Port (COTP) Zone includes an area of responsibility that encompasses nearly the entirety of the state of Virginia, excluding the northeastern counties of Loudoun, Fairfax, Arlington, Prince William, and northern third of Stafford, as well as the independent cities that fall within these counties. The COTP Zone extends seaward in a easterly direction from the Virginia coast to the 200 nautical mile exclusive economic zone boundary. Sector Virginia includes the major ports of Norfolk, Portsmouth, Newport News, and Richmond and major river systems such as the James, York, Rappahannock, and Elizabeth Rivers. The AOR also includes several locks and dams, active shipyards, major deep draft cargo ports, and the waters of multiple lakes, rivers and coastal waterways.

Incident Impact

An incident involving DMM and CWM may result in unique and potentially significant impacts in a number of ways, to include:

(1) Injury to vessel crewmember(s).

(2) Contamination of vessel.

(3) Negative impact to vessel's schedule, operations, catch, and/or livelihood.

(4) Contamination of catch/threat to food supply.

(5) Disruptions to a vessel's operation, waterway, marina and/or pier/facility. These disruptions may stem from operational controls, such as safety zones or Captain of the Port Orders, necessary to provide for public safety and/or to facilitate an emergency response.

(6) Public safety/health concerns (real or perceived).

(7) Risk to responders.

(8) The response may exceed or overwhelm the capabilities or resources of local fire departments/HAZMAT teams and/or require a joint federal, state and/or local response. Additionally, depending on the time of year, Level A or B personal protective equipment (PPE) may pose health and safety risks for responders that may need to be mitigated.

Pre-Incident Conditions

(1) On 22 August 2016, the Coast Guard Inspections and Compliance Directorate issued Marine Safety Alert 11-16 **(see enclosure 2)** titled "Dangerous Bycatch from Bygone Days, Discarded Munitions Remain a Present-Day Hazard!" The alert addressed the extreme hazards that potentially exist today caused by discarded munitions, particularly for commercial fishermen engaged in dredging and trawling. The alert also recommended the fishing fleet review and follow the Army's 3R Explosive Safety Guide for Maritime Industry, and report discoveries to the National Response Center at 1-800-424-8802.

(2) The Army's 3R Explosive Safety Guide for Maritime Industry is guidance produced by the Army in July 2013 **(see enclosure 3)**. This guide provides mariners with information on the actions to take should they recover or suspect they have recovered a munition during maritime operations.

(3) Sector Virginia created a Quick Response Card (QRC) for the Sector Command Center and Sector Response personnel to help guide information collection and initial response actions for an incident involving munitions **(see enclosure 4).**

Support from Other Agencies

Federal, state, and local agencies will play a key role in DMM and/or CWM response operations. The Coast Guard may receive support from, or provide support to, one or more of the following:

Federal

Department of Defense (DOD) Contacts *(in Order of Priority During a Response)*

(1) Naval Weapons Station Yorktown, VA and Naval Amphibious Base Little Creek, VA: The Explosive Ordnance Disposal (EOD) Mobile detachment at Naval Weapons Station Yorktown and Explosive Ordinance Disposal Mobile Unit Two (EODMU2) at Naval Amphibious Base Little Creek are a six-person team equipped, trained and responsible for identifying (confirming/denying presence of) DoD military munitions, determining the threat, limiting the spread of contamination, and rendering it safe. The EOD has a 9-meter (29' 6") rigid hull boat, and normally launches on maritime missions from Naval Weapons Station Yorktown or Naval Amphibious Base Little Creek, although the boat is trailer-able and can launch from an alternate boat ramp. The EOD has a 1-4 hour ramp-up time (may be longer on weekends/holidays), and has a two-person team available on 24/7 duty. The EOD is dispatched through the Regional Operations Center 757-322-2609, but may also be reached directly at 757-462-8452 (day)/ 757-444-2324 (night). The team is not equipped or responsible for decontamination actions onboard the vessel or catch.

If the recovered munition is determined to contain an unknown liquid fill, EOD will assist in coordinating further disposition. If the vessel is at sea, EOD can, if the risk is acceptable and if authorized by higher DoD authority, dispose of the munition at sea.

(2) DoD's 20th Chemical, Biological, Radiological, Nuclear, and Explosives (CBRNE) Operations Center: 410-436-6200. Responsible for determining and executing safe disposition, removal, and transport of munition, once rendered safe by an Explosive Ordnance Disposal team.

(3) The Navy On Scene Coordinator (NOSC) that covers Sector Virginia zone is Commander Navy Region Mid-Atlantic, 1510 Gilbert Street, Norfolk, VA 23511. Contact may be made through the Regional Operations Center at 757-322-2609.

(4) The Office of the Assistant Secretary of the Army for Safety, Environment, and Occupational Health's Director for Munitions and Chemical Matters, can be reached at 703-697-5564.

(5) Additional U.S. Army Contacts (Consult Navy EOD, 20th CBRN Operations Center, and Atlantic Strike Team to determine additional notifications based on incident):
- Army Operations Center: 703-697-0218 or 703-695-4695.
- Army National Guard 21st Civil Support Team (CST).
- Chemical Material Activity's Director, Recovered Chemical Material Directorate, 410-436-1083.
- Edgewood Chemical Biological Center's Director for Operations for Program Integration, 410-436-9570.
- U.S. Forces Command's Director, CBRNE Analytical Remediation Activity, 410-436-9570

Department of Homeland Security (DHS)

(1) National Response Center (NRC). The NRC is a part of the federally established National Response System and staffed 24 hours a day by the U.S. Coast Guard. It is the designated federal point of contact for reporting all oil, chemical, radiological, biological and etiological discharges into the environment, anywhere in the United States and its territories. The NRC also takes maritime reports of suspicious activity and security breaches within the waters of the United States and its territories. Reports to the NRC activate the National Contingency Plan (NCP) and the federal government's response capabilities. It is the responsibility of the NRC staff to notify the pre-designated On Scene Coordinator assigned to the area of the incident and to collect available information on the size and nature of the release, the facility or vessel involved, and the party(ies) responsible for the release. The NRC maintains reports of all releases and spills in a national database. The NRC can be contacted at 1-800-424-8802.

(2) National Strike Force (NSF): The National Strike Force (NSF) provides highly trained, experienced personnel and specialized equipment to Coast Guard and other federal agencies to facilitate preparedness for and response to oil and hazardous substance pollution incidents in order to protect public health and the environment. The NSF's area of responsibility covers all Coast Guard Districts and Federal Response Regions. Units that fall under the NSF can be requested or dispatched via communications with District 5 Command Center, and/or via the NSF Coordination Center (NSFCC) at 252-331-6000.

a. National Strike Force Coordination Center (NSFCC): THE NSFCC provides support and standardization guidance to the Atlantic Strike Team (AST), Gulf Strike Team (GST) and Pacific Strike Team (PST). The NSFCC also oversees the maintenance of the OPA-90 mandated Response Resources Inventory (RRI), Oil Spill Removal Organization (OSRO) Classification Program, and National Maintenance Contract (NMC).

b. Strike Team's (ST): Three specialized teams make up the National Strike Force (NSF); The Atlantic Strike Team (AST), Gulf Strike Team (GST) and Pacific Strike Team (PST). All three Strike Teams are vital national assets comprised of a unique, highly trained cadre of Coast Guard professionals who maintain and rapidly deploy with specialized equipment and incident management skills, including maritime environmental response, Weapons of Mass Destruction WMD), and Chemical, Biological, Radiological, and Nuclear (CBRN) response.

c. Public Affairs Information Assist Team (PIAT): The Public Information Assist Team brings experienced members with expertise in interagency crisis communication to assist Incident Commanders (IC) and Federal On Scene Coordinators (FOSC) meet their objectives of truth and transparency of operations for the public.

d. Coast Guard Incident Management Assist Team (IMAT): The IMAT is also a part of the NSF. It is designed to provide tactical incident support during a response. This team represents the highest level of ICS experience and qualifications in the Coast Guard and its members are available upon request to assist operational or incident commanders during significant contingencies.

Department of Justice (DOJ)

(1) Federal Bureau of Investigation (FBI). The FBI is the lead Federal agency for criminal investigations of terrorist acts or terrorist threats, as well as intelligence collection activities within the United States. FBI field office Norfolk, VA area of responsibility spans the counties of Accomack, Chesapeake, the Eastern Shore, Norfolk, Northampton, Portsmouth, Suffolk, and Virginia Beach. For a CWM/DMM incident, the FBI's investigative priorities include: possession of WMD (location, and who has access to it), and whether or not there are indicators that those involved intended to locate and retrieve the DMM. The FBI field office Norfolk has a WMD Operations Unit, WMD Countermeasures Unit, Domestic Emergency Support Team, Hazardous Materials Response Unit, and a Materials and Device Unit. The Norfolk office receives NRC reports, but may also be reached directly at 757-455-0100.

Department of Health and Human Services (HHS)

(1) Food and Drug Administration (FDA): The FDA is responsible for protecting the public health by ensuring the safety, efficacy, and security of the nation's food supply. The FDA manages the National Shellfish Sanitation Program (NSSP), which is the federal/state cooperative program for the sanitary control of shellfish produced and sold for human consumption. The purpose of the NSSP is to promote and improve the sanitation of shellfish (oysters, clams, mussels, and scallops), moving in inter-state commerce. The cognizant FDA office for the state of Virginia are located at Accomack field office (757-787-5864 x221), Norfolk field office (757-683-8461) and White Stone field office (804-435-1095). For CWM/DMM response, the FDA coordinates with designated state shellfish regulatory officials, as well as the owner/operator of the vessel and offloading/processing facilities, to coordinate the identification, status, isolation/embargo, and disposition of the shellfish catch.

(2) Office of the Assistant Secretary for Preparedness and Response (ASPR): Regional Emergency Coordinators (RECs) serve as ASPR's primary representatives throughout the country at the regional level. The main role of the RECs is relationship building, planning for effective federal emergency responses, and facilitation of preparedness and response activities for public health and medical emergencies. ASPR and the REC are an additional resource that the state health department will engage for situational awareness and resource support (if needed). Region III covers Virginia and can be reached at 215-861-4413.

(3) Centers for Disease Control and Prevention (CDC): The CDC provides independent oversight to the U.S. Army's chemical weapons elimination program and serves as an important element in ensuring the safe destruction of chemical warfare material for protection of public health. The CDC also recommends exposure limits for chemical warfare agents. During a response, the CDC may be able to provide additional resources and expertise for environmental or responder monitoring, medical guidelines and recommendations, and disposal. Contact and additional information at: www.cdc.gov/nceh/demil; 800-232-4636.

Environmental Protection Agency (EPA)

(1) Consequence Management Advisory Division (CMAD): The CMAD is EPA's national special team providing expertise and response capabilities for CBRN. CMAD's Portable High-throughput Integrated Laboratory Identification System (PHILIS) is a mobile laboratory for on-site analysis of environmental samples contaminated with chemical warfare agents and toxic industrial compounds. There is one PHILIS in Edison, NJ, and another in Castle Rock, CO. Throughput for each PHILIS unit is approximately 60 samples/day. CMAD provides tactical capabilities for **screening, sampling, monitoring, decontamination, clearance, and waste management**. CMAD also includes a 16 member team located in six geographical regions (Washington DC; Erlanger, KY; Raleigh, NC; Edison, NJ; Boston, MA; and Kansas City, KS. Expertise includes biology, toxicology, health physics, chemistry, engineering, industrial hygiene, HVAC engineering, and contracts/grants management. CMAD also has contractual arrangements with laboratories in various locations in the US. Team members are available to respond and/or provide technical expertise 24/7/365. Requests for CMAD support can be made through EPA's Emergency Operations Center at 202-564-3850.

(2) EPA's Environmental Response Team (ERT): Capable of conducting on-site health and safety assessments (including chemical, biological and physical treatment and monitoring) to determine if immediate threats to personnel safety exist. Coast Guard commanders who have reason to suspect threats to physical safety exist should contact the ERT via the National Response Center (NRC) at 1-800-424-8802 or EPA's Emergency Operations Center at 202-564-3850.

National Oceanic and Atmospheric Administration (NOAA)

(1) National Weather Service (NWS): The NWS provides weather, water, climate data, forecasts and warnings for the protection of life and property. The NWS office that services Sector Virginia's AOR is NWS Wakefield, which can be reached at https://www.weather.gov/akq/, 757-899-4200, and AKQ.webmaster@noaa.gov.

(2) NOAA Scientific Support Coordinator (SSC): The NOAA SSCs are part of NOAA's Office of Response and Restoration. NOAA SSCs are interdisciplinary scientific teams that support the Federal On Scene Coordinator, and respond to oil and chemical spills in U.S. waters.

NOAA SSCs help the On-Scene Coordinator make timely operational decisions. The team is headquartered at NOAA's campus in Seattle; however, members are located around the country to represent the team at spills, drawing on the team's spill trajectory estimates, chemical hazards analyses, and assessments of the sensitivity of biological and human-use resources. OR&R staff members also represent NOAA on the National Response Team and Regional Response Teams. NOAA SSC locations are mostly associate with Coast Guard Districts. The Region Three SSC covers Sectors New York, Delaware Bay, Maryland-National Capital Region, Virginia, and North Carolina. The assigned SSC for Sector Virginia is Mr. Frank Csulak. He can be reached at 732-371-1005.

State

Virginia Department of Environmental Quality (DEQ): DEQ administers the state's environmental protection, conservation, and emergency response efforts. DEQ may be reached at 804- 698-4000, or through the Tidewater Regional Office at 757-518-2000.

Virginia Department of Health (VDH): The VDH is responsible for ensuring the health and well-being of communities and populations by protecting and promoting the physical, mental, and environmental health of its citizens, and by preventing disease, injury, and disability. The VDH Office of Emergency Management has responsibility to coordinate the emergency activities of the Department and its components. VDH OEM would lead Department efforts and activities for these situations, including alerting/notifying other Department units that have specific responsibilities, such as liaising with hospitals and EMS agencies, epidemiology and disease monitoring, and public information. One unit of note is the VDH Consumer, Environmental and Occupational Health Service (CEOHS), which serves the communities and workers through activities aimed at improving the health and well-being of the public. At the core of its mission are preventive initiatives to decrease disease and injury by reducing exposure to chemical, physical and biological hazards. CEOHS activities are organized into three programs: Environmental and Occupational Health Surveillance, Food Safety and Public Protection, and Environmental and Occupational Health Assessment. The VDH OHS is the State Shellfish Regulatory Official listed on the FDA's Interstate Certified Shellfish Shippers List. VDH Shellfish Sanitation Manager Mr. Keith Skiles can be contacted at 804-864-7480 or via email at Keith.Skiles@vdh.virginia.gov.

Virginia Emergency Operations Center: The Virginia Emergency Operations Center (VEOC), when activated, performs direction and control, prioritization, assessment, coordination, and resource management. The emergency operations center operates with a hybrid organizational structure that incorporates elements of the incident command system and emergency support functions to structure its assessment, coordination, and resource activities. The Deputy Operations Director (DOD) is responsible for three of the major functions: assessment, coordination and resource management. The assessment function is performed by an Information and Planning Branch, the coordination function by Operations and Communications, and the resource management function by three branches: Emergency Services, Human Services, and Infrastructure & Resource that coordinate specific ESF functions that fall under those branches.VA EOC can be contacted at 804-674-2600

Virginia Office of Public Safety and Homeland Security (VPSHS): Leads and coordinates Virginia's counterterrorism, cybersecurity, and emergency preparedness efforts, and can be contacted at 804-786-5351.

Virginia Department of Emergency Management (VDEM): The VDEM is a state agency that works closely with local government emergency managers, other state agencies, volunteer organizations and federal agencies such as FEMA to ensure a comprehensive, efficient and effective response to emergencies and disasters throughout Virginia. Headquartered in Richmond, VDEM is organized around five divisions with a staff of approximately 75 employees. Reporting directly to the Secretary of Public Safety and the Governor of Virginia, VDEM works under the broad authority of the Commonwealth of Virginia. State resources can be coordinated through VA EOC at 804- 674-2600

Local

Fire Departments: Some municipal fire departments have specialized HAZMAT units, many of which are trained in WMD response. State/municipal HAZMAT capabilities should be coordinated through the cognizant state office of emergency management or regional operations/dispatch center.

Emergency Medical Services (EMS): Local EMS organizations are responsible for responding to requests for medical assistance, depending upon the severity of the incident in terms of number of casualties and extent of exposure. EMS personnel may be restricted from responding to a site by the Lead Federal Agency (LFA) until protective capabilities for responders are available.

Harbormaster: Local harbormasters are usually employed by the town in which the harbor is located. They may be part of the local law enforcement agency or may have powers delegated to them directly by the town or city council. Harbormasters may be able to readily facilitate movement of vessels within the harbor and clear dock space as needed for the response.

Hampton Roads Metropolitan Medical Response System (MMRS): The purpose of the Hampton Roads MMRS is to develop and sustain a comprehensive medical response capability for the Hampton Roads communities to the health and medical consequences of WMD, terrorist acts, or any natural or technological disaster. MMRS coordinates local law enforcement, fire, HAZMAT, EMS, hospital, and emergency management to more effectively respond in the first 48 hours of a public health crisis. Through the Emergency Communication Center (ECC) located in Norfolk (or in the case of a catastrophic event, Yorktown) the strike teams can be activated by the Emergency Manager, Incident Commander, or other Public Safety Officers. MMRS can be contacted at 757- 441-5608.

Maritime Incident Response Team (MIRT): The mission of the Maritime Incident Response Team (MIRT) is to provide immediate on-scene maritime advice and agency liaison to the United States Coast Guard and Incident Commanders responding to fires, hazardous materials, search and rescue, and other emergencies in the marine environment. The MIRT will promote maritime response capabilities in The Port of Virginia through an ongoing program of training, drills, resources, and continued support and coordination through port partnerships. The MIRT can be requested via email at bburket@portofvirginia.com or by phone at 757-683-2199.

Hampton Roads Incident Management Team (HRIMT): The mission of the Hampton Roads Incident Management Team (HRIMT) is to provide a professional, All-Hazard Type 3 IMT to support major incidents and events that occur in the Hampton Roads region, the Commonwealth of Virginia, and outside State as requested. HRIMT was formed to provide specialized assistance to all member communities, and to provide specialized assistance to other communities and Agencies as available. The member community for the HRIMT consists of the sixteen localities identified by the Hampton Roads Planning District Commission. These consist of the Cities of Chesapeake, Franklin, Hampton, Newport News, Norfolk, Poquoson, Portsmouth, Suffolk, Virginia Beach, and Williamsburg, and the Counties of Gloucester, Isle of Wight, James City, Southampton, Surry, and York. The MRIMT can be requested via email at mgurley@cityofchesapeake.net

Private

Vessels: The Master of a vessel has a vested interest in the safety of their vessel, crew, and cargo. In the event suspected CWM encountered during normal fishing activity, hazards a crewmember or vessel, the Master may contact local authorities via 911 and/or Sector Virginia's Command Center via phone, VHF channel 16, or other means. The Master may also provide advice to the Incident Commander on the use of personnel and equipment. The Master and crew can also provide crucial information regarding the vessel's construction, cargo, firefighting systems, fishing configurations/cargo hold filtration systems, etc. It should be noted that a vessel's owner may be a different person than the master. In these cases, the owner may be an additional stakeholder to consider/engage.

Shellfish Processing Facilities: Shellfish Processing Facilities regularly used for processing shellfish in this AOR are addressed in the Situation paragraph above. The processing plants have protocols in place to deal with DoD military munitions encountered during processing at the plant. An encounter with DoD military munitions should be reported to local law enforcement. Law enforcement will request EOD support of an explosives or munitions emergency. The responding EOD team will follow applicable EOD procedures when addressing the munitions encountered.

Assumptions

(1) Timely notification(s) will enable a swift, effective, and comprehensive multi-agency response.

(2) Fishing vessels will be inclined to return to their intended next port of call/homeport. If the vessel has been engaged in fishing, the vessel Master will want to go to the dock where they offload catch.

(3) An incident(s) will be significant enough to require the commitment of Federal, state and local forces.

(4) An incident(s) involving CWM will require an atypical response that may create unease for decision makers and political officials.

(5) The source of contamination (i.e. the military munition) will be reasonably ascertained through information collection efforts, photo evidence, and/or on scene evaluation by a trained EOD team.

Legal Considerations

(1) 14 USC 102: Provides the Coast Guard authority to engage in planning for HAZMAT and CBRNE incidents. One of the Coast Guard's primary duties is enforcing or assisting to enforce all applicable federal laws upon the high seas and waters subject to United States jurisdiction.

(2) 14 USC 521. Provides the Coast Guard authority to render aid and save life and property in the event of a marine-related emergency, within the capability of available Coast Guard resources.

(3) 14 USC 522: Authorizes the Coast Guard to make inquiries, examinations, inspections, searches, seizures, and arrests upon the high seas and waters over which the United States has jurisdiction, for the prevention, detection, and suppression of violations of U.S. laws.

(4) 14 USC 1701: Authorizes the Coast Guard to utilize its personnel and facilities to assist, upon request, other Federal, state, and local agencies.

(5) Ports and Waterways Act (33 USC 1223-1225). Delegates authority to the Captain of the Port (COTP) to direct the anchoring, mooring, or movement of a vessel; to specify times of vessel entry, movement, or departure to, from, or through ports, harbors, or other waters; to restrict vessels operation in hazardous conditions to vessels which have particular operating characteristics or capabilities; or to direct the handling, loading, discharge, storage and movement including, emergency removal, control and disposition of explosives or other dangerous cargo or substances, on any bridge or other structure on or in the navigable waters of the United States or any land structure immediately adjacent to those waters.

(6) Clean Water Act: Pre-designates the Coast Guard COTP, as the Federal On Scene Coordinator (FOSC) for pollution discharge response and removal. Under this authority, the FOSC may coordinate and direct all public and private efforts directed at removal or elimination of imminent and substantial threats to the environment. Among the actions that may be taken, are the immediate removal and disposal of vessels, structures, and/or floating debris.

(7) Intervention on the High Seas Act (33 USC 1471): Extends the Coast Guard's authority to take similar preemptive or corrective FOSC action onto the high seas (i.e., beyond the 12-mile territorial sea).

(8) The Magnuson Act, 50 USC 191: Provides Coast Guard District Commanders and Captains of the Port (COTP) with broad authority in situations which may affect the safety and security of vessels, harbors, ports, and waterways.

(9) The Ports and Waterways Safety Act, 33 USC 1221 through 1236: Gives the Coast Guard jurisdiction to control vessel or waterfront facility operations to prevent physical or environmental damage to any U.S. port.

(10) 40 CFR 300.120: On-Scene Coordinators and Remedial Project Managers, general responsibilities. Includes a provision that states "DoD will be the removal response authority with respect to incidents involving DoD military weapons and munitions or weapons and munitions under the jurisdiction, custody, or control of DoD"

Execution

For incidents occurring offshore or in the coastal zone involving real or potential hazardous material, it is anticipated that the Coast Guard will assume the Federal On Scene Coordinator role under the National Oil and Hazardous Substances Pollution Contingency Plan (NCP), 40 CFR Part 300. Incidents known to involve DoD military weapons and munitions should also involve a DoD On Scene Coordinator to serve as the removal response authority, in accordance with 40 CFR 300.120. Due to the complexity, number of assisted/assisting agencies, and potential response duration, a NIMS ICS Unified Command structure should be considered early in the response. Normally, Sector Virginia will initially dispatch a response team, comprised of at least two persons, at least one of whom will be a qualified Pollution Responder, to coordinate initial on scene Coast Guard response efforts on behalf of the COTP/FOSC. Additionally, Coast Guard deployable specialized forces, such as those operating under the National Strike Force, may be consulted and/or requested through established Coast Guard request for forces channels, and will operate in accordance with established policies and procedures. To better assist agencies in their initial response to an incident, an Incident Briefing Form ICS 201-CG Military Munition Discovery and Response form has been provided. (**see enclosure 7**)

The response operation(s) may involve *time-phasing*. These phases are discussed in further detail below.

[1] Phase I: Discovery/Notification.
[2] Phase II: Evaluation and Stabilization.
[3] Phase III: Rescue Operations (if applicable).
[4] Phase IV: On Scene Assessment, Mitigation, and Decontamination.
[5] Phase V: Reconstitution.

Phase I: Discovery/Notification

Phase I involves the discovery of a real or potential threat in the maritime environment, and the initial report made to the Coast Guard of the incident. Discovery may occur while the vessel is underway and engaged in fishing operations, while returning to port, or after returning to port when a crewmember(s) begins to exhibit signs of chemical blister agent exposure.

Initial Coast Guard notification may be received directly from the vessel's master (either while still at sea, or after returning to port), from a NRC report, and/or from another entity such as federal, state or local response agency, hospital, etc. Regardless of timing or method of Coast Guard notification, a report should be made to the Coast Guard Sector Virginia's Command Center in Portsmouth, and to the NRC, as soon as possible. Upon notification, the Sector Virginia's Command Center will collect key information about the incident and vessel(s) involved, make internal notifications, and initiate the Coast Guard's response actions in accordance with the QRC **(see enclosure 4).**

Phase II: Initial Evaluation and Initiating the Response

Phase II involves evaluating the incident, characterizing the threat, and stabilizing a potentially fluid situation enough so that tactical response strategies may be formed and coordinated with other response partners.

Communications with the vessel and initial safety/first aid guidance: Depending on the situation, the vessel Captain and crew will need initial safety guidance.

- Follow the guidance in the 3Rs Explosive Safety Guide for Maritime Industry **(see enclosure 3).**
- For incidents involving exposure to a suspected chemical agent (i.e. sulfur mustard), the most important factors are removing the agent from the body and preventing spread. Decontamination of anybody who came into contact with the munition must start immediately, even if no adverse effects are felt at the start.
- Mustard agent penetrates the skin within two minutes. Therefore, decontamination of a person for mustard agents must occur in the first 1-2 minutes of exposure in order to prevent or decrease any tissue damage (skin, eyes, and/or airways).

Emergency First Aid and Gross Decontamination Onboard a Vessel

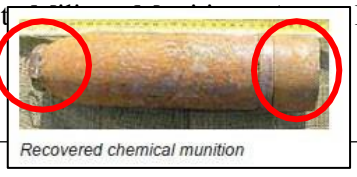
Note: Gross decontamination efforts done at sea by a vessel's crew may include extensive flushing/wash down with salt water and/or fresh water (performed from an upwind position), wash down of the vessel with bleach solution, and/or steps consistent with those addressed in enclosure (5). Additional to the guidance provided in enclosure (5), a 0.5% bleach solution may be safely applied to skin if soap/water is not available or enough. Gross decontamination of a person or vessel should be done for as long as necessary until the substance is no longer visible. The affected area of the body (including any blistering) should also be dressed with a clean, dry dressing. Do not puncture blisters.

- Remove contaminated clothing and double seal in a plastic bag. Close nearby doors and hatches, and secure ventilation systems.
- Clean eyes only if stinging. Flush with water for 10-15 minutes.
- Additional first aid guidance for exposures to chemical munitions can be found in enclosure (5).

Evaluate the incident and threat: If the munition remains onboard or personnel have been exposed to a chemical agent, the level of concern, and complexity of response, are significantly elevated. In these cases, it may be prudent to direct the vessel to remain offshore, or proceed to a suitable anchorage area, until the cognizant Navy EOD team can evaluate the presence and severity of a potential explosive or chemical agent hazard – and respond accordingly. The presence or potential of crew injuries must also be factored into this evaluation. Evaluation of the threats and hazards by trained experts, such as the Navy EOD team, followed by close collaboration/consultation between decision makers, will be critical to properly identifying **risk-based** initial response actions. A Navy EOD team will normally take 4-8 hours to deploy a vessel along the Virginia shore (after notification). The location of the incident, weather, and status of the team at time of notification may extend the response time. Therefore, initial evaluation will be done remotely to the extent possible, while the team is being mobilized, based upon all available information.

The Munition May Offer Important Clues About Hazards

Note: According to the Naval EOD, a missing cone and/or scoring on the base of a suspected chemical munition canister are indicators that the munition is **not** fused (i.e. does not present an explosive threat). If it is feasible and safe to do so, the vessel crew should be directed to provide photos of the DMM to the Coast Guard or UC. Photos taken from onboard the vessel could provide valuable initial clues to subject matter experts as to the type of munition and potential threat posed. However, sea growth and deterioration may make initial visual confirmation difficult or impossible.



Recovered chemical munition

A new 5-inch 38 caliber projectile

Consider Initial Control Actions: For scenarios involving a DMM/CWM onboard a vessel that is still underway, **one of the first critical decision points will be where to direct the vessel**. Consider Coast Guard operational controls on the vessel, crew, and/or waterway in order to protect life and/or property, or to facilitate a response (to include COTP Order and/or Safety Zones). If a crew member or the vessel has become contaminated by CA, the contaminated crew member needs to be controlled and decontaminated prior to leaving the vessel (see page 19 and enclosure 5).

Control Actions on Vessel – Trade Offs

Note: The decision to keep a vessel offshore and away from port will be based upon a number of complex factors, and may need to be thoroughly evaluated by decision makers in a short amount of time. The potential threat to public safety, based upon the totality/confidence of the information available at the time, should be evaluated, and weighed against the fact that **suitable response options are reduced**, **and risks to responders are exponentially elevated**, **in an offshore environment**. Additional factors that may influence the ability to direct or keep a vessel offshore include: current/forecasted weather/sea state, vessel Master's level of concern/apprehension, health issues/injuries onboard, status of fuel/provisions onboard, and ability of vessel to anchor or station-keep. See page 22 for further discussion. It is necessary to determine, as best as possible initially based on all known facts, the true nature and extent of current and potential danger posed by the threat. This will include consensus among experts and decision makers as to the known or suspected substance, method of transfer/contamination, explosive/vapor threats, calculated danger/hot zones, etc. **Understanding and articulating "most probable" and "worst case" threats will become critical during stakeholder consultation and risk-based decision making, particularly for MEDEVAC and/or where to place vessel.**

Initiate the Response:

- ***Limit or prevent injury to those on scene as a top priority***. Determine early, through command center communications with the vessel, if exposure to personnel has occurred or may occur, and provide information to reduce potential effects of exposure onboard the vessel. Information for the neutralization of a suspected chemical agent, and decontamination, must be immediately available to the vessel Captain if needed. See page 19 and Enclosure (5).
- ***Remove or neutralize the threat***. Sulfur Mustard, for example, has a **freezing point of 58.1°F**. Suspected sulfur mustard can be rendered inert, and therefore risks associated with a damaged or leaking canister significantly reduced, at these (or lower) temperatures. If safe to do so, the vessel crew may consider securing a canister in an enclosed container with sea water or ice, or freezing the canister or discharged liquid fill with CO2 from an upwind position. CO2 is available on many commercial fishing vessels in the form of a portable fire extinguisher.

- ***Give the vessel further instructions.*** As a default position, the vessel should be directed to start proceeding towards port, at the master's discretion, and if safe to do so. The vessel should remain at least 1 nautical mile (NM) offshore until a full picture of the situation can be established. The nature of the situation may require a Captain of the Port order.
- ***Contact/dispatch a Coast Guard response team.*** This team will normally be comprised of at least two persons, at least one of whom will be a qualified Pollution Responder, and additional unit representatives, as necessary.
- ***Contact/coordinate with DoD response teams and subject matter experts*** (whether or not munition is onboard the vessel), if source of contamination is believed to have been from a DoD munition source. Contact the following, in order of priority (see page 7 for contact info).
  [1] Naval Weapons Station Yorktown EOD Team or EODMU2.
  [2] 20th CBRNE Operations Center.
  [3] Navy OSC.
- ***Complete internal notifications.***
- ***Continue/complete external notifications.*** At a minimum, during this phase, timely notifications should be made to the following (see pages 7-11 for contact info):
  - FDA.
  - State environmental response agency(ies).
  - State departments of public health.
  - State shellfish regulatory/response agencies.
  - FBI.
  - NOAA SSC.
  - EPA Emergency Operations Center for further notification to CMAD.

  Note: Many of these agencies will receive the National Response Center report; however, follow-on coordination at the local level will be expected. Supporting agencies may expand depending on the nature of the event.
- ***Consider initiating Critical Incident Communications*** with the Coast Guard chain of command.
- ***Assemble initial unified response structure,*** even if done remotely at first.
- ***Consider activation of Sector Incident Management Team.***
- ***Assess resource requirements/shortfalls.***
- ***Engage Coast Guard Public Affairs***.
- ***Recommend to D5 an Incident Specific Regional Response Team (RRT) call*** (include Defense Support Coordinating Element).

DoD Standard Operating Procedure

Note: When military munitions are discovered outside DoD's munitions logistics management system, authorized officials (e.g., federal, tribal, state, and local law enforcement officers) may request DoD support for an explosives or munitions emergency response. The DoD Military Service that first becomes aware of an incident involving DoD military munitions will, if necessary, take immediate action to prevent or limit damage or injury.

If a recovered munition contains a liquid fill and the vessel is in port or the munitions is on land, the responding DOD EOD unit, regardless of Service, is required to contact the 20th CBRNE. The 20th CBRNE will dispatch the Chemical Analytical Remediation Activity (CARA) to assess non-intrusively, the munition, package it in a specialized container, and transport it to the nearest military installation within the state capable of safe storage of Category II munitions.

When a known chemical munition or munition with an unknown liquid fill is involved, the need for support from, and close coordination with, other DoD agencies on the response action is **mandatory**. Such agencies include the 20th CBRNE, the Chemical Material Activity's Director, Recovered Chemical Material Directorate (RCMD), and the Office of the Deputy Assistant Secretary of the Army for Environment, Safety and Occupational Health (ODASA (ESOH)).

Phase III: *Rescue Operations*

Phase III, if applicable, involves the rescue operation (i.e. MEDEVAC or MEDICO) for a vessel's crewmember(s) at sea. The trigger for a rescue operation would normally be a request from the vessel Master to provide medical advice (i.e. or MEDICO) remotely, or a request to perform a medical evacuation of a crewmember from the vessel using a Coast Guard helicopter or boat.

According to a U.S. Public Health Service (USPHS) officer (CG Flight Surgeon involved in MEDEVAC discussions), an at-sea emergency MEDEVAC *may* be recommended for a crewmember exhibiting signs of moderate to severe exposure, described as extensive coverage (i.e. a limb or multiple portions of body), or symptoms of eye/respiratory issues. Patients with moderate to severe exposure will need to be treated by a hospital with a burn center as soon as possible to increase chances of survival. For minor cases (i.e. skin redness or irritation), a MEDEVAC may not be recommended, since the medical gain of expedited removal and transport to a medical facility is likely not enough to outweigh the risk of the operation (as compared to the transit time of the vessel to return to port on its own). Minor exposures require treatment at a hospital with an Intensive Care Unit (ICU). In any event, there will be substantial risk vs. gain, and operational risk management discussions that will take place between the Sector, District 5, Flight Surgeon, and resource provider (i.e. Air Station), to fully evaluate the circumstances of a potential MEDEVAC mission. This evaluation will involve gross decontamination measures reported to have been completed by the vessel's crew, confidence in those measures, and risks to responders vs. potential gain of the mission. Typically, MEDEVAC consultations among decision makers involves considering and weighing the following:

- Type/nature of medical emergency.
- Type of medical care a patient needs.
- The location that medical care can be received
- How urgent/quickly that medical care is needed.
- Whether or not that window can be met be a Coast Guard asset.

Key elements that will factor into the MEDEVAC recommendation, and risk vs. gain discussions, include:

- Time of exposure.
- Extent/degree of exposure (including approximate coverage of body).
- Extent/nature of blistering/burns.
- Decontamination/first aid actions taken onboard the vessel, and on the exposed crewmember(s).
- Eye or respiratory symptoms.
- Status of the source of contamination (i.e. canister).

Additional questions to ask the vessel Master to help establish facts for risk-based decision making include:

- When was the source of contamination first handled?
- What was done onboard the vessel after the munitions were handled?
- What was done with the munition(s)?
- When did the crewmember(s) first start developing symptoms?
- What was done with the crewmember(s) after they developed symptoms?
- Where were they on the vessel from time of exposure to the time of symptoms?
- Were these places washed down/sanitized? If so, how and when?
- What is the status of the person's clothing, gloves, etc that were being worn at the time of exposure?

MEDEVAC

Note: If the source of the contamination is contained/removed, and gross decontamination of the vessel and exposed crewmembers has occurred on scene by the vessel crew, a MEDEVAC *may* be considered (after standard MEDEVAC consultations and concurrence from the supporting unit). Rescue personnel should use universal precautions. Universal precautions are to treat any bodily fluid as if it may be contaminated. Suitable PPE includes medical gloves (i.e. Nitrile gloves), eye protection, and a surgical mask. Treatment rendered by Coast Guard responders would be supportive in nature (oxygen, pain meds, and monitoring vitals) as there are no specific antidotes for mustard agents.

Most USPHS Flight Surgeons have completed the Army's Medical Management of Chemical and Biological Casualties course. This level of training equips Flight Surgeons with the ability to discuss and make recommendations on first aid and treating casualties, recognizing the severity and level of urgency, risks of further contamination transfer, and mitigating those risks for first responders. Flight surgeons will provide a recommendation as to the medical need and urgency of a MEDEVAC, based on all available information about the patient's status and stability. Additional policies on MEDEVAC can be found in section 4.7 of the Coast Guard Search and Rescue Addendum. The final decision to conduct a MEDEVAC rests with the aircraft commander, cutter commanding officer, or coxswain on scene. For a scenario such as this, the commanding officer/officer in charge (or their representative) of the recommended MEDEVAC asset's unit will be involved in the MEDEVAC decision making, along with the Search and Rescue Mission Coordinator, Flight Surgeon, and District 5 Command Center/Chief of Incident Management. If desired, additional expertise/consultation may be received from a DoD Medical Officer, or the 20th CBRNE Operations Center (see page 7 for contact info).

It is expected that a MEDEVAC would only be considered (and necessary) for cases involving severe symptoms, and when there is high confidence among all stakeholders that the mission will not put responders at risk of contamination. If there is reason to believe the environment is still contaminated, the only option will be to extract the crewmember(s) pier-side via an established decontamination station/process.

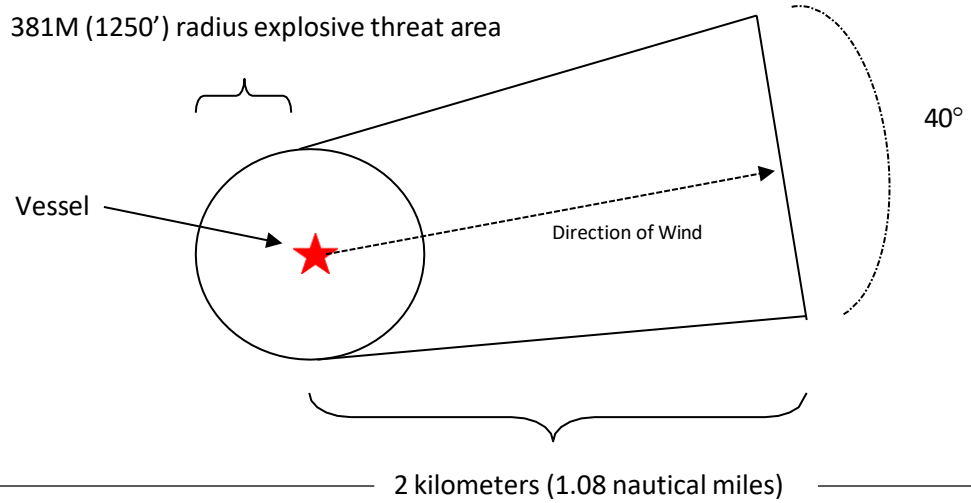
Phase IV: On Scene Assessment and Mitigation

To facilitate a timely and effective response by a trained HAZMAT team, access for emergency medical services, and appropriate catch offloading capabilities, the **vessel subject to the response should be brought to a shoreside facility appropriate for the size and type of vessel as soon as safely practicable**. Remaining offshore, or at an anchorage, significantly reduces options for a suitable HAZMAT response, and increases risk for the vessel's crew and emergency responders.

If the source of contamination (i.e. military munition shell/casing) is still onboard, or there is a compelling public safety concern due to the possibility of an explosive threat, un-identified munition, and/or chemical vapor threat, remaining offshore or proceeding to an anchorage (if the vessel is capable of anchoring) may be the safest interim option until the threat can be determined and mitigated by trained response personnel (EOD Team). Once determined, the EOD team will be able to secure or package the munition, in conjunction with the 20th CBRNE.

Worst Case Exclusion Zone and Threat Analysis

Note: Early consultation with the Navy EOD will be needed to evaluate and determine prudent/required exclusion areas around a vessel or threat (i.e. standoff distance), based on what they may be able to deduce from the munition's characteristics. Pending a more thorough evaluation of the threat, the **default worst case exclusion zone for an unknown munition threat, or unanalyzed (but possible) explosive threat**, can be used as a rule of thumb. (Source: Initial Exclusion Area for an Unknown Chemical Source, as per EOD AEDOPS.



Exclusion Zones, and subsequent decontamination hot/warm/cold zones will be further refined/determined (and likely vastly reduced from the default explosive and downwind exclusion area depicted in the graphic). The zone refinement will be accomplished by the EOD, in conjunction with the Defense Threat Reduction Agency (DTRA). Upon further evaluation of the scene, munition(s), and/or HAZMAT involved, the EOD can obtain sophisticated modeling and analysis on the explosive and vapor threat from DTRA. Inputs to this analysis will include type/number of munitions, assumed/known chemical liquid fill (if applicable), actual vs. potential volume of released chemical liquid fill, and current/projected environmental conditions.

The Atlantic Strike Team is trained and equipped for chemical agent confirmation sampling. This means the ability to confirm the presence of a chemical agent (i.e. an indicator turning a particular color based on detection of a particular chemical agent group), but not identification of exact type of agent. The AST's primary tool used for confirmation testing is M8/M9 detection paper for field level rudimentary sampling. Definitive analysis to pinpoint the actual chemical agent requires lab testing. A primary resource for field lab testing will be the EPA CMAD. Additional capabilities exist via the 20th CBRNE and/or an equipped Civil Support Team. See pages 7-9.

Note: **In addition to confirmation sampling and decontamination efforts during this phase, coordination early in the response among the EPA CMAD, city/state public health and emergency management officials, FDA/USDA, and potentially additional incident specific members of the RRT is critical. This coordination will identify and manage expectations and requirements for environmental monitoring during the response, clearance sampling, and waste management.**

Offshore EOD Team Response

The Navy EOD team is capable of responding to an offshore/coastal incident. Their primary surface resource is a trailer-able 9-meter (29-foot) rigid hull response boat, with operational limitations of 10-15kt winds and 3-foot seas. A response to a possible chemical munition will require a minimum of five personnel, but ideally will include the full six-person EOD team.

For incidents involving a potential explosive or dangerous vapor threat onboard a vessel, it is anticipated that the Coast Guard will order the vessel to remain at least <u>one nautical mile offshore</u> (based on the criteria for initial exclusion area for unknown chemical source). Actual position for a given incident will be driven largely by the current and future prevailing wind and sea conditions. It may become necessary to weigh the risks of keeping the vessel offshore in bad weather, where there may be increased hazards to the crew and responders, versus the risks of bringing the vessel to a more protected harbor/back bay location.

For an offshore EOD response, the EOD team will need, and request, at a minimum, the following assistance from the Coast Guard:

- Coast Guard escort/support vessel (Buoy Tender (preferred) or Medium Endurance Cutter). **If the situation will not require a decontamination element**, a Patrol Boat or Fast Response Cutter may be adequate to support the EOD team's vessel and crew. This asset will be needed to provide a stable support tie-off platform for the smaller EOD boat, assist with logistics/messing needs, and stage equipment. It is also anticipated that this vessel will be needed to embark a National Strike Force contingent to provide additional support, expertise, and equipment back-up for the EOD team. This Coast Guard vessel may also be part of an offshore safety zone presence. Additional boat(s) may be required for safety zone enforcement.

- Ability to perform decontamination of up to five EOD personnel from the support vessel.
- Potential need for air supply bottle swap (Strike Team support).

- Advice/recommendations for a boat ramp/launch site, staging of equipment, and/or parking/logistics support at the nearest Coast Guard station.

Limitations of the Navy EOD Team's Capabilities

Note: The EOD is only capable of and equipped for "hasty decontamination" for themselves following entry to analyze or render a munition safe. Hasty decontamination is typically reserved for limited use for lifesaving extraction of a casualty or injury. A trained and equipped HAZMAT/Decontamination team will be needed to operate in tandem with the EOD, particularly for prolonged responses.

Limitations of an Offshore HAZMAT Response

A HAZMAT response in an offshore/maritime environment would be extremely complex, dangerous, lengthy, resource-heavy, and expensive. Barring a very unique/compelling circumstance, the physical hazards of an offshore HAZMAT operation to both responders and vessel crew will outweigh the public health/safety threat posed by a chemical agent, such as Sulfur Mustard, onboard a vessel.
The following is a list of limitations and constraints that should be considered for an offshore HAZMAT response:

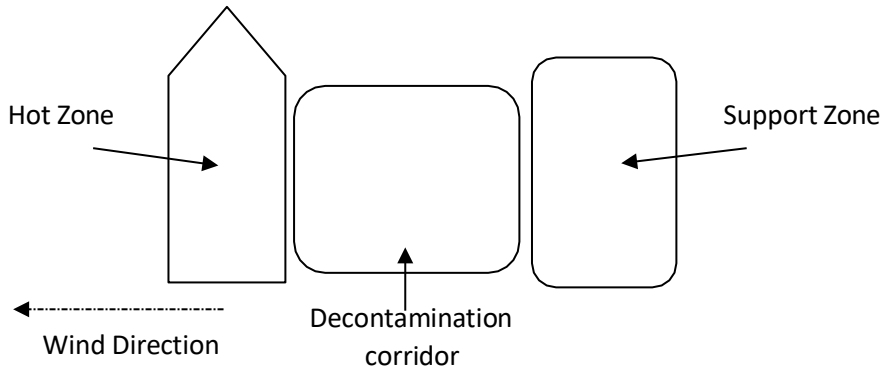
- The use of sodium hypochlorite (bleach) is a prominent decontamination agent. However, when used on metal deck surfaces and mixed with large quantities of salt water, it creates a "black ice" effect on chemical protective boots. This increases the safety concerns for HAZMAT responders transferring between vessels, traversing decks/fish holds, etc.
- Sea spray and wet/running machinery surfaces could cause run off of hydraulic fluid, solvents, and fuel oils. These could lead to false positives with chemical detection paper to a greater degree than if the vessel were moored with the machinery disengaged and dry.
- Logistics of decontamination water and support materials will be a factor. Decontamination water will either need to be dumped overboard, or retained onboard. Retaining onboard may require the capacity to retain hundreds of gallons of water onboard.
- The minimum personnel footprint for a full HAZMAT response will require an empty buoy tender deck or large deck barge. Personnel required for an NFPA/OSHA compliant operation beyond a basic EOD entry support is anticipated to include:

    - HAZMAT Team Lead
    - HAZMAT Safety Officer
    - (2) Entry Personnel
    - (2) Decon Personnel
    - (2) Rescue personnel
    - (1) Support zone/medic
    - (2-4) back up personnel for the next entry team
    - Medical team of at least two Emergency Medical Technicians (EMTs).
    - Until initial detection rules out the potential of air-borne contaminants, the HAZMAT team would default to level B entry, which requires at least one air bottle per person per entry.

- Generally speaking, a HAZMAT entry and decontamination operations will require the establishment of a **Hot Zone**, **Decontamination Corridor**, and **Support Zone**. The size, orientation, etc, of these zones is dynamic and will be case-specific. However, the establishment of these zones in the maritime environment will be particularly challenging, and currently void of formalized or tested tactics, techniques, and procedures within the Coast Guard, DHS, or DoD.

    a. *Hot Zone: Contaminated vessel (and potentially the area immediately surrounding the vessel).*
    b. *Decontamination Corridor: Area that contains the decontamination equipment (including water source(s)), upwind of the hot zone, and easily accessible to/from the hot zone and support zone.*
    c. *Support Zone (Cold Zone): Safe area for the staging and support of responders and equipment, prior to/following entry and/or decontamination.*

Basic Schematic for Full HAZMAT DECON Operation in a Stable Environment



The ability to establish these zones in a dynamic maritime environment that is susceptible to changing weather and sea conditions is a significant limitation. This may need to be mitigated by bringing the vessel to a dock, or if absolutely necessary, to a protected (i.e. back bay) location, along with a barge/support vessel(s) that may be anchored to the sea floor by spud or alternative method.

Bringing a Vessel to Port

Unless early analysis and consultations with DoD subject matter experts indicate an explosive and/or compelling public health hazard, the vessel should ultimately be brought to a pier (preferably a pier that normally accommodates that vessel type) so that an adequate response may be carried out.

Vessel homeports and shellfish offloading docks typically have sufficient space to support a response, and provide easy "brow" access and normal logistics support equipment for vessels. Homeports and offloading docks provide facilities to offload, segregate, and secure a catch that may be contaminated by CA until determination of its disposition. However, bringing a potentially hazardous vessel to port should only be done once safety controls are considered and put in place, to adequately control/isolate the vessel, vessel crew, and catch. Alternatively, military facilities *may* be considered. However, potential impacts to that unit's readiness as a result of placing a vessel at their facility, including the potential for a prolonged response, must be considered and weighed against other options.

Military Facilities:

(1) Naval Weapons Station Yorktown, VA, located on the York River, has a large ammunition pier. This pier is located within the secure footprint of Naval Weapons Station Yorktown, has ample space, and is co-located with the Naval Weapons Station EOD. This pier *could* support a complex, multi-agency DMM response onboard a vessel; however, will require substantial collaboration with, and approval from, the DoD via the Navy OSC.

Food Safety Actions

States have the authority to place a vessel's catch under embargo (i.e. seizure), either at the dock or at a processing facility. Once under embargo, and if product is still at the processing facility, products are marked and isolated from other product in refrigerated storage until a decision is made for disposition. If already processed (i.e. canned) and shipped out from the facility, embargoed product may be subject to recall under the authority and coordination of FDA and state health officials. The Coast Guard is **not** the agency responsible for determining the fate of the catch. This decision is made through collaboration among the FDA, State Health officials, and processing facility (if applicable). As part of the decision making process, the Coast Guard may be asked to provide information pertaining to the vessel, nature of reported encounter with the hazardous substance, and response/remediation efforts.

Phase V: Reconstitution

The Reconstitution (or recovery) Phase follows response operations and is associated with returning to normal operations, and fulfilling post-response requirements.

One of the key aspects of Reconstitution will involve clearance sampling, and waste management/disposal. Clearance sampling (confirmation and/or lab based) is performed to provide confirmation of no contamination. What requires clearance sampling and when will be a case by case determination among cognizant decision makers, including the EPA, city/state public health and emergency management officials, and FDA/USDA. Examples of items that may require clearance sampling, depending on the nature and severity of the case, may include areas of the vessel, personal affects/property or public areas contacted by an exposed fisherman, fishing gear (i.e. clam cages), transport vehicles/containers, and processing facilities. **Mobilization of the EPA CMAD specialists and capabilities early in the response will improve coordination of clearance and waste management requirements with city/county/state officials and other federal partners.**

Additional activities anticipated during the Reconstitution Phase include:

- Cancellation of control actions on vessel, crew, facility, and/or waterway.
- Medical screening/de-briefs for responders.
- Demobilization support, including refueling and re-provisioning Coast Guard resources, decon station break-down and replenishment, and transportation of gear to home unit.
- De-briefings, hotwash, and after action reports. After-action reports, including lessons learned that may help improve this plan over time, should be forwarded to the Sector's Planning Staff office within 30 days of case conclusion.
- Case documentation, including accounting of expenditures.
- Repayment of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) fund by Responsible Party, if applicable.

Administration and Logistics

Funding

The Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) fund, operated by EPA, provides broad Federal authority to respond directly to releases or threatened releases of hazardous substances that may endanger public health or the environment. CERCLA funding is authorized for removal actions, and remedial actions. The CERCLA fund may be opened in order to initiate response actions, if the source of the chemical contamination is not known, or not confirmed to be from DMM/CWM. However, if the source is a confirmed DoD munition, the DoD will be consulted for continued funding and/or reimbursement of the CERCLA fund through the National Pollution Funds Center (NPFC). In all cases, the cognizant NOSC should be contacted early on in the response for further response and funding coordination.

The Navy OSC should be consulted to determine the role and method of contact for the cognizant DoD Claims division or servicing legal division for follow on tort claims.

Public Affairs

District 5 is responsible for coordinating all Coast Guard public affairs activities, which will at first be accomplished through close coordination with "at the ready" Coast Guard public affairs support within the Sector and the Sector's collateral duty Public Affairs Officer.

(1) Coast Guard Public Affairs staff will:

- Support the lead agency's public affairs strategy regarding the release of information pertaining to response plans, operations, or response force makeup.
- Notify District 5 External Affairs and begin a draft press release for distribution for partner agency and Sector Virginia's command staff review. Ideally, an initial press release will be issued within the first day of the response. Timing and content of press releases will depend largely on the circumstances of the incident. It is customary for the Coast Guard to issue an initial (brief) press release, followed up by a subsequent release that contains more details. Press releases early in the response are intended to address the facts known about the incident, vessel involved, crew composition, location, public health information (if applicable), and the Coast Guard's role/actions. Names of additional agencies involved, their responsibilities, and agency POCs for the media (names and contact info), should be provided (normally in the subsequent press release). Due to the length of time required for joint release reviews and approvals, it is recommended that public affairs stakeholders (i.e. response agencies addressed by the press release and/or needing to be part of the review/approval process) be identified, along with agency POCs, as early as possible.
- Draft public affairs guidance, and provide support for interviews and/or press conferences.
- The Navy OSC will identify the DoD public affairs office/contact for general military munitions matters/questions.

(2) During the two prior incidents involving DMM in others zones, the public affairs posture remained "response to query." Due to some OGA sensitivities and considerations for these cases, joint approval is required, and therefore the overall public affairs posture may not be as pro-active as the normal Coast Guard posture. In both prior cases, the uncertainty surrounding the source of contamination, and final determination of the catch's fate, were among the key factors influencing public affairs posture and strategy for some partner agencies.

(3) Other Public Affairs offices likely to be involved:
- State Department(s) of Environmental Quality
- State Health Department(s)
- Food and Drug Administration
- Local fire department or first responders
- National Strike Force
- NOAA
- EPA

Medical Services

Acute care hospitals are capable of providing treatment to patients with injuries stemming from blister agent exposure. However, depending on the extent and seriousness of the injury, a trauma center or a burn center (for serious cases) may be necessary to deliver required care. For additional medical facilities information **(see enclosure 6).**

Hospitals in Virginia:

- Sentara Norfolk General **(Level I Trauma Center; Burn Center; helo pad)**: 600 Gresham Dr. Norfolk, VA 23507 (757) 388-5597
- Sentara Virginia Beach General Hospital (**Level II Trauma Center; helo pad**) 1060 First Colonial Road, Virginia Beach, VA 23454 (757) 395-8000
- VA Commonwealth University Medical Center (**Level I Trauma Center**) 1250 E. Marshall St. Richmond, VA 23219 (804) 828-9111
- Riverside Regional Medical Center (Newport News) (**Level II; helo pad**) 500 J Clyde Morris Blvd, Newport News, VA 23601 (757) 594-2000
- INOVA Fairfax Regional Hospital(**Level I Trauma; helo pad, Air Care**) 3300 Gallows Rd, Falls Church, VA 22041 (703) 776-3154

Hospitals in Maryland:

- Peninsula Regional Medical Center (Salisbury, MD) **(Level III Trauma Center; helo pad)**: 100 E Carroll St, Salisbury, MD 21801 (410) 546-6408
- The John Hopkins Hospital (Baltimore, MD) (**Level I Trauma Center; Burn Center; helo pad**) 1800 Orleans St. Baltimore, MD 21287 (410) 955-5000

Hospitals in North Carolina:

- Duke University Hospital (Durham, NC) **(Level I Trauma Center; helo pad)**: 2301 Erwin Road, Durham, NC 27710 (919) 684-8111
- Pitt County Memorial Hospital (Greenville, NC) (**Level I Trauma; helo pad**) 2100 Stantonsburg Rd, Greenville, NC 27834 (252) 847-4100

Burn Centers:

- Sentara Norfolk General **(Level I Trauma Center; Burn Center; helo pad)**: 600 Gresham Dr. Norfolk, VA 23507 (757) 388-5597
- The John Hopkins Hospital (Baltimore, MD) (**Level I Trauma Center; Burn Center; helo pad**) 1800 Orleans St. Baltimore, MD 21287 (410) 955-5000
- Temple University Hospital **(Level I Trauma Center; Burn Center; helo pad)**: 3401 N Broad St, Philadelphia, PA, (215) 707-2000.

Situation Reports

Standard Coast Guard Command Center information management procedures (i.e. internal briefing matrix, and use of internal databases) will be used until such time as formal Situation Reports (SITREPs) are deemed to be required and/or the case becomes managed under ICS with an Incident Action Plan. The format and timeline for reports will be determined in consultation with District 5 Command Center or IMT (if established). For a prolonged case, it is anticipated that the first formal SITREP will be required within 6-10 hours of case initiation. The anticipated format is an ICS 209, which may be modified to meet the nature of the case. District 5 will provide SITREP transmission instructions, however, it is anticipated that SITREPs will be transmitted to the District via email to the District Command Center, or uploaded to the District 5 IMT CG Portal site. Additional guidance, resources, and templates, can be found on the District 5 IMT Portal site: D5 IMT Depending on the seriousness of the case, media attention, etc, it is also recommended that the Sector Commander provide informal verbal briefings to the District 5 Commander and/or Chief of Staff, as appropriate.
