MMF Ad Hoc meeting minutes

26th June 2014

Approved minutes

recorded by jonathan king

MMF ad hoc meeting minutes, 26th June 2014 -1

- **Meeting started** at 9 am Pacific, chaired by Jonathan King.
- **Attendee list** was taken from the Webex attendee lit, 18 attendees were noted.
- **Presentations** shared in the MMF ad hocs can be found at the MMF ad hoc web page.
  - *http://www.ieee802.org/3/bm/public/mmfadhoc/meetings/index.html*
- **IEEE patent policy:** Attendees were reminded of the IEEE patent policy
  - *http://www.ieee802.org/3/patent.html*
- **House keeping:** The agenda was approved. MMF ad hoc meeting minutes were approved for June 5th & 12th, May 1st & 8th, April 3rd, 10th & 24th, Feb 25th & 20th.
- **Presentations:**
  - Draft changes to clause 95 including TxVEC – pdf of Frame document for review- Jonathan King
  - 802 3-95 TxVEC improved 4 – Piers Dawe
  - 100G-SR4 & scope noise – John Petrilla
- **Discussion:**
  - The group reviewed the Frame document (8023-95-TxVEC_CMP3.pdf), with revisions implemented as agreed on 19th June ad hoc. It was noted that some specification values will need revision following the switch from TDP: the hit ratio at which TxVEC is calculated from histogram data, TxVEC spec limit, and consequent specs.
  - Piers' presented an update to his contribution describing changes to TxVEC (section 95.8.5) which used a simplified set of equations for calculating TxVEC. A few changes were suggested during discussion and a revision (version 5) was distributed on the reflector after the meeting, and is available on the MMF ad hoc materials page. Jonathan will provide a frame version of the changes for review next week.

  - *Continued…..*

MMF ad hoc meeting minutes, 26th June 2014 - 2

- **Discussion** *continued*…..
  - It was agreed that measurement data comparing 'TxVEC' and 'improved TxVEC' metrics vs Rx sensitivity would be key to deciding whether to adopt the 'improved TxVEC' method. When asked, Greg LeCheminant (Agilent) said that he thought the calculations needed could be implemented in contemporary 'scopes. Greg also offered use of a 12.6 GHz O/E and oscilloscope to assist with making Tx eye histograms for use in TxVEC calculations. Jonathan and John Petrilla said they hoped to be able to provide more Tx eye measurements for comparing TxVEC methods.
  - John Petrilla presented a study showing that oscilloscope noise is likely to be significant for a 19 GHz bandwidth O/Es and will impact the VECP calibration (for SRS testing) and Tx eye mask measurements. Revised eye mask coordinates were proposed, but lack of time prevented in-depth discussion. The issue will be revisited on the next MMF ad hoc call.
  - Greg LeCheminant confirmed the 17uW RMS input referred noise for a 19GHz O/E, as modeled in John's work, and expected a 9uW RMS input referred noise for a 12.6GHz bandwidth O/E.
  –
- **Meeting ended** at 10.40 am
- **Next meeting:** Thursday July 3rd, 2014, 9 am to 10.30 am

Attendees

Pete Anslo, Ciena

Derek Cassidy, BT

Piers Dawe, Mellanox

Patrick Decker, Oracle

Dan Dove, Dove Networking Solutions/Huawei

Mike Dudek, Qlogic

Greg LeCheminant, Agilent

Jonathan King, Finisar

Paul Kolesar, Commscope

John Petrilla, Avago Tech

Rick Rabinovich, Alcatel-Lucent

Adee Ran, Intel

Randy K Rannow, API

Mike Ressl, Hitachi Cable

Itaru Sakabe, SEI

Megha Shanbhag, TE

Patrick Van Vickle, Sumitomo Electric

Kuang Yi, HP