Close Combat Systems

NDIA
2007 Munitions Executive Summit

PM Close Combat Systems

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Organization & Programs Managed

CLOSE COMBAT SYSTEMS

210 Products Managed in FY06

Business Management
Bob Wisser

COL Jack Koster
Project Manager

Patricia Felth
Dep. Project Manager

Chief System Engineer
Ross Benjamin
Technology Associate
Harold Schliesske

Networked/Demolitions
Doreen Chaplin

Munitions/Pyrotechnics
S. Lombardo

Protect Force
Kevin Wong

PM IMS
LTC J. Winbush
Joe Pelino DPM

PM Countermine
LTC Lozis
Phil Purdy DPM

PM IED Defeat
LTC Karl Borjes
R. Gullifer DPM
(Provisional)

ARDEC

JMC

NVESD

Networked/Demolitions
- Spider Networked Munitions System
- Legacy Mines
  - Claymore
  - MOPMS
  - Volcano
- Demolitions
  - MDI
  - Det. Cord
  - Blasting Caps
  - Fuzes
  - Bangalore Torpedo
  - Block Explosive
  - Sheet Explosives
- APOBS
- CAD/PAD
- EOD Ammo

Munitions/Pyrotechnics
- Grenades
  - Lethal Grenades
  - Smoke Grenades
  - Launcher Grenades
- Pyrotechnics
  - Flares
  - Signals
  - Simulators
  - Shoulder-Launched Munitions
  - AT4-CS
  - BDM
- Non Lethal Capability Set
- VLAD
- PVAB
- Non Lethal Ammo
  - MCCM
  - 40 mm
  - 12 gauge
  - NL Grenades
- Tactical NL Munitions
- Special Projects
  - MI RAMS
  - GDS
  - GMENS
  - TD-SYDET
  - SOF Demo Kit
  - RWBK

(IMS) Intelligent Munitions System*

PM IMS
- LTC J. Winbush
- Joe Pelino DPM

PM Countermine
- LTC Lozis
- Phil Purdy DPM

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(Provisional)

Standoff Mine Detection Systems:
- HSTAMIDS*
- GSTAMIDS*
- ASTAMIDS*

IED Mine Rollers
FSEP*

OVERSIGHT:
- VOSS*
- Husky Ferret Arm
- Sparrow Cache Detection

ARDEC

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NVESD

* FCS Program
PM CCS FY06 vs. FY07 Program Funding

<table>
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<th>PRODUCT LINE</th>
<th>FY06 #Lines</th>
<th>FY07 #Lines</th>
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TOTAL ALL PRODUCT LINES: 175 132 $975.3 978.3

$1006M w/IED-D in FY07
Intelligent Munitions Systems (IMS) Operational Challenges

Urban Complex Environment

Meeting operational effectiveness requirements in urban and built-up areas

Lethal & Non-Lethal

Developing scaleable effects that are effective at all stand-off

Ability to Deliver Sensors

Network Centric

Networked Systems require secure and always available communications (IA, DITSCAP)

Artillery • Mortars • Airdrop

To enable capabilities like safe passage, software controls safety critical functions
Shoulder Launched Munitions (SLM) Operational Challenges

**Capability: Portability**
Minimize Weight and Size

**Capability: Minimum Range**
Lethal effects at short ranges encountered in street-to-street fighting

**Capability: Survivability**
Fire from enclosures to allow gunner use of existing cover

**Capability: Lethality**
Incapacitate Personnel Within:
- Light Armored Vehicles
- Field Fortifications
- Masonry Structures

**Challenge: Physical Performance Limitations**

**Challenge: Multi-purpose Warhead/Fuzing**

**Challenge: Health Hazard Reduction**
- Noise
- Back-blast
- Toxic Fumes

**Challenge: Fragmentation**
Rapid Acquisition Process

Gap Analysis
- Identify Requirements
- Seek Funding
- Develop Schedule
- Develop Test Plan
- Initial ILS Assessment

Technology Assessment
- Refine requirements
- Finalize Acquisition Plan/ Obtain funding
- Finalize Program Plan/ Schedule
- Coordinate Test & Evaluation
- Develop Sustainment Plan

Transition to Life Cycle Manager
- Finalize Requirements
- Manage Funding & Schedule
- Manage Sustainment
- Transition Technologies

PM Roles During Life Cycle
- Early PM Oversight
- Initial Assessment/ Program Planning

PM
- Lead
- Support

Support
- Lead

Support
- Lead

RDECOM/JIEDDO/REF
- ATOs, ACTD, SIBRs
- REF, JIEDDO Initiatives
- RDECOM/ Lab/ Industry Initiatives

ONS/ JUONS

TERMINATE

POR

Niche

Transition
Stakeholders & Teaming Relationship

Requirements & Funding Come From:
- Theater / TRADOC (JRAC)
- JIEDDO
- Army Staff
- SOCOM
- Industry

Coordination with multiple organizations leads to Mission Success
Summary

• New Warfare → New Challenges
  – Decreasing effectiveness of older products

• Modernization through Acquisition