

SAF User Documentation : Logical Structure Viewpoint

Domain	Aspect	Maturity
Logical	Taxonomy & Structure	released

Example

Logical-Structure-Viewpoint-example.svg

Purpose

The Logical Structure Viewpoint covers the basic technical notion of the System and is widely reusable among similar systems like product families, or product generations. The Logical Structure Viewpoint specifies how the system is decomposed into a hierarchical structure of logical components responsible for different System Functions (divide & conquer principle).

Applicability

The Logical Structure Viewpoint supports the "Develop Architecture Viewpoints", and the "Develop Models and Views of Candidate Architectures" activity included in the "Architecture Definition process" activities of the INCOSE SYSTEMS ENGINEERING HANDBOOK 2015 [§ 4.4] and contributes to the artifact "System Architecture Description".

Presentation

A block definition diagram (BDD) featuring the logical System block and logical blocks for each kind of Logical Element the system is composed of. The elements are connected to the System block by means of aggregation relationships. Note: Multiple relationships to a kind of element are allowed meaning, that this kind of element is used in several roles.

Stakeholder

- Regulation Authority
- System Architect

Concern

- How are applicable requirements considered in the system architecture?
- What are the logical components the system is composed of?

Profile Model Reference

The following Stereotypes / Model Elements are used in the Viewpoint:

- SAF_LogicalElement
- SAF_LogicalInternalRole
- SAF_LogicalSOI
- SAF_SLV02a_View

Input from other Viewpoints

Required Viewpoints

• System Functional Breakdown Structure Viewpoint

Recommended Viewpoints

• System Process Viewpoint