

# IETF 117 MPLS WG Status Update

IETF 117 (San Francisco & Online) – July 2023

## **WG Chairs:**

Tarek Saad

Loa Andersson

Nic Leymann

## **Secretary :**

Mach Chen

**This session is being recorded**

# Note Well

This is a reminder of IETF policies in effect on various topics such as patents or code of conduct. It is only meant to point you in the right direction. Exceptions may apply. The IETF's patent policy and the definition of an IETF "contribution" and "participation" are set forth in BCP 79; please read it carefully.

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Definitive information is in the documents listed below and other IETF BCPs. For advice, please talk to WG chairs or ADs:

- [BCP 9](#) (Internet Standards Process)
- [BCP 25](#) (Working Group processes)
- [BCP 25](#) (Anti-Harassment Procedures)
- [BCP 54](#) (Code of Conduct)
- [BCP 78](#) (Copyright)
- [BCP 79](#) (Patents, Participation)
- <https://www.ietf.org/privacy-policy/>(Privacy Policy)



# Administrative

- **Blue Sheet**
  - Blue sheets will be automatically generated when you login into the Meetecho
- **Zulip:**
  - <https://zulip.ietf.org/#narrow/stream/117-mpls>
- **Minutes Taking:**
  - <https://codimd.ietf.org/notes-ietf-117-mpls>
- **MPLS Session Agenda at:**
  - <https://datatracker.ietf.org/doc/agenda-117-mpls>
- **Materials/Slides at:**
  - <https://datatracker.ietf.org/meeting/117/session/mpls>
- **Datatracker:**
  - <http://datatracker.ietf.org/wg/mpls>
- **MPLS WG Wiki:**
  - <https://wiki.ietf.org/group/mpls>
- **MPLS WG Github:**
  - <https://github.com/ietf-wg-mpls/drafts>

# Agenda Bashing (1/2)

- 1. WG Status Update (Agenda Bashing) - 13:00**
  - Duration: 15 mins
  - Presenter: WG Chairs
- 2. MNA Status - 13:15**
  - Duration: 15 mins
  - Presenter: Tarek Saad
- 3. IANA Registry for the First Nibble Following a Label Stack - 13:30**
  - ID: <https://datatracker.ietf.org/doc/draft-ietf-mpls-1stnibble>
  - Duration: 10 mins
  - Presenter: Greg Mirsky
- 4. LSP Ping/Traceroute for Enabled In-situ OAM Capabilities - 13:40**
  - ID: <https://datatracker.ietf.org/doc/draft-xiao-mpls-lsp-ping-ioam-conf-state-01>
  - Duration: 10 mins
  - Presenter: Xiao Min

# Agenda Bashing (2/2)

## 5. **The Case for PSD - 13:50**

- Duration: 40mins
- Presenter: Stewart Bryant

# WG Status (Errata, 1/4)

[Technical Errata Reported][7521], reported by: Mohamed Boucadair  
RFC6215, Section: 1.1

## ✓ Original Text

The Transport Service Interfaces for MPLS-TP are defined in Section 3.4.3 of [RFC5921]. These definitions are illustrated by showing MPLS-TP Provider Edges (PEs) containing a UNI and an NNI. The figures illustrate the UNI and the NNI as a span. However, it is convention to illustrate these interfaces as reference points. Furthermore, in the case of a UNI, it is useful to illustrate the distribution of UNI functions between the Customer Edge (CE) side and the PE side of the UNI, i.e., the UNI-C (**User-to-User Interface**, Client side) and UNI-N (User-to-Network Interface, Network side), in order to show their relationship to one another.

## ✓ Corrected Text

The Transport Service Interfaces for MPLS-TP are defined in Section 3.4.3 of [RFC5921]. These definitions are illustrated by showing MPLS-TP Provider Edges (PEs) containing a UNI and an NNI. The figures illustrate the UNI and the NNI as a span. However, it is convention to illustrate these interfaces as reference points. Furthermore, in the case of a UNI, it is useful to illustrate the distribution of UNI functions between the Customer Edge (CE) side and the PE side of the UNI, i.e., the UNI-C (**User-to-Network Interface**, Client side) and UNI-N (User-to-Network Interface, Network side), in order to show their relationship to one another.

**Notes** □ As listed in Section 1.2., UNI stands for "User-to-Network Interface", not "User-to-User Interface".

# WG Status (Errata, 2/4)

[Technical Errata Reported][6754], reported by: Bert Van Ael

RFC6215, Section: 3.2.1

✓ Original Text

PE1 also has this **Inter-AS** I-PMSI A-D route.

✓ Corrected Text

PE1 also has this **Intra-AS** I-PMSI A-D route.

Notes □ "PE1 also has this route" refers to "Although ASBR1 does not have a route to PE2, it does have a BGP Intra-AS Inclusive PMSI (I-PMSI) auto-discovery (A-D) route". Intra-AS mechanisms are used for auto-discovery/binding for Non-Segmented Inter-AS Tunnels.

# WG Status (Errata, 3/4)

[Technical Errata Reported][7059], reported by: Jan Lindblad  
RFC8960, Section: 2.5

✓ Original Text

```
augment "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route/"
  + "rt:next-hop/rt:next-hop-options/rt:simple-next-hop" {
  description
    "Augments the 'simple-next-hop' case in IP unicast routes.";
  uses nhlfe-single-contents {
    when "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route"
      + "/mpls:mpls-enabled = 'true'";
  }
}
```

**Notes** □ The original YANG statements make the "uses" statement apply to all rt:rib and all rt:route instances as soon as there is at least one instance that has mpls:mpls-enabled set to true. I suspect this is not the author's intent.

The corrected YANG statements make the "uses" statement only apply to the specific route instances that have mpls:mpls-enabled set to true. There are also other ways to fix this issue.

✓ Corrected Text

```
augment "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route/"
  + "rt:next-hop/rt:next-hop-options/rt:simple-next-hop" {
  description
    "Augments the 'simple-next-hop' case in IP unicast routes.";
  uses nhlfe-single-contents {
    when "../../../mpls:mpls-enabled = 'true'";
  }
}
```

# WG Status (Errata, 4/4)

[Technical Errata Reported][7060], reported by: Jan Lindblad  
RFC8960, Section: 2.5

✓ Original Text

```
augment "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route/"
+ "rt:next-hop/rt:next-hop-options/rt:next-hop-list"
+ "rt:next-hop-list/rt:next-hop" {
description
"This leaf augments the 'next-hop-list' case of IP unicast
routes.";
uses nhlfe-multiple-contents {
when "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route"
+ "/mpls:mpls-enabled = 'true'";
}
}
```

✓ Corrected Text

```
augment "/rt:routing/rt:ribs/rt:rib/rt:routes/rt:route/"
+ "rt:next-hop/rt:next-hop-options/rt:next-hop-list"
+ "rt:next-hop-list/rt:next-hop" {
description
"This leaf augments the 'next-hop-list' case of IP unicast
routes.";
uses nhlfe-multiple-contents {
when "../././././././impls:mpls-enabled = 'true'";
}
}
```

**Notes** □ The original YANG statements make the "uses" statement apply to all rt:rib and all rt:route instances as soon as there is at least one instance that has mpls:mpls-enabled set to true. I suspect this is not the author's intent. The corrected YANG statements make the "uses" statement only apply to the specific route instances that have mpls:mpls-enabled set to true. There are also other ways to fix this issue.

# WG Status (Liaisons)

- **Liaisons** (since last meeting) – from MPLS:
  - **None.**
- **Liaisons** (since last meeting) – **to MPLS**:
  - **None**

# Document Status

## (Since IETF116)

- **\*\*\* New RFCs**
  - None
- **\*\*\* Docs in RFC Ed**
  - draft-ietf-mpls-rfc6374-sfl-10 (MISSREF) *Waiting on I-D.draft-ietf-mpls-sfl-control*
- **\*\*\* Docs in IESG**
  - draft-ietf-mpls-sfl-control-03 (*AD Evaluation*)
  - draft-ietf-mpls-ri-rsvp-frr-15 (*AD is watching – Nic/Shepherd is working on new publication request*)
- **\*\*\* New WG Docs**
  - None



# Document Status

## (Since IETF116)

- **\*\*\* Updated WG Docs**
  - [draft-ietf-mpls-1stnibble-02](#)
  - draft-ietf-mpls-bfd-directed-24 (*Author report: Stable, waiting for Shepherd Write-Up*)
  - draft-ietf-mpls-egress-tlv-for-nil-fec-07 (*Status: WGLC requested, in rtgdir early review*)
  - draft-ietf-mpls-p2mp-bfd-05 (*Author report: Stable, waiting on RTG-DIR early review. Shepherd will reach out to Greg Mirsky to review*)
  - draft-ietf-mpls-inband-pm-encapsulation-06 (*Author report: potential MNA usecase. Chairs may ask authors to present in upcoming MNA open call interim*)
  - draft-ietf-mpls-mpls-msd-yang-01 (*Author report: Stable, the authors plan to do an update after 117 and then request YANG doctor review and WGLC*)
  - draft-ietf-mpls-spring-inter-domain-oam-06 (*Status: document is ready for WGLC, Rtgdir early review finished*)

# Document Status

## (Since IETF116)

- **\*\*\* Alive WG Docs without Update**

- draft-ietf-mpls-mna-hdr-02
- draft-ietf-mpls-mna-requirements-04 (*in RTG-DIR early review, addressing comments*)
- draft-ietf-mpls-mna-usecases-02 (*Shepherd will be sending a mail to the list*)
- draft-ietf-mpls-lspping-norao-01 (*Author report: Stable, Ready for WGLC*)
- draft-ietf-mpls-mna-fwk-03
- draft-ietf-mpls-rfc6374-sr-07 (*Author report: authors requested WGLC*)
- draft-ietf-mpls-sr-epe-oam-08 (*Status: WGLC ended, waiting for Shepherd Write-Up* □)

- **\*\*\* Soon to Expire**

- draft-ietf-mpls-mldp-multi-topology-02 (*Author report: will refresh and address Shepherd's comments*)



# Document Status

## (Since IETF116)

- **\*\*\* New Individual Docs**
  - draft-li-mpls-mna-nrp-selector-00



# Document Status

## (Since IETF116)

- **Alive Individual Docs**

- draft-mirsky-mpls-bfd-bootstrap-clarify-04
- draft-gao-mpls-teas-rsvpte-state-update-06
- draft-song-mpls-sr-eh-01
- draft-li-mpls-mna-entropy-01
- [draft-xiao-mpls-lsp-ping-ioam-conf-state-01](#)
- draft-song-mpls-extension-header-12
- draft-mb-mpls-ioam-dex-04
- draft-mirsky-mpls-stamp-05
- draft-cx-mpls-mna-inband-pm-01
- draft-liu-mpls-lsp-ping-nrp-01
- draft-jags-mpls-ps-mna-hdr-00
- draft-song-mpls-flag-based-opt-01
- draft-xp-mpls-spring-lsp-ping-path-sid-06
- draft-nainar-mpls-lsp-ping-yang-04
- draft-gandhi-mpls-stamp-pw-03

