

Closing Report

IEEE 802.3 P802.3bz 2.5G/5GBASE-T Task Force

David Chalupsky, Intel

San Diego, CA
July 28, 2016

IEEE P802.3bz 2.5G/5GBASE-T Task Force Project Information

Task Force Organization

David Chalupsky, Chair

Jon Lewis, Secretary

George Zimmerman, Chief Editor

Peter Jones, Chair, Architecture ad hoc

Editorial Team: Chris DiMinico, Jon Lewis, Mike Klempa, Valerie Maguire, Brett McClellan

Chris DiMinico, Chair, Use Case ad hoc

German Feyh, Chair, Enterprise Noise and Use Case Analysis ad hoc (ENUCA)

Task Force web and reflector information

Reflector information: <http://ieee802.org/3/NGBASET/reflector.html>

Home page: <http://ieee802.org/3/bz/index.html>

PAR - <http://www.ieee802.org/3/bz/P802.3bz.pdf>

CSD - http://www.ieee802.org/3/bz/802d3_NGEABT_CSD_802.3_WG_approved_12-march-15.pdf

Objectives - http://www.ieee802.org/3/bz/ngeabt_objectives_802.3WG_approved_0315.pdf

Private area: <http://ieee802.org/3/bz/private/index.html>

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User = xxxxx password = xxxxx

IEEE P802.3bz Adopted Schedule

| | | | |
|------|-----------|------|---|
| 2015 | January | | 1st SG meeting |
| | March | | 2nd SG meeting |
| 2015 | May | D0.1 | 1st TF mtg, preliminary draft |
| | July | D1.0 | start TF review |
| | September | D1.1 | |
| | November | D1.2 | technically complete - presubmit for WG ballot. Must be available 10days prior to 802.3 mtg |
| 2016 | January | D2.0 | 30-day IWGB: 1/23-2/21. |
| | March | D2.1 | conditional SB for May |
| | April | D3.0 | |
| | May | D3.1 | |
| | July | D3.2 | |
| | August | | Aug 5th final recirc start for deadline Sept Revcom |
| | September | D3.? | Approved |

Activities This Week

- 72 minute meeting Wednesday morning
 - 43 attendees.
- 100% approval on D3.2
- Addressed 2 comments on D3.2
 - Modified title to reflect full scope by adding “Media Access Control Parameters”
- Authorized the generation of D3.3
- Moved to request conditional approval to forward draft to RevCom
- Scheduled contingent interim for August 25, 2016
- Meeting minutes and D3.3 are posted to web

Liaisons and Communications

Incoming liaison from TIA TR42, providing draft 1.1 of TSB-5021 to P802.3bz

No response needed.

P802.3bz TF Motion #4

Move to

Reaffirm the CSD responses in

http://www.ieee802.org/3/bz/802d3_NGEABT_CSD_802.3_WG_approved_12-march-15.pdf

Request 802.3 WG to progress the draft to Revcom

Direct the task force chair to make the following motion to 802.3

Move that the IEEE 802.3 Working Group re-affirm the CSD responses in http://www.ieee802.org/3/bz/802d3_NGEABT_CSD_802.3_WG_approved_12-march-15.pdf and request conditional approval to progress the IEEE P802.3bz draft to RevCom once the Sponsor ballot process has been successfully completed.

Moved: Jon Lewis

Seconded: Steve Carlson

Technical ($\geq 75\%$ required)

Y: 35 N: 0 A: 0

Motion passes/fails

IEEE P802.3bz D3.2 Status

100% Approve, 2 comments,

| | D3p0 | D3p0% | D3p1 | D3p1% | D3p2 | D3p2% | Required |
|-------------------------------|------|-------|------|-------|------|--------|----------|
| Voters | 124 | | 124 | | 124 | | |
| Return | 102 | 82.3% | 108 | 87.1% | 111 | 89.5% | >50% |
| Approve | 95 | 96.0% | 102 | 98.1% | 107 | 100.0% | >75% |
| Disapprove w/comment | 4 | 4.0% | 2 | 1.9% | 0 | 0.0% | <25% |
| Disapprove w/o comment | 0 | 0.0% | 0 | 0.0% | 0 | 0.0% | |
| Abstain | 3 | 2.9% | 4 | 3.7% | 4 | 3.6% | <30% |
| Comments | 113 | | 22 | | 2 | | |

Unsatisfied Comments Review

Total of 0 unsatisfied comments from 0 Disapprove voters

D3.2 Comment Profile

2 Comments:

- 1) This draft meets all editorial requirements.
- 2) Change title from: "Standard for Ethernet Amendment: Physical Layer and Management Parameters for 2.5 Gb/s and 5 Gb/s Operation, Types 2.5GBASE-T and 5GBASE-T"
to:
"Standard for Ethernet Amendment: Media Access Control Parameters, Physical Layers, and Management Parameters for 2.5 Gb/s and 5 Gb/s Operation, Types 2.5GBASE-T and 5GBASE-T"

CHANGES FROM DRAFT 3.2 TO 3.3

- No technical changes
- Change title only

| | | |
|--|---|----|
| | IEEE P802.3bz™/D 3.2 <u>3.3</u> , 30th June 2016 <u>27th July 2016</u> | 1 |
| | (Amendment of IEEE Std 802.3™-2015, <approved amendments to be added during publication preparation>) | 2 |
| | IEEE P802.3bz™/D 3.2 <u>3.3</u> | 3 |
| | Draft Standard for Ethernet | 4 |
| | Amendment: | 5 |
| | <u>Media Access Control Parameters,</u> | 6 |
| | Physical Layer <u>Layers</u> , and Management | 7 |
| | Parameters for 2.5 Gb/s and 5 Gb/s | 8 |
| | Operation, Types 2.5GBASE-T and | 9 |
| | 5GBASE-T | 10 |
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Recirculation ballot and resolution meeting schedule

Proposed Schedule

| | |
|---|-----------|
| IEEE P802.3bz comment resolution meeting | 7/27/2016 |
| 3rd Sponsor recirculation ballot day one | 8/2/2016 |
| RevCom September meeting submittal deadline | 8/5/2016 |
| 3rd Sponsor recirculation ballot close date | 8/16/2016 |
| IEEE P802.3bz comment resolution meeting | 8/25/2016 |
| RevCom September meeting | 9/16/2016 |

Additional
Contingent
Interim

802.3 WG Motion

Move that the IEEE 802.3 Working Group re-affirm the CSD responses in

http://www.ieee802.org/3/bz/802d3_NGEABT_CSD_802.3_WG_approved_12-march-15.pdf and request conditional approval to progress the IEEE P802.3bz draft to RevCom once the Sponsor ballot process has been successfully completed.

Moved by David Chalupsky on behalf of the Task Force Technical ($\geq 75\%$ required)

Y: N: A:

Motion passes/fails

P802.3bz additional interim

Contingent Interim

Will be cancelled if not necessary

August 25, 2016, 10am-1pm

Santa Clara, CA

No fee

Teleconference will be available

...but the rules say you must be in the room to vote

<http://ieee802.org/3/rules/guidelines.html>

Questions?

Thank you!

Next Generation Enterprise Access BASE-T PHY Objectives

- Support full duplex operation only
- Preserve the 802.3 / Ethernet frame format utilizing the 802.3 MAC
- Preserve minimum and maximum Frame Size of current 802.3 standard
- Support Auto-Negotiation (Clause 28)
- Support optional Energy Efficient Ethernet (Clause 78)
- Support local area networks using point-to-point links over structured cabling topologies
- Do not preclude meeting FCC and CISPR EMC requirements
- Support PoE (Clause 33)
 - including amendments made by 802.3bt “DTE Power via MDI over 4-Pair Task Force”
- Support MAC data rates of 2.5 Gb/s and 5 Gb/s
- Support a BER better than or equal to 10^{-12} at the MAC/PLS service interface (or the frame loss ratio equivalent)
- Select copper media from ISO/IEC 11801:2002, with any appropriate augmentation to be developed through work of 802.3 in conjunction with SC25/WG3 and TIA TR42
- Define a 2.5 Gb/s PHY for operation over
 - Up to at least 100m on four-pair Class D (Cat5e) balanced copper cabling on defined use cases and deployment configurations
- Define a 5 Gb/s PHY for operation over
 - Up to at least 100m on Class E (Cat6) balanced copper cabling on defined use cases and deployment configurations
 - Up to 100m on Class D (Cat5e) balanced copper cabling on defined use cases and deployment configurations