

**SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS**  
**Campaigning with Partners for Integrated Deterrence**

**CAPT Randy Slaff**, Program Executive Officer  
**MARITIME**



# PROGRAM EXECUTIVE OFFICE – MARITIME

- PEO Opening Comments and Portfolio Overview
- PM Combat Diving
- PM Naval Special Warfare
- Undersea Special Mission Systems
- PM Undersea Systems
- PM Surface Systems
- Maritime Technology Office
- Open Forum Questions

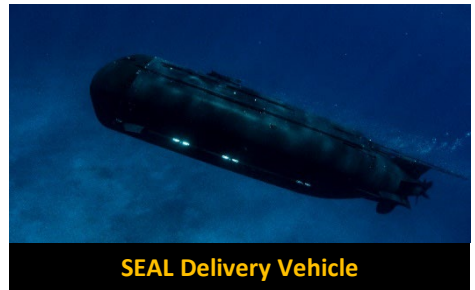


# ORGANIZATIONAL CHART



# PROGRAM EXECUTIVE OFFICE MARITIME (M)

## UNDERSEA SYSTEMS



SEAL Delivery Vehicle



Dry Deck Shelter



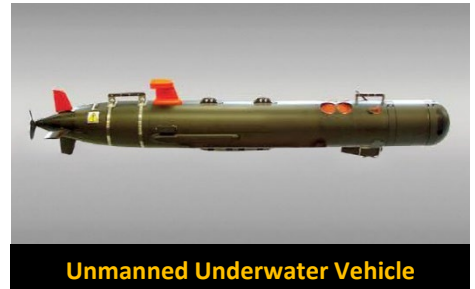
Dry Combat Submersible - Next



Dry Combat Submersible



SOF Combat Diving



Unmanned Underwater Vehicle

## SURFACE SYSTEMS



Combatant Craft Assault



Combatant Craft Heavy



Special Operations Craft -Riverine



Combatant Craft Medium



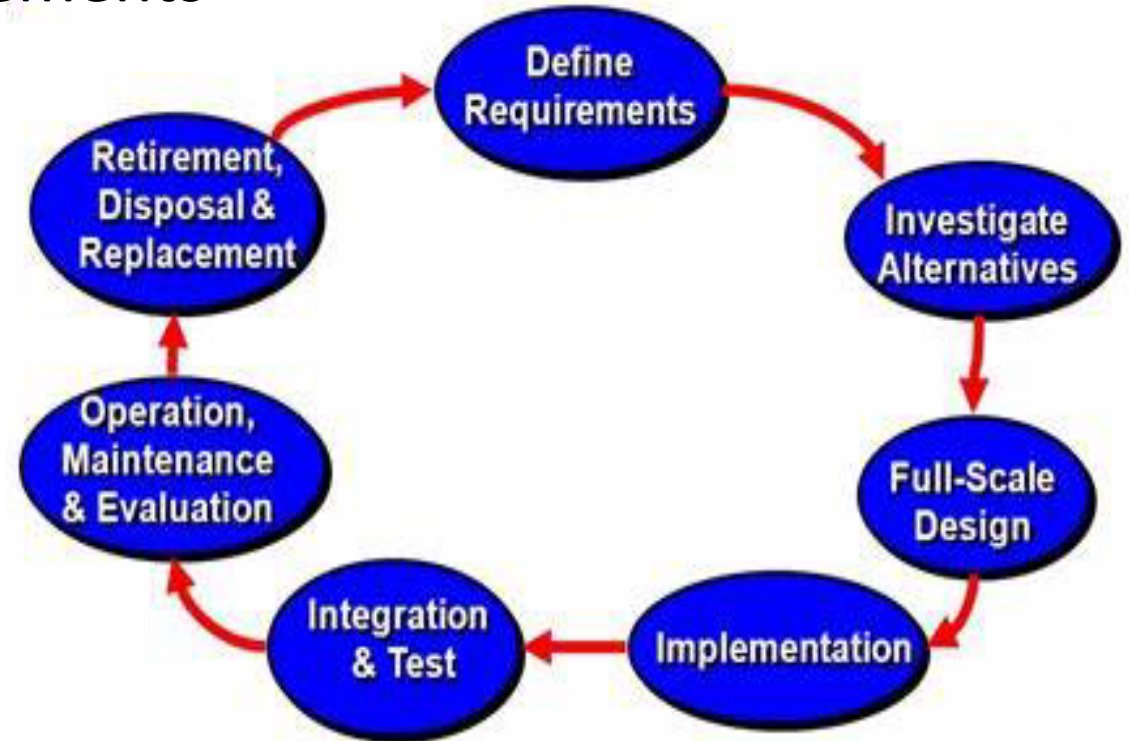
Next Gen CCFLIR2



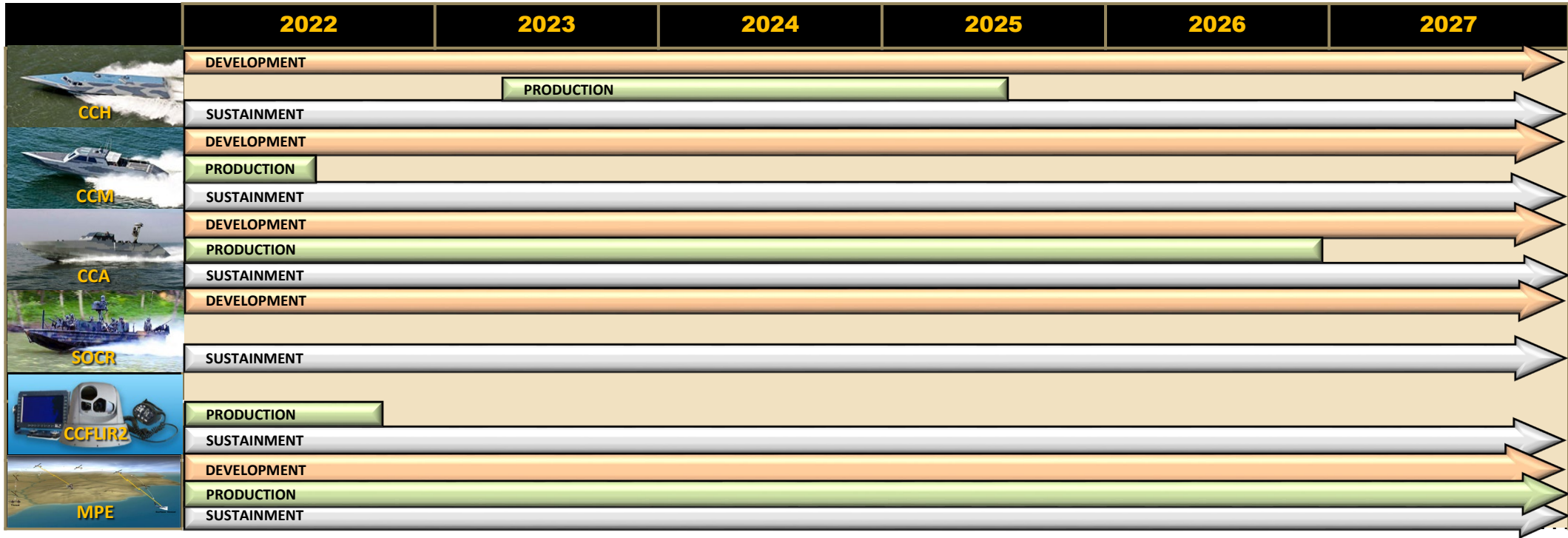
Maritime Precision Engagement

# WHY PEO MARITIME IS UNIQUE

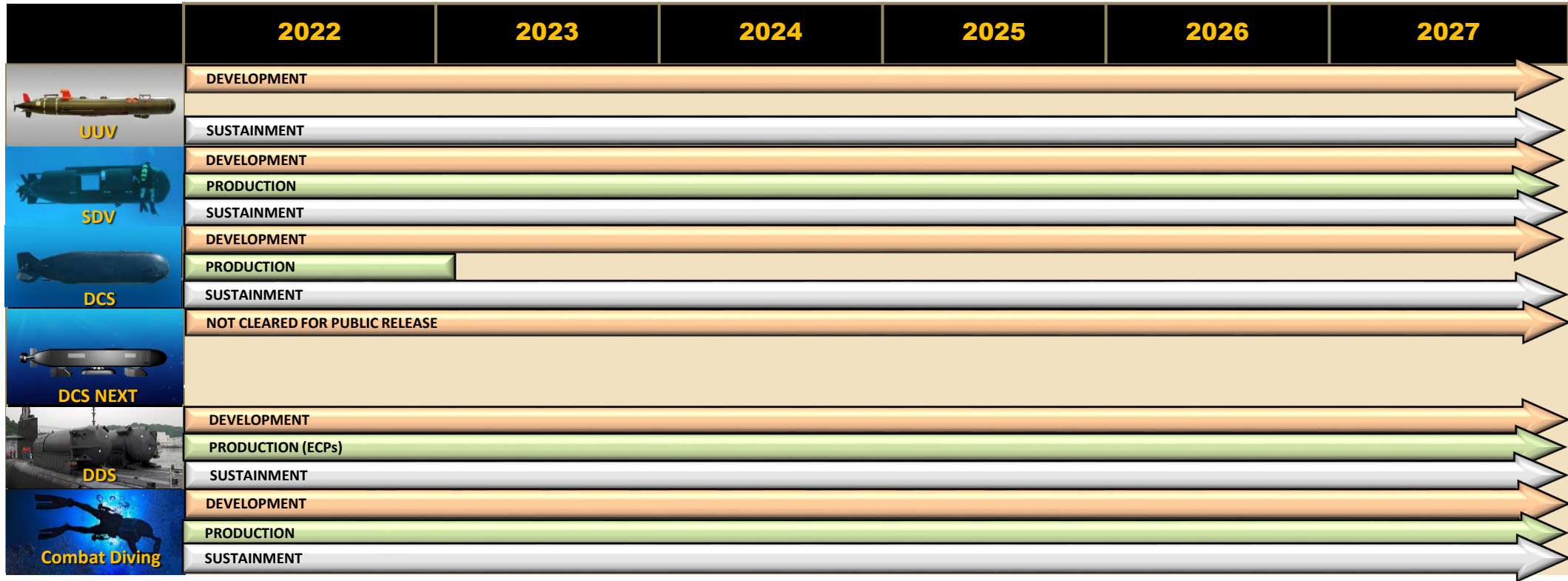
- Typically do not receive equipment from parent service
- Majority of platforms are Special Operations Peculiar (SO-p), built specifically to meet NSW requirements
- Full Life Cycle System Management
- Cradle to Grave – development to divestiture with two exceptions
  - MK 18 MOD 1 – service common UUV with SO-p modifications
  - Combat Diving – modified COTS, in addition to specific builds



# NSW SURFACE ROADMAP



# NSW UNDERSEA/DIVING ROADMAP



# PROGRAM EXECUTIVE OFFICE – MARITIME

- **Continue Fielding Enhanced Capability**

- Modernization of the Maritime Portfolio

- Combatant Craft/CCFLIR2
- SDV MK 8 to SDV MK 11
- Dry Deck Shelter Modernization
- Dry Combat Submersible
- Maritime Precision Engagement
- SOF Combat Diving

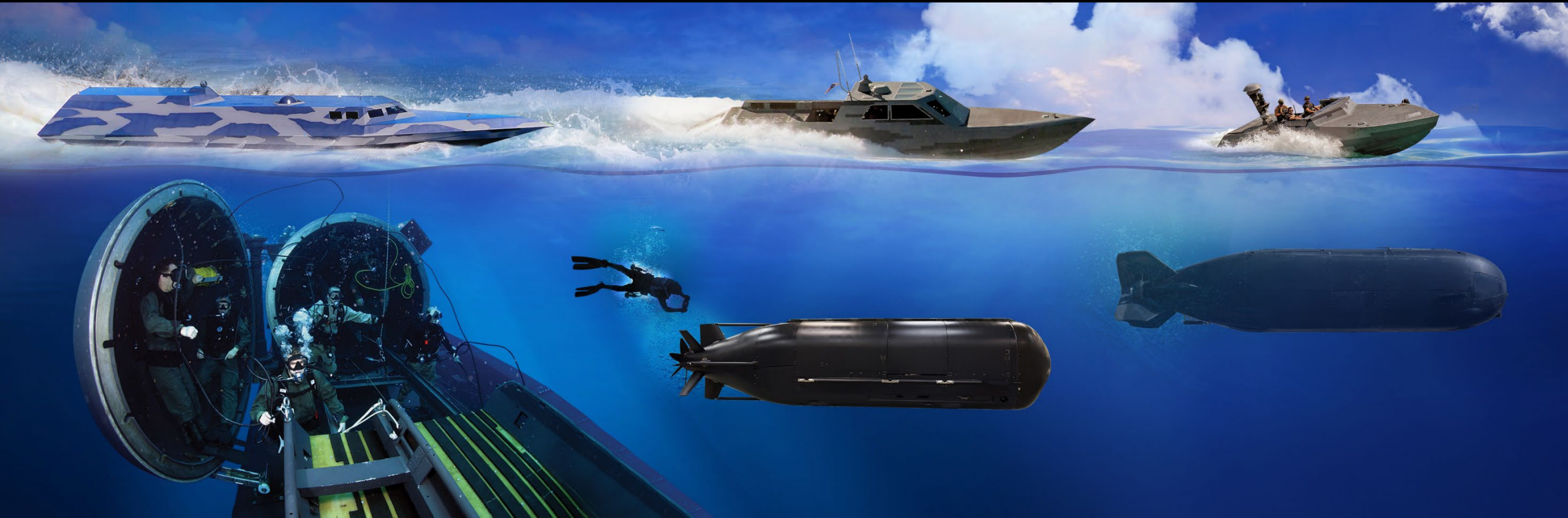
- **Areas of Interest**

- Maritime Communications
- Power & Energy
- Fleet Interoperability
- Training and Operator Performance
- Enhanced Navigation
- Diver Thermal Protection
- Diver Equipment Power
- Sustainment
- Survivability and Lethality
- Artificial Intelligence Enabled Capabilities

- **Reaching out to Industry Partners**

- Requests for Proposal
- Requests for Information
- Broad Area Announcements
- SOFWERX Collaboration Events
- S&T Technical Experimentation Events
- Industry Days





# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS

## Campaigning with Partners for Integrated Deterrence

Program Manager Special Operations Forces Combat Diving

## PORTFOLIO REVIEW



# SOF COMBAT DIVING



- Supports the individual diver, as well as integration with all PEO-Maritime systems and platforms
- Efforts target equipment in the areas of maritime environmental protection, diver propulsion, diver navigation, Underwater Breathing Apparatus (UBA) and underwater communication (diver-to-diver and diver-to-platform)
- Supports development of enhanced diving capabilities for operators using both wet and dry submersibles

## ACQUISITION STRATEGY

- Utilization of existing contracts, other government agencies, and new contracts competitively selected

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## PERIOD OF PERFORMANCE

- Planned FY22 through FY27

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## MILESTONES

- Various Based on Projects

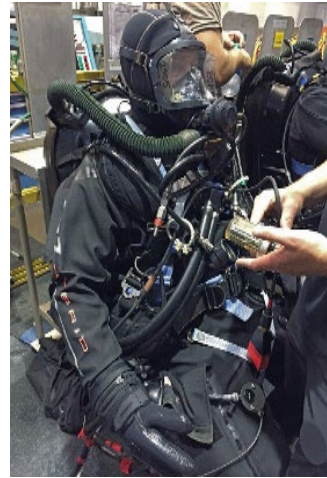
## CURRENT CONTRACT/OEM

- DLA Troop Support, Philadelphia, PA
- See Following Slides for List of Major Suppliers

# SOF COMBAT DIVING REQUIREMENT AREAS

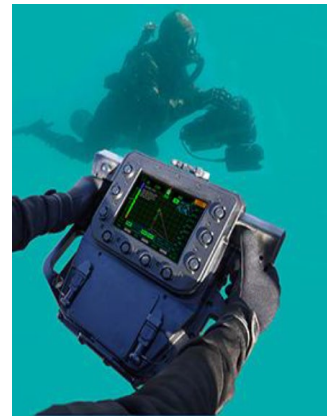
## • Maritime Environmental Protection

- Enhanced thermal regulation
  - Active and passive heating and cooling
- Full face mask
  - For use with closed-circuit rebreather
  - Incorporates voice communications
- Excursion-capable O2 Underwater Breathing Apparatus (UBA)
- Chemical, Biological, Radiological, and Nuclear or Explosive (CBRNE) protection



## • Diver Navigation

- Hand-held and collective capabilities
  - Situational awareness
  - Navigational accuracy (positioning)



## • Diver Propulsion

- Collective, individual and hands-free capabilities
  - Compact size and reduced weight
  - Flexible delivery options (ship, submarine)
  - Commonality



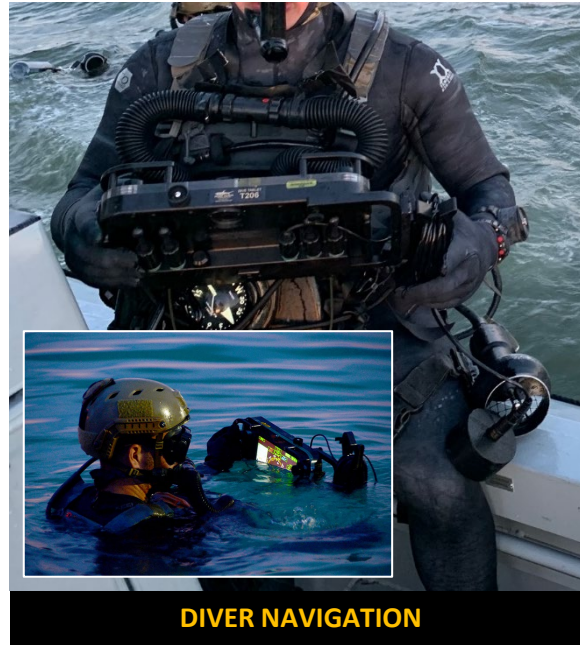
## • Underwater Communication

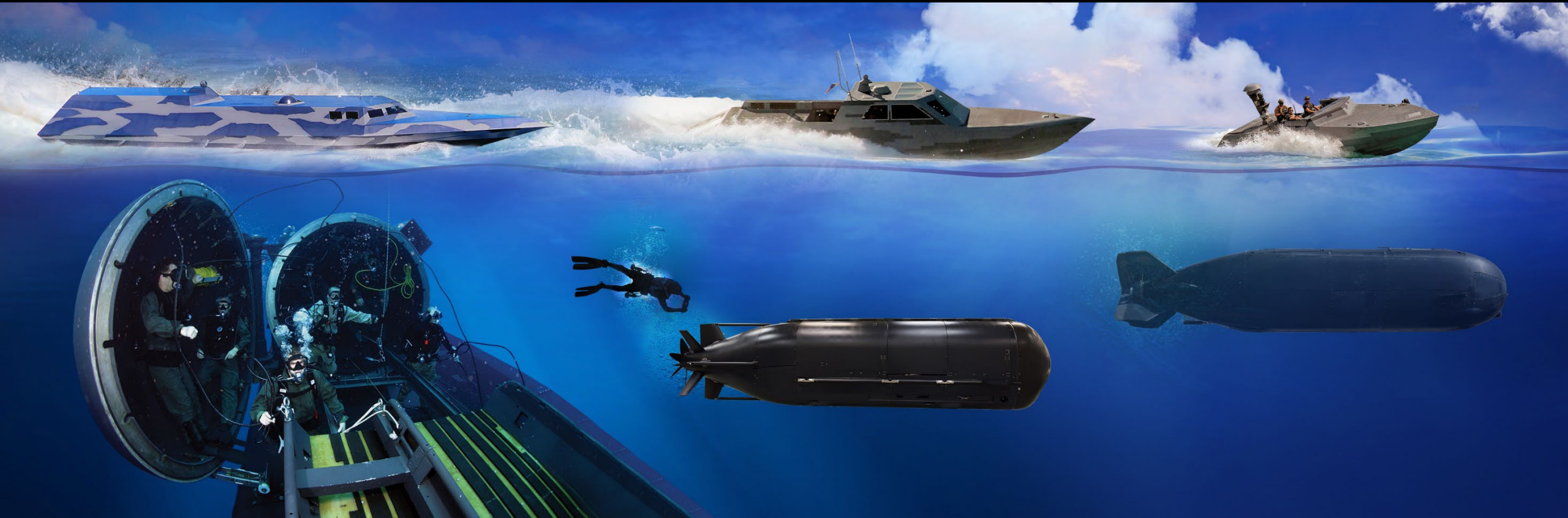
- Diver-to-diver and diver-to-platform
- Android Tactical Applications Kit (ATAK)
- Acoustic and Optical
  - Text and data
  - Voice (air and HeO2)
  - Full motion video



# SOFCOMBAT DIVING MAJOR INDUSTRY PARTNERS

- Advanced Diver Solutions, Virginia Beach, VA
- Aqua Lung, Vista, CA
- Rini Technologies, Oviedo, FL
- Patriot3 Maritime, Fredericksburg, VA
- Stidd Systems Inc., Greenport, NY
- SUEX SRL, Villorb, Italy
- Marine Tech SA, Krosno, Poland
- Ceebus Technologies, Boulder, CO
- Nellis Engineering, Inc., West Sacramento, CA
- Shark Marine Technologies, Inc., St. Catharines, Ontario, Canada





# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS Campaigning with Partners for Integrated Deterrence

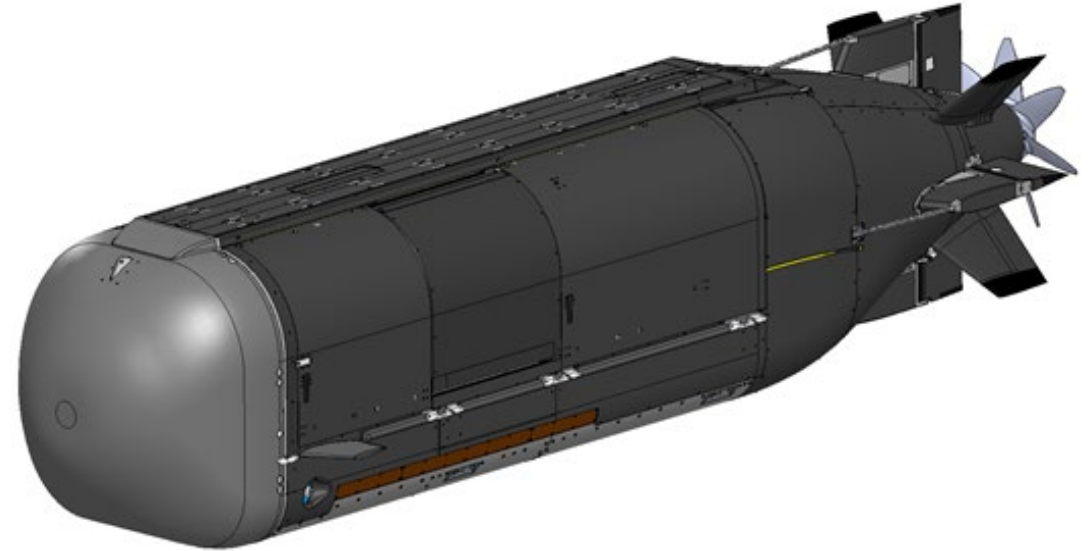
Program Manager Naval Special Warfare

## PORTFOLIO REVIEW



# SEAL DELIVERY VEHICLE MK 11

- Next generation free-flooding wet combat manned submersible to transport Special Operations Forces (SOF) personnel and equipment for a variety of missions
- SDV MK 11 replaces the current SDV MK 8, Mod 1 vehicle



## ACQUISITION STRATEGY

- Full and open competition
- Contract awarded in 2011
- Follow-On Production Contract awarded in 2019

## PERIOD OF PERFORMANCE

- FY11 through FY20
- FY19 through FY24

## MILESTONES

- IOC: Planned for FY22
- FOC: Planned for FY27

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

- RDT&E      FY22 through FY27
- PROC        FY22 through FY27
- O&M        FY22 through FY27

## CURRENT CONTRACT/OEM

- Teledyne Brown Engineering, Huntsville, AL

# SEAL DELIVERY VEHICLE MK 11

- **SDV MK 11 Enhancements over SDV MK 8**

- Intel Core i7 Processors, Secure SSD, GB Ethernet Backbone
- Improved software and user interface
- Higher accuracy navigation
- Increased cargo and payload capacity
- Increased range

- **Project Status**

- Boats 1 & 2: Delivered May & Jun 2018
- Boats 3 & 4: Delivered Mar & Apr 2020
- Boat 5: Delivered Jun 2020
- Boats 6 – 10: Planned FY22 through FY23



# SMALL CLASS UUV

- Small Class UUV enables access to high threat areas in the maritime domain, expands access and reach into littorals and reduces risk to personnel/manned platforms. Provides enhanced situational awareness and access & placement.
- MK 18 Mod 1 transitioned to Lionfish (Remus 300) in FY21
- Service Common Platform incorporating Special Operations-peculiar Modifications



## ACQUISITION STRATEGY

- Procure *Service Common (MFP-2)* man-portable UUV PoR and augment it with purpose built, modular, plug-and-play sensors/payloads to meet SOF Peculiar requirements (MFP-11).

## PERIOD OF PERFORMANCE

- N/A

## MILESTONES

- IOC: FY21
- FOC: Planned for FY23

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

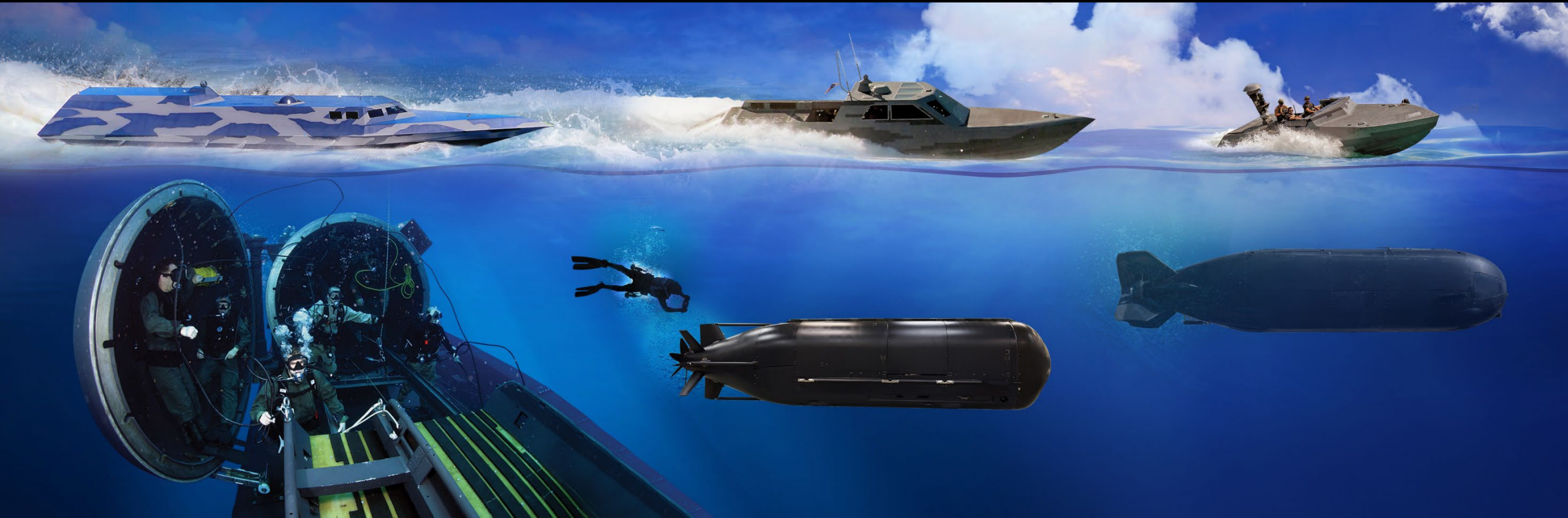
## FUNDING

- RDT&E FY22
- PROC FY23 through FY27
- O&M FY22 through FY27

## CURRENT CONTRACT/OEM

- Huntington Ingalls Industries, Pocasset, MA





# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS Campaigning with Partners for Integrated Deterrence

Program Manager Undersea Special Mission Systems

## PORTFOLIO REVIEW



# DRY DECK SHELTER

- The Dry Deck Shelter (DDS) is a certified diving system that attaches to modified submarines. The program provides material safety certification, maintenance, modernization (Field Changes) and minor modifications for the DDS
- Maintenance and modernization contract to include Restricted Availabilities (RAVs), Regular Overhauls (ROHs) and Configuration Changes



## ACQUISITION STRATEGY

- DDS Maintenance Contract (open competition)
- Contract awarded in 2018

## PERIOD OF PERFORMANCE

- FY18 through FY23

## MILESTONES

- Modernized DDS IOC: FY22

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## CURRENT CONTRACT/OEM

- Oceaneering International Inc. – Marine Services Division (OII-MSD)

# DRY DECK SHELTER

## Dry Deck Shelter Modernization Project

### Mod DDS Configuration Changes

- Field Change (FC) 167 – Remotely Operated Hangar Outer Door
- FC 168 – Extend shelter 50 inches
- FC 169 – Increased capacity Payload Launch and Recovery System
- FC 170 – Remote Control from the host submarine

### Mod DDS Objectives

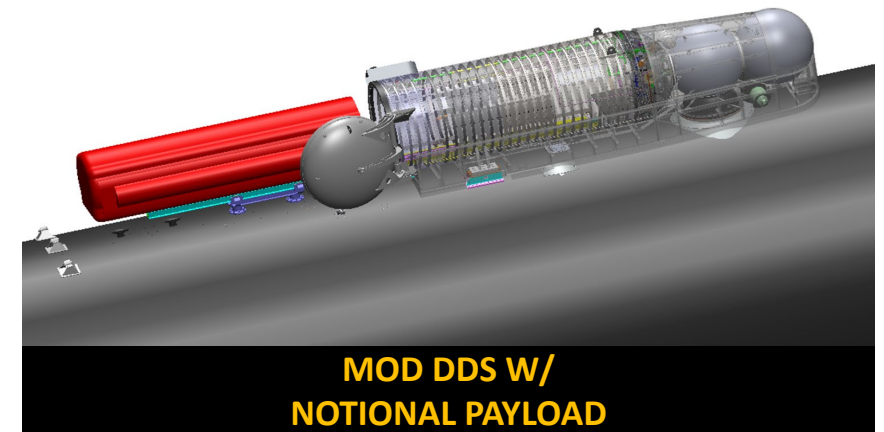
- Increase payload volume
- Increase weight capacity
- Remote hangar operation from Virginia Class host submarine
- Reduce risk to host submarine
- Reduce operator fatigue

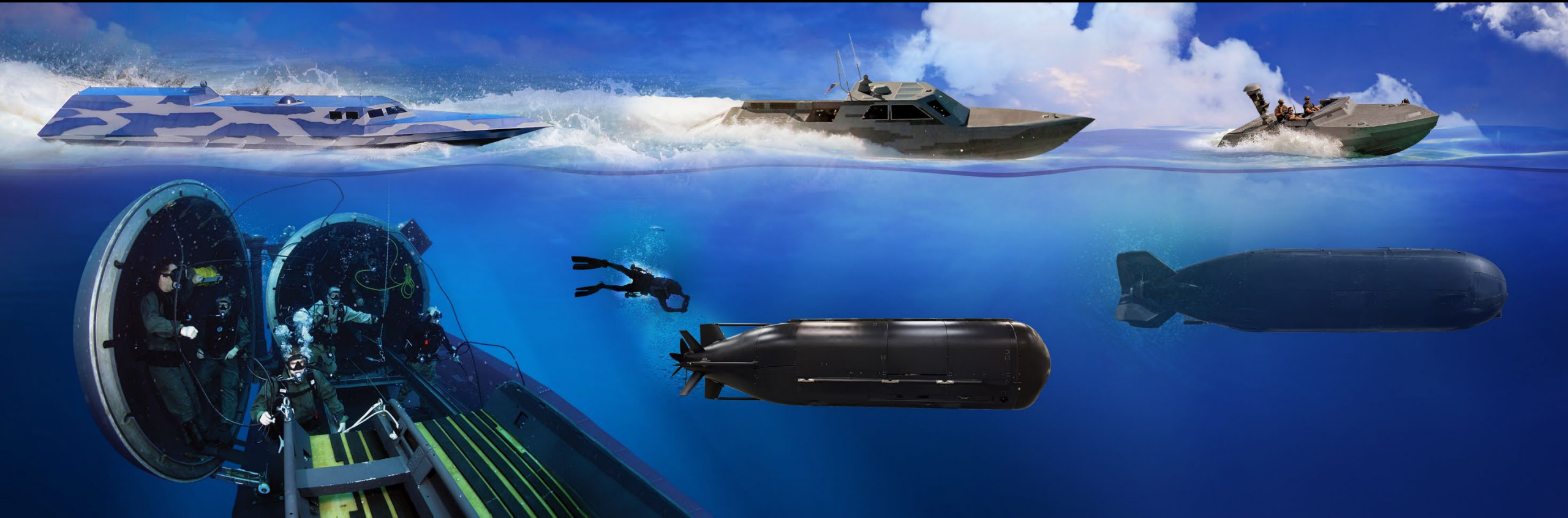
### Project Status

- Preliminary Design Review completed Sep 2016
- Critical Design Review completed Dec 2017
- Technical Data Package approved Jul 2020
- Technical Demonstrator Production Complete – Mar 2022

### Target Payloads

- Naval Special Warfare (NSW)
- SEAL Delivery Vehicle MK 11 (SDV MK 11)
- Large Displacement Unmanned Undersea Vehicle (LDUUV)
- Littoral Battlespace Sensing – AUV, Submarine (LBS-AUV(S))





# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS Campaigning with Partners for Integrated Deterrence

Program Manager Undersea Systems

## PORTFOLIO REVIEW



# DRY COMBAT SUBMERSIBLE (DCS)



**DCS 1 PREPARING FOR AN UNDERWAY**

## ACQUISITION STRATEGY

- Full and Open competition for production representative system with options for up to two additional systems

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil



**DCS 2 FULLY ASSEMBLED**

## PERIOD OF PERFORMANCE

- FY16 through FY23

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27



**DCS 3 C-17 AIRLIFT**

## MILESTONES

- IOC: FY22
- FOC: FY23

## CURRENT CONTRACT/OEM

- Lockheed Martin RMS (Prime)
- Submergence Group, LLC (Major Subcontractor)
- MSubs Ltd. (Major Subcontractor)

# DCS NEXT EFFORTS

## Dry Submersible Program

- Interoperable with specific US Navy submarines
- System will be Classed by a member of the International Association of Classification Societies
- Certified by NAVSEA for interoperability with the submarine
- Certified by SOCOM for SOF embarkation

## Market research including

- DCMA Industrial Capability Assessment
- Technology Risk Reduction studies
- Industry days/Industry visits
- Naval Sea Systems Command enterprise coordination/collaboration

## Submarine Interoperability

- Mated solution on designated submarines
- Phases of operation while integrated: Transit, Launch, Recover, Replenish, and Maintain

## Surface Ship Interoperability

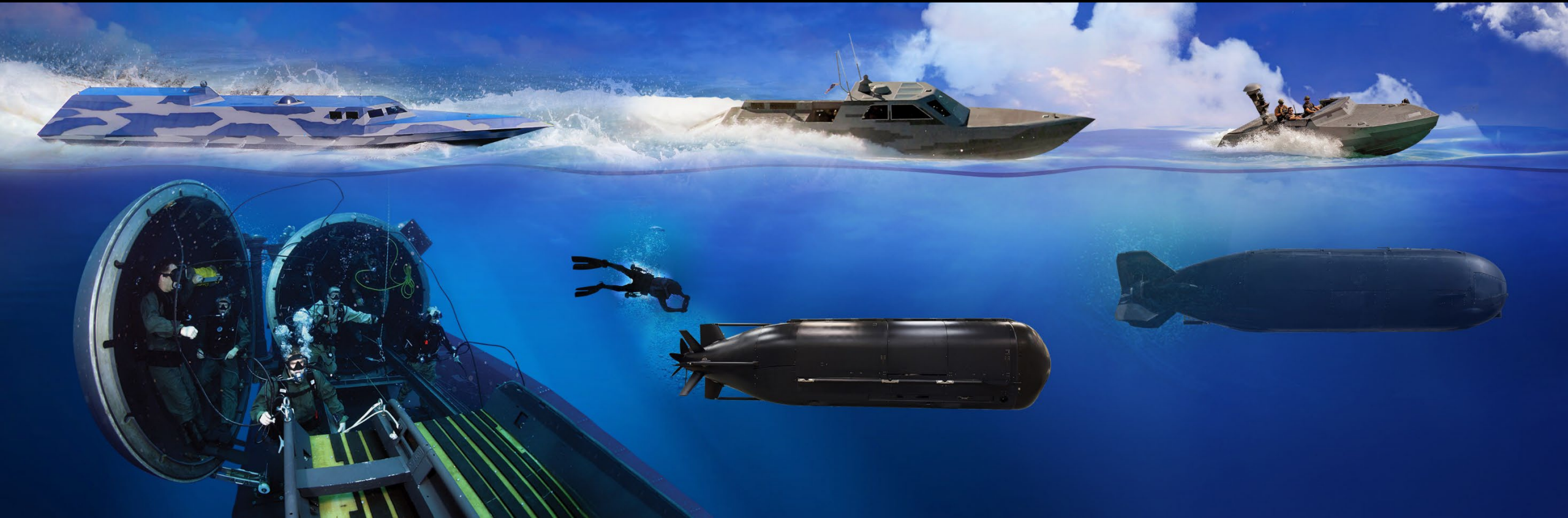
- Potential Navy surface ship vessels of opportunity not defined at this time
- Phases of operations while integrated: Transit, Launch, Recover, Replenish, and Maintain

### ACQUISITION STRATEGY

- Open competition / multi-award for design of production representative system. Down-select to build and integrate the first system. Follow-on award for additional production systems.

### POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil



# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS Campaigning with Partners for Integrated Deterrence

Program Manager Surface Systems

## PORTFOLIO REVIEW



# COMBATANT CRAFT HEAVY (CCH): SEALION

- Provides long range insertion and extraction capabilities
- 3 of 3 fielded
- CCH-1 replacement funded FY23



## ACQUISITION STRATEGY

- Two tech demonstrators transferred from USN
- SEALION III sole source award
- CCH-4 RFI released
- SOFSA sustainment task order

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## PERIOD OF PERFORMANCE

- FY16 through FY21

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## MILESTONES

- IOC: FY14
- FOC: FY21

## CURRENT CONTRACT/OEM

- Vigor Works, LLC (OEM)
- SOFSA/Lockheed Martin (CLS)



# COMBATANT CRAFT MEDIUM (CCM) MK 1

- Multi-role surface combatant craft with the primary mission of inserting and extracting SOF
- 30 of 30 fielded



## ACQUISITION STRATEGY

- Small business set aside using competitive prototyping
- SOFSA sustainment task order

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## PERIOD OF PERFORMANCE

- FY15 through FY22

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## MILESTONES

- IOC: FY15
- FOC: FY21

## CURRENT CONTRACT/OEM

- Vigor Works, LLC (OEM)
- SOFSA/Lockheed Martin (CLS)

# COMBATANT CRAFT ASSAULT (CCA)

- Medium range, maritime assault, interdiction, insertion and extraction platform
- Production contract for Capital Equipment Replacement program
- 32 of 32 fielded



## ACQUISITION STRATEGY

- New production contract awarded FY20
- SOFSA sustainment task order

## PERIOD OF PERFORMANCE

- FY20 through FY24

## MILESTONES

- IOC: FY14
- FOC: FY20

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## CURRENT CONTRACT/OEM

- US Marine Inc. (OEM)
- SOFSA/Lockheed Martin (CLS)

# COMBATANT CRAFT FORWARD LOOKING INFRARED (CCFLIR)

- Provides SOF with a multi-sensor, electro-optic system that enhances SOF effectiveness by improving their ability to detect, recognize, identify, range, track and highlight objects of interest in a maritime environment
- Integrated and deployed on CCM and CCH
- CCA integration in design and test stage
- 48 of 58 delivered



## ACQUISITION STRATEGY

- Full and Open Competition completed FY15
- Modified GOTS technology

## PERIOD OF PERFORMANCE

- FY15 through FY24

## MILESTONES

- IOC: FY18
- FOC: FY24

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

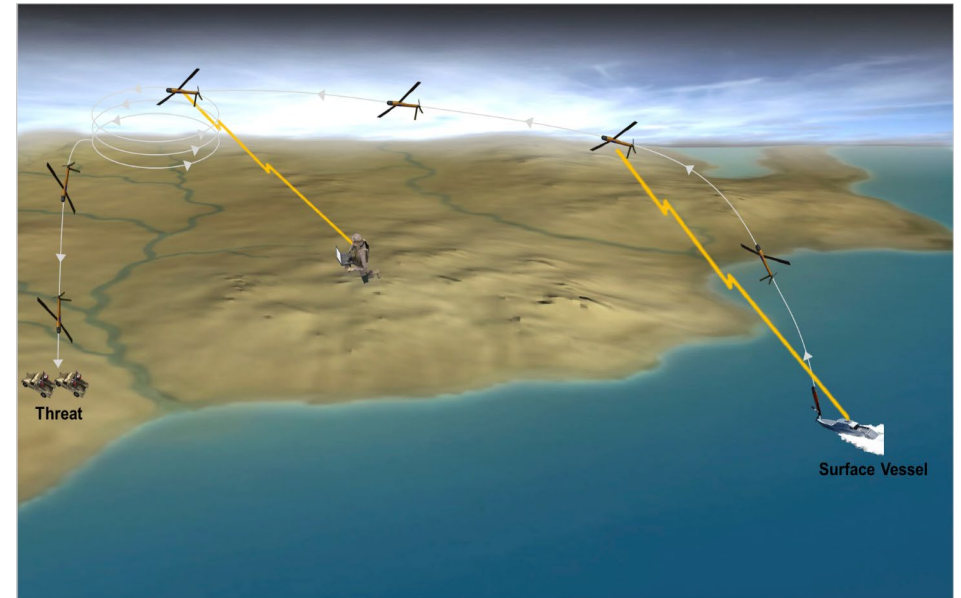
- |         |                   |
|---------|-------------------|
| • RDT&E | None              |
| • PROC  | FY23              |
| • O&M   | FY22 through FY27 |

## CURRENT CONTRACT/OEM

- Teledyne FLIR (OEM)
- NSWC Crane – Sustainment

# MARITIME PRECISION ENGAGEMENT (MPE)

- Pursuit of Standoff, Loitering, Man-in-the-loop Weapons system deployed on Combatant Craft and capable of targeting individuals, groups, vehicles and small oceangoing craft. The program consists of combatant craft alterations, launcher systems and munitions
- “A-Kit” prototype in fabrication
- Munition development



## ACQUISITION STRATEGY

- Government design effort for craft integration and control system

## PERIOD OF PERFORMANCE

- TBD

## MILESTONES

- Continual assessment of design safety and suitability
- Candidate munition(s) availability for testing

## POINT OF CONTACT

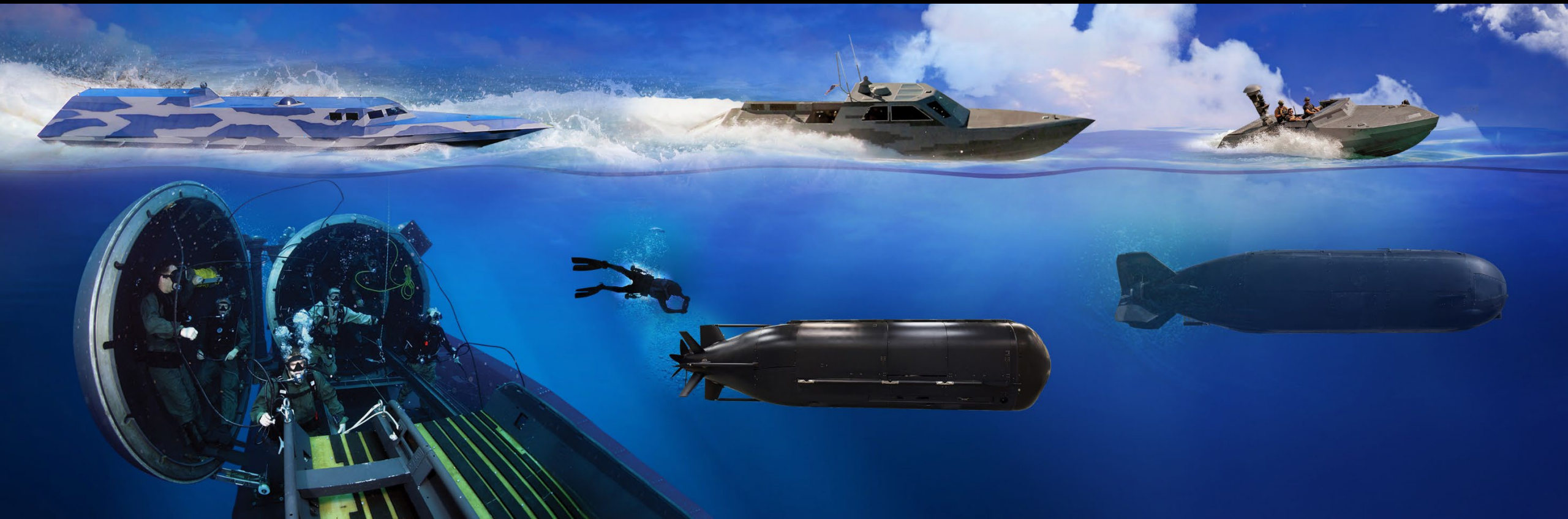
- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

- RDT&E FY22 through FY27
- PROC FY22 through FY27
- O&M FY22 through FY27

## CURRENT CONTRACT/OEM

- OEM - TBD
- NSWC Dahlgren – System Development
- NSWC Carderock – Craft Integration



# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS

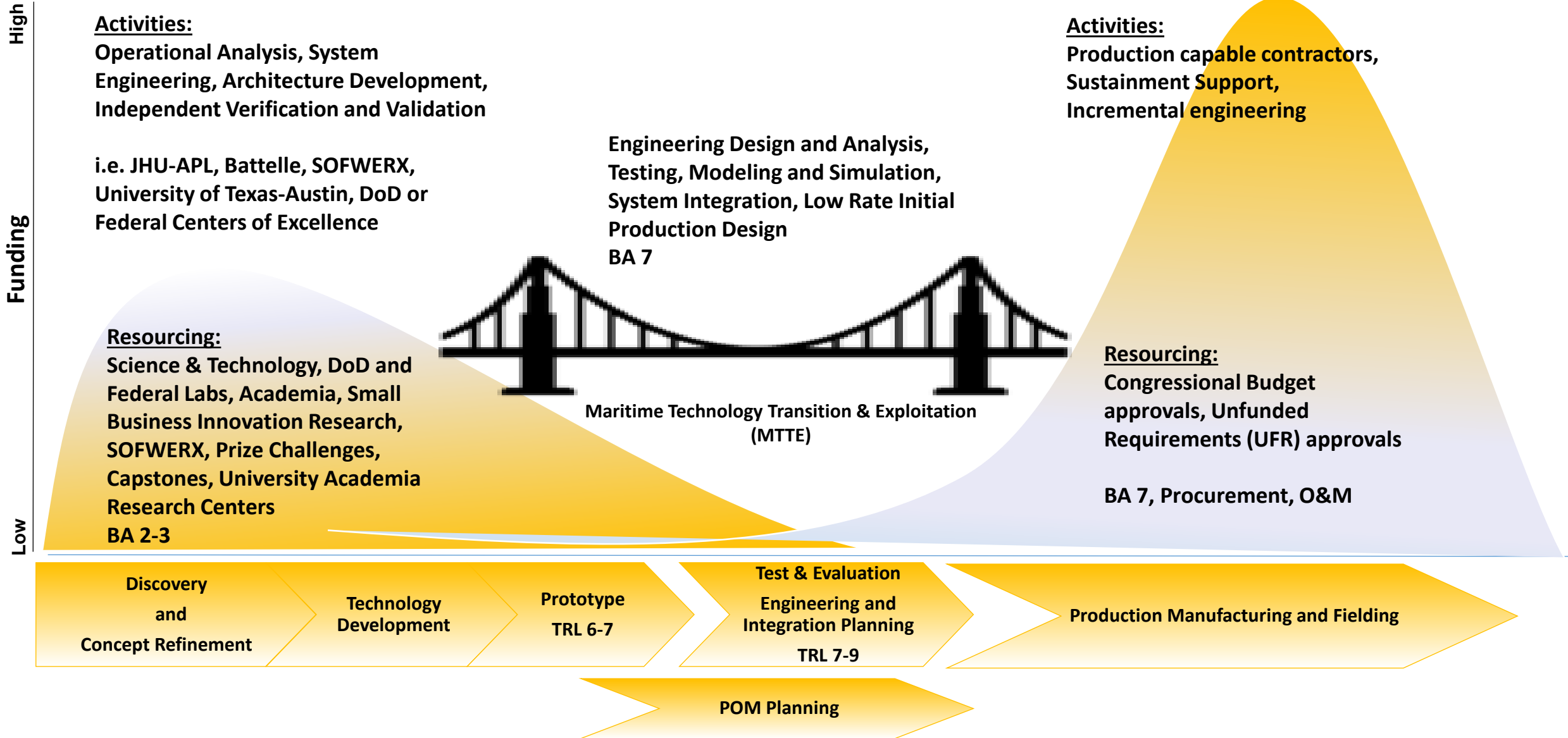
## Campaigning with Partners for Integrated Deterrence

Technical Director PEO-Maritime

## PORTFOLIO REVIEW



# MARITIME TECHNOLOGY OFFICE



# S&T / R&D OPPORTUNITIES FOR INDUSTRY

- Starting in FY20 PEO-M requested significant additional RDT&E funding to build capability in the areas listed below
- PEO-M continues to seek opportunities for innovative technology development and to partner with industry



**ACQUISITION STRATEGY**

- Leverage both existing and new contracts. Use IDIQ / RFP / BAA / SBIR / STTR / OTA
- Open architectures – maximize opportunity for rapid integration of new technology

**POINT OF CONTACT**

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

**POTENTIAL FY22 ENGAGEMENT OPPORTUNITIES**

- TE Events – SOF Combat Diving, Surface Systems
- SOCOM S&T BAA
- OTAs
- SOFWERX Engagements

**FUNDING**

• RDT&E	FY22 through FY27
• PROC	None
• O&M	None

**FY22-FY27 TECHNOLOGY INTEREST AREAS**

- Interoperable Maritime Communications Architecture
- Power & Energy
- Enhanced Survivability
- Strategic Initiatives & Fleet Interoperability
- Artificial Intelligence-enabled capabilities
- Enhanced Navigation
- Improved C4ISR Capabilities
- Diver Technologies
- Training & Operator Performance

# COMBATANT CRAFT MISSION EQUIPMENT (CCME)

- Provides advanced technologies to correct system deficiencies, improve asset life and augment mission requirements. It provides rapid response solutions to support combatant craft systems, sub-systems and their evolving requirements.
- Advanced sensors and communications
- Assured/Alternative Position, Navigation & Timing



## ACQUISITION STRATEGY

- Integrate high TRL technologies across the family of combatant craft through BAAs, SIBRs and existing government contracts

## PERIOD OF PERFORMANCE

- Varies per task

## MILESTONES

- Varies per task

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## FUNDING

- RDT&E      FY22 through FY27
- PROC        None
- O&M        None

## CURRENT CONTRACT/OEM

- Multiple Government and Industry Partners



# UNDERSEA CRAFT MISSION EQUIPMENT (UCME)

- Provides advanced technologies to correct system deficiencies, improve asset life and augment mission requirements. Provides rapid response solutions to support undersea craft and diver systems and sub-systems.
- Advanced Sensors & Communications
- Undersea Navigation
- Unmanned Systems



SEAL Delivery Vehicle  
Mark 11 (SDV MK 11)



Dry Combat  
Submersible (DCS)



Dry Deck Shelter (DDS)



SOF Combat Diving  
(SOF CD)



Mark 18 - Mod 1 Unmanned  
Underwater Vehicle (UUV)

## ACQUISITION STRATEGY

- Integrate high TRL technologies across the family of underwater craft and diver systems through existing or planned IDIQ, BOA, UARC, and FFRDC contracts, and non-FAR based agreements (OTAs) to include SOFWERX

## POINT OF CONTACT

- USSOCOM SOF AT&L, Engage SOF (eSOF), (813) 826-1269, eSOF@socom.mil

## PERIOD OF PERFORMANCE

- Varies per task

## FUNDING

- RDT&E FY22 through FY27
- PROC None
- O&M None

## MILESTONES

- Varies per task

## CURRENT CONTRACT/OEM

- Naval Undersea Warfare Center – Newport (NUWC) – Newport
- UARCs
- Various Vendors

# OPPORTUNITIES

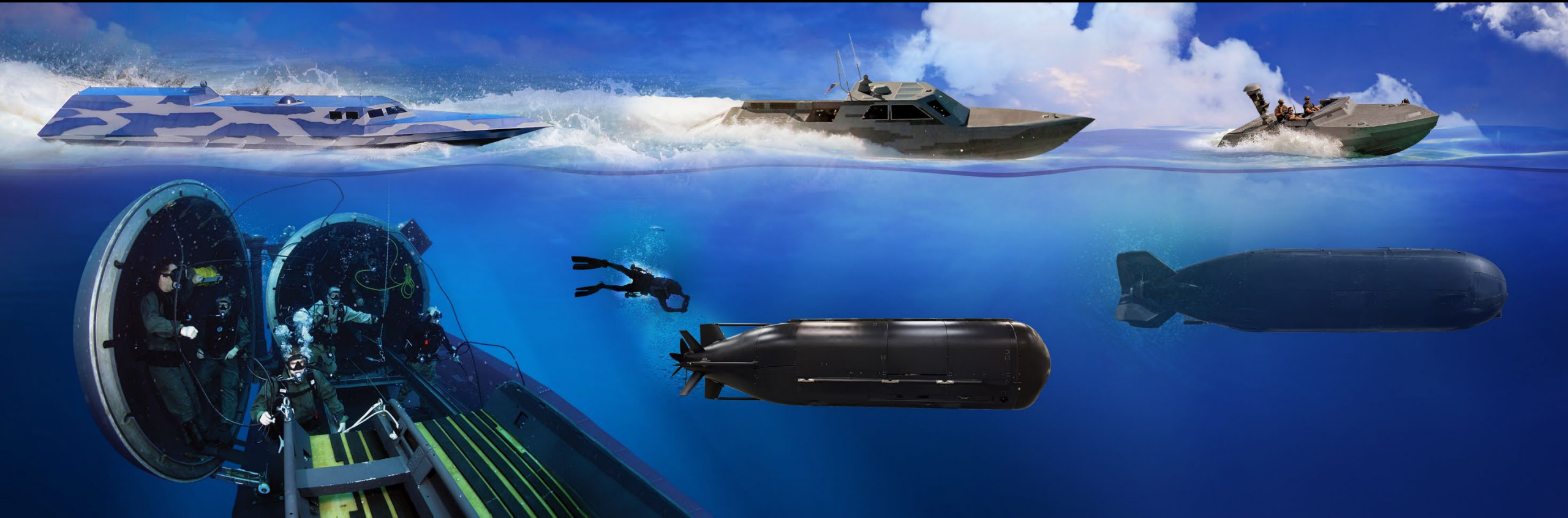
- **Broad Agency Announcements (BAA) & Requests For Information (RFI)**
  - **USSOCOM Science & Technology (S&T) Directorate**
- **Office of the Secretary of Defense Programs**
  - **Small Business Innovation Research (SBIR)**
  - **Small Business Technology Transfer (STTR)**
  - **Foreign Comparative Test (FCT)**
- **Other Transaction Authorities**
  - **Undersea Technology Innovation Consortium (UTIC)**
- **Cooperative Research And Development Agreements (CRADAs)**



# OPPORTUNITIES

- Collaborative efforts with Government Laboratories, University Affiliated Research Centers, Federally Funded Research & Development Centers, Land Grant Universities, etc.
- USSOCOM S&T Technical Experimentation Events
- USSOCOM Acquisition Agility Events – SOFWERX
- USSOCOM S&T Technology Scouting  
– [www.atlas-sof.com](http://www.atlas-sof.com)
- USSOCOM Engage SOF (eSOF)





# SPECIAL OPERATIONS FORCES ACQUISITION, TECHNOLOGY, & LOGISTICS Campaigning with Partners for Integrated Deterrence

## QUESTIONS?

