

# Guided Missile Destroyer (DDG MOD) 2.0





### 7 September 2023



CAPT Todd E. Hutchison,
PM



### **PMS 421**



### **Large Surface Combatant Modernization & Sustainment**

<u>Mission Statement:</u> Lead and integrate all modernization and sustainment policy, planning, and execution for Large Surface Combatants (LSC). Be responsible for the integration of modernization and sustainment throughout the lifecycle including harvesting of critical material from decommissioning platforms. Manage modernization planning and execution across Participating Acquisition Resource Managers (PARMs). Oversee all facets of LSC modernization, advanced planning of availabilities, integration of new technologies, planning yard functions and sustainment. Ensure timely funding and other agreements between SEA 21 and PARMs to improve modernization ration, availability planning and sustainment.

CG 47 DDG 51 DDG 1000 DDG(X) AEGIS Ashore

#### **Modernization**

- Planning & Programming
  - POM Cycle Advanced Planning
  - PY Oversight SID Development / LLTM
  - Congressional RFI Responses
- Financial
  - Execution of TOA
  - Manage Growth Funding Requests
  - Oversee Upward Obs
- Execution
  - Issue LOAs
  - PMR Management
  - NAVSEA Execution Reviews

#### Sustainment

- Platform Readiness
- ILS
- OSLRs
- Safety
- Fleet Coordination
- Fleet Liaison / Feedback
- Harvesting
- LCMG support



# PMS 421 Mission Support Areas







### DDG MOD 2.0 Overview



#### > DDG MOD 2.0 is the next phase of upgrading the DDG 51 Class

- In addition to the DDG MOD 1.0 HM&E and Combat Systems/AEGIS upgrades, DDG MOD 2.0 ships will be equipped with:
  - □ SPY-6(V)4 Air and Missile Defense Radar (AMDR) with updated AEGIS Baseline
  - □ SLQ-32(V)7 Surface Electronic Warfare Improvement Program (SEWIP) Block III
  - ☐ High Efficiency Super-Capacity (HESC) Chillers

#### ➤ May 2021 Resources & Requirements Review Board (R3B) Approved

- Smart Start Plan to ramp up to DDG MOD 2.0 production
  - ☐ Four DDGs will complete two modernization availabilities to receive full complement of 2.0 capabilities (DDGs 91, 93, 95, 97):
    - DDG MOD 1.5: Delivers SLQ-32(V)7 in addition to DDG MOD 1.0 HM&E and CS/AMOD packages
    - DMP2: Delivers SPY-6(V)4 and HESC
- Full Scale DDG MOD 2.0 will execute modernization on 2 DDGs per FY
  - □ Decision balances the need to deliver the capability to the Fleet while reducing the industrial base risk associated with the technically complex availabilities



# DDG 51 Class Modernization (DDG MOD) 2.0

### Innovative Approach



# "Crawl – walk – run" approach to ramp up the DDG MOD Program to DDG MOD 2.0 through a Smart Start on four DDGs

- Incrementally installing 2.0 capabilities across two avails for government and industry learning and training
- Modernization the central focus of DDG MOD 2.0 Availabilities

#### Transformational efforts in planning and execution phases

- Extensive use of LIDAR scans, 3D computer modeling and 3D printed models to improve engineering drawing quality and installation processes
- Out of the box installation methods to improve efficiency and reduce avail duration towards our <u>BOLD GOAL</u> of 52 weeks which could reduce overall program time

#### Modeling new construction programs with acquisition rigor

- Developed first Acquisition Strategy specific to surface ship modernization
- Creating new Program Office and Program Manager dedicated to DDG MOD 2.0



DDG MOD 2.0 provides ESSENTIAL warfighting capabilities to the Surface Fleet through timely modernization of FLT IIA DDGs



# PB24 DDG MOD Fielding Profile

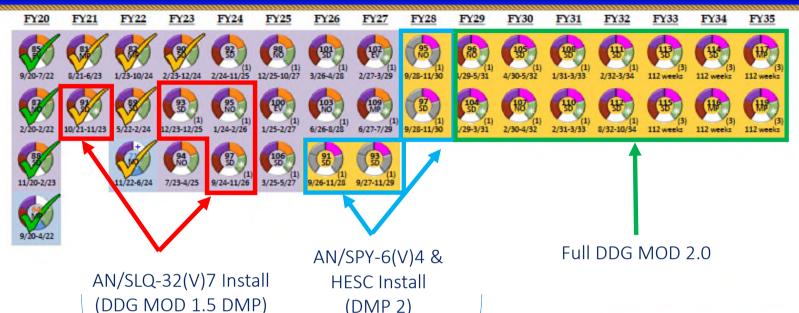


#### Completed FY10 - FY20 HME AMOD C/S Only MLE 51 56 54 60<sup>2</sup> 55 52 62<sup>2</sup> 58 53\* $63^2$ 59 57 61 64 65 66 69 67 79 70 80 72 83 73 84 74 85 76 $77^{2}$ 86 87 # of Ships Completed:



MCCARTHY.WIL Digitally signed by MCCARTHY.WILLIAM.FRA LIAM.FRANCIS.1 NO5.1047597397 047597397

CAPT Matthew Tardy DATE Major Program Manager, Surface Ship Modernization (PMS 407)



**Smart Start** 

SQQ-89A(V)15

SLQ-32(V)7 (white is funded by IWS2)

Note (1): Avail dates subject to change Note (2): SQQ-89A(V)15 previously installed Note (3): Dates not yet reflected in NDE Dates in red require avail contract to be definitized in FY prior to avail execution NDE Availability dates as of 29 March Duration Estimates are based on

Hull No. (No BMD. CIWS BLK 1B BMD 3.6.X, BMD 4.0.X) SLQ-32(v) MK38 MOD 2, 3, or 4 Home Port KU Band EV - Everett Navy ECDIS NO - Norfolk SPS-73(V)18 NMT MP - Mayport SD - San Diego CANES PH - Pearl Harbor BMD 4.X (FLT I/II) PO - Portland SQQ-89A(V)15, YO - Yokosuka Tech Refresh, Flt IIa Other Major Alts MLE (C/S) Integrated C/S Mod ACB/TI 1MC Upgrade w/ BMD 5.X Peripherals Gun SPMR (FLT VII) Integrated C/S Mod BL 10M w/ BMD 6.X MLE (HM&E) Stand-Alone C/S Upgrades Previously Not DDGM funded Completed

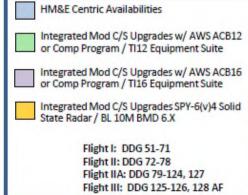
HM&E Upgrades

GEDMS

RSC

DDG 75, 78, 99 HM&E Centric Availabilities

PMS407 DDG Mod Not Programmed:



Avail in Progress **Avail Completed** 

29 March 2023

For

## current projections

Notes:

2023



# **Questions / Discussion**

