### TSVWG IETF-102 (Montreal)

19th July 2018

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### **HELP TSVWG!**

- Need a Note Taker
- Need a scribe for Jabber session
- Need reviewers for WG drafts
- Future TSVWG Authors:
   PLEASE add "-tsvwg-" to any ID submitted

### Document Review Request

- Document quality relies on reviews, please review documents in your working group and at least one other document from another working group.
- If you'd like documents that you care about reviewed, please put the effort in to review other documents.

- No RFCs published since start of IETF 101
  - 4 RFCs published between IETF 100 and 101
- 2 Internet-Drafts (IDs) in RFC Editor Queue:
  - DiffServ and Web RTC QoS
    - RFC Ed. State: MISSREF [several WebRTC drafts]
  - DSCP IANA Process Changes
    - RFC editing in progress

- 1 ID at IESG
  - SCTP (RFC 4960) Errata and Issues
    - Update later in this meeting
- 2 IDs with WG chairs & authors after WGLC
  - FEC Framework Extension
  - FEC Sliding Window Random Linear Code
    - Both drafts updated (slide later in this deck)
    - Will be submitted for RFC publication soon
- 1 ID in WG Last Call
  - Diffserv Lower Effort PHB
    - Plan to conclude WG Last Call later today

- 2 IDs likely to go to WG Last Call soon
  - ECN Encapsulation for Lower Layer Protocols
  - ECN for Tunnels that use Shim Headers
    - Above two drafts will be WG Last Called together

- Additional Working Group IDs (7)
  - 1) SCTP NAT Support
  - 2) L4S Architecture
  - 3) L4S Identifier (ECN)
  - 4) L4S AQM (dualq-coupled)
  - 5) UDP Options
  - 6) Tunnel Congestion Feedback (draft expired)
  - 7) Datagram PL Path MTU Discovery

### **TSVWG: Related Drafts**

- Transport-related (on TSVWG agenda):
  - Path MTU detection via IPv6 packet truncation
    - draft-leddy-6man-truncate
  - Transport Header Encryption Impacts
    - draft-fairhurst-tsvwg-transport-encrypt
    - WG adoption requested
  - TCP Encapsulation Considerations
    - draft-pauly-tcp-encapsulation
  - -L4S and Diffserv (part of L4S agenda item)
    - draft-briscoe-tsvwg-l4s-diffserv
  - IPv6 Reservation Protocol
    - draft-han-tsvwg-ip-transport-qos

### TSVWG: Related Drafts (2)

- Transport-related (not on TSVWG agenda):
  - Priority Switching Scheduler
     draft-finzi-priority-switching-scheduler
     (ISE publication will be requested)
  - ECN and NSH (related to Tunnel Congestion Feedback)
     draft-eastlake-sfc-nsh-ecn-support (sfc WG)
- Internet-related (intarea WG):
  - Tunnel MTU Considerations
     draft-ietf-intarea-tunnels
  - Fragmentation Fragility
     draft-bonica-intarea-frag-fragile
  - SOCKS Protocol Version 6
     draft-olteanu-intarea-socks-6

## TSVWG Agenda

#### **Chairs Agenda Bashing**

**NOTE WELL** 

#### Thursday's Agenda (two back-to-back sessions)

Document Accomplishments and Status Milestones Review

Drafts

## WG Milestones Review (1)

- Jun 2018 Submit 'Guidelines for Adding Congestion Notification to Protocols that Encapsulate IP' as a BCP RFC
- Jun 2018 Submit 'Propagating Explicit Congestion Notification Across IP Tunnel Headers Separated by a Shim as a Proposed Standard RFC

(move both dates to Oct 2018, drafts are ready for WGLC)

- Jun 2018 Submit "Forward Error Correction (FEC) Framework
   Extension to Sliding Window Codes" as a
   Proposed Standard RFC
- Jun 2018 Submit "Sliding Window Random Linear Code (RLC)
   Forward Erasure Correction (FEC) Scheme for
   FECFRAME" as a Proposed Standard RFC
   (WGLC completed on both FEC drafts, will submit soon)
- Aug 2018 Submit 'A Lower Effort Per-Hop Behavior (LE PHB)' as a Proposed Standard RFC (WGLC almost complete, milestone includes DSCP IANA draft, already at RFC Editor)

## WG Milestones Review (2)

- Sep 2018 Submit "Low Latency, Low Loss, Scalable Throughput (L4S) Internet Service: Architecture" as an Informational RFC
- Sep 2018 Submit "DualQ Coupled AQM for Low Latency, Low Loss and Scalable Throughput" as an Experimental RFC
- Sep 2018 Submit "Identifying Modified Explicit Congestion Notification (ECN) Semantics for Ultra-Low Queuing Delay" as an Experimental RFC (Too soon – move all three L4S dates to July 2019?)
- Oct 2018 Submit 'SCTP NAT Support' to IESG as a Proposed Standard RFC

## WG Milestones Review (3)

- Dec 2018 Submit "Transport Options for UDP" as a Proposed Standard RFC
- Dec 2018 Submit 'Packetization Layer Path MTU Discovery for Datagram Transports' as a Proposed Standard RFC
- Dec 2018 Submit "Tunnel Congestion Feedback" as an Informational RFC
  - (Tunnel Congestion Feedback unlikely to be done in 2018, adjust date in Bangkok)
- Dec 2019 Submit "SCTP" (rfc4960bis) as a Proposed Standard RFC (new milestone)

# Agenda for Thursday (part 1)

- 1) Document Status, Charter and Accomplishments
  - WG drafts, Related drafts, Milestones
- 2) Agenda Bashing and Hackathon update
- 3) Transport and Network drafts
  - LE (Lower Effort) PHB
    - draft-ietf-tsvwg-le-phb (WGLC conclusion)
  - Datagram Packetization Layer Path MTU Discovery
    - draft-ietf-tsvwg-datagram-plpmtud
  - Path MTU detection via IPv6 packet truncation
    - draft-leddy-6man-truncate
  - QUIC Transport Mechanisms
  - QUIC and ECN

# Agenda for Thursday (part 2)

- 4) Other presentations / New Work
  - Transport Header Encryption Impacts
    - draft-fairhurst-tsvwg-transport-encrypt
    - WG adoption requested
  - TCP Encapsulation Considerations
    - draft-pauly-tcp-encapsulation

--- Break (1750 – 1810) ---

# Agenda for Thursday (part 3)

#### 5) Transport Protocols and Mechanisms

- SCTP Drafts
  - draft-ietf-tsvwg-natsupp
  - draft-ietf-tsvwg-rfc4960-errata (update) & plans for rfc4960bis
- UDP Options
  - draft-ietf-tsvwg-udp-options
- L4S drafts
  - draft-ietf-tsvwg-l4s-arch
  - draft-ietf-tsvwg-ecn-l4s-id
  - draft-ietf-tsvwg-dualq-coupled
  - draft-briscoe-tsvwg-l4s-diffserv (new)

### 6) Other Presentations / New Work

- IPv6 Reservation Protocol
  - draft-han-tsvwg-ip-transport-qos

### FECFRAME and RLC drafts: WGLC results

- Several reviews during WGLC
  - Gorry F. (detailed review)
  - Emmanuel L. (bad wording WRT transport)
  - Jonathan D. (GF(28) specification ambiguity)
- Strong support
  - Ali B.
- Actions taken by authors
  - brand new PRNG TinyMT32
    - legacy PRNG flawed... Details at NWCRG meeting Thursday
  - brand new "RLC parameter derivation" section
  - 1 revision for FECFRAME I-D, 3 revisions for RLC I-D
    - + minor typos waiting for next revision
- Related work on using RLC in QUIC @NWCRG
  - https://datatracker.ietf.org/doc/draft-roca-nwcrg-rlc-fec-scheme-for-quic/
  - Details at NWCRG meeting, Thursday morning