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Interoperability
Profiles Capability Team (IP CaT)



C3 Taxonomy, Profiles and Architecture Building Blocks (ABB)

ISA² MID-TERM CONFERENCE

Linking public administrations, businesses and citizens

Follow discussions online

 @EU_isa2

 ISA² Programme

#ISA2CONF18

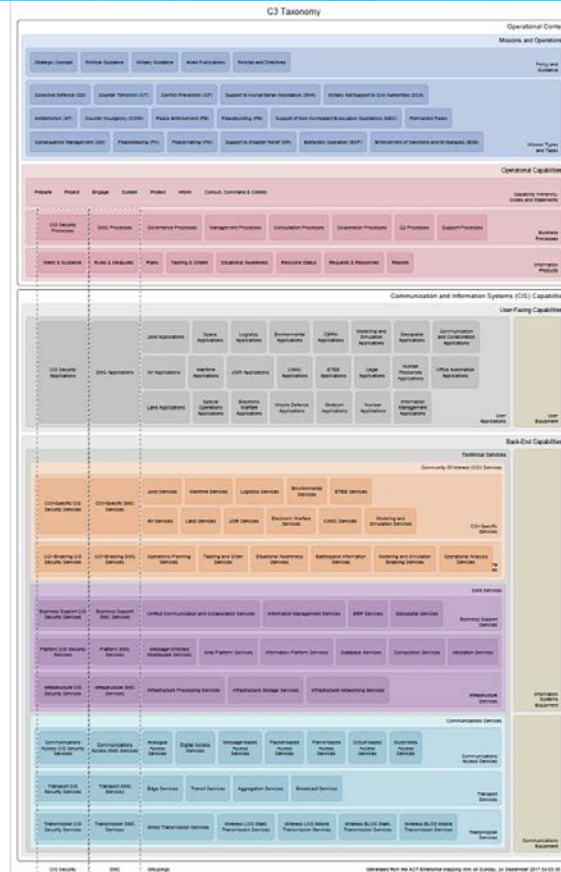
Interoperability Challenges

- Political
 - Sovereignty/Control
 - Political Statements
- Resource
 - Legacy Equipment
 - Different upgrade cycles
- Different Communities
 - Logistics, Medical, Finance
 - Intelligence, Comms
- Standards:
 - Configuration options



C3 Taxonomy Architecture Domains

7-layer OSI Model



Business (Operational) Domain

Information Domain

Application Domain

Technology Domain



Example Profile - DNS

Mandatory Standards

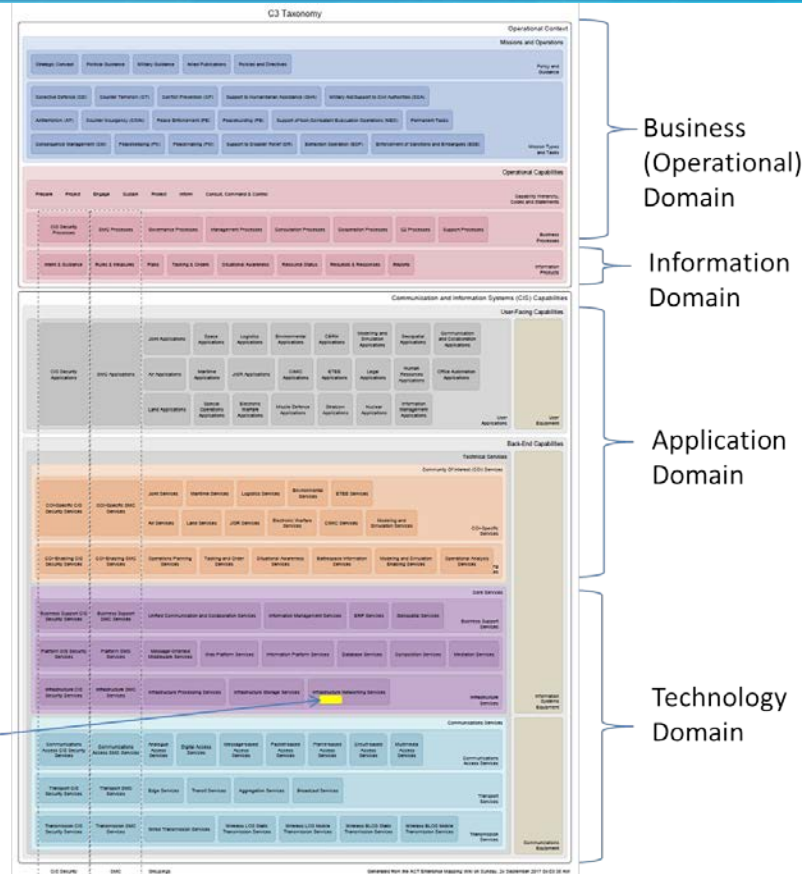
- [Domain names - concepts and facilities \(IETF RFC 1034:1987\)](#)
- [Domain names - implementation and specification \(IETF RFC 1035:1987\)](#)
- [Clarifications to the DNS Specification \(IETF RFC 2181:1997\)](#)
- [A DNS RR for specifying the location of services \(DNS SRV\) \(IETF RFC 2782:2000\)](#)
- [Distributing Authoritative Name Servers via Shared Unicast Addresses \(IETF RFC 3258:2002\)](#)
- [Operation of Anycast Services \(IETF RFC 4786:2006\)](#)
- [DNS Zone Transfer Protocol \(AXFR\) \(IETF RFC 5936:2010\)](#)
- [DNS Transport over TCP - Implementation Requirements \(IETF RFC 5966:2010\)](#)
- [Extension Mechanisms for DNS \(EDNS\(0\)\) \(IETF RFC 6891:2013\)](#)
- [Architectural Considerations of IP Anycast \(IETF RFC 7094:2014\)](#)

Implementation Instructions

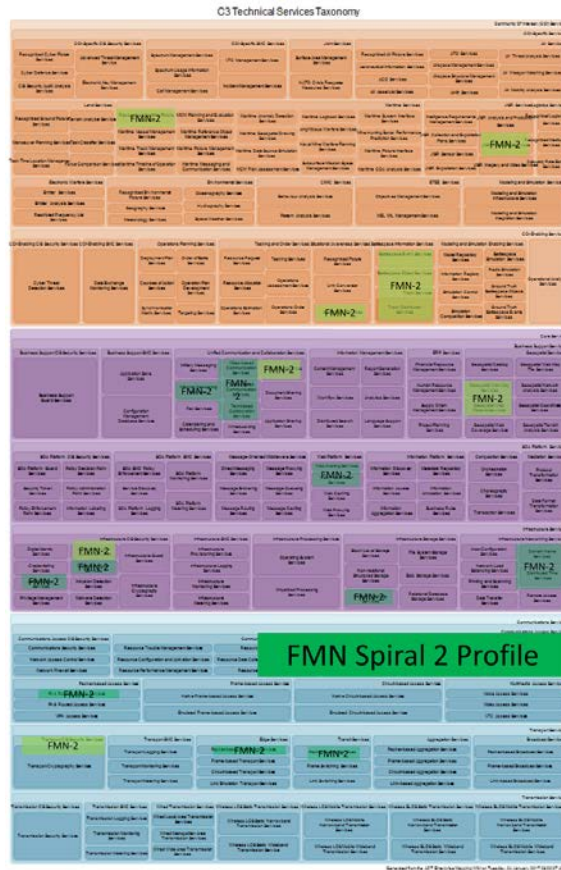
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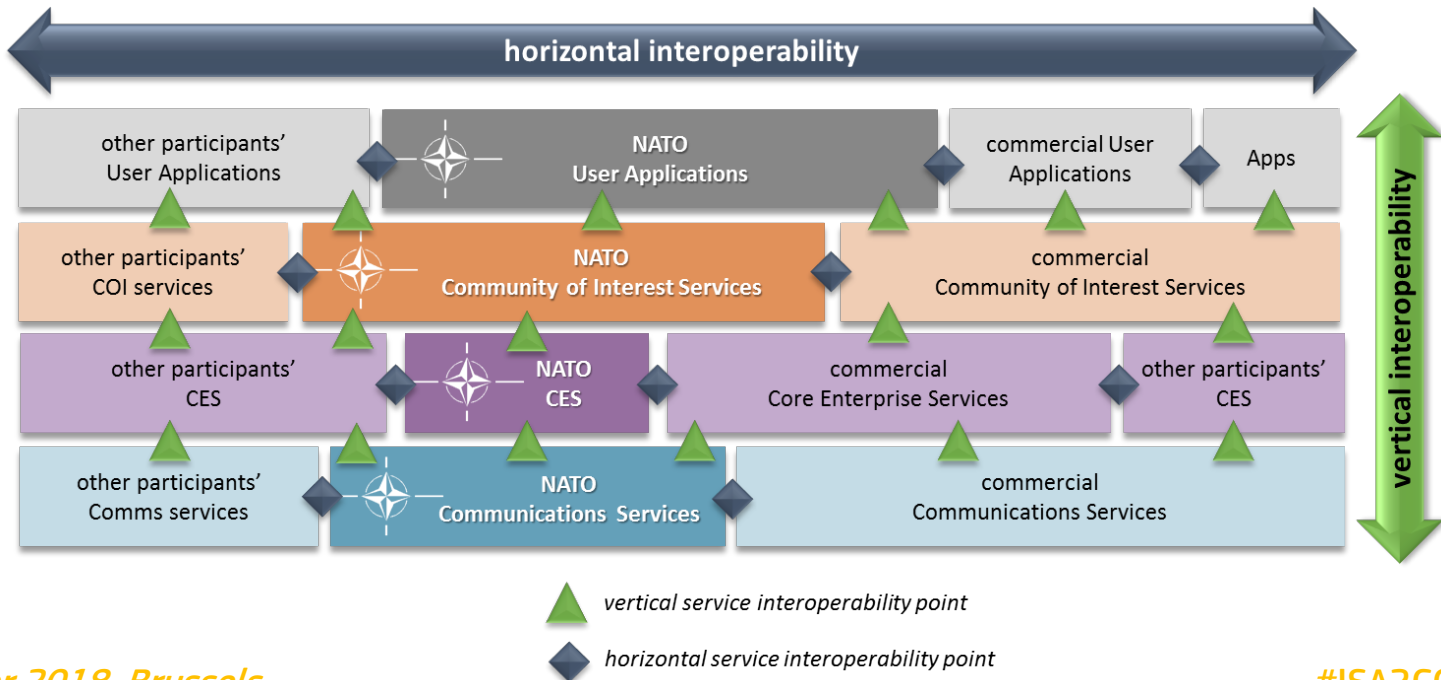
C3 Taxonomy Architecture Domains



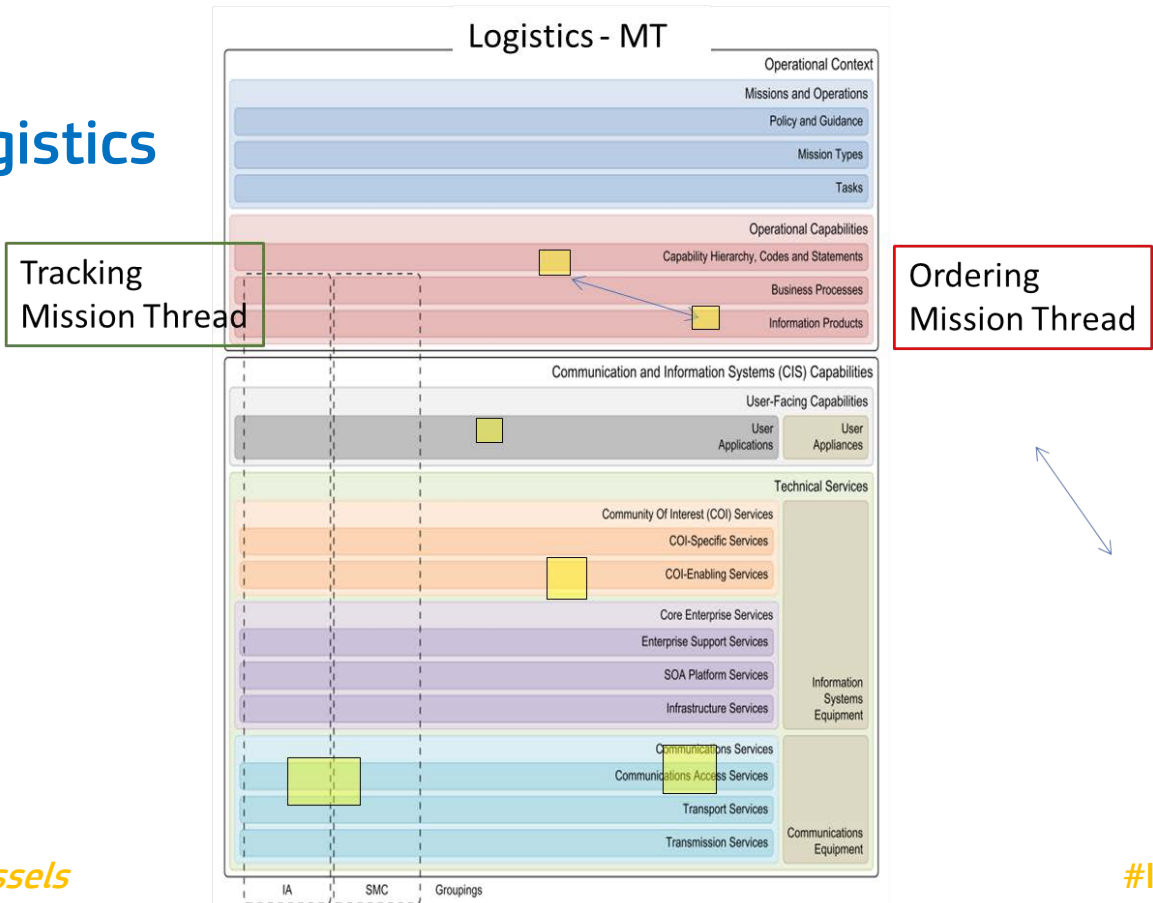
Federated Mission Networking (FMN) Profile Mapped to C3 Taxonomy



Mission configurable Open Plug and Play Architecture



Architecture Analysis - Logistics



Gap Analysis

