DLEP Research Group

IETF 88 Vancouver
DLEP Research Group

Some text redacted
DLEP Research Group

JOKE!

- In case you are reading this after the event

NOTHING is redacted
DLEP Research Group

• Formed to advance progress on the DLEP draft

• Mailing list discussion archive at http://www.ietf.org/mail-archive/web/manet-dlep-rg/current/maillist.html

• Closed list membership of active DLEP developers to make faster progress (but open to new members by group consensus)
Progress to date

• Group formed at Berlin (IETF 87)
• F2F discussion followed by work items
• Five papers (posted to mailing list) reporting on radio metrics generated by:
  – 3G/4G/LTE and BGAN
  – Wi-Fi and Software Defined Radios
  – legacy military radios
  – mesh networking radios
  – vehicle/aircraft tactical radios
IETF 88 Meeting

• Met on Tuesday morning
  – Defined core metric set (almost)
  – Defined optional metric semantics
  – Reliable transport and heartbeats
  – Agreed work items and timescales for draft-05
  – Agreed to push back advanced topics
Core Metric Set

• Maximum Data Rate (MDR) – Tx and Rx
• Current Data Rate (CDR) – Tx and Rx
• Relative Link Quality (RLQ)
  – Text to be tightened/clarified
• Latency – Almost defined!
  – EFT metric being evaluated by Henning Rogge

Everything else is an extension!
Optional Metric Semantics

- Per-session metric set advertised at session creation
  - Initial values supplied in the Peer Offer message
  - May be overridden at Neighbor Up
  - May be overridden with Neighbor Update
Reliable Transport

• **TCP is the required transport protocol**
  - Secondary protocols are permitted
  - Reliability semantics of messages to be clearly defined
  - No requirement for TCP keep-alive

• **Heartbeat rules altered**
  - Because we now use reliable transport
  - Recommendations on thresholds for session termination
Dlep-05 work items and schedule

- We will deliver dlep-05 before IETF 89
  - Core agreed items

- There will be a dlep-06 before last-call
  - We want to demonstrate progress
  - Some topics still under discussion
  - Incorporate MANET WG feedback
Dlep-06 Topics

- Broadcast/Multicast 'Neighbor' metrics
- Link Characteristic Requests / Flow Control Messages
  - Want to generalize mechanism so that it can be extended to other 'set' processes.
- Other things we MUST have in core specification
  - But there better be a good reason!
Next...

• We want to re-charter the design team
  – The format seems to work
  – We will produce two more drafts
  – Complete at IETF 90 - Toronto 2014
Conclusion

• Missed our initial deadline
• Did make progress
• Much more progress planned
• DLEP will happen!