

Minutes P802.3by 25 Gb/s Ethernet Task Force ad-hoc meeting – January 7, 2015

Prepared by Kent Lusted

Proposed Agenda:

- Approval of the Agenda
- IEEE patent policy reminder (see <http://www.ieee802.org/3/patent.html>)
- Approval of draft minutes for December 17
- 25GE Task Force Update – Mark Nowell
- 25GE Optical Ad Hoc Update – Jonathan King
- “A Baseline Proposal for 25GBASE-KR PMD” – Adele Ran
- “Proposed Baseline text for: Chip-to-module 25 Gb/s one-lane Attachment Unit Interface (XXVAUI-1)” – Tom Palkert
- “Proposed Baseline text for: Chip-to-chip 25 Gb/s one-lane Attachment Unit Interface (XXVAUI-1)” – Tom Palkert

Presentations posted at: <http://www.ieee802.org/3/by/public/adhoc/architecture/index.html>

Meeting began at 8:04 a.m. Pacific.

Meeting began with the agenda presentation:

http://www.ieee802.org/3/by/public/adhoc/architecture/agenda_010715_25GE_adhoc.pdf

Matt Brown showed the links to the ad hoc page and the email reflector.

Matt Brown reviewed the Attendance information related to the ad hoc. He reminded participants to indicate full names and employer/affiliation correctly for the meeting minutes.

Matt presented the proposed agenda. No one objected.

Matt reminded participants of the IEEE patent policy. (see <http://www.ieee802.org/3/patent.html>) No one responded.

The December 17 meeting minutes were posted after the meeting. No comments were received. Matt Brown asked if there were objections to approving the minutes as posted. No one responded. The December 17 meeting minutes were approved by the ad hoc.

Task Force Update -- Mark Nowell

- Task Force meeting is next week.
- Mark received 23 presentation requests. The material will be posted today or tomorrow.
- Mark is working on a project timeline for review at the Task Force meeting.

25GE Optical Ad Hoc Update – Jonathan King

The attendee was not immediately available.

Presentation #1:

“A Baseline Proposal for 25GBASE-KR PMD” – Adee Ran

See http://www.ieee802.org/3/by/public/adhoc/architecture/ran_010715_25GE_adhoc.pdf

- Adee reviewed the background and scope for the backplane PMD baseline.
- Adee assumed in the baseline that RS-FEC will be the only FEC choice for the backplane PMD. Other modes could be added if there is consensus.
- Discussed where to place the AUI reference in the proposed figure. Matt Brown has prepared a PMA presentation with details. If there is time at the end of the meeting, he will request permission from the group to present it.
- No loopback or test patterns are in the proposed PMD baseline.

Presentation #2:

“Proposed Baseline text for: Chip-to-module 25 Gb/s one-lane Attachment Unit Interface (XXVAUI-1)” – Tom Palkert

See http://www.ieee802.org/3/by/public/adhoc/architecture/palkert_010715_25GE_adhoc_01.pdf

- The proposed baseline leverages the P802.3bm Annex 83 CAUI-4 chip to module specification.
- The HCB/MCB performance could be an issue. Chris Diminico has a contribution on this topic for the Task Force meeting.
- The proposed 25GBASE-R PCS does not have lanes. Discussed replacing the PMA lane mapping “PMA (5:1)” with “PMA” or similar.
- Discussed the RS-FEC block in the proposed chip-to-module Figure. FEC depends on optical baseline proposal. Decided to leave it as RS-FEC for now.
- Discussed the impact of the FEC type on the XXVAUI bit error ratio performance. A no-FEC solution would have a different BER target.
- Discussed the PICS table and references to Annex 83E. Generation of the PICS table is an editorial function and will be created during the editorial process. Tom will add a comment to the PICS slide for the editors to make the relevant changes to the PICs, as necessary.
- Discussed relaxing the HCB/MCB return loss limit to account for the mechanical effects of the SFP28 cage. A potential solution is to allow for measurement inaccuracy in the specification.

Presentation #3:

“Proposed Baseline text for: Chip-to-chip 25 Gb/s one-lane Attachment Unit Interface (XXVAUI-1)” – Tom Palkert

See http://www.ieee802.org/3/by/public/adhoc/architecture/palkert_010715_25GE_adhoc_02.pdf

- Similar material to the previous presentation.
- Tom will add a comment to the PICS slide for the editors to make the relevant changes to the PICs, as necessary.

Matt Brown asked if there were objections to presenting the proposal for the PMA baseline. No one responded.

Presentation #4:

“25GE PMA sublayer baseline proposal” – Matt Brown

See http://www.ieee802.org/3/by/public/adhoc/architecture/brown_010715_25GE_adhoc.pdf

- Reviewed the considerations for the PMA baseline proposal.
- Request for Matt to add remote and local loopback (optional) from Clause 83. Also add scrambled idle patterns in the PCS. Remove PRBS31 from PCS.
- Request for Matt Brown to align the XXVAUI diagrams with Tom Palkert’s proposal.

Meeting ended at 9:35 a.m. Pacific.

List of attendees (captured from Webex tool)

Name	company
Eric Baden	Broadcom
Matt Brown	Apm
Rick Rabinovich	alcatel-lucent
Arthur Marris	Cadence
salvatore rotolo	St
Daniel Koehler	morethanip
Oded Wertheim	Mellanox
Mark Nowell	Cisco
Don Cober (CoMira)	comira-inc
Kenneth Jackson	sei-device
Ryan Latchman	Macom
Adee Ran	Intel
Ghani Abbas	Ericsson
chris diminico	MC Communications
David Malicoat (HP)	Hp
Ingvar Froroth	Marvell
Alexander Rysin	Mellanox
Brian Schuette	Arista
Duane Remein	Huawei
Mike Dudek	Qlogic
Dave Brown	Semtech
Piers Dawe	Mellanox
Venu B (Marvell)	Marvell

Name	company
Scott Irwin	Mosys
Adrian Butter	IBM
Greg D Le Cheminant	Keysight
Steve Trowbridge	alcatel-lucent
Raymond Nering	cisco
Peter Anslow	ciena
Chris Roth (Molex)	molex
Kent Lusted	intel
Vittal	Dell
Scott Kipp	brocade
Megha Shanbhag	TE
Adam Healey	avagotech
Erdem Matoglu	amphenol-tcs
Nathan Tracy	TE
Andre Szczepanek	inphi
Stefano Valle	St
Mark Gustlin	xilinx
Hassan Ali	Ti
Gary Nicholl	cisco
Doug Day	Toshiba
Jeff Slavick	avagotech
Scott Sommers	molex
Warren Meggitt	arista
Rich Mellitz (Intel)	intel
Brad Booth	microsoft
Ken Van Orman	spirent
sam sambasivan	AT&T
Rita Horner	synopsys
George Zimmerman	Aquantia & Commscope
jonathan king	finisar
Piروز Toyserkani	cisco
Shinkyō Kaku	alliedtelesis
martin	xpliant
Paul Kolesar	commscope
Dan Dove	Dove Networking Solutions & Emulex
Zhongfeng Wang	broadcom
Tom Palkert	visi
John D'Ambrosia	Dell
Ali Ghiasi	Independent
rob stone	broadcom

Name	company
Dan Cunningham (Arista)	arista
Amrik	cisco
Juan-Carlos Calderon	cortina-systems
Derek Cassidy	BT
Flavio Marques	furukawa.co
Pirooz Toyserkani	cisco
Jim Weaver	arista