# **Joint CBRND Requirements**



### 2016 NDIA CBRN Defense Conference & Exhibition

COL A. Scott Estes Deputy Director, JRO-CBRND 2 August 2016

UNCLASSIFIED



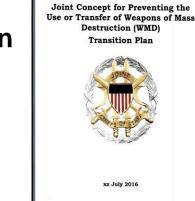
- JRO Mission / Functions
- Non-Materiel Efforts
- Requirements Development Trends
- Development Opportunities
- Questions & Discussion

- Lead joint CBRN defense equipment (CDE) and medical CDE capabilities development
- Develop and maintain the CBRN defense Overarching Operational Concept
- Represent the Services and Combatant Commanders in JCIDS and act as their proponent for coordinating and integrating CBRND operational capabilities
- Lead development of DOD CBD POM
- Develop the CBRND Modernization Plan
- Conduct CBRN Operational Risk Assessment
- Facilitate development of joint CBRN defense doctrine, training, senior leader education, and sponsor development of multi-service doctrine
- Oversee, manage, and sponsor concept experimentation

CJCS focal point for CBRN defense concepts, requirements, and chem-bio-rad defense programming to advance Joint Force capability to counter WMD.

**JRO** Mission & Functions

- Joint Concept Development
  - Prevent the Use or Transfer of WMD Transition
    - WMD Target BDA/CDA Assessment Study
    - WMD Disablement CBA DTRA led
    - WMD Deterrence Study NDU led
    - CWMD Cmd & Control Study
    - Control Study
    - Prevent WMD Transfer CBA



Non-Materiel Efforts

UNCLASSIFIED - For Official Use Only

- Operations in CBRN Environments Prospectus submit Sep 16
- NTA CONOPS Revision
- Chemical Challenge Level Study final report due 30 Sep
- Operations in an Infectious Disease Environment (IDE) Capabilities Baseline Assessment (CBA)
- Medical Countermeasures (MCM) Concept of Operations (CONOPS) Development Process
- NCR CWMD Staff Officer Orientation Seminar

## **Requirements Development Trends**

- Increasing focus on:
  - Cloud-based computing
  - Sustainment costs
  - Upgradability
  - Common equipment for combat and homeland defense
  - Ease of use/reduced training requirements
- Collective Protection new approach needed?
- Reducing administrative burden associated with IT Box
- Cost Performance "trade space" identification
- Integrated Early Warning



# **Development** Opportunities

- Aircraft Contamination Survivability
  - Decontamination
  - Patient/Remains Transportation
- Uniform Integrated Protective Ensemble
- Mass Casualty Decon
- Next Generation Chemical Detector
- Wearable sensors
- Auto-injector alternatives
- Point of Care Diagnostics (NGDS)
- Antiviral treatments
- Unmanned Systems
- Almost anything addressing NTA threats









6

UNCLASSIFIED





### Materiel Efforts: CBRND Core Capabilities Areas

#### <u>SENSE</u>

- Chemical Detection
- Biological Detection
- Radiological Detection
- Expeditionary Analytics
- Medical Diagnostics

#### <u>SHIELD</u>

- Respiratory and Ocular Protection
- Percutaneous Protection
- Chemical Prophylaxis
- Biological Prophylaxis
- Radiological Prophylaxis
- Expeditionary Collective Protection

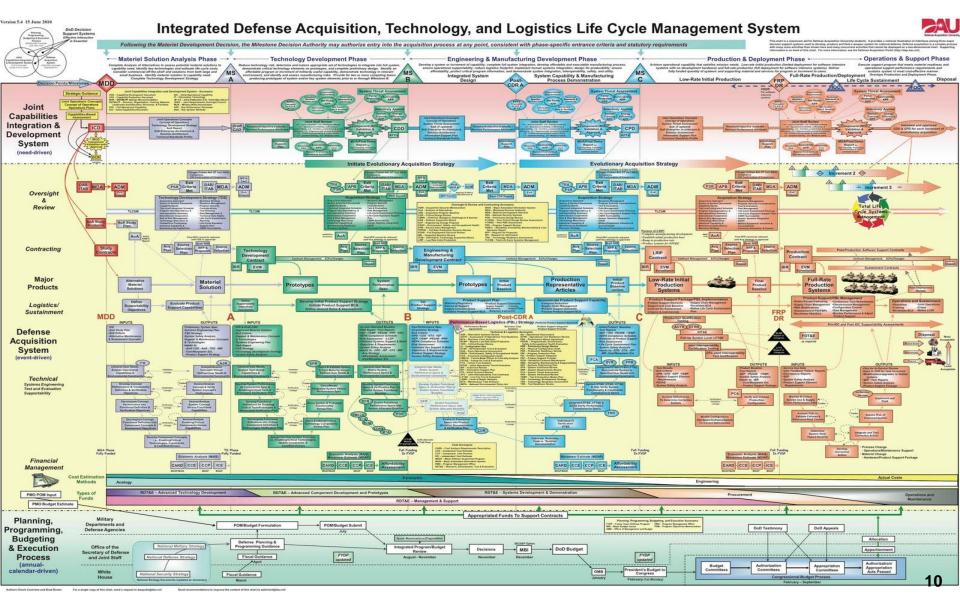
#### **SHAPE**

- CBRN Warning and Reporting
- Decision Analysis & Management

#### <u>SUSTAIN</u>

- Personnel Contamination Mitigation
- Materiel Contamination Mitigation
- Chemical Therapeutics
- Biological Therapeutics
- Radiological Therapeutics

	Materiel Efforts
SENSE - Dismounted Recon Sets, Kits, & Outfits - Common Analytical Laboratory Sys - Joint Biological Tactical Detection Sys - Next Generation Diagnostic System	SHAPE - Joint Warning and Reporting System - Joint Effects Model
<ul> <li>SHIELD</li> <li>Botulism</li> <li>Plague</li> <li>Filovirus</li> <li>Western Eastern Venezuelan Equine Encephalitis</li> </ul>	<ul> <li>SUSTAIN</li> <li>Contaminated Human Remains Pouch</li> <li>Joint Biological Agent Decon System</li> <li>Joint General Purpose Decontaminant</li> <li>Joint Service Equipment Wipes</li> <li>Emerging Infectious Diseases – TX</li> <li>Filovirus</li> </ul>



#### UNCLASSIFIED