



MARINE CORPS SYSTEMS COMMAND

PROGRAM EXECUTIVE OFFICER LAND SYSTEMS



Advanced Planning Brief to Industry

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PM-Towed Artillery Systems

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PM-TAS Portfolio

CURRENT



M777A2



M111 Improved Position and Azimuth Determining System (IPADS)



M119A2 & Digitization

LEGACY



D30



Gun Laying and Positioning System (GLPS)



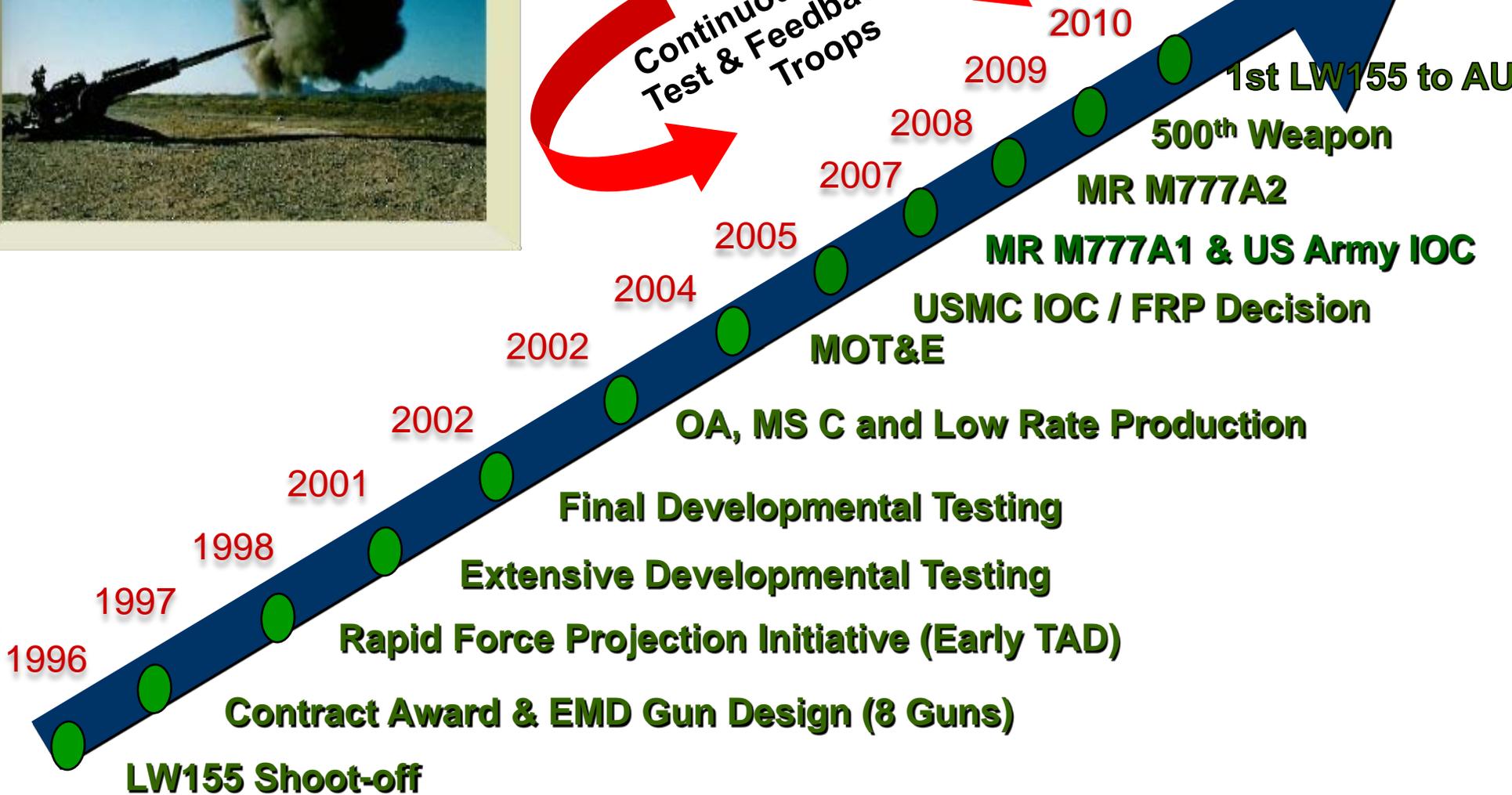
M198



M777A2 Program Evolution



Continuous Live Fire
Test & Feedback from
Troops



M777A2 Howitzer

Program Description

- 155mm Towed Howitzer
- Joint US Army/USMC Program
- AAO: US Army 542 and USMC 511
- FMS to Canada (37) and Australia (35)
- BAE Systems (UK) is Prime Contractor for Production and Initial Sustainment
- GFE Cannon manufactured at Watervliet Arsenal
- GFE Optical Fire Control, INU, PFM, Spade Dampers, BII competitively procured

Key Requirements/Performance

- Weight < 10,000 lbs
- Emplacement < 3 Minutes
- Displacement < 2-3 Minutes
- Rate of Fire > 4 rounds per Minute
- Digital and Optical Fire Control
- Compatible with Excalibur and PGK
- Air Mobility: MV22, CH53D/E, CH47D

Production/Sustainment Schedule

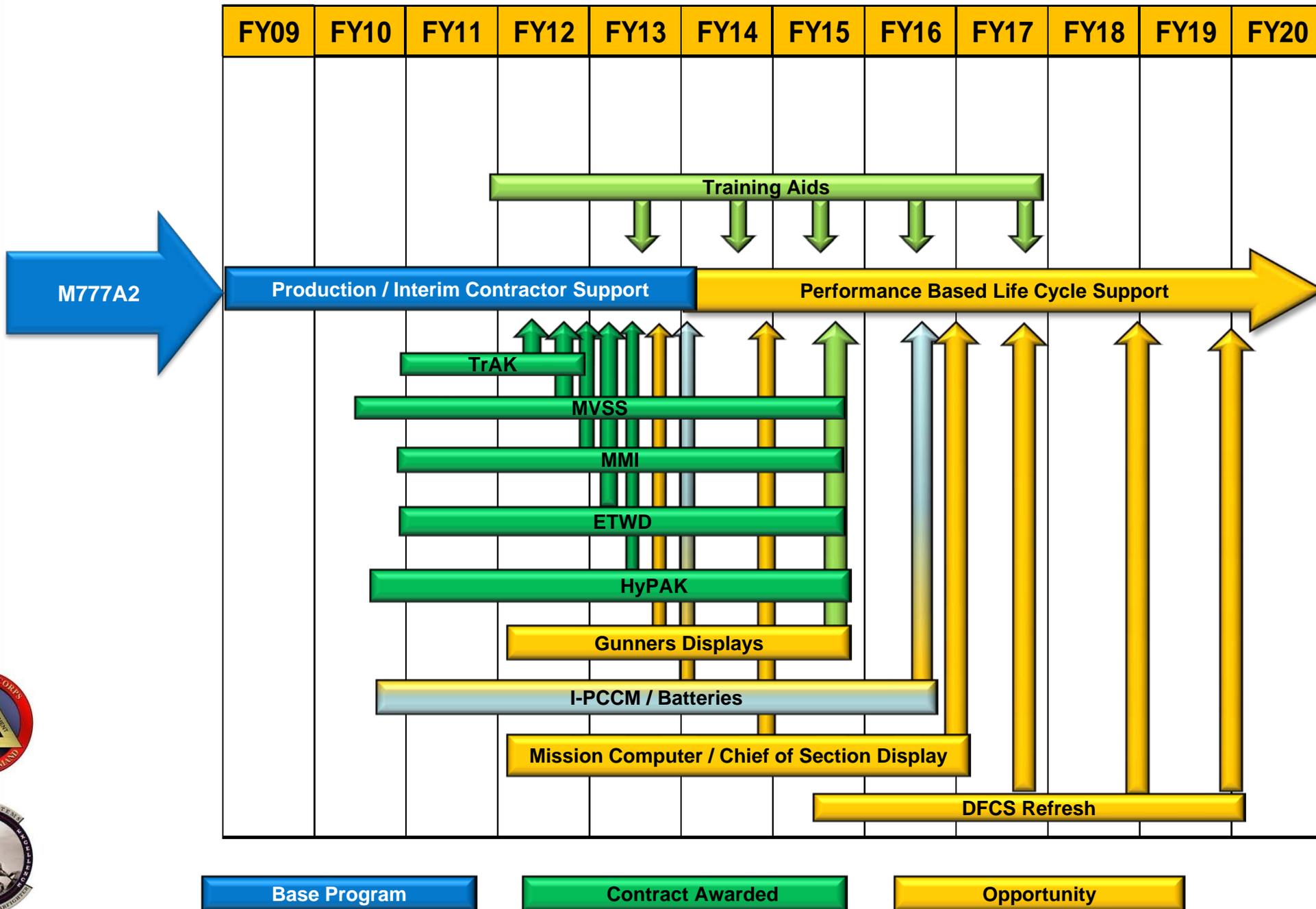
- Army/USMC Production through Nov 2013
 - >850 of 1071 fielded to date
- Additional Production Potential
 - Significant FMS interest
- Sole source ICS sustainment contract through Feb 13
- Competitive Performance Based Life Cycle Support (PBLCS) contract in FY13

Modernization Strategy

- Limited Cannon and Platform Program
 - Traverse Assist Kit (TrAK)
 - Hydraulic Power Assist Kit (HyPAK)
 - Electronic Thermal Warning Device (ETWD)
- Active Digital Fire Control Refresh
 - Improved Power Conditioning Control Module
 - Smart Batteries
 - Muzzle Velocity Sensor System (MVSS)
 - Computer and Displays
 - Radios



M777A2 Roadmap



M777A2 Digital Fire Control Refresh



Communications:

Upgrade Radio, Implement I-PIK and remove DAGR
 -May result in enclosure re-design
 Projected Fielding: FY16-17



Electronic Thermal Warning Device (ETWD):

Replace current mercury device to address safety/MACS M232A2 Z5
 Fielding: FY 13-14



Mission Computer (MSC)



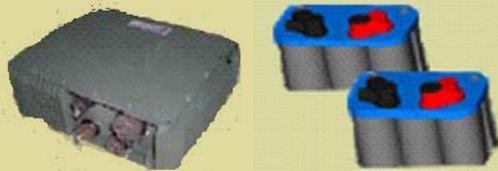
Chief of Section Display (CSD)

Computer / Displays:

MSC/CSD: Active replacement to address obsolescence/support future upgrades
 Projected Fielding: FY15
 Gunners Displays: Active replacement to address obsolescence
 Projected Fielding: FY13



Gunner/Asst Gunner Display (GD/AGD)



Power:

PCCM: Replace with I-PCCM to address field issues/support future upgrades
 Smart Battery: Li-ion under investigation
 Fielding: FY14



Muzzle Velocity Sensor System (MVSS)



Inertial Navigation Unit (INU)

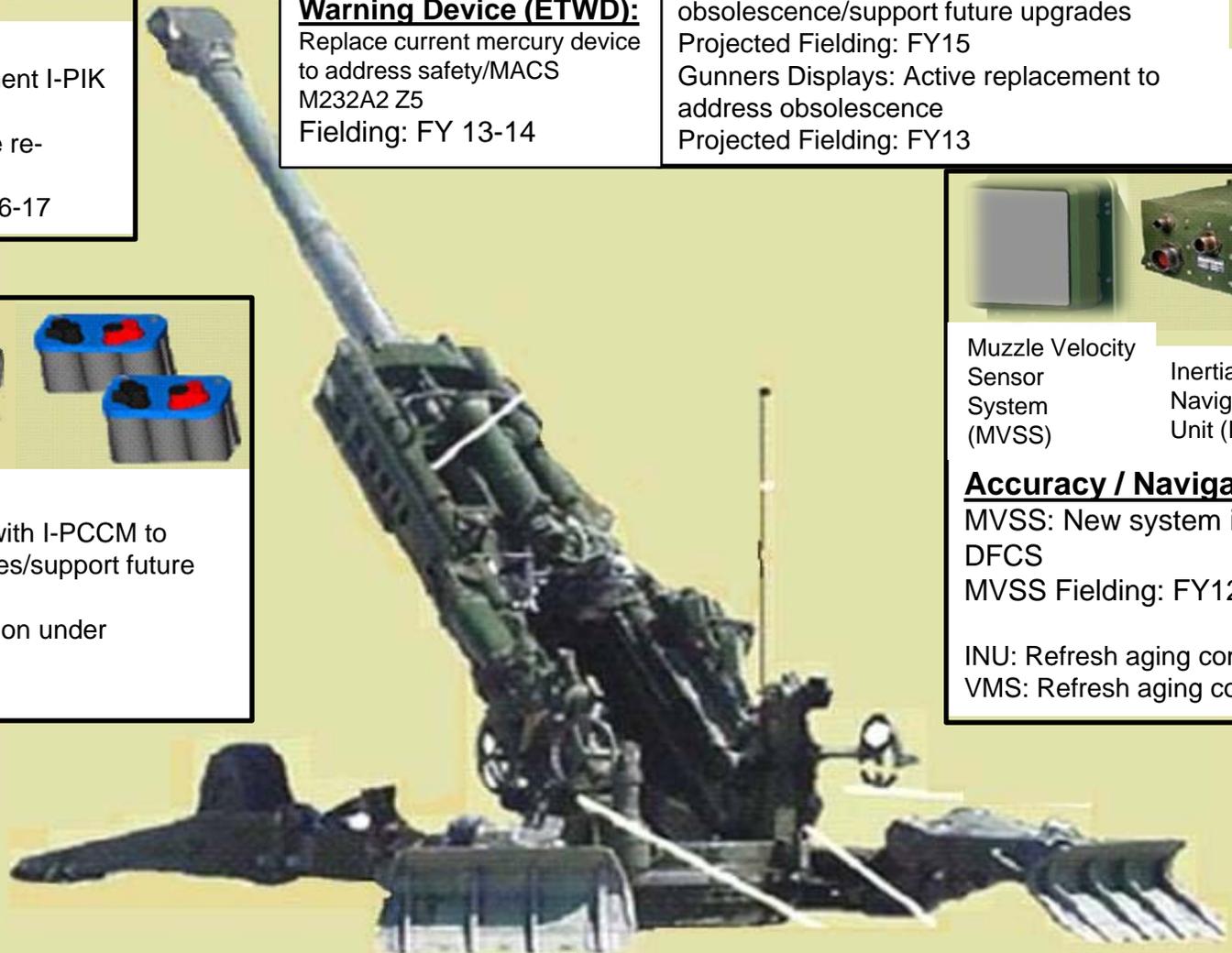


Vehicle Motion Sensor (VMS)

Accuracy / Navigation:

MVSS: New system integrated with DFCS
 MVSS Fielding: FY12

INU: Refresh aging components
 VMS: Refresh aging components



Mission Computer Attributes

- Same physical space claim as existing
- Reuse of all existing cables and harnesses
- Reduced power consumption
- 1.6GHz dual-core processor with 2GB RAM (min)
- 16GB Solid State Drive
- Internal USB TacLink® Modem
- (8) RS-422, (8) Ethernet, (4) USB 2.0 ports
- 802.11n (threshold) and Bluetooth (objective)
 - Dedicated port for attaching external antenna
- Windows Standard Embedded 7 operating system



Chief of Section Attributes

- No larger than existing
- Same mating connector as existing
- 6lb (threshold) 4lb (objective) total weight
- 8” (or larger) LCD touch screen
- 800MHz dual-core processor with 512MB RAM (min)
- Ethernet port
- Dedicated maintenance port
- Hot swappable internal battery
- 802.11n (threshold) and Bluetooth (objective)
 - Internal antenna
- Windows Embedded Compact 7 operating system



Gunners Display Attributes

- Improved sunlight readability
- Reduced power consumption
- Higher reliability
- Simplified repair procedures
- Lower unit cost



Acquisition Strategy

- **Competitively awarded**
 - Firm Fixed Price (FFP)
 - Indefinite Delivery, Indefinite Quantity (IDIQ)
- **Best Value**
 - Manufacturing / Management
 - Obsolescence Strategy
 - Technical
 - Past Performance
 - Cost
 - Small Business Participation

RFP's to be on FedBizOpps in 2-4 weeks



Performance Based Life Cycle Support (PBLCS) Vision

Vision:

Establish a Joint Government/Contractor Team to provide world class sustainment of the M777A2 Lightweight 155MM Howitzer that meets or exceeds Warfighter expectations at the Best Value to the Government

Long Term Aspiration:

Contractor assumes responsibility for overall Availability of the Howitzer



PBLCS Goals

■ Responsiveness:

- Rapidly identify Warfighter Performance Based Agreement (PBA) Metric shortfalls and implement corrective action
- Provide Field Service Representatives to support fielded units

■ System Improvements:

- Apply Systems Engineering and Configuration Management to manage obsolescence, technical insertion, and provide long term solutions and improvements to the system
- Maintain ILS products (TM's, LSA, etc)

■ Overall System Support Management:

- Develop and Manage PBAs with Organic and Contractor Product Support Providers to meet Warfighter PBA Metrics

■ Supply Support:

- Forecast requirements, manage inventory, and provide timely delivery of spares to meet metrics



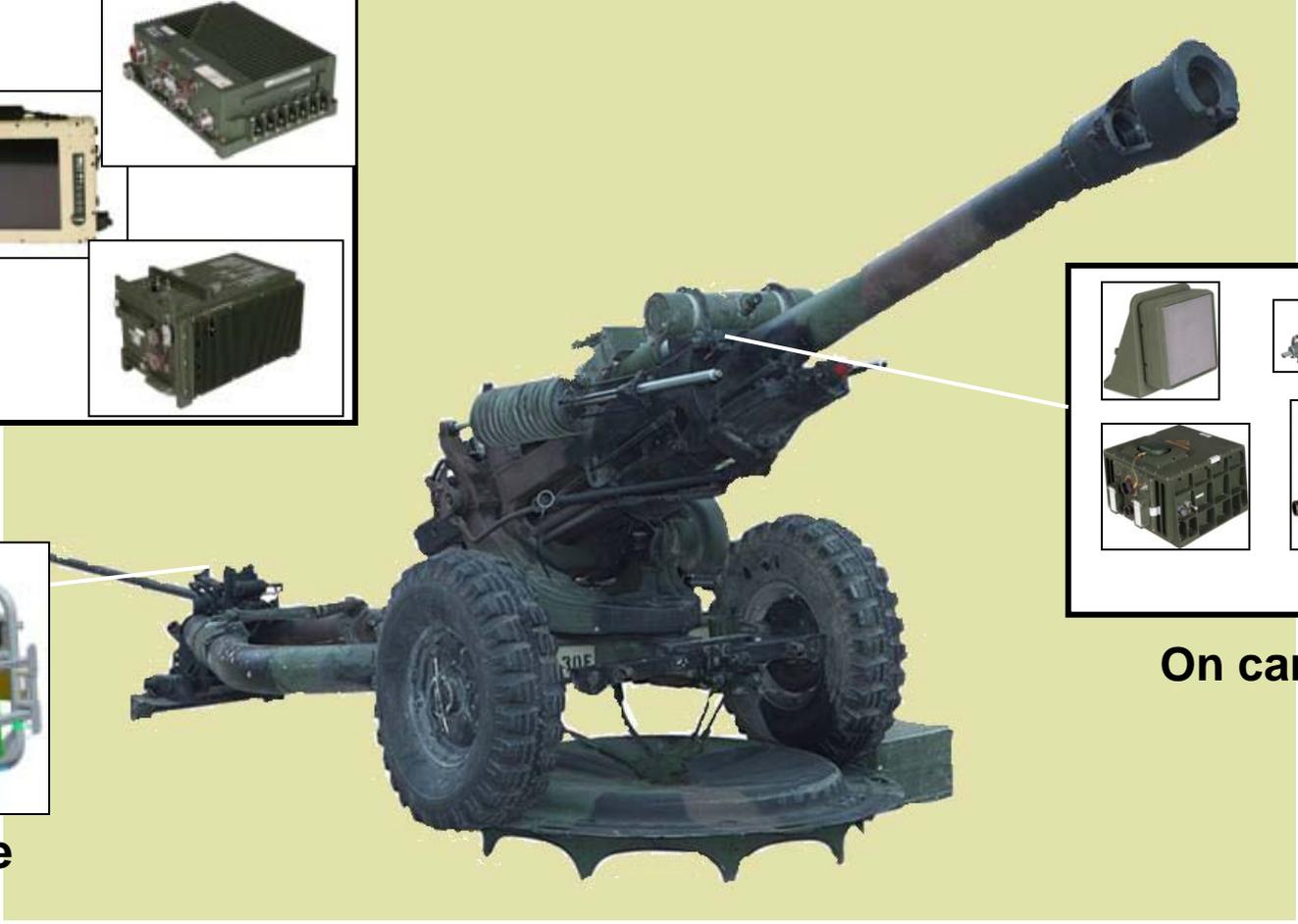
PBLCS Acquisition Strategy

- Contemplated strategy is a 10 year contract
 - Base year plus four 1 year Options.
 - At the end of each of the first 5 years, the Government would evaluate the contractor under an Award Term scenario for extending the contract an additional year.
- All options and award terms would be subject to the availability of funds.
- 2 Step Proposal Strategy



PM-TAS Opportunity

M119A2 Digitization



On carriage



Off Carriage
'sled'

Power-Sled and Brackets-Cables-Gunners Display



Questions ?

