LFN OVP

(Compliance and Verification program for the NFV/SDN/VNF Ecosystem)

OPNFV Verified Program

LF NETWORKING

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Why Compliance and Verification?

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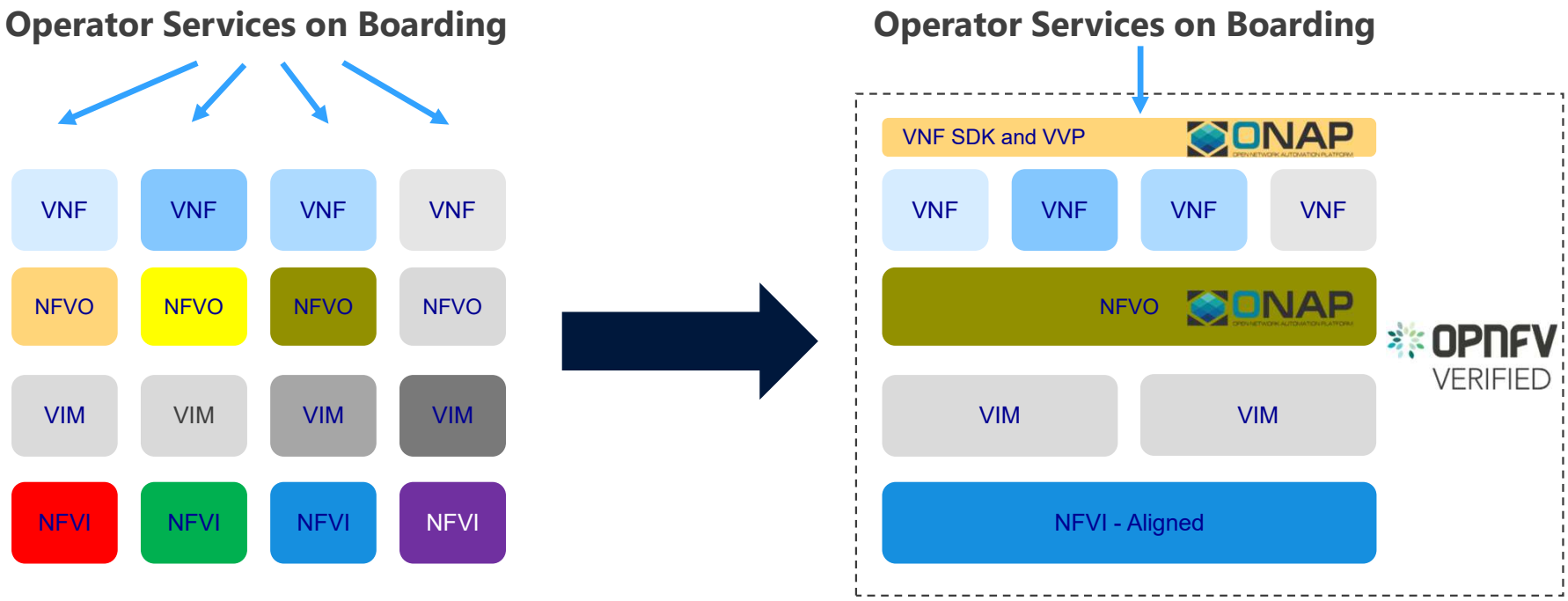
OVP: Compliance & Verification Program

Accelerating Deployment – Reduce Operator & Supplier Integration/Interop Testing Intervals By 50%



What is OVP?

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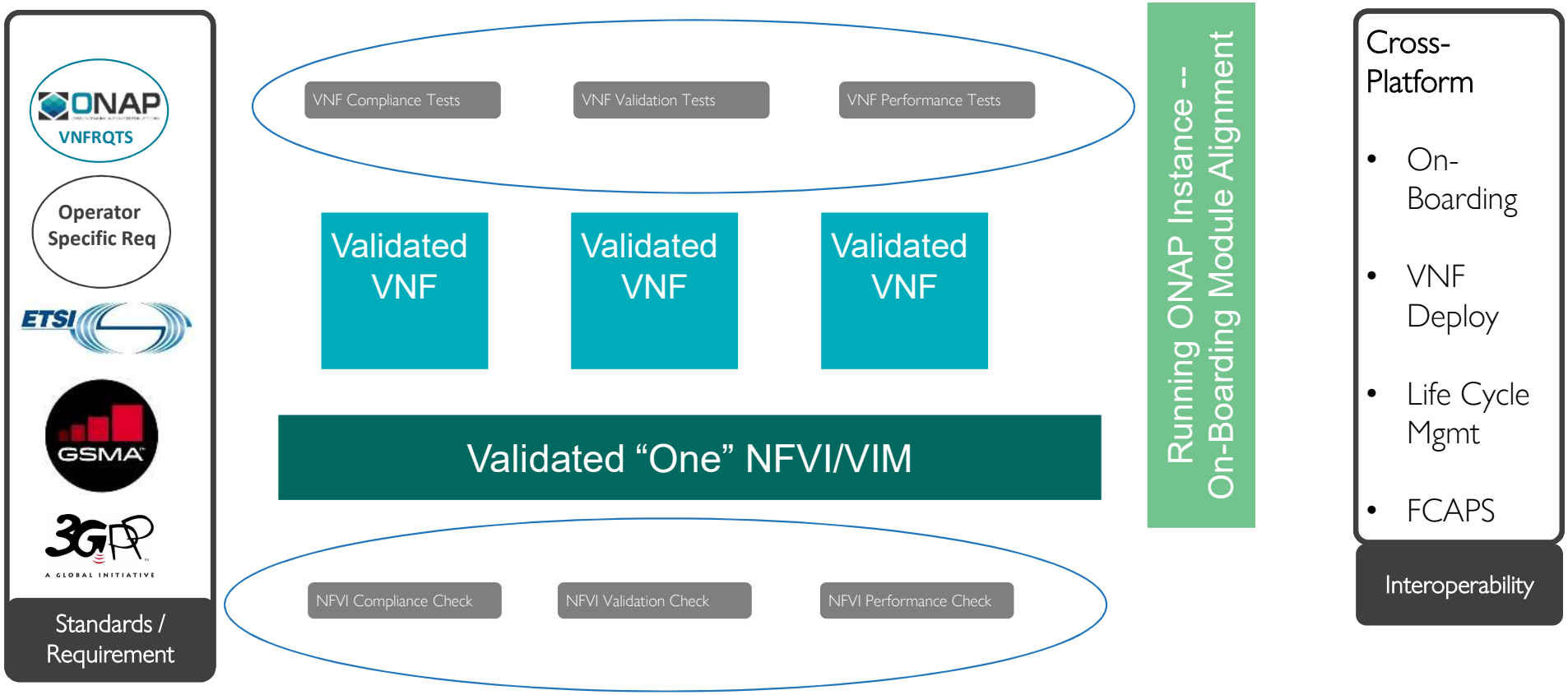
Vision – End to End Lifecycle System Validation



LFN CVC | The Overall Picture

VNFs

VNF Compliance Checks	VNF Validation Tests	VNF Performance Tests
Check against existing VNF standards such as: ➢ ONAP VNFRQTS ➢ ETSI NFV ➢ GSMA ➢ 3GPP ➢ Operator specific requirements.	Validation tests for VNF running against various profiles. (LCM, Health, etc) ➢ OpenStack ➢ VMWare ➢ Kubernetes ➢ etc	Performance tests for VNF running against a given Infrastructure profile ➢ Profile A ➢ Profile B ➢ Profile C

NFVI

NFVI Compliance Checks	NFVI Validation Tests	NFVI Performance Tests
Check against existing NFVI standards such as: ➢ ETSI NFV ➢ GSMA	Validation tests for VFVI ➢ OpenStack ➢ VMWare ➢ Kubernetes ➢ etc	Performance tests for NFVI against given Infrastructure profile ➢ Profile A ➢ Profile B ➢ Profile C

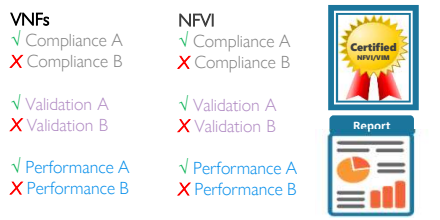
Testing/ Certification Tools

Tooling to allow test cases to run and results to be submitted to a repository.

Unified repository for both VNFs and NFVI.

CVC Process & Governance

Unified VNF/NFVI Certification Repository/Portal

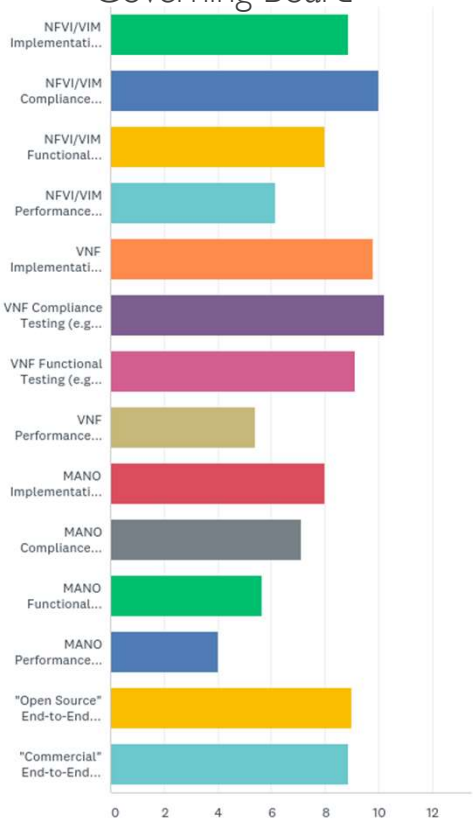


OVP Terminology

Term	Meaning
Compliance Testing	Testing a product against a set of requirements as outlined in a specification or standard (e.g., MUST, SHOULD, MUST NOT) statements
Verification Testing	Testing a product to validate it behaves as expected in real-life type conditions (e.g., testing failover for an NFVI/VIM or testing on-boarding and lifecycle management actions)
Performance Testing	Testing a product's performance in defined environments; Note that this will depend on specifics of operator environments, system tuning, etc.
System Under Test	The commercial product being tested; e.g., VNF, NFVI/VIM, etc.
Interoperability	Testing that implementations from different vendors work with each other and that the end-to-end system works as desired.

Survey Results – High Level Priorities (VNFs and NFVI)

Governing Board



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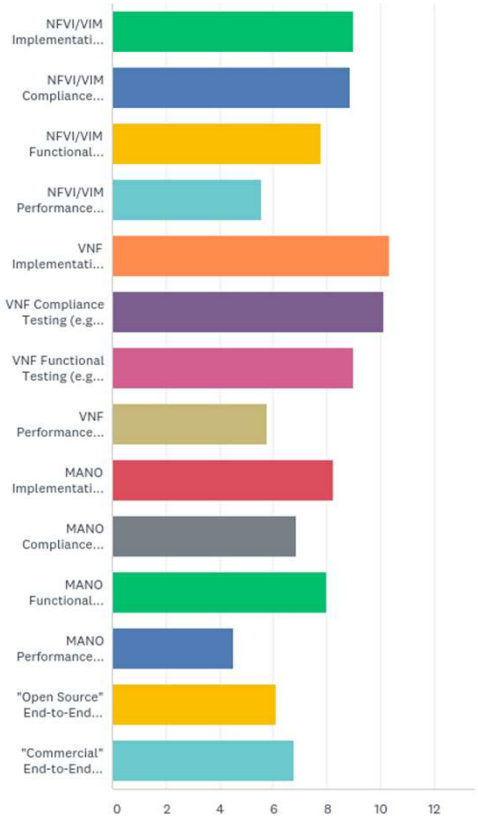
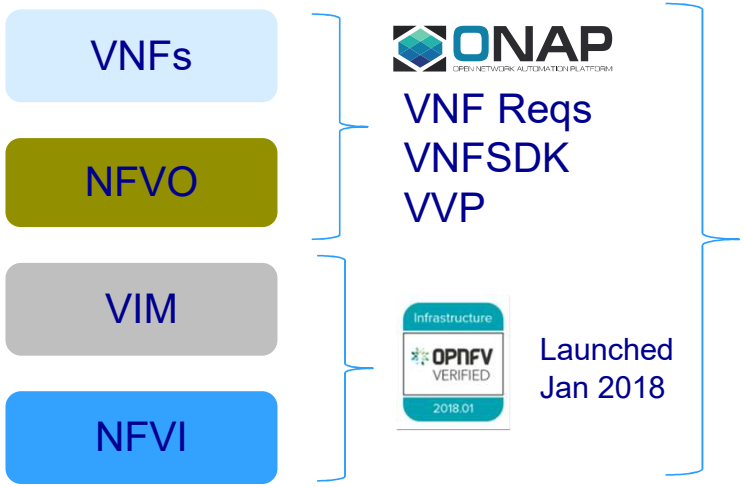


LFN OVP - Compliance and Verification Summary

Current Scope

- Demonstrate the readiness and availability of commercial products
- Validate full life cycle of IaaS and VNF components
- Address real world deployment challenges
- Improve quality and speed of NFV deployments
- Enable self testing and lab testing with strong governance

LF Networking Compliance and Verification



Single OVP Program

- Functional Testing
- VNF Packaging
- Life-cycle Management
- Interoperability
- Other functional Areas

Certification of VNFs through NFVI – participation >70% End users + ALL Networking Vendors

OVP – Compliance Testing Done the Open Source Way

- OVP is the premier, best-in-class, best practices platform/community for compliance and validation of *network functions* and requisite "systems"
- OVP unifies testing across multiple open source communities and SDOs
- OVP test tooling is developed in the open using open source best practices
- OVP tooling is available to all to incorporate into product development, vendor qualification labs
- The entire ecosystem – End Users, Vendors, System Integrators – are encouraged to contribute requirements and test cases
- OVP operates in a transparent fashion on the governance of the CVC and the Governing Board

Initial VNF Compliance Program

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OVP, The Final Frontier – Compliance & Verification

News

- An Open Source, Community-led compliance and verification program for the NFV and VNF ecosystem
- Builds on OVP tooling & ONAP VNF onboarding programs

OPNFV VERIFIED

LF Networking expands OVP program for compliance & verification, eases Telco Interoperability & Deployment Challenges

Backed by leading global carriers, open standards and open source organizations

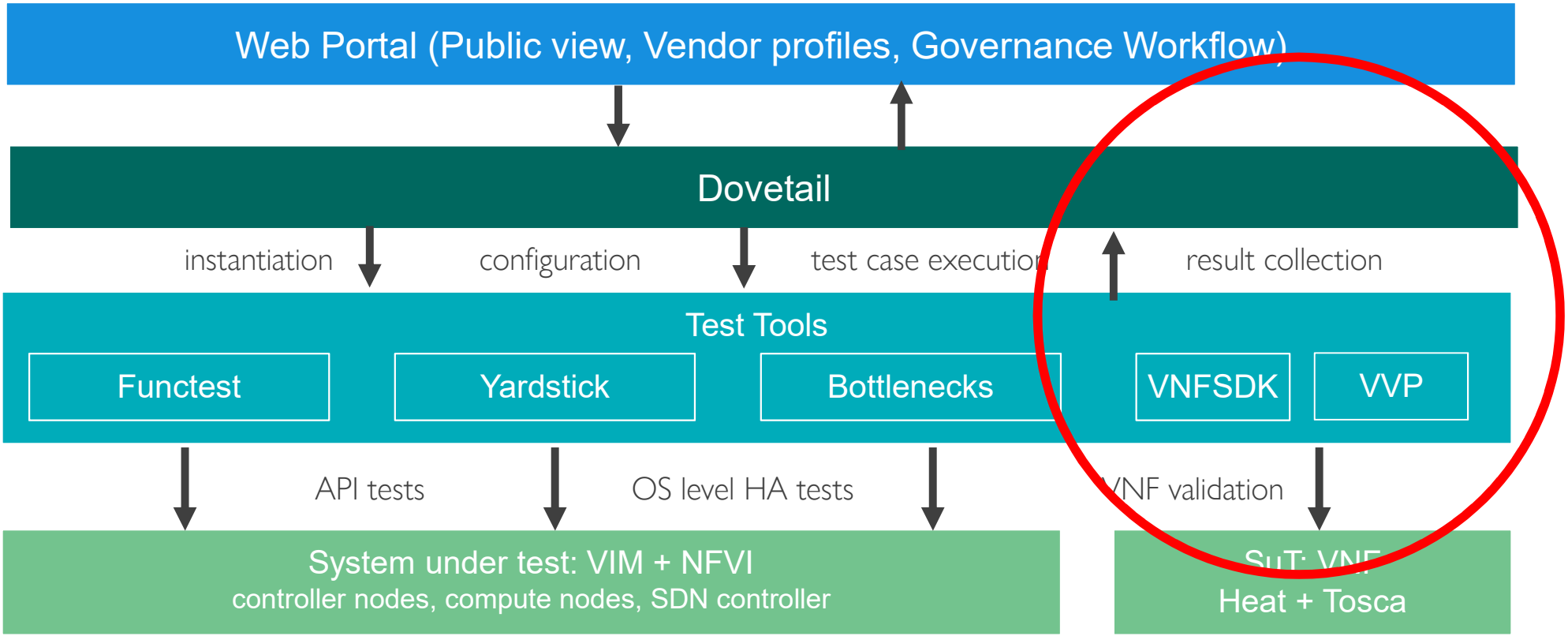
SAN JOSE, Calif. — Open Networking Summit North America — April 3, 2019 — LF Networking (LFN), which facilitates collaboration and operational excellence across networking projects, today announced expansion of its OPNFV Verification Program (OVP) to include Virtual Network Function (VNF) compliance testing. The expanded OVP, created in conjunction with the ONAP...


Infrastructure
OPNFV
VERIFIED
2018.09


VNF
OPNFV
VERIFIED
2019.04


Lab
OPNFV
VERIFIED
2019

OVP Toolchain

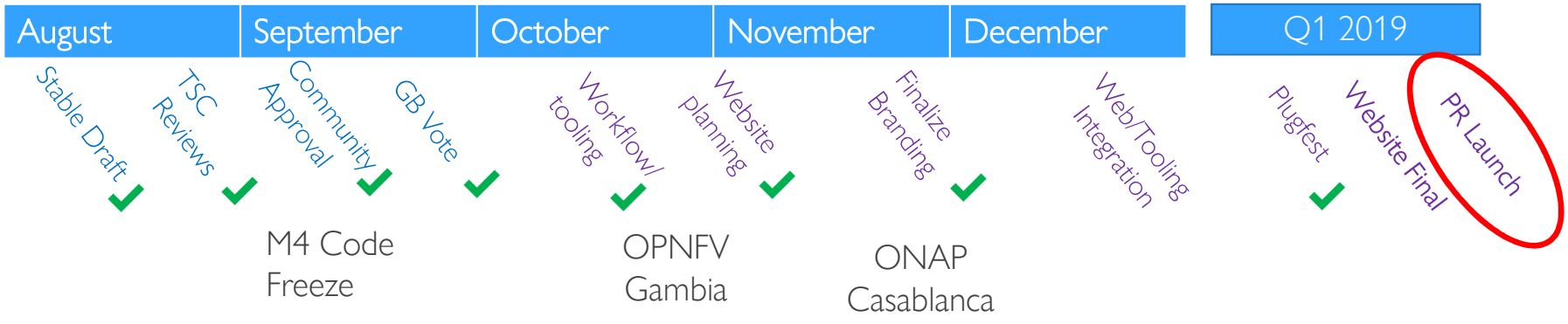


Verified Lab Program

- Work with third party labs that have passed the rigorous badging program to indicate expertise in open source software and LFN projects in particular
- Lab requirements include CI/CD knowledge, community participation and commitment, ability to run the test tool suite
- Working with a Verified Lab can improve troubleshooting capabilities and accelerate a company's ability to pass compliance testing.

Updated March 18

OVP 2018 – a look back



Program Definition

- Approve Program Governance
- Finalize 3rd Party Lab Governance
- ONAP Test Case Development
- VNFSDK Refactoring Work
- Start documentation work

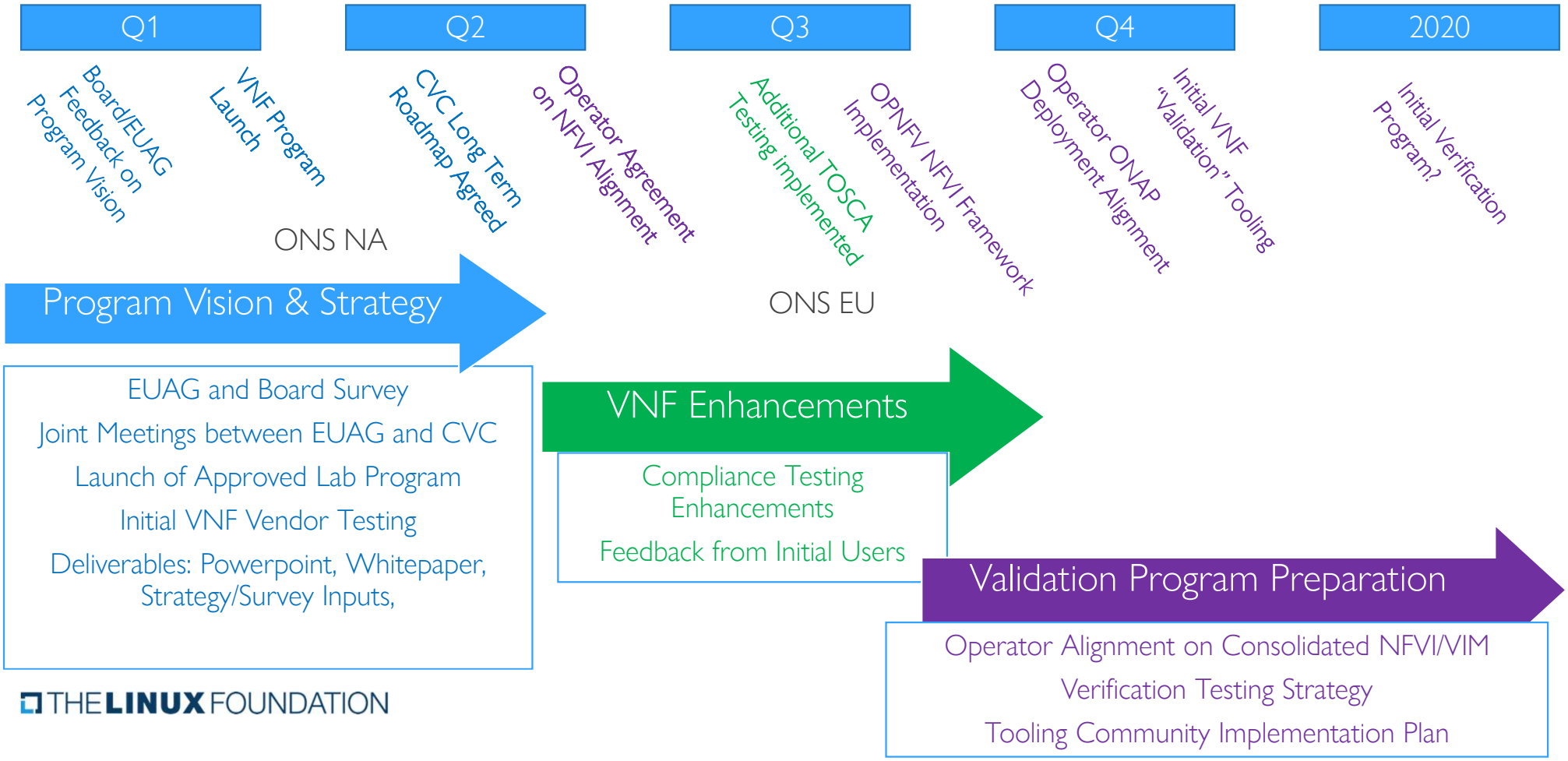
Technical Enhancements

- Beta testing ONAP VNFs
- Dovetail Integration

Go to Market

- Vendor Outreach/Initial cohort recruitment
- (Re)branding and website
- Finalize Terms & Conditions

2019: Possible Journey Ahead



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Key Benefits to Service Providers

Accelerate time to deployment for new network services

Improve interoperability and software quality

Reduce in-house testing effort and reduce costs

Key Benefits to Vendors

Improve time to revenue for new product offerings

Achieve greater alignment with service provider customer requirements

Demonstrate product quality through open ecosystem testing