MPLS Working Group

MPLS Sessions:

Tuesday, November 6, 13:50-15:50 (+07) Afternoon session I

Wednesday November 7, 11:20-12:20 (+07) Morning session II

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.

As a reminder:

- By participating in the IETF, you agree to follow IETF processes and policies.
- If you are aware that any IETF contribution is covered by patents or patent applications that are owned or controlled by you or your sponsor, you must disclose that fact, or not participate in the discussion.
- As a participant in or attendee to any IETF activity you acknowledge that written, audio, video, and photographic records of meetings may be made public.
- Personal information that you provide to IETF will be handled in accordance with the IETF Privacy Statement.
- As a participant or attendee, you agree to work respectfully with other participants; please contact the ombudsteam (https://www.ietf.org/contact/ombudsteam/) if you have questions or concerns about this.

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)

I E T F

Administrative

- Audio Streaming/Recording
  - Please speak only using the microphones
  - Please state your name before speaking

- Data tracker: http://datatracker.ietf.org/wg/mpls/

- Minute takers & Etherpad
  - http://tools.ietf.org/wg/mpls/minutes

- Meet Echo:
  - http://ietf101.conf.meetecho.com/

- Online Agenda and Slides at:
  - https://datatracker.ietf.org/meeting/103/materials/

Agenda Bashing – Admin

- Agenda (https://datatracker.ietf.org/meeting/103/agenda/mpls):

No.	I-D	Version	Presenter	
Tuesday, November 6, 13:50-15:50 (+07) Afternoon session I				
1	Agenda bashing, WG status reports	-	Chairs	
2	draft-abd-mpls-ldp-identifier-name	0	Anil Kumar S N (remote)	
3	draft-ietf-mpls-ldp-yang	5	Kamran (remote)	
4	draft-ietf-mpls-mldp-yang	5	Kamran (remote)	
5	Update on MPLS LSP Static and MPLS Base YANG drafts	-	Tarek Saad	
6	draft-arora-mpls-spring-ttl-procedures-srte-paths	0	Shraddha Hegde	
7	draft-hegde-mpls-spring-epe-oam	0	Shraddha Hegde	
Wednesday November 7, 11:20-12:20 (+07) Morning session II				
1	Agenda bashing, WG status reports	-	Chairs	
2	draft-mirsky-mpls-oam-mpls-sr-ip	1	Greg Mirsky	
3	draft-nainar-mpls-spring-lsp-ping-sids	0	Zafar Ali	
4	draft-xie-mpls-ldp-bier-extension draft-xie-mpls-rsvp-bier-extension	1	Jingrong Xie	
5	MPLS RMR drafts (cross WG coordination)	-	Kireeti Kompella	

Agenda Bashing - Admin

- Fill in the Blue Sheets, and it pass on.

- Return to WG Chairs

WG Status (Errata)

RFC Number (Errata ID)	Section	Type	Source of RFC	Submitted By	Date Submitted
RFC4928 (5396)	Section 2	Technical	mpls (rtg)	Jitendra Kumar Sharma	2018-06-18

Reported By: Jitendra Kumar Sharma
Date Reported: 2018-06-18

Section Section 2 says:
A less obvious case is when the packets of a given flow happen to have constant values in the fields upon which IP ECMP would be performed. For example, if an Ethernet frame immediately follows the label and the LSR does ECMP on IPv4, but does not do ECMP on IPv6,then either the first nibble will be 0x4, or it will be something else. If the nibble is not 0x4 then no IP ECMP is performed, but Label ECMP may be performed. If it is 0x4, then the constant values of the MAC addresses overlay the fields that would have been occupied by the source and destination addresses of an IP header. In this case, the input to the ECMP algorithm would be a constant value and thus the algorithm would always return the same result.
It should say: <This paragraph should be removed>

Notes:
The example stated here seems incorrect. It talks about an L2VPN case where Ethernet frame starts immediately after the last label in the stack. But had it been an IP packet instead, the same initial 12 bytes, which is the place for MAC addresses in an Ethernet Frame, would not be the place of IP addresses, as IP addresses are placed at the end of 20-byte IP header (not start). Hence it would still be subjected to ECMP if precautions (as recommended in this RFC) are not been followed.

WG Status (Liaisons)

- **Liaisons** (since last meeting) – **to/from MPLS**:

  None.

Document Status
Since IETF102

*** New RFCs

- *None*

*** Docs in IESG

- *draft-ietf-mpls-egress-protection-framework*
- *draft-ietf-mpls-lsp-ping-lag-multipath*
- *draft-ietf-mpls-spring-entropy-label*
- draft-ietf-mpls-rsvp-shared-labels

*** New WG Docs

- **draft-ietf-mpls-ldp-rmr-extensions**
- **draft-ietf-mpls-sr-over-ip**
- draft-ietf-mpls-sfc-encapsulation

Document Status
Since IETF102

*** Updated WG Docs

- **draft-ietf-mpls-base-yang**
- draft-ietf-mpls-ri-rsvp-frr – *Waiting on Write-Up*
- draft-ietf-mpls-bfd-directed
- **draft-ietf-mpls-ldp-yang**
- draft-ietf-mpls-mldp-mib
- **draft-ietf-mpls-mldp-yang**
- **draft-ietf-mpls-rmr**
- draft-ietf-mpls-sfc
- draft-ietf-mpls-sr-over-ip
- **draft-ietf-mpls-static-yang**
- draft-ietf-mpls-summary-frr-rsvpte

*** Existing WG Docs

- draft-ietf-mpls-rfc6374-sfl
- draft-ietf-mpls-sfl-framework

Document Status
Since IETF102

*** New Individual Docs

- **draft-abd-mpls-ldp-identifier-name**

- **draft-arora-mpls-spring-ttl-procedures-srte-paths**

- **draft-hegde-mpls-spring-epe-oam**

- **draft-mirsky-mpls-oam-mpls-sr-ip**

- **draft-nainar-mpls-spring-lsp-ping-sids**

Document Status
Since IETF102

*** Updated Individual Docs

- **draft-esale-mpls-ldp-rmr-extensions**

- draft-mirsky-mpls-oam-mpls-sr-ip

- draft-mirsky-mpls-p2mp-bfd

- draft-nslag-mpls-deprecate-md5

- draft-song-mpls-extension-header

- **draft-xie-mpls-ldp-bier-extension**

- **draft-xie-mpls-rsvp-bier-extension**

- draft-xu-mpls-payload-protocol-identifier

- draft-xu-mpls-sr-over-ip

- draft-zheng-mpls-lsp-ping-yang-cfg

Document Status
Since IETF102

*** Existing Individual Docs

- draft-chandra-mpls-rsvp-shared-labels-np

- draft-nainar-mpls-rfc8287-errata

- draft-zzhang-mpls-rmr-multicast

- draft-zzhang-mpls-rmr-rsvp-p2mp

Progress Report Update(s)
I-D: <**draft-ietf-mpls-summary-frr-rsvpte**>

- Current status: (revision -02)
  - *Refreshed draft for impending expiry*

- *Next steps:*
  - *Document is stable and asking for WGLC*

Missing status progress report

The following WG drafts are missing status report:

- draft-ietf-mpls-bfd-directed – *Issues being sorted out*
- draft-ietf-mpls-mldp-mib – *Expires soon*
- draft-ietf-mpls-sfc – *In WGLC*
- draft-ietf-mpls-rfc6374-sfl – *No status update*
- draft-ietf-mpls-sfl-framework – *No status update*

RFC Editors Style Guide

- **RFC 7322: "RFC Style Guide"**
  - This is the law for ID and RFC Authors
  - As all law it is sometimes open for negotiations
- Some fix points
  - RFC Structure
    - Go read the style guide
    - Try not be to inventive
  - Abstract
    - a maximum of 20 lines
    - enough information to be understandable

RFC Editors Style Guide

- Abbreviations List

- https://www.rfc-editor.org/materials/abbrev.expansion.txt

- Two type of entries with and without an asterisk (*)

  - MPLS*, means it does **not need to be expanded**

  - LSP, means that I **has to be expanded** first time it is used in a document

  - don't make assumptions, go check as soon as you use an abbreviation

  - Note that there are duplicates

  - We added "SID", that is now listed with four different expansions

Two abbreviations

- WGLC, Working Group Last Call
- WGAP, Working Group Adoption Poll
- In no way local to the MPLS wg, but we are more and more frequently using them.

WGLC and WGAP

(Working Group Last Call and Working Group Adoption Poll)

- Does co-authors and contributors need to respond
  - No, the wg-chairs know what the authors/contributors opinion of a draft in wglc and wgap is.
- May a co-author and contributor respond
  - Yes, certainly! Though it does not change much.
  - One reason for a co-author to respond may be that he/she thinks the "traffic" on the mailing list is too low, and the response mail may be a of reminding the wg that WGLC or WGAP is going on.
  - **A better is probably to ask people with an interest in the area to review and respond.**

IPR Polls

- Done in preparation for WGAP and WGLC.

- Authors and contributors need to respond

- An entry in the Acknowledgement section saying:
  "The authors want to thank Mrs X who contributed valuable text."
  Will cause me to ask her to respond to the IPR poll

- IPR polls does not conclude until all people who are supposed to respond has done so.

- What happens if someone does not respond?

- OK – there is an escape clause, but since we started doing IPR polls we have not needed to use it.

- If your company has an IPR disclosure against an individual document, it is a good idea to trigger an update when it becomes a wg document. Very helpful, but not required.

Preliminary and Final Agenda

- We have dates when the wg chairs are supposed to upload a "Preliminary" and "Final" agenda.
- This is done on a best effort basis.
- The preliminary agenda is an approximation, often just a list of the slots requested.
- The preliminary agenda and does not guarantee that there will be a slot for everything listed.
- The final agenda is the best estimate that the chairs have what we will work on at the f2f meeting
- There might be updates to the final agenda, but the should be minimal.
- Also we do "Agenda Bashing", the f2f meeting can change things on the agenda.

Sleeping Beauties

- draft-alvarez-mpls-ldp-color-lsp
- draft-ama-mpls-fm-rdi
- draft-balaji-mpls-csc-te-lsp-splice
- draft-balaji-mpls-lawful-intercept-thru-label-dis
- draft-balaji-mpls-li-thru-label-dis-snmp
- draft-beeram-mpls-rsvp-te-scaling
- draft-bryant-mpls-rfc6374-over-udp
- draft-bryant-mpls-sfl-control
- draft-bryant-mpls-synonymous-flow-labels
- draft-bryant-mpls-unified-ip-sr
- draft-cheng-mpls-tp-pwe3-dual-homed-protection
- draft-chen-mpls-ldp-yang-cfg
- draft-chenpeng-mpls-ldp-ext
- draft-dai-mpls-rsvp-te-mbb-label-reuse
- draft-esale-mpls-ldp-node-frr
- draft-fang-mpls-hsdn-for-hsdc
- draft-fang-mpls-label-forwarding-no-swap
- draft-farrelll-mpls-opportunistic-encrypt
- draft-fuxh-mpls-delay-loss-rsvp-te-ext
- draft-fuxh-mpls-delay-loss-te-framework
- draft-fuxh-mpls-delay-loss-te-framework
- draft-fuxh-mpls-delay-loss-te-problem-statement
- draft-gandhi-mpls-te-yang-model

- draft-hmk-mpls-tp-p2mp-oam-framework
- draft-iwijnand-mpls-mldp-multi-topology
- draft-jacob-mpls-ethldp
- draft-jacquenet-mpls-rd-p2mp-te-requirements
- draft-keten-mpls-expbit
- draft-kini-mpls-entropy-label-src-stacked-tunnels
- draft-kini-spring-mpls-lsp-ping
- draft-kompella-mpls-larp
- draft-kompella-mpls-rsvp-ecmp
- draft-kumarkini-mpls-spring-lsp-ping
- draft-li-mpls-global-label-framework
- draft-li-mpls-global-label-usecases

Sleeping Beauties -II

- draft-li-mpls-label-stack-distribution
- draft-li-mpls-ldp-mt-mib
- draft-li-mpls-p2mp-te-alt-path
- draft-li-mpls-path-programming
- draft-li-mpls-proxy-te-lsp
- draft-li-mpls-seamless-mpls-mbb
- draft-liu-mpls-tp-interconnected-ring-protection
- draft-liu-mpls-tp-p2mp-linear-protection
- draft-lzj-mpls-receiver-driven-multicast-rsvp-te
- draft-lzl-mpls-ucase-n-20bit-label-limitation
- draft-lzj-mpls-receiver-driven-multicast-rsvp-te

- draft-lzl-mpls-ucase-n-20bit-label-limitation
- draft-lzl-mpls-ucase-n-20bit-label-limitation
- draft-manral-mpls-rfc3811bis
- draft-mda-mpls-tp-p2mp-oam-framework
- draft-mpls-big-label-ucase-req
- draft-mpls-big-label-ucase-req
- draft-nainar-mpls-spring-lsp-ping-sids
- draft-ncrsht-mpls-unique-and-consistent-label-ldp
- draft-ncrsht-mpls-unique-and-consistent-label-ldp
- draft-openconfig-mpls-consolidated-model

- draft-pdutta-mpls-tldp-hello-reduce
- draft-pelletier-mpls-ldp-bindings-refresh
- draft-pignataro-mpls-reserved-labels-lb
- draft-raszuk-mpls-domain-wide-labels
- draft-raszuk-mpls-domain-wide-labels
- draft-renwei-mpls-big-label
- draft-saad-mpls-lsp-instant-install-rsvpte
- draft-saad-mpls-lsp-instant-install-rsvpte
- draft-saad-mpls-lsp-instant-install-rsvpte
- draft-turaga-mpls-test-labels

Sleeping Beauties -III

- draft-vainshtein-mpls-gal-tc-ttl-handling
- draft-vgovindan-mpls-extended-bfd-disc-tlv
- draft-wijnands-mpls-mldp-multi-topology
- draft-villamizar-mpls-multipath-extn
- draft-wu-mpls-rsvp-te-path-profile
- draft-xu-isis-mpls-elc
- draft-xu-mpls-el-capability-signaling-igp
- draft-xu-mpls-multi-domain-deployment-enhancement
- draft-xu-mpls-payload-protocol-identifier
- draft-xu-mpls-service-chaining
- draft-xu-mpls-spring-islands-connection-over-ip
- draft-xu-mpls-unified-source-routing-instruction
- draft-xu-sfc-using-mpls-based-source-routing
- draft-xu-sfc-using-mpls-spring
- draft-you-mpls-spring-sfc-oam
- draft-zhang-mpls-tp-yang-oam
- draft-zhao-mpls-mldp-protections
- draft-zheng-mpls-lsp-ping-yang-cfg
- draft-zlj-mpls-mrsvp-te-frr
- draft-zzhang-mpls-icmp-bier
- draft-zzhang-mpls-rmr-multicast