



CIM Forum Charter Dated 2018-12-18

The information provided below is subject to change and reflects the current state of the CIM Forum charter within the DMTF.

Management Problem(s) and Environment

The CIM Forum Is responsible for the development and maintenance of CIM-based management standards in the following areas:

- **Systems Management**

The CIM Forum develops and implements procedures, test software and tests that allow member companies and others to verify conformance of software and hardware that implement DMTF system management standard specifications. The CIM Forum also promotes adoption of those standards through programs and activities that allow developers to validate and show the interoperability of their implementations.

- **CIM Architecture**

The CIM Forum is dedicated to defining and documenting the architecture and language infrastructure that is the foundation for DMTF management profiles, registries, protocols, and schemas.

- **CIM Schema**

Management of Information Technology requires interaction with a large number of systems from a variety of vendors and suppliers as well as systems customized in a particular environment. In order to manage these systems effectively, it is necessary to deliver an integrated set of systems management standards.

The CIM Forum addresses this problem by developing a "Core" model and related "Common" models that address specific management domains. These models provide a means to discover, configure, monitor, and manage logical and physical objects. These objects represent physical assets, such as servers, desktop and mobile devices, processors, memory, communication ports, switches, and other system components. These objects also represent logical objects used for virtualization and cloud management.

These interfaces enable the industry to provide interoperable management solutions for information technology equipment.

The CIM Forum ensures that the Common Information Model (CIM) is able to provision and manage objects in a heterogeneous and end-to-end environment.

- **CIM Profiles for Platforms and Services**

The pressure for IT to reduce the costs of maintaining enterprise computing infrastructure continues. Manageability of connected platforms within the enterprise infrastructure drive significant IT cost.

There is a desire for an interoperable manageability interface for connected compute platforms. The platforms include servers and client platforms. The server platforms span stand-alone, rack mount, bladed or partitioned machines. The client machines span desktops, laptops, and tablets.

There is a desire for an interoperable manageability interface for network services within an Internet network to which the above platforms are connected.

There is also a desire for an interoperable manageability interface to manage the security services on connected compute platforms.

An interoperable manageability interface is one that is independent of: 1) machine state, 2) operating system state, 3) server system topology, and 4) access mechanisms.

CIM Forum Charter

The CIM Forum is chartered to perform its conformance and promotion missions for these DMTF initiatives:

- SMASH
- DASH
- NETMAN

The CIM Forum charter includes the access protocols and management profiles that are part of these initiatives.

The activities in the scope of the mission of CIM Forum are:

System Management:

- Developing and maintaining test tools for conformance.
- Developing and implementing conformance verification procedures.
- Administering DMTF certification registry for DASH and SMASH.
- Determining the nature and form of certification provided to implementations which demonstrate conformance.
- Holding plugfests for members and industry attendees.

CIM Architecture:

The CIM Forum is responsible for defining and documenting the architecture and language infrastructure that is the foundation for CIM management profiles, registries, protocols, and schemas.

The associated work covers the following major topics:

1. Specification of the Common Information Model (CIM) Infrastructure (meta-model and qualifiers, and the Managed Object Format (MOF) language)
2. Specification of Generic Operations
3. Specification of the CIM Query Language (CQL)
4. Specification of Standard Message infrastructure
5. Specification of a mapping between the CIM meta-model and the Object Management Group (OMG) Unified Modeling Language (UML)
6. Specification of DMTF management profile infrastructure, including artifacts, to enable the authoring and production of machine-readable profiles
7. Specification of Web-based Enterprise Management (WBEM) discovery
8. Specification of management profiles for configuration, monitoring, security, and management of WBEM servers
9. Specification of management profiles for common functions
10. Specification of standard metadata related to metrics (metric schema) and the semantics of standard metrics (metric registry)

The CIM Forum defines and documents the issues and proposed solutions involving the overall management architecture and the future directions of CIM technologies. This includes:

1. Develop a strategy for migration of CIM v3 from CIM v2
2. Provide recommendations regarding the evolution of the CIM meta-model and supporting technology extensions
3. Review and approve new DMTF architectures and technology submissions
4. Develop and document best design and use practices for CIM Schemas (defined by DMTF or elsewhere) and extensions
5. Develop models (schema and profiles) for metrics and statistical data

CIM Schema:

The CIM Forum is responsible for development of the DMTF Common Information Model (CIM) schema and for oversight of CIM Common Models developed by DMTF working groups and Alliance partners. These responsibilities include:

1. Development of CIM Core Schema that is the basis for domain-specific modeling
2. Review and approval of CIM Schema from alliance partners
3. Development of tooling for creating and maintaining the schema
4. Review and approval of all Managed Object Format or MOF-based Schema in the DMTF
5. Approval of DMTF technical and informational specifications, CIM Schema, and presentations with technical content generated by this working group
6. Technical content of the CIM Schema related DMTF web pages and portals

CIM Profiles for Platforms and Services:

The CIM Forum is chartered to develop the CIM model, profiles, and command line protocols that enable interoperable manageability for the following domains:

1. Server platforms
2. Desktop platforms
3. Mobile platforms
4. Network services
5. Platform authentication, authorization, and auditing services

For server, desktop and mobile platforms, the manageability shall span in-band, out-of-band, in-service, and out-of-service environments (consistent with definitions in DSP2001). This includes interactions with the operating system that are necessary to assist in hardware management. Direct management of a running operating system and its associated applications is out of scope.

For network services, the working group shall create specifications for interoperability of virtual network, network device and network service management. The working group shall also augment the existing CIM profiles to address the management requirements of the networking protocols and services for the physical, logical and virtual technologies.

For security, the working group shall address management of the underlying security capabilities utilized by such protocols and initiatives (for example: interfaces for the management of keys and certificates). The CIM Forum will address security requirements for protocols and management initiatives related to CIM.

The CIM Forum reports directly to the Technical Committee.

Reliance/Coordination with Other DMTF Groups

The CIM Forum is a child body of the Technical Committee to which it reports on a regular basis. The Forum reports as requested by the DMTF Board or the Technical Committee.

Links

- To join the CIM Forum, DMTF members see <https://www.dmtf.org/join/forums>.
- To join the DMTF, see <http://www.dmtf.org/join/>.
- To contact the CIM Forum chairs, DMTF members see CIM-Forum-chair@dmtof.org. All others can contact admin@dmtof.org.