DoDAF Strategic Direction of Moving DoDAF towards an Unified Architecture Framework and Standard

Walt Okon
Senior Architect Engineer
Architecture & Interoperability Directorate
Office of the Secretary of Defense
E-Mail: walt.okon@osd.mil

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2 May 2013, Washington, DC
Federation – Managing the Seams

DoD CIO

DCMO Develop & Approve Business Architecture
JS Develop & Approve Warfighting Architecture
USD (I) Develop & Approve Intelligence Architecture

Information Enterprise Architecture
DoD CIO Develop & Approve

Department Of The Army EA
Department Of The Navy EA
Department Of The Air Force EA

Reference Models
OMS, FEA
Tools
DARS, DITPR
Tech Stds
DISR
Arch Guidance
DODAF
Laws, Regs, and Policy
Laws, Regs, Policy

SUPPORT THE WARFIGHTER
Structure of the JIE Architecture

Multiple Levels, Tiered Responsibility and Accountability

SECDEF & DoD CIO Strategy

Laws, Regulations, Policies

DoD IEA
Connect, Access, Share, Operate, Defend, Govern
Reference Architectures

JIE Architecture

Big Rock Reference Architectures

JIE Architecture Review Process

Technical Architectures

Technical Implementation Guidance

Solution Architectures
= Functional Architectures / System Specs
Elements of Quality Architecture

- Single Architecture Framework
- Policy, Direction, Guidance
- Exchange
- Architecture Tools
- Certified Architects

Enabling efficient and effective acquisition of hardware, software and services used by DoD and Partners in mission performance.
DoDAF V2.0 Viewpoints Fit-For Purpose

Architecture viewpoints are composed of data that has been organized to facilitate understanding.

Capability Viewpoint
Articulate the capability requirement, delivery timing, and deployed capability

Operational Viewpoint
Articulate operational scenarios, processes, activities & requirements

Services Viewpoint
Articulate the performers, activities, services, and their exchanges providing for, or supporting, DoD functions

Systems Viewpoint
Articulate the legacy systems or independent systems, their composition, interconnectivity, and context providing for, or supporting, DoD functions

Project Viewpoint
Describes the relationships between operational and capability requirements and the various projects being implemented. Details dependencies between capability management and the Defense Acquisition System process.
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DoDAF V2.0 Vision

Presentation Techniques

- Dashboards
- Graphical Depictions
- Reference Models
- Fusion Products

Views for Other Stakeholders

Structured Knowledge Base – Common Model

Views for the Architect

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• The DoD IEA uses this conceptual depiction to describe the IE in providing guidance and direction.

• Enables an IE that is capable of delivering capabilities to end users through IE services.
Architecture Exchange Capability
Unified Profile for DoDAF/MODAF (UPDM)
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AUTHORITATIVE DATA

DoDAF v2.0

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Fit for Purpose
Unified Direction of USG and NATO
Achieving Strategic Goals and Capability

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Framework Objective:
• Achieve a single integrated Architecture Framework for interoperability.
• Achieve a US, Canada, and United Kingdom single Framework with a common Data Meta Model
• Achieve alignment with the US Government Common Approach to Enterprise Architecture

DoDAF v1.5
DoDAF v2.0
DoDAF/DNDAF v2.04
UAF v2.05

- Standardization, e.g.,
  - ISO
  - OMG
  - OASIS

- MODEM – DM2 Harmonization (IDEAS Domain Level)
- NATO NAF
- UDAF

- Urgent CRs
- TECHEDITION
- DM2 OWL

- Federal Common Approach
- DNDAF Security Views

- Net-centricity and SoA
- SvcV views

- JCIDS & NR-KPP
  - Applicability beyond C4ISR
  - Use-based
  - Integrated Architecture

- 26 AV/OV/SV/TV views
  - Linked to I&S policies
  - CADM 2.0

- C4ISR F/W v1.0
- C4ISR F/W v2.0

- Fit-for-purpose
- Data-centric architecture
- Improved models of systems, services, capabilities, rules, measures
- DoDAF Meta Model (DM2) based on IDEAS

- Urgent CRs
  - 52 ➔ 1 XSD
  - IDEAS Foundation v1.0 fixes


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Unified Architecture Framework (UAF)

Unified Architecture Framework
Strategic Direction
Mission Statement
Objectives

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Unified Architecture Framework

Unified Architecture Framework Strategic Direction

• Move to Single Architecture Framework = Interoperability
• Development of the AMN architecture in 2010
• Development of Unified Profile for DoDAF and MODAF (UPDM) Versions 1.0, 2.0, and 3.0
• Ideas Meeting in June 2012
• NATO CAT workshop 10/11 Sept 2012
• UAF - NATO Extraordinary Capability Architecture Team, 23 Jan 2013
• Object Management Group (OMG) March 2012

Launchpad for Unified Architecture Framework (UAF)
4.1 ARCHITECTURE FRAMEWORKS

Reference Document 3195
NATO Consultation, Command and Control Agency
Agence de Consultation, de Commandement et de Conduite des Opérations de l’OTAN

DEVELOPMENT OF THE AMN ARCHITECTURE IN 2010 – LESSONS LEARNED

Afghan Mission Network (AMN)

Torsten Graeber, NATO C3 Agency
June 2011
The Hague

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4.1 ARCHITECTURE FRAMEWORKS

• 4.1.2 Observations [Need for a Unified Architecture Framework]

• Differences in DoDAF, MODAF, and NAF make it difficult to match the meta-model one to one.
  – some of the concepts in the frameworks have the same name but different definitions, i.e. different semantics.

• Difficult to cross-walk the concepts between the different frameworks leads to miscommunication between architects using different frameworks.
DoD CIO Vision Statement:

- Support achieving the DoD CIO Vision to deliver agile and secure information capabilities to enhance combat power and decision making
- Move to Single World-Wide Architecture Framework
- Coordinate and work with:
  - UK – MODAF
  - Canada DNDAF
  - NATO – NAF
- Create an International Standard
Unified Architecture Framework

• **Overall architecture framework convergence vision**

• **Current U.S. convergence initiatives**
  – Structure and contents of DoDAF v2.03
  – U.S. Federal Government; Common Approach to Federal Enterprise Architecture

• **Next -- NATO Architecture Capability Team (Architecture CaT)**
  – Architecture CaT Understanding
  – Approach for UAF – IDEAS, Common metamodel supporting multiple policies
  – Define Architecture CaT Workshop Objectives and Goals

DM2 founded upon International Defence Enterprise Architecture Specification (IDEAS)
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Unified Architecture Framework

• Architecture federation and data exchange
  – Agreement on common concepts and meanings
  – Architectures can be assessed for interoperability and for capability gaps and overlaps in support of Coalition operations long-range planning
  – Defense, humanitarian, law enforcement, …

• Standardization
  – Tools
  – Training
DoD CIO

Unified Architecture Framework

<table>
<thead>
<tr>
<th>Process Supported</th>
<th>FFP</th>
<th>Legacy</th>
<th>Views</th>
<th>Data</th>
<th>Ontology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ops</td>
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<td>JCIDS</td>
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<td>DAS</td>
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<td>CPM</td>
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<td>PPBE</td>
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</tbody>
</table>

The 52 DoDAF models use the DM2 concepts

- DoDAF Models
  - Operational
  - Capabilities
  - Services
  - Systems
  - Data and Information
  - Standards
  - Projects

- DM2

<table>
<thead>
<tr>
<th>Data</th>
<th>Ontology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capabilities</td>
<td>Temporal Parts, Boundaries, Before-After</td>
</tr>
<tr>
<td>Performers</td>
<td>Sum, Fusion, Union, Intersection, Partition, &amp; Disjoint</td>
</tr>
<tr>
<td>Rules</td>
<td>Naming &amp; Description</td>
</tr>
<tr>
<td>Services</td>
<td>Parts and overlaps</td>
</tr>
<tr>
<td>Resource Flows</td>
<td>Type instances, super-subtypes, &amp; powertypes</td>
</tr>
<tr>
<td>Projects</td>
<td>Properties &amp; Measures</td>
</tr>
<tr>
<td>Reification</td>
<td>4-D Mereotopology</td>
</tr>
<tr>
<td>Pedigree</td>
<td>Set Theory</td>
</tr>
</tbody>
</table>
DoD CIO

Unified Architecture Framework

- DoDAF will be foundational and enhanced
- DoDAF will contain DNDAF Security Views/Models
- DoDAF and MODAF will be Harmonized
- UAF will be capability focused
- DoDAF/UAF will become an international Standard (ISO/OMG)
- DoDAF DM2 and MODEM will be Harmonized
- OMG UPDM – Name Change
  - Unified Architecture Exchange

DoDAF Sunsets and Unified Architecture Framework Emerges
Unified Architecture Framework

Benefits

- Enable interoperability for All
- Be Mission and Business focused
  - efficiencies
- More user-friendly
- Alignmet with DoDI 8270 (Prescriptive)
- Incorporate MODEM and UPDM
- Cost effective for governments and industry
- Enable reuse and Information Sharing
Office Of Management and Budget (OMB)
Agency Enterprise Roadmaps

Walt Okon
Senior Architect Engineer
Architecture & Infrastructure (A&I) Directorate
(703) 473-6849
walt.okon@osd.mil
Unified Architecture Framework

• Documentation section identifies 50 artifacts, what DoDAF calls models

• DoD led the Artifact Working Group that is updating these artifacts
<table>
<thead>
<tr>
<th>Draft Artifacts</th>
<th>DoD CIO</th>
</tr>
</thead>
<tbody>
<tr>
<td>S-1 Strategic Plan</td>
<td>CV-1, 2, 3, 5, 6 (Capability Activities, Effects, Hierarchy, Schedules)</td>
</tr>
<tr>
<td>S-2 Concept Overview Diagram</td>
<td>DoDAF OV-1 (Operational Concept)</td>
</tr>
<tr>
<td>S-3 Capability Effects</td>
<td>DoDAF CV-1 (Capability Effects)</td>
</tr>
<tr>
<td>S-4 Capability Deployments and Schedules</td>
<td>DoDAF CV-3, 4, 5 (Capability Schedules, Dependencies &amp; Deployments)</td>
</tr>
<tr>
<td>S-5 Capability Hierarchies</td>
<td>DoDAF CV-2 (Capability Hierarchies)</td>
</tr>
<tr>
<td>S-6 Organization Chart</td>
<td>DoDAF OV-4 (Organizational Relationships)</td>
</tr>
<tr>
<td>S-7 SWOT Analysis</td>
<td>D-4 Business Data Mapped to Key</td>
</tr>
<tr>
<td>S-8 Knowledge Management Plan</td>
<td>D-5 Physical Data Model</td>
</tr>
<tr>
<td>S-9 Architecture Summary</td>
<td>D-6 Data Steward Assignments</td>
</tr>
<tr>
<td>S-10 Architecture Dictionary</td>
<td>D-7 Data Flow Diagram</td>
</tr>
<tr>
<td>S-11 Balanced Scorecard</td>
<td>A-1 Application Inventory</td>
</tr>
<tr>
<td>B-1 Business Process Model</td>
<td>A-2 Application Service Matrix</td>
</tr>
<tr>
<td>B-2 Business Process Sequences</td>
<td>A-3 Application Performance Matrix</td>
</tr>
<tr>
<td>B-3 Operational Performance</td>
<td>A-4 Application Interface Diagram</td>
</tr>
<tr>
<td>B-4 Concept of Operations</td>
<td>A-5 Application Interface Matrix</td>
</tr>
<tr>
<td>B-5 Business Value Chain</td>
<td>A-6 Application Data Exchange</td>
</tr>
<tr>
<td>B-6 Business Service Catalog</td>
<td>A-7 Application Communication</td>
</tr>
<tr>
<td>B-7 Business Service Capabilities</td>
<td>A-8 Event Sequence Diagram</td>
</tr>
<tr>
<td>B-8 Business Process Services</td>
<td>A-9 State-Transition Diagram</td>
</tr>
<tr>
<td>B-10 Business Case / Alternatives</td>
<td>A-10 Software License Inventory</td>
</tr>
<tr>
<td>B-11 Business Transition Plan</td>
<td>A-11 System/Application Evolution</td>
</tr>
<tr>
<td>B-12 Project Plan</td>
<td>I-1 Asset Inventory</td>
</tr>
<tr>
<td>D-1 Conceptual Information</td>
<td>I-2 Network Diagram</td>
</tr>
<tr>
<td>D-2 Key Information Sources and D-3 Logical Data Model</td>
<td>I-3 Enterprise Service Bus Diagram</td>
</tr>
<tr>
<td>D-4 Project Schedules</td>
<td>I-4 Hosting Concept of Operations</td>
</tr>
<tr>
<td>D-5 Technical Standards Profile</td>
<td>I-5 Technical Standards Profile</td>
</tr>
<tr>
<td>D-6 Technology Forecast</td>
<td>I-6 Technology Forecast</td>
</tr>
<tr>
<td>SP-1 Security Controls Catalog</td>
<td>NIST SP 800-53, SP 800-37, CNSSI-4009, FIPS 200</td>
</tr>
<tr>
<td>SP-2 Security and Privacy Plan</td>
<td></td>
</tr>
<tr>
<td>SP-3 Security Authorization</td>
<td>C&amp;A Documentation</td>
</tr>
<tr>
<td>SP-4 Continuous Monitoring Plan</td>
<td></td>
</tr>
<tr>
<td>SP-5 Disaster Recovery Plan</td>
<td></td>
</tr>
<tr>
<td>SP-6 Continuity of Operations Plan</td>
<td></td>
</tr>
<tr>
<td>SP-7 Site Security Management Plan</td>
<td></td>
</tr>
<tr>
<td>SP-8 Suitability Plan</td>
<td></td>
</tr>
</tbody>
</table>
Common Approach to Federal Enterprise Architecture

- OMB Published Federal CIO Memo
  - Shared Services, 2 May 2012
- OMB Published Common Approach
  - Common Approach to Federal Enterprise Architecture, 2 May 2012
- Rewrite-Federal Segment Architecture Methodology (FSAM) to Collaborative Planning Methodology
- DoDAF v2.02 Artifacts to Common Approach
- OMB Tasking-DoD Enterprise Roadmap,

Provides Standardized method to develop architectures
Common Approach with DoDAF 2 Implementation

- DoDAF included in Federal Enterprise Architecture Framework (FEAF) 2.0 DRAFT artifact details
  - Examples on following slides
- DoDAF v2.03, a streamlined and disambiguated revision, nears coordination
- In JCIDS, acquisition, and systems engineering policies for over a year for all acquisitions
  - Three milestones including interoperability plan
  - Systems engineering reviews
- Reference architectures using for IEA, JIE, JMTs, WMA, BMA, and I/C JARM – all DoD mission areas
## Draft Artifact Working Group

### Strategic Plan Examples (6 of 11)

<table>
<thead>
<tr>
<th>PRM</th>
<th>Performance Reference Model</th>
<th>Descriptions</th>
<th>Other Framework Names</th>
</tr>
</thead>
<tbody>
<tr>
<td>S-1</td>
<td>Strategic Plan</td>
<td>A description of the organization's vision, strategic objectives, a prioritization of the desired outcomes from achieving those objectives, the measurements that will demonstrate achievement, and the resources to be used to achieve them</td>
<td>DoDAF CV-1, 2, 3, 5, 6 (Capability Effects, Hierarchy, Schedules, Deployments, and Activities)</td>
</tr>
<tr>
<td>S-2</td>
<td>Concept Overview Diagram</td>
<td>The high-level graphical/textual description of the operational concept.</td>
<td>DoDAF OV-1 (Operational Concept)</td>
</tr>
<tr>
<td>S-3</td>
<td>Capability Effects</td>
<td>Supports the Strategic Plan by defining effects caused by activities conducted for capabilities and measures for these effects</td>
<td>DoDAF CV-1 (Capability Effects)</td>
</tr>
<tr>
<td>S-4</td>
<td>Capability Deployments and Dependencies</td>
<td>Supports the Strategic Plan by defining schedules for the deployment of capabilities in terms of timelines, organizations, and locations and dependencies among effects caused by capabilities</td>
<td>DoDAF CV-3, 4, 5 (Capability Schedules, Dependencies &amp; Deployments)</td>
</tr>
<tr>
<td>S-5</td>
<td>Capability Hierarchies</td>
<td>Presents one or more hierarchies of capabilities and the types of hierarchical relationships between these capabilities</td>
<td>DoDAF CV-2 (Capability Hierarchies)</td>
</tr>
<tr>
<td>S-6</td>
<td>Organization Chart</td>
<td>Presents the composition and relationships among organizational performers</td>
<td>DoDAF OV-4 (Organizational Relationships)</td>
</tr>
<tr>
<td>BRM</td>
<td>Business Reference Model</td>
<td>Descriptions</td>
<td>Other Framework Names</td>
</tr>
<tr>
<td>-----</td>
<td>--------------------------</td>
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</tr>
<tr>
<td>B-1</td>
<td>Business Service Catalog</td>
<td>Presents the business services, taken from the BRM, that are provided within the scope of the architecture and may also indicate business services that are consumed or used internally within the architecture</td>
<td>DoDAF SvcV-1 (Service Composition)</td>
</tr>
<tr>
<td>B-2</td>
<td>Business Service Capabilities</td>
<td>A mapping between the business services and the capabilities that these services support</td>
<td>DoDAF CV-7 (Capabilities Services)</td>
</tr>
<tr>
<td>B-3</td>
<td>Business Case / Alternatives Analysis</td>
<td>A summary of the planning, budgeting, acquisition, and management of federal capital assets sufficient to determine if investment funding should be recommended or continued</td>
<td>OMB Exhibit 300</td>
</tr>
<tr>
<td>B-4</td>
<td>Business Value Chain</td>
<td>Describes the information or resource flows between organizational performers</td>
<td>DoDAF OV-2 (Organizations and Resources)</td>
</tr>
<tr>
<td>B-5</td>
<td>Business Process Model</td>
<td>Presents the hierarchical structure of organizational activities and activities performed by organizational performers to consume and produce resources</td>
<td>DoDAF OV-5a&amp;b (Operational Activities), Operational Activity Diagram, Business Process Diagram</td>
</tr>
<tr>
<td>B-6</td>
<td>Business Process Services</td>
<td>A mapping of business services provided by business processes.</td>
<td>DoDAF SvcV-5 (Service Operational Activities Support)</td>
</tr>
<tr>
<td>B-7</td>
<td>Business Process Sequences</td>
<td>Supports the CONOPS by presenting sequences of activities performed by organizational performers</td>
<td>OV-6c (Operational Activity Sequences)</td>
</tr>
<tr>
<td>B-8</td>
<td>Concept of Operations (CONOPS)</td>
<td>Organizes Business Processes Sequences into scenarios</td>
<td>DoDAF OV-6c (Operational Activity Sequences)</td>
</tr>
</tbody>
</table>
# Draft Artifact Working Group

## Applications Examples

<table>
<thead>
<tr>
<th>ARM</th>
<th>Applications Reference Model</th>
<th>Descriptions</th>
<th>Other Framework Names</th>
</tr>
</thead>
<tbody>
<tr>
<td>A-1</td>
<td>Application Inventory</td>
<td>A registry of applications and services, the system functions or service activities they perform, and, optionally, prioritized or ranked.</td>
<td></td>
</tr>
<tr>
<td>A-2</td>
<td>Application Service Matrix</td>
<td>Interface relationships between services and applications</td>
<td>DoDAF SvcV-3a&amp;b (Service Interfaces to Services and Systems)</td>
</tr>
<tr>
<td>A-3</td>
<td>Application Performance Matrix</td>
<td>The measures (metrics) of applications</td>
<td>DoDAF SV/SvcV-7 (System and Services Measures)</td>
</tr>
<tr>
<td>A-4</td>
<td>Application Interface Diagram</td>
<td>The identification of application resource flows and their composition</td>
<td>DoDAF SV-1 (System Composition and Interfaces)</td>
</tr>
<tr>
<td>A-5</td>
<td>Application Interface Matrix</td>
<td>The interface relationships among systems</td>
<td>DoDAF SV-3 (System - System Interfaces)</td>
</tr>
<tr>
<td>A-6</td>
<td>Application Data Exchange Matrix</td>
<td>The details of resource flows among systems; the activities performed; the resources exchanged; and the attributes (rules and measures) associated with these exchanges</td>
<td>DoDAF SV/SvcV-6 (System and Service Resource Flows)</td>
</tr>
<tr>
<td>A-7</td>
<td>Application Communication Diagram</td>
<td>The means by which resource flows between applications occur</td>
<td>DoDAF SV/SvcV-2 (Systems and Services Interface Means)</td>
</tr>
<tr>
<td>A-8</td>
<td>Event Sequence Diagram</td>
<td>A sequence of triggering events associated with resource flows and systems</td>
<td>DoDAF SV/SvcV-10c (System and Service Activity Sequences)</td>
</tr>
<tr>
<td>A-9</td>
<td>State-Transition Diagram</td>
<td>The states systems transition to in response to events</td>
<td>DoDAF SV/SvcV-10b (System and Service State Transitions)</td>
</tr>
<tr>
<td>A-10</td>
<td>Software License Inventory</td>
<td>A list of Commercial-off-the-Shelf (COTS) assets with details about each (installation date, original cost, condition and such).</td>
<td>DoDAF SV/SvcV-8 (System and Service Evolution)</td>
</tr>
<tr>
<td>A-11</td>
<td>System/Application Evolution Diagram</td>
<td>The planned incremental steps toward migrating a suite of systems and/or applications to a more efficient suite, or toward evolving a current system or application to a future implementation</td>
<td></td>
</tr>
</tbody>
</table>
# Draft Artifact Working Group Infrastructure Examples

<table>
<thead>
<tr>
<th>IRM</th>
<th>Infrastructure Reference Model</th>
<th>Descriptions</th>
<th>Other Framework Names</th>
</tr>
</thead>
<tbody>
<tr>
<td>I-1</td>
<td>Asset Inventory</td>
<td>A list of assets with details about each (installation date, original cost, condition and such)</td>
<td>Asset register</td>
</tr>
<tr>
<td>I-2</td>
<td>Network Diagram</td>
<td>Describes the means by which resource flows between systems occur</td>
<td>DoDAF SV/SvcV-2 (Systems and Services Interface Means)</td>
</tr>
<tr>
<td>I-3</td>
<td>Enterprise Service Bus Diagram</td>
<td>TBD</td>
<td></td>
</tr>
<tr>
<td>I-4</td>
<td>Hosting Concept of Operations</td>
<td>Presents the high level functional architecture, organization, roles, responsibilities, processes, metrics and strategic plan for hosting and use of hosting services</td>
<td></td>
</tr>
<tr>
<td>I-5</td>
<td>Technical Standards Profile</td>
<td>Collects the various systems standards rules that implement and sometimes constrain the choices that can be made in the design and implementation of an architecture</td>
<td>DoDAF StdV-1 (Standards Profile)</td>
</tr>
<tr>
<td>I-6</td>
<td>Technology Forecast</td>
<td>The emerging technologies, software/hardware products, and skills that are expected to be available in a given set of time frames and that will affect future infrastructure development</td>
<td>DoDAF SV/SvcV-9 (System and Service Technology and Skills)</td>
</tr>
</tbody>
</table>
DoD’s Enterprise Roadmap

OMB Tasking
DoD CIO Development
Annual Roadmap Report
EA Management Tool
DoD CIO

Agency Enterprise Roadmap

• Office of Management and Budget (OMB)-Tasked all Federal Departments and Agencies.
• DoD CIO Internal Directorates to Develop Enterprise Roadmap
• OMB, Federal Chief Architect tasked Agencies for EA Roadmap each 30 April
• Enterprise Roadmaps becomes an Agency management tool.
DoD Enterprise Roadmap Purpose

- Documents and maps organization strategic goals to business and mission services - integrating technology solutions across missions.
- Identifies resource requirements, planned solutions, transition plans, performance gaps, and current and future architecture.
- Describes the EA governance process, the implementation methodology, and the documentation framework.
- Provides a living document for clear version control of changes in current and future missions and resources.
- Available on-line in EA repository for access to program information promoting linkage of EA to management and technology processes.
- Support the annual Federal Budget process and deliver an Enterprise Roadmap to OMB’s Office of E-Government by 1 April.
- An authoritative reference for IT portfolio reviews using PortfolioStat methods/tools and for program-level analysis and planning.
SUPPORT THE WARFIGHTER

DoD CIO

DOD and DNI together on Standards

Joint Standards Program Governance and Joint Enterprise Standards Committee (JESC)
Existing DoD CIO Governance

Color coding indicates related functions

Aligned /chartered under CIO Executive Board
DoD CIO

ASRG Organizational Structure
(Current)

LEGEND
ASRG Architecture & Standards Review Group
TIC Technical Integration Committee
FAC Federated Architecture Committee
DoDAF DoD Architecture Framework
DM2 DoDAF Meta Model
DARS DoD Architecture Registry System
ITSC Information Technology Standards Committee
EWSE Enterprise-Wide System Engineering
GTG CMB GIG Technical Guidance Configuration Management Board

Ad Hoc WGs
DoD CIO

Architecture and Standards
Approved Baselines

ASRG = Architecture & Standards Review Group
FAC = Federated Architecture Committee
ITSC = Information Technology Standards Committee
DARS = DoD Architecture Registry System
DISR = DoD IT Standards Registry

SUPPORT THE WARFIGHTER
JESC Governance Structure

DoD & IC CIOs

Joint Information Enterprise (JIE) "Primary Driver"

Architecture and Standards Review Group (ASRG)

Joint Enterprise Standards Committee (JESC)

Technical Integration Committee (TIC)

Executive Steering Group

IT Standards Oversight Panel

JESC Secretariat

Community Collaboration Groups

AD HOC GROUPS FORUMS Technical Working Groups (TWGs)
Unified Architecture Framework Emerges

**Framework Objective:**
- Achieve a single integrated Architecture Framework for interoperability.
- Achieve a US, Canada, and United Kingdom single Framework with a common Data Meta Model
- Achieve alignment with the US Government Common Approach to Enterprise Architecture

**Key Features:**
- Net-centricity and SoA
- SvcV views
- JCIDS & NR-KPP
- Applicability beyond C4ISR
- Use-based
- Integrated Architecture
- 26 AV/OV/SV/TV views
- Linked to I&S policies
- CADM 2.0
- Joint Interoperability
- ModeM – DM2 Harmonization (IDEAS Domain Level)
- NATO NAF
- UDAF

**Timeline:**
- 1995
- 1997
- 2003
- 2007
- 2009
- 2010
- 2012
- 2013
- 2014
- 2016

**Versions:**
- DoDAF v2.0
- DoDAF v1.5
- DoDAF v2.0
- DoDAF v2.01 v2.02
- DoDAF/DNDAF v2.04
- DoDAF/DNDAF v2.03
- DoDAF/DNDAF v2.02
- DoDAF v2.01
- DoDAF v2.00
- UDF v2.05
- IDEAS Foundation v1.0 fixes
- UltraV Load OWL
- DM2 OWL
- Federal Common Approach
- DNDAF Security Views
- NATO NAF
- UAF
- Standardization, e.g.,
  - ISO
  - OMG
  - OASIS
  - UAF

**DoD CIO**

**Unified v2.03**
Delivering JIE Benefits

Benefits of Successful IT Modernization

- Increase mission effectiveness
- Strengthen cyber security
- Improve outcomes of IT Acquisition
- Faster capability deliveries
- Improve interoperability
- Save billions through cost efficiencies

Question and Discussion

DoDAF Strategic Direction of Moving DoDAF towards an Unified Architecture Framework and Standard

Walt Okon
Senior Architect Engineer
Architecture & Interoperability Directorate
Office of the Secretary of Defense
E-Mail: walt.okon@osd.mil

SUPPORT THE WARFIGHTER