




SAF User Documentation : System Requirement Traceability Viewpoint

| Domain | Aspect | Maturity |
|------------|------------------------|---|
| Functional | Traceability & Mapping |  released |

Example

| Legend | | Detect and Report Fire (context FFD) | Request sensor data (context FFDS) | Analyze FF data(context FFDS Cont...) | StakeholderRequirement [CONOPS_ | Capability [CEO FFDS Vendor] | CPBLTY-11 Fire Detection | CPBLTY-12 Fire Monitoring | Capability [Fire Operations Expe | CPBLTY-25 Propagation Estimati... |
|---------------|--|--------------------------------------|------------------------------------|---------------------------------------|---------------------------------|------------------------------|--------------------------|---------------------------|----------------------------------|-----------------------------------|
| | FFDS_Requirement | | | | | | | | | |
| | Fire Detection | | 1 | 2 | | | 1 | 1 | | 1 |
| | SYS-REQ-002 Forest Fire Detection | 1 | | | 1 | 1 | | | | |
| | Fire Monitoring | | | 1 | | | | 1 | | |
| | SYS-REQ-003 Forest Fire Evolution Monitoring | 1 | | | 1 | 1 | | | | |
| | Fire Prediction | | | 1 | | | | | | 1 |
| | SYS-REQ-004 Forest Fire Spread Prediction | 1 | | | 1 | | | | 1 | |

Purpose

The System Requirement Traceability Viewpoint specifies for every System Requirement the traceability to the functional domain level

- System Use Case
- System Capability
- System Context Definition
- System Context Exchange
- System Context Interaction
- System Process

- [System State](#)

Applicability

The System Requirement Traceability Viewpoint supports the "System Requirements Definition Process" activities of the INCOSE SYSTEMS ENGINEERING HANDBOOK 2015 [§4.3] and contributes to the System Requirements Traceability. The System Requirement Traceability Viewpoint also contributes to the System Requirements Verification and Traceability Matrix (RVTM).

Stakeholder

- [Project Manager](#)

Concern

- What is the rationale for this system requirement?
- Which Stakeholder Requirements are addressed by System Requirements?
- Which system interface is addressed by a system requirement?

Presentation

A System Requirement Dependency Matrix featuring relationships for every System Requirement to the functional domain level

- System Use Case
- System Capability
- System Context Definition
- System Context Exchange
- System Context Interaction
- System Process
- System State

Profile Model Reference

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

- [SAF_SFV08b_View](#)
- [SAF_SystemFunctionalRequirement](#)
- [SAF_SystemFunctionalRequirementConstraint](#)
- [SAF_SystemFunctionalRequirementRefinement](#)
- [SAF_SystemNonFunctionalRequirement](#)
- [SAF_SystemRequirement](#)
- [SAF_SystemRequirementDerivation](#)
- [SAF_SystemRequirementDerivation](#)

- [SAF_SystemRequirementRefinement](#)
- [SAF_SystemRequirementRefinement](#)
- [SAF_SystemRequirementRefinement](#)

Input from other Viewpoints

Required Viewpoints

- [Stakeholder Requirement Viewpoint](#)
- [System Requirement Viewpoint](#)

Recommended Viewpoints

- [System Use Case Viewpoint](#)
- [System Capability Viewpoint](#)
- [System Context Exchange Viewpoint](#)
- [System Context Interaction Viewpoint](#)
- [System Process Viewpoint](#)
- [System Functional Refinement Viewpoint](#)
- [System State Viewpoint](#)