Minutes IEEE 802.3 10SPE SG AdHoc meeting 22 August 2016

Prepared by Peter Jones

Proposed Agenda:

Title	Presenter(s)	Affiliation
Start and Administrivia	Peter Jones	Cisco
10SPE Study Group Overview	George Zimmerman	CME Consulting / Commscope, LTC & Aquantia
10SPE Strawman Objectives Discussion	George Zimmerman	CME Consulting / Commscope, LTC & Aquantia
Industrial Automation Bit Error Rate	David Brandt	Rockwell Automation
Industrial Automation and Emerging Single-pair Ethernet	David Brandt	Rockwell Automation
Reduced Minimum Frame Size	David Brandt	Rockwell Automation

Presentations (will be) posted at:

http://grouper.ieee.org/groups/802/3/10SPE/public/adhoc/index.html

Agenda/Admin Peter Jones:

Meeting began at 8:05am PST.

1. Reviewed the Attendance information related to the ad hoc.
2. Displayed and read pre-par patent slide deck.
3. Reminded participants to indicate full names and employer/affiliation correctly for the meeting minutes.
4. Presented the proposed agenda.
   a. Added Late contribution from Chris DiMinico
   b. Added "what's next" section
   c. Agenda accepted without opposition.

Presentations/Discussion.

10SPE Study Group Overview   George Zimmerman   CME

- Scope question, e.g., what about 100M on the same cable?
  - Study group needs to agree on the problem(s) to solve. Once this is done, then formal docs (e.g. Objectives, PAR, CSD) fall out of this agreement.
  - Discussion of managing conflicting goals/optimization points between economic and technical feasibility. Need to find balance, and where you think that is depends on where you look from.

- o The presenter suggested that study group participants should bring contributions early to the ad hoc to socialize and build consensus. Saying this another way, consensus matters, and people need time to think.
- Objectives can change in Task Force if need be.
- Presentations should reference CSDs or objectives (e.g., what are you trying to solve).
- Meeting timing – move to alternate weeks Monday 9-11 am PT/wed 7-9 am PT – review in September interim SG meeting

10SPE Strawman Objectives Discussion   George Zimmerman   CME

- What sorts of questions do we need to address?
- There are
    - o Boilerplate objectives.
    - o Usual but more interesting objectives.
    - o Hard stuff.
- How to make progress on a specific objective?
    - o Bring presentations and build consensus, the sooner the better.
    - o Along with the "What", also provide the "Why" to help the group understand the need.
    - o Several items were highlighted which should be carefully considered whether they are 'MUST HAVE' or not. Too many options tends to add complexity and slow things down.
- Deciding the answer before the question is well understood, is not normally a path to success.

Industrial Automation Bit Error Rate   David Brandt Rockwell Automation

- Presenter covered material, some questions and discussion.
- The presenter proposed that a BER objective of 10^{-9} based on analysis and consistent with experience with 10/100Mbps solutions would be adequate, and no objections were raised.

10SPE Link Segment   Chris DiMinico   MC Communications /Panduit

- Relative to 802.3bp figure shown, discussion about location of MDI and relationship to link segment.
    - o What lessons should 10SPE learn from 100BASE-T1/1000BASE-T1?
- The presenter indicated that a follow up presentation would be offered with more detail on the specifications for existing industrial and automotive cabling.

Reduced Minimum Frame Size   David Brandt Rockwell Automation

- Presenter lost connection to the meeting, meeting moved on to "10SPE Link Segment" - Chris DiMinico" to give presenter time to re-connect.
- Restarted after "10SPE Link Segment".
- Presenter reviewed material regarding frame content use cases.
- Presenter's conclusion, ROI of changing MAC to reduce frame size questionable, does not see compelling reason to address this.

- Individuals voiced opinions regarding whether a change in frame size would be a good idea in this project, including:
  - Reducing frame size could introduce compatibility and network interconnection issues.
  - It's beyond the scope of a PHY project, impacts 802.3 MAC, and also impacts 802.1.

Industrial Automation and Emerging Single-pair Ethernet   David Brandt Rockwell Automation

- Not presented, deferred to next AdHoc.

What's next?

- Next meetings – covered in 10SPE Study Group Overview
- Follow ups?
  - Review material presented today, and respond to open questions and items.
  - Prepare for next AdHoc meetings and September interim.
- Collaboration and co-operation is strongly encouraged.
- Early notice of intent to present is strongly encouraged.
- Use of the reflector for discussion is strongly encouraged.

Meeting closed – 10:55 PST

Attendees (from Webex + emails)

Name	Affiliation	attended 8/22
Ahmad Chini	Broadcom	y
Andy Gardner	Linear Technology	y
Brett McClellan	Marvell	y
Chris Diminico	MC Communications/Panduit	y
Claude Gauthier	OmniPHY	y
David Abramson	TI	y
David Brandt	Rockwell Automation	y
David Hoglund	Johnson Controls	y
David Law	HPE	y
Dayin Xu	Rockwell Automation	y
Dieter Schicketanz	Consultant, Reutlingen University	y
Derek Cassidy	ICRG	y
Frank Schewe	Phoenix Contact	y
Geoff Thompson	Independent	y
George Zimmerman	CME Consulting / Commscope, LTC & Aquantia	y
Harald Müller	Endress+Hauser	y

Heath Stewart	Linear Technology	y
Hossein Sedarat	Aquantia	y
Jacky Chang	HPE	y
Jeff Marvin	Linear Technology	y
Jens Gottron	Siemens	y
Joerg Haehniche	Endress+Hauser	y
Laura Schweitz	Turck	y
Masood Shariff	CommScope	y
Matthias Fritsche	HARTING Electronics GmbH	y
Mehmet Tazebay	Broadcom	y
Maris Graube	Relcom Inc.	y
Mohammad Ahmed	TE	y
Paul Mooney	Sprirent	y
Peter Jones	Cisco	y
Peter Wu	Marvell	y
Richard Mei	CommScope	y
Ron Muir	JAE	y
Theo Brillhart	Fluke	y
Woo-Suk Ko	LGE	y
Attendee count		35