

Casablanca Release Planning for VNFRQTS

DRAFT PROPOSAL FOR COMMENTS

The content of this template is expected to be fill out for M1 Release Planning Milestone.

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Overview

Project Name	Enter the name of the project
Target Release Name	Casablanca
Project Lifecycle State	Incubation
Participating Company	AT&T, China Mobile, Amdocs, Ericsson.

Scope

What is this release trying to address?

The Casablanca release of VNFRQTS project will address the following items:

- bug fixes, maintenance and feature alignment of **VNF Guidelines**, **VNF Requirements** and **VNF Test Descriptions** consistent with the rest of the ONAP Casablanca release.
 - including updates to HEAT and TOSCA requirements for VNF Package onboarding
 - PNF capabilities supported by the ONAP platform
 - 5G use cases supported by the ONAP platform
 - Autoscaling use case supported by the Platform
 - management interface updates
- The **VNF Provider Use case** for Autoscaling to be documented with associated VNF Requirements
- The **VNF Test Descriptions** *appendix* to be updated to reflect test implementations planned for Casablanca by other projects (VVP, VNFSDK, etc.)
- **Toolchain** improvements for the management of VNF Requirements
- Categorization of VNF Requirements to support VNF Badging & certification initiatives

Use Cases

Describe the use case this release is targeted for (better if reference to customer use case).

The TSC identified the following Use cases for Release A:

Release first proposed	TSC Use Case	VNFs identified/impacted in TSC Use case
Amsterdam	Use Case: Residential Broadband vCPE (Approved)	vBNG, vG_MUX, vG, vAAA, vDHCP, vDNS
Amsterdam	Use Case: vFW/vDNS (Approved)	vFW, vPacketGenerator, vDataSink, vDNS, vLoadBalancer, all VPP based.
Amsterdam	Use Case: VoLTE(approved)	vSBC, vPCSCF, vSPGW, vPCRF, VI/SCSCF, vTAS, VHSS, vMME
Beijing	5G- RAN deployment, Slicing, SON	
Beijing	Enterprise vCPE --potential R1 use cases' extension	vCPE, vAAA, vDHCP
Beijing	ONAP Change Management	
Beijing	SD-WAN	vBG
Beijing	Scale Out	VOLTE, vDNS
Beijing	Centralised Parser Distribution	
Casablanca	5G Use case Items Casablanca Requirements to Support 5G Use Case	<ul style="list-style-type: none"> Complete PNF Support PNF onboarding & Packaging PNF Registration, VES Event domain
Casablanca	CCVPN(Cross Domain and Cross Layer VPN) USE CASE	<ul style="list-style-type: none"> Service onboarding Service configuration
Casablanca	Centralized Representation and Consistent Identification of Cloud Regions In ONAP	
Casablanca	Change Management Extensions	<ul style="list-style-type: none"> Traffic migration building block 5G RAN PNF Software upgrade
Casablanca	Edge Automation through ONAP	Access Management will leverage the PNF management
Casablanca	OpenSource Access Manager	Access Management will leverage the PNF management
Casablanca	Scaling Use Case Extension	In Beijing the operator had to manually select the controller type (SDNC or APPC) within VID. The controller type should be part of the VNF model and not a run time option.
Casablanca	HPA Casablanca Plans (ONAP)	<ul style="list-style-type: none"> Specification of VNF HPA requirements as part of the VNFD (TOSCA only) On-boarding and use of VNFs with TOSCA based VNFDs

The VNF Requirements developed by this project are applicable to the VNFs identified in the TSC E2E use cases.

- a **VNF Provider (developer)** using VNF Requirements in designing, testing, and certifying a VNF for use on ONAP
- a **Service Provider** using VNF *Requirements as prototype text for RFPs* to acquire VNFs to run in an ONAP context see [VNF RQTS-16](#)
- [VNF Validation Project](#) uses VNF Test Descriptions developed by this project to implement VNF testing for validation purposes.
- [VNF SDK Project](#) also uses VNF Test Descriptions developed by this project to implement VNF testing for validation purposes

The VNF Requirements also cover nonfunctional requirements. ONAP non-functional requirements proposed for the Casablanca release that impact the VNF requirements include:

- Security
 - Description of how the xNFs receive their certificates

Minimum Viable Product

Describe the MVP for this release.

- A **VNF Guidelines** document summarizing VNF provider oriented deliverables and providing informative, forward looking guidance.
- A set of Integrated **VNF Requirements** for use as prototype RFP text.
- **VNF Test Descriptions** for use by [VNF Validation](#) project, and [VNF SDK](#) Project traceable from the VNF Requirments.
 - Appendix identifying which VNF requirements are testable by inspection of the VNF Package, and where the tests are implemented.
- **VNF Use Case** - VNF Provider Guidelines for VNF Scale Out Use Case
 - Manual Scale out
 - Automated Scale Out
- **VNF Badging Categories**
 - Groomed list of VNF Requirements for VNF Badging
 - Groomed list of VNF Requirements for VNF Certification by testing

Functionalities

List the functionalities that this release is committing to deliver by providing a link to JIRA Epics and Stories. In the JIRA Priority field, specify the priority (either High, Medium, Low). The priority will be used in case de-scoping is required. Don't assign High priority to all functionalities.

Epics

Key	Summary	T	Created	Updated	Due	Assignee	Reporter	P	Status	Resolution
No issues found										

Stories

Key	Summary	T	Created	Updated	Due	Assignee	Reporter	P	Status	Resolution
No issues found										

Longer term roadmap

Indicate at a high level the longer term roadmap. This is to put things into the big perspective.

Amsterdam- deliver overview VNF Guidelines & prototype RFP text requirements.

Beijing - Update Amsterdam deliverable for new ONAP features, Test Descriptions for VNF Package Testing, VNF Scaling Use case, tooling improvements

Casablanca - Extend tracability of VNF requirements into testing (VNF Requirements Database),additional VNF provider use cases, Update Beijing deliverable for new ONAP features

Dublin - Design time VNF testing description, additional VNF provider use cases, Update Casablanca deliverable for new ONAP features

El Alto - Run time VNF testing description, update Dublin deliverable for new ONAP features

Frankfurt - Update El Alto deliverable for new ONAP features

Release Deliverables

Indicate the outcome (Executable, Source Code, Library, API description, Tool, Documentation, Release Note...) of this release.

Deliverable Name	Deliverable Description
VNF Guidelines	Documentation. Provides a high level informative overview of guidance towards VNF providers. (provided since Amsterdam release)

Referring to [CII Badging Security Program](#) and [Platform Maturity Requirements](#), fill out the table below by indicating the actual level , the targeted level for the current release and the evidences on how you plan to achieve the targeted level.

Area	Actual Level	Targeted Level for current Release	How, Evidences	Comments
Performance	NA		documentation	<ul style="list-style-type: none"> 0 -- none 1 – baseline performance criteria identified and measured 2 & 3 – performance improvement plans created & implemented
Stability	NA		documentation	<ul style="list-style-type: none"> 0 – none 1 – 72 hours component level soak w/random transactions 2 – 72 hours platform level soak w/random transactions 3 – 6 months track record of reduced defect rate
Resiliency	NA		documentation	<ul style="list-style-type: none"> 0 – none 1 – manual failure and recovery (< 30 minutes) 2 – automated detection and recovery (single site) 3 – automated detection and recovery (geo redundancy)
Security	NA		documentation	<ul style="list-style-type: none"> 0 – none 1 – CII Passing badge + 50% Test Coverage 2 – CII Silver badge; internal communication encrypted; role-based access control and authorization for all calls 3 – CII Gold
Scalability	NA		documentation	<ul style="list-style-type: none"> 0 – no ability to scale 1 – single site horizontal scaling 2 – geographic scaling 3 – scaling across multiple ONAP instances
Manageability	NA		documentation	<ul style="list-style-type: none"> 1 – single logging system across components; instantiation in < 1 hour 2 – ability to upgrade a single component; tracing across components; externalized configuration management
Usability	1	1 Establish Linkage to VNF Testing (improved testability) Establish categorization and linkage to VNF Badging (improved Usability) Toolchain improvements (improved consistency)	docs.onap.org VNF Guidelines VNF Requirements VNF Use Cases VNF Test Case Descriptions	<ul style="list-style-type: none"> 1 – user guide; deployment documentation; API documentation 2 – UI consistency; usability testing; tutorial documentation

• API Incoming Dependencies

List the API this project is expecting from other projects.

Prior to Release Planning review, Team Leads must agreed on the date by which the API will be fully defined. The API Delivery date must not be later than the [release API Freeze date](#).

Prior to the delivery date, it is a good practice to organize an API review with the API consumers.

Other ONAP projects that this VNF Requirements project depends on:

- [SDN-C](#) (for API requirements on VNFs)
- [APPC](#) (for VNF configuration requirements)
- [VF-C](#) (for VNF life cycle management and configuration)
- [Service Design & Creation](#) (for VNF onboarding)
- [DCAE](#) (for VNF reporting requirements)
- [Authentication and authorization Framework](#) (for VNF Security Requirements)
- [Modeling](#) (for Tosca Data Modeling for VNF)
- [Multi-VIM/ MultiCloud](#) (for network cloud infrastructure requirements)

The VNF Requirements does not produce code interfacing with platform APIs. The VNF Requirements do consolidate requirements from ONAP platform components that impact the design and development of VNFs. These ONAP platform components in the table below generate APIs that impact VNFs and so these are generally reflected in the VNF Requirements.

API Name	API Description	API Definition Date	API Delivery date	API Definition link (i.e. swagger)
APPC	VNF configuration requirements	M2	M3	APPC Documentation
Authentication and authorization Framework	VNF Security Requirements	M2	M3	
DCAE	VNF reporting requirements	M2	M3	DCAE APIs documentation
Modeling	Tosca Data Modeling for VNF	N/A		ONAP Modelling Specifications
Multi-VIM/ MultiCloud	network cloud infrastructure requirements	N/A		MultiCloud Documentation
SDN-C	API requirements on VNFs	M2	M3	SDNC APIs documentation
Service Design & Creation	VNF onboarding	M2	M3	SDC documentation
VF-C	VNF life cycle management and configuration	M2	M3	VF-C APIs documentation

• API Outgoing Dependencies

The VNF Requirements do not provide code with APIs, but the VNF Requirements are used as inputs by a number of other ONAP projects. API this project is delivering to other projects.

API Name	API Description	API Definition Date	API Delivery date	API Definition link (i.e. swagger)
Documentation	References to deliverables produced by this project may be included in various ONAP release documents maintained through the documentation project	N/A see the VNFRQTS <> Documentation Project Workflows wiki page	Continuous Delivery (build via Docs Jenkins Job)	docs.onap.org
Reference VNFs (now Integration Project)	Reference VNFs should be VNF Requirement compliant. The Integration Project maintaining those Reference VNFs would be dependent on the VNF Requirements for validating compliance.	N/A see the VNFRQTS <> Integration Project Workflow wiki page	Beijing release version published, Casablanca version in process	consolidated list of VNF Requirements published in Appendix 8d of docs.onap.org
VNF SDK	VNF tooling should support the development and packaging of VNFs that are conformant to the VNF Requirements	NA see the VNFRQTS <> VNFSdk project Workflow wiki page	Beijing release version published, Casablanca version in process	VNF Test Description lists testable requirements. Appendix captures which are tested by VNFSdk
VNF Validation program (ICE)	VNF Validation should be traceable against the VNF Requirements	N/A see the VNFRQTS <> VNF Validation project Workflow wiki page.	Beijing release version published, Casablanca version in process	VNF Test Description lists testable requirements. Appendix captures which are tested by VVP

• Third Party Products Dependencies

The VNF Requirements is documentation rather than code so there is no dependency on 3rd party products other than the documentation and development tool chains provided through the Linux Foundation.

• Testing and Integration Plans

The VNF Requirements is documentation built using the LF toolchain from .rst files into html. This toolchain is administered by the [documentation](#) project. The toolchain provides for syntax checks of the documentation within Sphinx, doc8 etc.

The VNF Requirements is documentation rather than code so there is no code delivery for CSIT.

Reference VNFs used for integration should be documenting their compliance to VNF Requirements.

• Gaps

This section is used to document a limitation on a functionality or platform support. We are currently aware of this limitation and it will be delivered in a future Release.
List identified release gaps (if any), and its impact.

Gaps identified	Impact
VNF Requirements linkage to testing	<p>VNF Requirements are current provided for RFP purposes, but the linkage to testing and validation of those requirments is not yet in place</p> <p>This release provides initial generic test plan descriptions for testing of VNFs based on the VNF Package. It does not provide test descriptions for design time or run time functional testing of VNFs.</p> <p>The testing linkage is also costrained by the scope of the VNF Information model in the VNF Package and the relationships identified between that information model and the VNF requirements.</p> <p>VNF Badging and certification programs are not yet in place, but enabling organizational arrangements e.g. LFN C&V committee are making these more viable.</p>
Hardware / infrastructure requirements	The Beijing release requirements had a placeholder (Chapter 6) for VNF requirements associated with the hardware execution environment. Additional requirements are expected in this area from the Multi-VIM project, and perhaps the PNF related features.
HEAT/TOSCA requirements	The Beijing release requirements has text on HEAT and TOSCA requirements but not all were numbered requirements text. This is expected to be improved as part of the Casablanca release work.

• Known Defects and Issues

Provide a link toward the list of all known project bugs.

Key	Summary	T	Created	Updated	Due	Assignee	Reporter	P	Status	Resolution
No issues found										

• Risks

List the risks identified for this release along with the plan to prevent the risk to occur (mitigation) and the plan of action in the case the risk would materialized (contingency).

Risk identified	Mitigation Plan	Contingency Plan
ONAP supporting multiple onboarding formats	work with VNF SDK, VVP and SDC to minimize the risk.	Document the desired direction in the forward looking VNF Guidelines
Inconsistency between published VNF Requirements and ONAP Platform	<ul style="list-style-type: none">Project reporting at M2 milestoneRaise bug reports	document discrepancy in release notes

• Resources

Fill out [the Resources Committed to the Release](#) centralized page.

• Release Milestone

The milestones are defined at the [Release Level](#) and all the supporting project agreed to comply with these dates.

Milestone	Deliverable	Date
M0	Intent to Participate	June 14, 2018
M1	Release Plan M1 Checklist	June 28, 2018
M2	M2 Checklist	July 26, 2018

M3	M3 Checklist	August 23, 2018
M4	M4 Checklist	September 20, 2018
RC0	RC0 Checklist	October 11, 2018
RC1	RC1 Checklist	October 25, 2018
RC2	RC2 Checklist	November 8, 2018
Signoff	Signoff Checklist	November 15, 2018

• Team Internal Milestone

This section is optional and may be used to document internal milestones within a project team or multiple project teams. For instance, in the case the team has made agreement with other team to deliver some artifacts on a certain date that are not in the release milestone, it is recommended to provide these agreements and dates in this section.

It is not expected to have a detailed project plan.

Date	Project	Deliverable
M1	VNFRQTS-236 - Getting issue details... <input type="button" value="STATUS"/>	Tool Chain
M4	VNFRQTS-239 - Getting issue details... <input type="button" value="STATUS"/>	Bug Fix
M2	VNFRQTS-240 - Getting issue details... <input type="button" value="STATUS"/>	Use Cases
M3	VNFRQTS-241 - Getting issue details... <input type="button" value="STATUS"/>	Test
M4	VNFRQTS-242 - Getting issue details... <input type="button" value="STATUS"/>	badging

• Documentation, Training

- The VNF Requirements is documentation built using the LF toolchain from .rst files into html. This toolchain is administered by the [documentation](#) project. The toolchain provides for syntax checks of the documentation within Sphinx, doc8 etc.
- The VNFRQTS Project publishes a [VNF Provider User Guide](#):
 - [VNF Guidelines](#)
 - Component lead - Wenyao Guan (China Mobile)
 - [VNF Requirements](#)
 - Component Lead - Hagop Bozawglanian (AT&T)
 - [VNF Provider Use Cases](#)
 - Component Lead - Scott Blandford (AT&T)
 - [VNF Test Descriptions](#)
 - Component Lead - Steven Wright (AT&T)
 - [Release Notes](#)

Other Information

• Vendor Neutral

If this project is coming from an existing proprietary codebase, ensure that all proprietary trademarks, logos, product names, etc. have been removed. All ONAP deliverables must comply with this rule and be agnostic of any proprietary symbols.

• Free and Open Source Software

FOSS activities are critical to the delivery of the whole ONAP initiative. The information may not be fully available at Release Planning, however to avoid late refactoring, it is critical to accomplish this task as early as possible.

List all third party Free and Open Source Software used within the release and provide License type (BSD, MIT, Apache, GNU GPL,...).

In the case non Apache License are found inform immediately the TSC and the Release Manager and document your reasoning on why you believe we can use a non Apache version 2 license.

Each project must edit its project table available at [Project FOSS](#).

Charter Compliance

The project team comply with the [ONAP Charter](#).