



Government
of Canada

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Enterprise Architecture in DND/CAF

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Introduction

The aim of today's presentation is to

- Acquaint participants with Enterprise Architecture in the context of DND/CAF
- Provide an overview of the DND/CAF EA Programme enablement and lessons learned



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Department of National Defence (DND) and the Canadian Armed Forces (CAF)

- DND is the largest federal government department in Canada.
- DND and the CAF together have a budget of approximately 20 billion dollars, and over 115,000 employees, including:
 - 65,000 Regular Force members;
 - 25,000 Reserve Force members (including
 - 4,000 Canadian Rangers); and
 - 25,000 civilians.
- The Deputy Minister has responsibility for policy, resources, interdepartmental coordination and international defence relations; and
- The Chief of the Defence Staff has responsibility for command, control and administration of the CAF and military strategy, plans and requirements.



3 Primary Roles for DND/CAF

- Defend Canada
- Defend North America
- Contribute to International Peace and Security



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EA – A Basic Understanding

- Imagine that we find ourselves in a new circumstance, job, travel, function, situation, environment etc.
- Q> As human beings, what do we do and why?
- A> Seek understanding by asking: WHO; WHAT; WHERE; WHEN; WHY; HOW



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Origins of EA

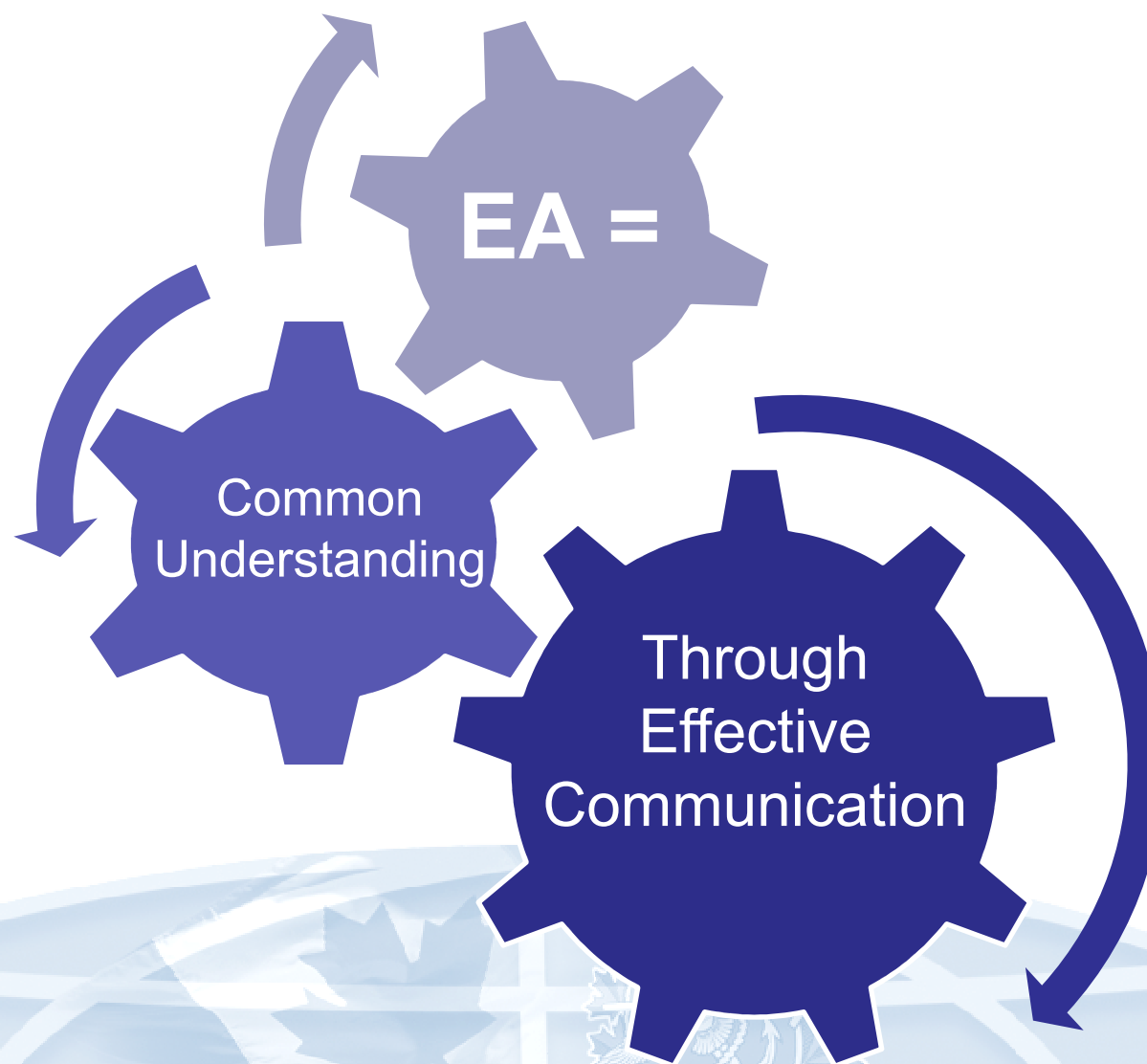
- These SIX little words seek to give “understanding” and awareness sufficient for us to survive and to thrive in any environment
- Therefore it is no coincidence that these words are at the heart of EA in its quest to create understanding out of complexity!





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What EA Provides!



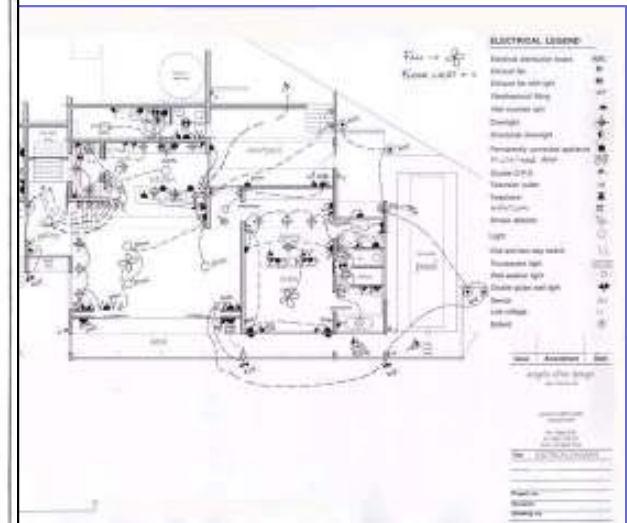


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Effective Communications

Everyone can relate to building architectures

- Architect's Rendering
- Floor plans and construction views
- Electrical wiring and plumbing diagrams, etc.
- All of which is about creating standards for effective communication





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Without Effective Communications?

Without an architecture:

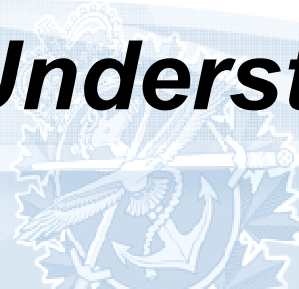
- No overarching design
- Point to point custom interfaces
- Duplication and redundancy
- Visible and invisible gaps
- High production and maintenance costs
- High Total Cost of Ownership (TCO)
with a low Return On Investment (ROI)

Sound familiar?
No Common Understanding!



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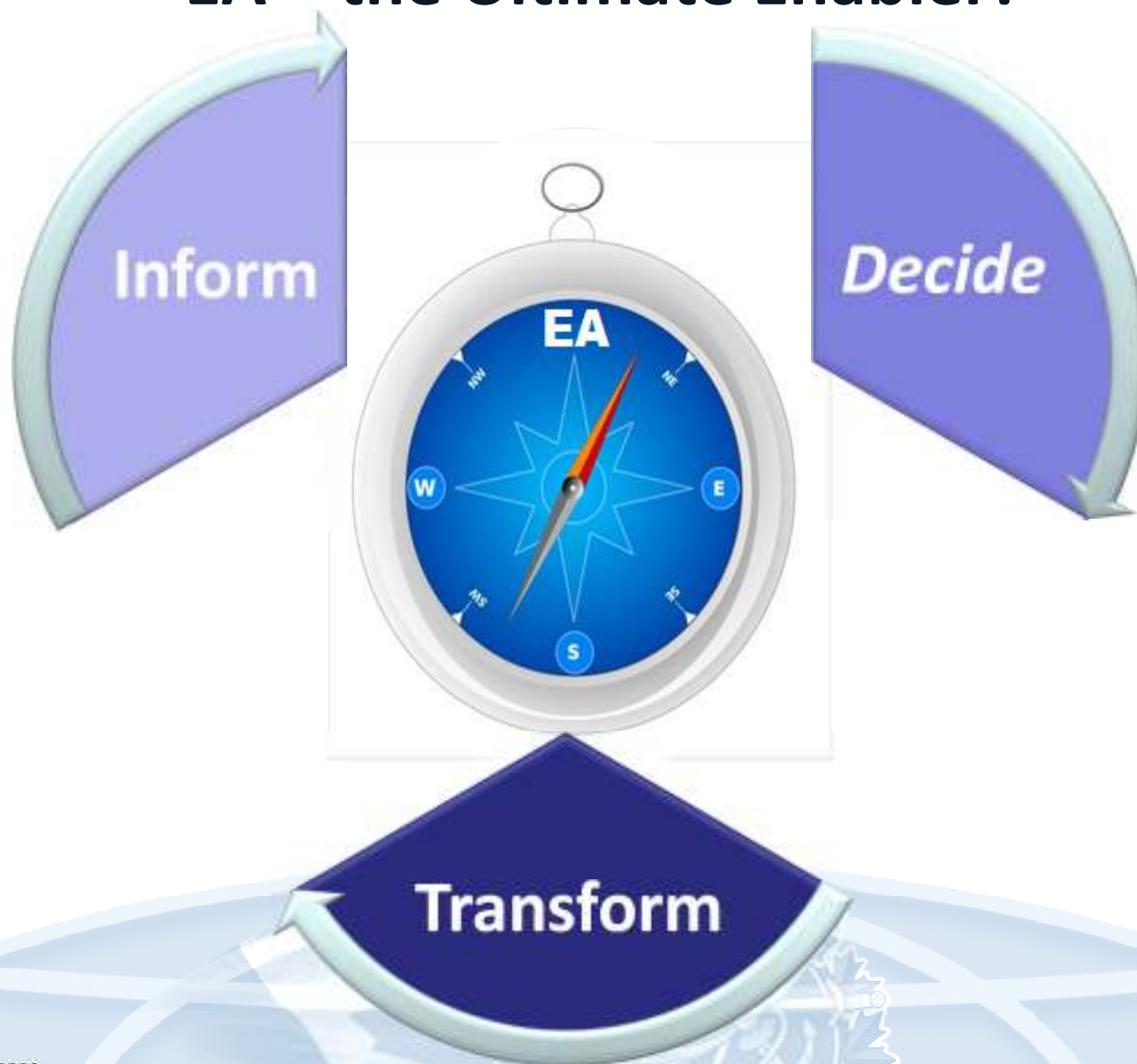


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EA – the Ultimate Enabler!



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DND/CAF Enterprise Architecture Programme Overview



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the DND/CAF Perspective of



Enterprise



DND / CAF



Architecture

Information describing:
• Business Vision & Strategy

• Legislation
• Rules & Regulations

• Functional Requirements

• Organizational Structures

• Models & Descriptions

• Process Maps & Models

• Solution/Capability Designs
& Specifications

...including:



ADM(abc)



ADM(def)



Defence
Renewal



Project A



Project B



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DEA Mandate



To actively establish, implement and manage a robust EA Programme that will ensure understanding by;

- enabling all DND/CAF organizations to employ a standard architecture framework and software tool
- establishing an integrated repository of DND/CF Architecture information to permit sharing of a common set of solutions
- providing a support capability to advise and assist EA practitioners, i.e. training, helpdesk, SME assistance





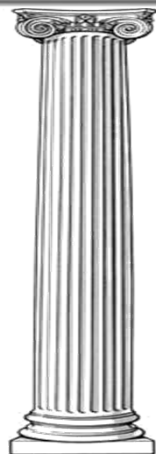
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Building a successful EA Programme for DND/CAF

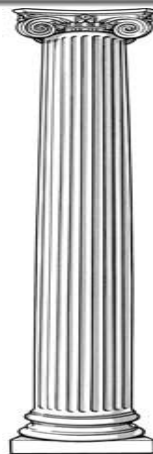
DND/CAF EA Programme

Vision - The Enterprise Architecture practice is embedded into the DND/CAF daily activities. The use of a clear, consistent, communicated and managed architecture provides decision makers at all levels with current information in support of change management and decision making.

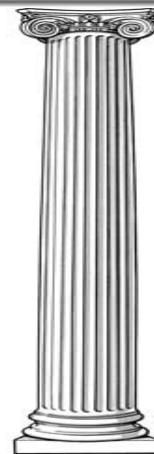
A successful EA Programme is built upon a number of “pillars”:



DND/CAF
Architecture
Framework



Tools, Training
and
Methodologies



Client
Services



Governance

All these components contribute, in varying degrees, to providing DND/CAF with the ability to do Enterprise Architecture.

Mission - DEA will develop, implement and maintain the DND/CAF EA Programme to ensure decision makers and systems developers at all levels are well supported with timely and accurate architectural information, tools and training.



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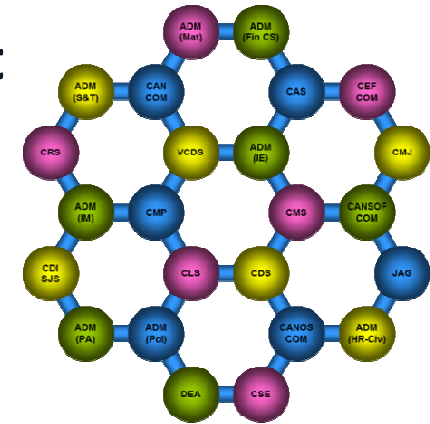
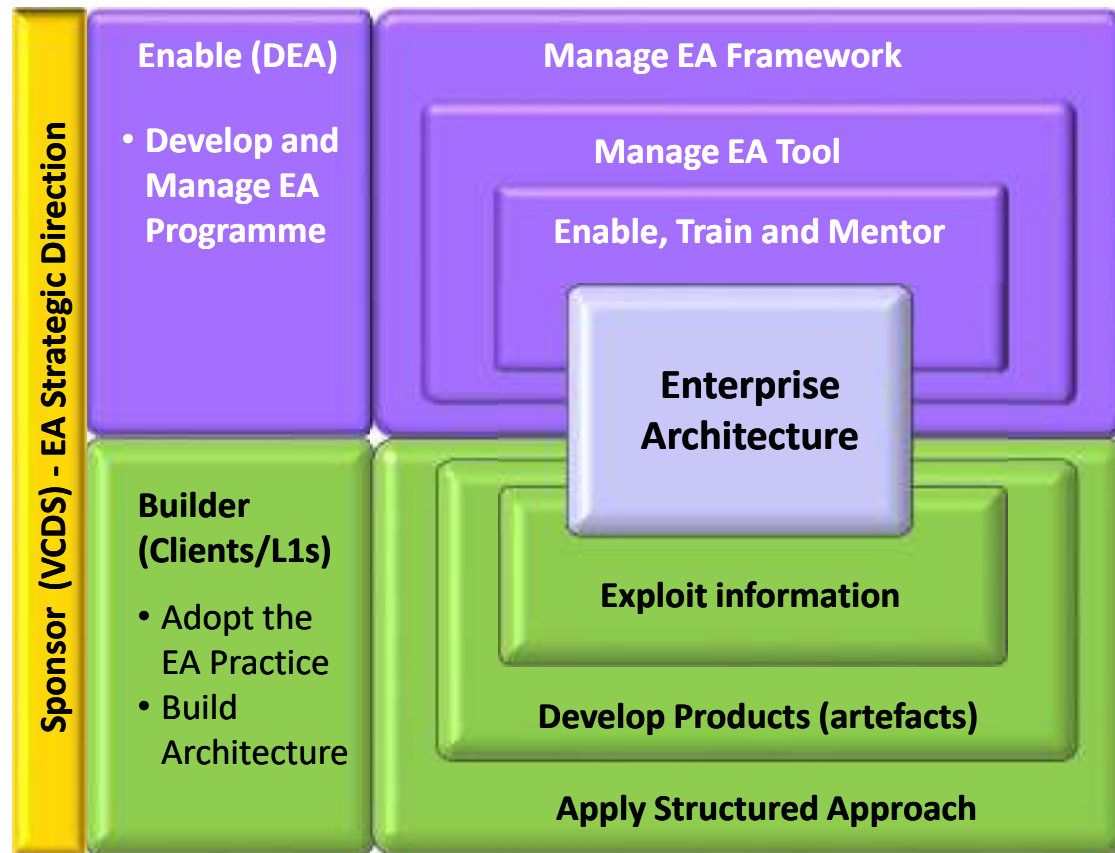
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DND/CAF EA Programme Intent Concept of Operations / Roles



“Builders” of architecture require a sustainable, scalable, repeatable process by which they can gather and document information about their business or organization.

The EA Programme now provides the components necessary to allow clients to perform Enterprise Architecture in support of their decision-making and transformational activities.



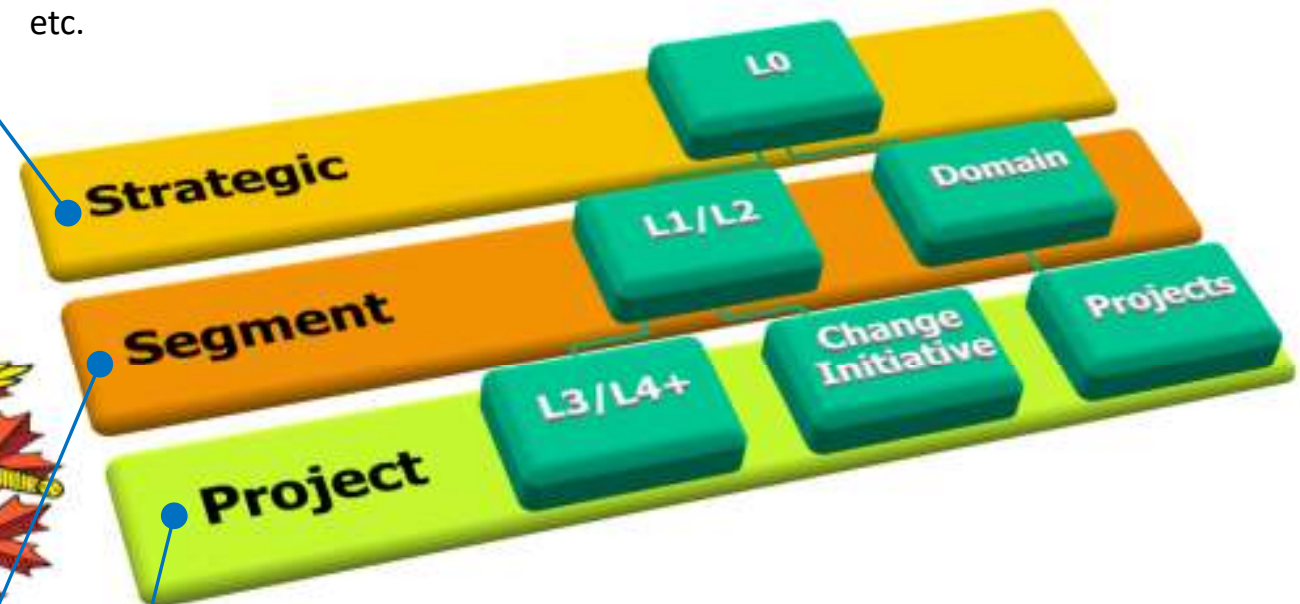


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EA Content Landscape

Builder
L1s

A **Strategic** Target Architecture is assembled from GoC policy, CFDS, ARA, DAODs, IP, PAA, FP&R, Capability Plan, etc.



Projects are required to develop using the DND AF views that show alignment to the Strategic Target Architecture.

Segment (domain) owners are engaged to develop architectures (e.g. Navy, C4ISR and MA&S) in alignment with Strategic Target Architecture



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Governance of the DND/CAF Enterprise Architecture

WHO

- Stakeholders, Practitioners

WHAT

- Information (Models, Views, Artefacts)

WHERE

- Committees, Boards (existing Governance)

WHEN

- Decision Points, to answer Questions

WHY

- Policy, Legislation, Process, Strategy, Capability Planning, Change

HOW

- Methods, Frameworks

Each of these `sub-elements` must be identified for EA initiative



Strategic

Segment

Project

DND Strategic Governance Processes where EA information can be integrated 16



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Benefits we are seeking

By capturing and presenting information in a consistent and uniform manner, Enterprise Architecture can inform, guide, and constrain the management decisions required for transformation in the following ways:

- Align investment/divestment decisions to support accountability, control and higher level Defence Strategies
- Facilitate gap analysis between current and future capabilities and the identification of trade-offs
- Gains in effectiveness, efficiency and reuse of existing solution assets
- Align services with capability objectives and create visibility needed for Performance Measurement
- Business-process improvement
- Coherence of business rules
- Management of change
- Regulatory and standards compliance



Inform. Decide. Transform.

17



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Implementation Status

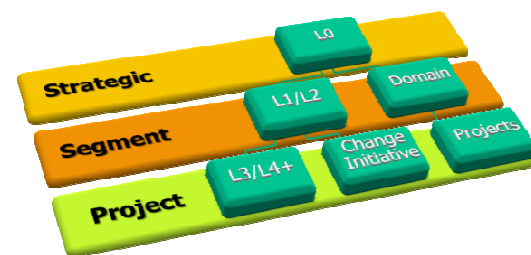
Current User base	
	<ul style="list-style-type: none">• 400+ named users on DND local network• Approx. 201 project/organization repositories on DND local network
Concurrent use network licence	
	<ul style="list-style-type: none">• 600 Local network licences: Production, Staging and Training• 100 Secret network licences• 50 Stand alone Secret network licenses
Networks	
	<ul style="list-style-type: none">• DND local, DND Secret (CAN-US) and Stand Alone Internal Secret network• DND Testing Environment





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Examples of Client engagements



	Client	Initiative
Strategic	C Prog - DMPP	PAA and Defence Business Model and supply chains support. The EA tool is the system of record for the PAA and supporting business process models & supply chains
	DRT	Value Modeling Maintenance and Execution Initiatives
Segment	RCN	Royal Canadian Navy Enterprise Model support
	ADM(Mat)	Maintenance and Support Supply Chains & policy integration support
	CFD - DC4ISR	C4ISR Programmatic Governance View & Joint Missions Threads
	ADM(HR-Civ)	Common HR Business Processes (TBS) support
Project	CANSOFCOM	Classified C2 Project
	CMP	MPMCT



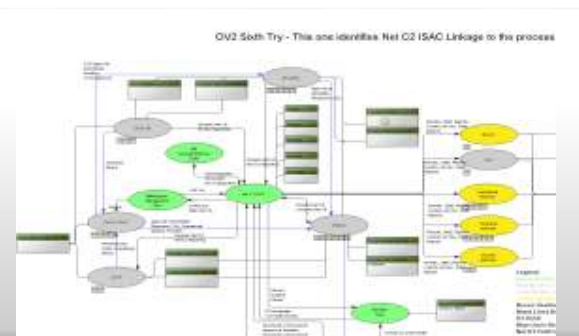
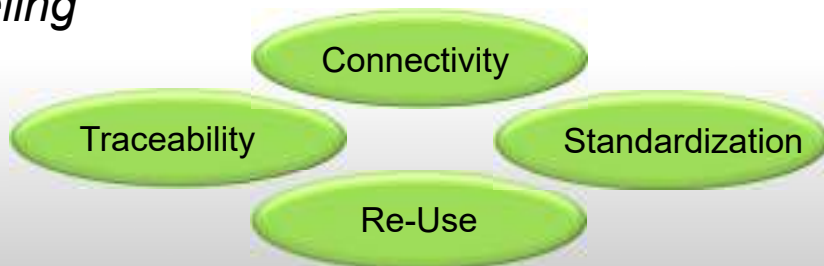


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EA in Use

Not just pretty pictures!

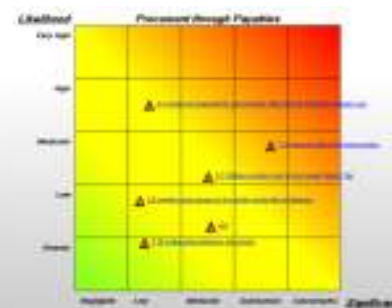
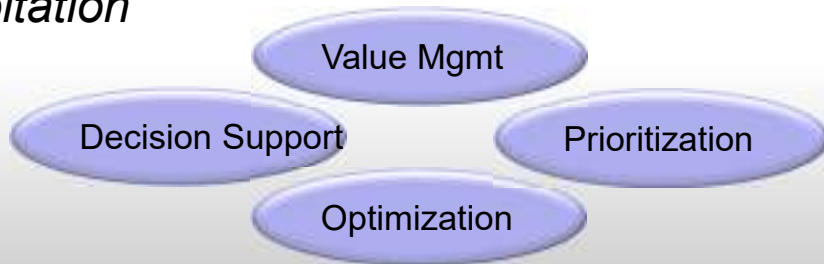
Modeling



Communication



Exploitation





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Lessons Learned/Observed

What we've learned/observed;

- Be practical – know when good is good enough
- Many Snowflakes
- Client experiences/soundings
- Senior level commitment is key
- Don't underestimate Level of Effort for sustainment
- It takes time, Keep moving toward end goal.



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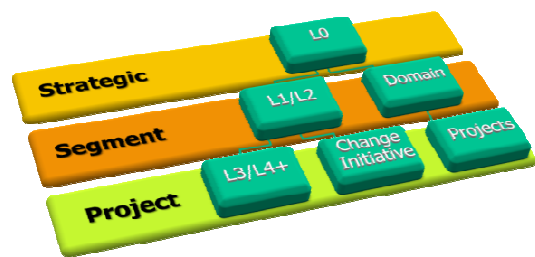


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Summary



- The intent of the DND/CAF EA Programme is to manage the Enterprise Architecture capability via the Sponsor, Enabler and Builder roles.
- It is designed to address & support a multi-layered approach to Enterprise Architecture.
- The capability is growing – we have reached IOC* with FOC** planned in the next few years.



*Initial Operational Capability

**Full Operational Capability



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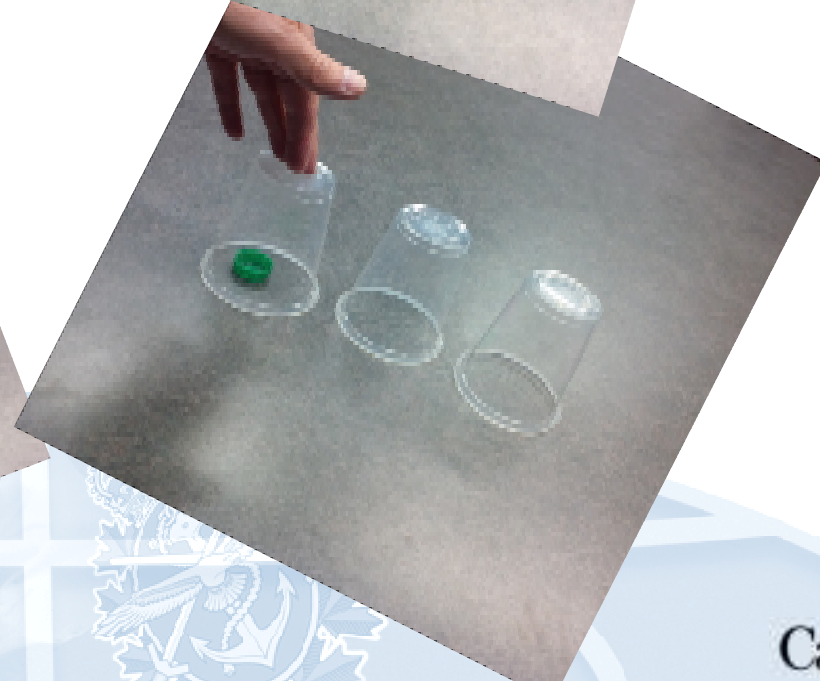
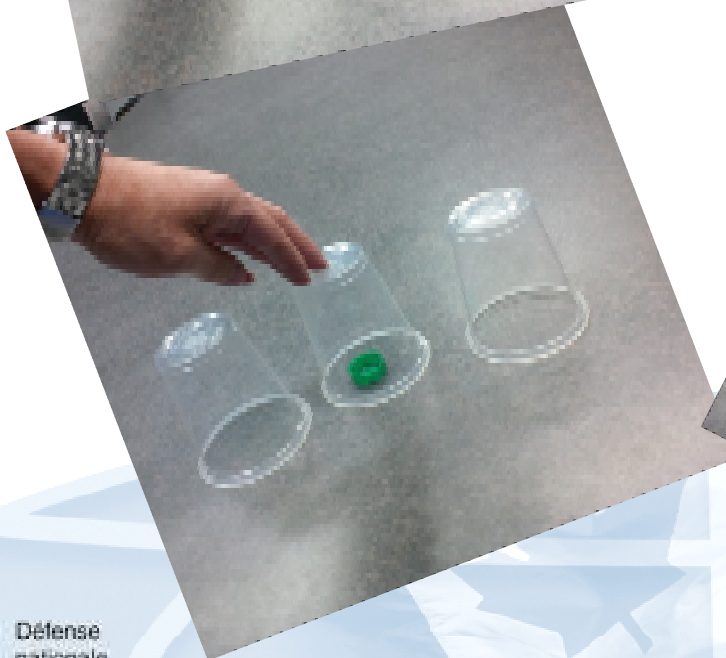
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EA is a Game Changer

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DND/CF ENTERPRISE ARCHITECTURE PROGRAMME

Inform. Decide. Transform.

PROGRAMME D'ARCHITECTURE D'ENTREPRISE DU MDN/FC

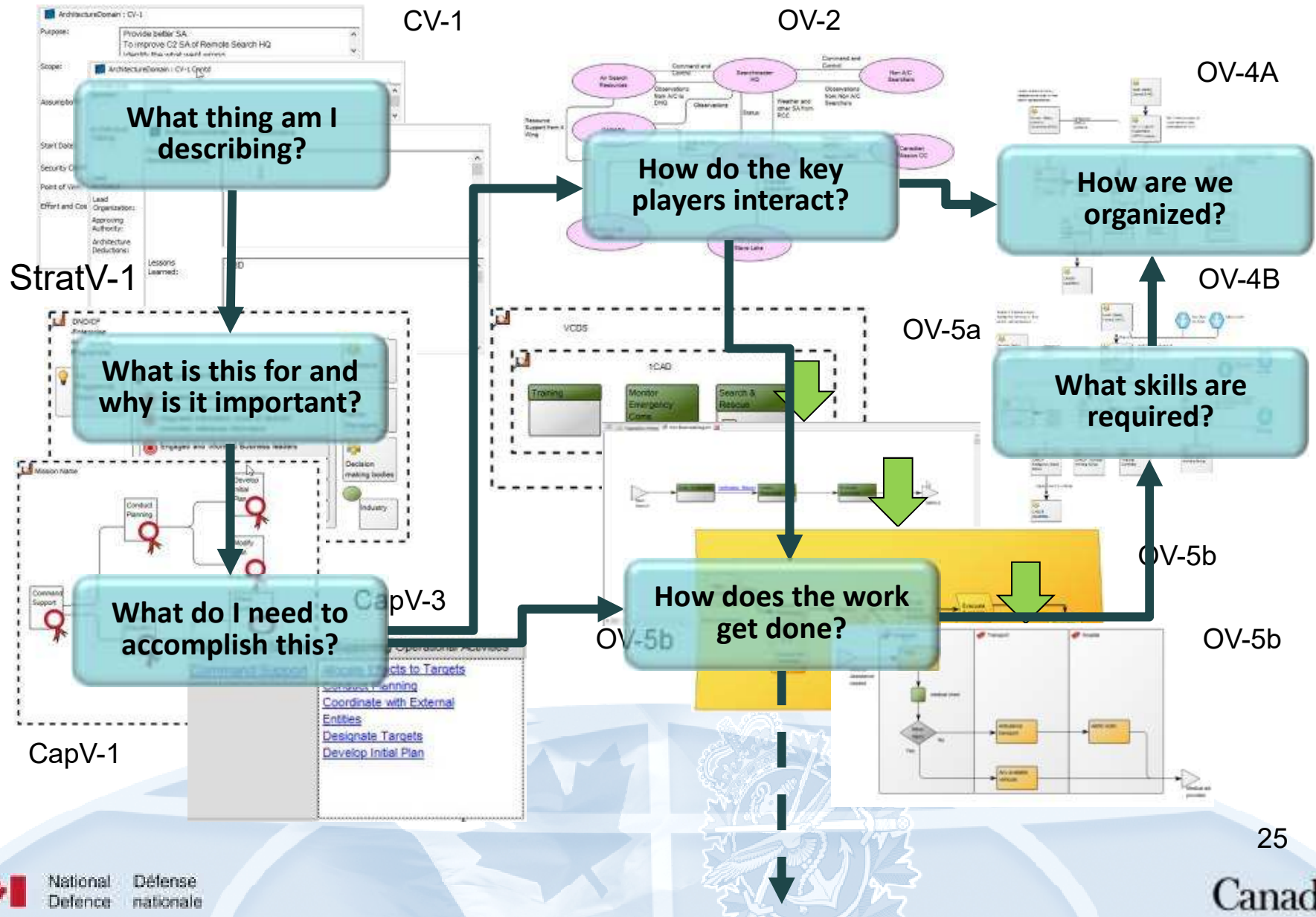
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DNDAF Views Interrogatives (1/2)





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DNDAF Views Interrogatives (2/2)

