

Update on L2/L3/common VPN YANG Modules

[draft-ietf-opsawg-vpn-common](#)

[draft-ietf-opsawg-l3sm-l3nm](#)

[draft-ietf-opsawg-l2nm](#)

S. Barguil, O. Gonzalez de Dios , (Telefonica)
Q. Wu (Huawei), M. Boucadair (Orange), A. Aguado
(Nokia), V. Lopez, L. Oliva (Telefonica), D. Voyer (Bell
Canada), L. Munoz, M. Julian (Vodafone)
L. Jalil (Verizon), Italo Busi (Huawei), J. Ma (China
Unicom), Erez Segev (ECI Telecom)

OPSAWG meeting

12th March 2020, virtual IETF 109

<https://github.com/IETF-OPSAWG-WG/l3nm>

(all three drafts in the same git)

draft-ietf-opsawg-vpn-common

- Main Changes since IETF#109
 - Addressed the yangdoctors review
 - Good review
 - Fixed some issues such as avoid enumeration typedefs when it makes sense, add some descriptions, canonical order
 - Enhance the readability of the module
 - Added annotations
 - Reordered some data notes for better clarity
 - Added more protocols that are used as underlay transport to accommodate LxNM deployment scenarios such as in DCs
 - Add more text to present the data nodes
- Next Step
 - No pending issues
 - Ready to go for the WGLC

draft-ietf-opsawg-l3sm-l3nm: Changes (1/2)

- Editorial updates:
 - Acronyms added
 - Reviewed architecture section to align and show relation with latest RFCs/drafts
 - ietf-teas-enhanced-vpn, ietf-teas-ietf-network-slice-definition, ACTN
 - Trees in the draft text updated
 - Explanations for every branch/leaf added for a better understanding of the model
 - Explanation on how to manage loopback interfaces at vpn-network-access level to the VPN (issue #221)
- Appendix updates:
 - Added Examples with IPv6 addresses. (issue #188)

draft-ietf-opsawg-l3sm-l3nm: Changes (2/2)

- Modeling updates:
 - Additional static routes attributes (issue #191)
 - External-connectivity included (issue #189)
 - Order of the leafs in the module updated for better readability (issue #187)
 - Support for PIM (issue #217) and IGMP (issue #215) at both vpn-node level and vpn-network access (CE-PE) level to support Multicast L3 VPN use cases
 - PE-CE security update (issue #192) added key-chain.
 - Add useful fields from CSMs to NSMs (Issue #209)
 - The model allows to point to the Customer Service Model.
 - Maximum Routes (Prefixes) Generalization (issue #213)

draft-ietf-opsawg-l3sm-l3nm: Status and next steps

- No pending issues so far
- Ready for the WGLC
- Complementary work in TEAS for TE Service Mapping
 - Associate Traffic Engineering paths (SR or RSVP-TE or VN) to the LxVPN service. Use of templates. Follow TEAS for the discussions!!

draft-ietf-opsawg-l2nm: Status and Open issues (1/2)

- We have received the Routing Directorate review.
 - The issues are solved as part of the VPN-Common model Update.
- The list of open Issues are the following:
 - Issue #205: Diffserv Model Type
 - Issue #204 EVPN Flavors
 - Issue #203 Bridge domain Id Definition
 - Issue #202 Split Horizon Support
 - Issue #201 IP Fast Re-Route support

draft-ietf-opsawg-l2nm: Status and Open issues (2/2)

- The set of issues closed during the latest months are:
 - EVPN issues:
 - Issue [#25](#) EVPN: Missing validation for dot1q
 - Issue [#23](#) EVPN: t-ldp with static label
 - Issue [#22](#) EVPN: Add support for dot1q push/pop/translate options
 - Issue [#21](#) EVPN: ESI missing for multi-homed evpn-vpws
 - Issue [#20](#) EVPN: Control-word missing
 - Issue [#19](#) EVPN: Vpws-evpn IDs missing
 - Issue [#5](#) how precedence-type is different from access-priority under availability question
 - Add examples (issue [#11](#)) and section on Sample Uses of the L2NM Data Model
 - Issue [#26](#) Node list: Limit elements for Point-to-point services

draft-ietf-opsawg-l2nm: Next Steps

- The closed issues will be included in the next draft release
- Review the EVPN support by IETF experts
- Solve all open issues in github
- Reviews and comments are welcome