

- Open Standards
- Open Architecture
- Open Innovation

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Avionics Architecture Team (AAT)

Within NAVAIR, PMA209 AAT leads the **development and implementation of Open Architecture (OA) standards, processes, development tools, and best business practices** resulting in DoD hardware and software product lines that increase the portability of applications, reuse of components, and the ability to adapt to changing requirements at a faster rate. The Team is comprised of the following Level II IPTs:

- **Software Open Systems Technologies (SWOST) IPT**
 - Developing and evolving Future Airborne Capability Environment (FACE™) and Open Mission Systems (OMS) SW standards
- **Hardware Open Systems Technologies (HOST) IPT**
 - Developing and streamlining the OpenVPX HW standard, as well as smaller form-factor standard with PC-104, for avionics
 - NEW HOST website now live: www.host-oa.com
- **Platforms Integration & Modeling (PIM) IPT**
 - Supporting aircraft platforms in defining potential OA solutions through Model Based Systems Engineering (MBSE), identifying specific areas of strategic reuse, and defining the functional architecture to facilitate the implementation of OA solutions



AAT External Support/Relationships



NAVAIR (USN)

- PMA-268: Unmanned Carrier Aviation (MQ-25)
- PMA-263: Small Tactical UAVs
- PMA-281: Strike Planning & Execution Systems (UCS/OMS)
- PMA-205: Training Systems & Ranges
- PMA-231: E-2/C-2 Command & Control Systems
- PMA-299: H-60 Multi-Mission Helicopters
- PMA-265: F/A-18 & EA-18G
- Future Vertical Lift (FVL/JMR)
- PMA-273: Naval Undergraduate Flight Training Systems (T-45)
- Systems Engineering Transformation (SET) Group



PEO(AVN) (USA)

- Cargo Helicopter Office (CH-47F)
- Utility Helicopter Office (UH-60M/V)
- Unmanned Aircraft Systems Office
- Future Attack Reconnaissance Aircraft Office (FVL)
- Apache Attack Helicopter Office (AH-64E)
- Aviation Mission Systems & Architecture Office



CSISR (USA)

- CSISR/EW Modular Open Suite of Standards (CMOSS)
- Vehicular Integration for CSISR/EW Interoperability (VICTORY)



AFLCMC (USAF)

- Open Mission Systems (OMS)
- Sensor Open Systems Architecture (SOSA™)



OSD

- DoD Tri-Service Modular Open Systems Working Group (MOSWG)



Joint Program Office (JSF)

- Joint Striker Fighter (F-35) OMS/HOST/FACE™



North Atlantic Treaty Organization (NATO)

- STANAG 4817: Multi-Domain Multi-Platform Drone Control Station (FACE™)



Collaborative Open Systems Architecture (U.K.)

- OA Alignment between: U.S. Army, U.S. Navy, & U.K. Ministry of Defense



The Open Group

- Membership & Participation in FACE™ & SOSA™ standards development (National Technology Transfer Act & OMB Circular A-119-1)



Avionics Architecture Team (AAT)



MOSA Way Forward for PMA209 AAT

- Focusing on development and insertion of standardized functional products using Model-Based Systems Engineering tools and processes
- Identifying NAVAIR OA-centric reuse opportunities - further defining and analyzing platform functional requirements
- Facilitating ease of implementation – Development of FACE™ and HOST (business & technical) Acquisition Starter Kits
- Providing OA Solutions - Baseline the FACE™ and HOST standards in accordance with requirements of the Tri-Services

www.TSOA-ID.net