C/ 00 SC Р # C/ 160 SC 160.6 Р L # 185 Finisar/ /II-VI Stassar, Peter DeAndrea, John Huawei Comment Type Ε Comment Status A Comment Type TR Comment Status R Table 159-4 The Table shows a value of -20 dBm for 25GBASE-BR10 and -26 dBm for Specification methodology and parameters for PAM4 optical signals have recently been 25GBASE-BR-10. I believe there is a typo, because the PMD has (4) types, -BR10. modified in P802.3cu. Parameters have been deleted, added or modified. Often to simplify BR20, -BR40, and -BR40+ the specification. Align with P802.3cu D2.2. Especially TDECQ - 10loq10(Ceq)c (max) has been removed as Tx parameter and SECQ - 10loq10(Ceq)f (max) as Rx parameter. TECQ SuggestedRemedy has been added, as well as TDECQ - TECQ. Transmitter over/under-shoot (max). Suggest change: add other (2) PMD types and comment for power levels Transmitter peak-to-peak power (max). "OMA minus TDECQ = value" has been modified to "OMA = value + TDECQ". In a similar way receiver sensitivity specification has been Response Response Status C modified. Etcetera ACCEPT IN PRINCIPLE. SuggestedRemedy See#1, Change text to show -20 dBm is for BR10, -26 dBm is for BR20/40 Align PAM4 specification methodology with P802.3cu D2.2. Response Response Status U # C/ 158 SC 158.6 188 REJECT. Stassar, Peter Huawei Comment Type ER Comment Status A No consensus reached on addressing the remedy PAM4 spec in Clause 160. For several parameters in Table 158-6, 158-7 and 158-8 there is a "zero" after the decimal C/ 00 SC 0 P0L 0 165 point. Remove the decimal point and "zero" after it. Dawe. Piers Nvidia SuggestedRemedy Comment Status D Comment Type Ε Remove the decimal point and "zero" after it for those parameters with integer values Editorial comments Response Response Status C ACCEPT. SuggestedRemedy To follow P C/ 158 SC 158 181 Proposed Response Response Status W Stassar, Peter Huawei PROPOSED REJECT. Comment Type TR Comment Status A SC 0 P0Requirements for interoperability between the various PMDs are missing. See latest CI 00 10 # 164 version of P802.3cu D2.2. Also for 159 and 160. Dawe, Piers Nvidia SuggestedRemedy Comment Type T Comment Status D Add requirements for interoperability for various PMDs in 158, 159 and 160 Tecehnical comments Response Response Status C SuggestedRemedy ACCEPT IN PRINCIPLE. To follow Proposed Response Implement the suggested remedy with editorial license to follow P802.3cu D2.2 Response Status W PROPOSED REJECT

C/ FM SC FM P1 L13 # 11 C/ FM SC FM P7 L15 # 14 Hajduczenia, Marek Charter Hajduczenia, Marek Charter Comment Type E Comment Status A Comment Type E Comment Status A Suggest to break title before "and 50" When editor is change, it is usual to designate them separately as Phase 1 and Phase 2 SuggestedRemedy SuggestedRemedy Insert line break before "and 50" to make title look a bit better Per comment Response Response Status C Response Response Status C ACCEPT. ACCEPT IN PRINCIPLE. C/ FM SC FM P7 L4 # 89 Follow example in 802.3cb, See #231 Grow, Robert RMG Consulting C/ FM SC FM P**7** L19 # 90 Comment Type Comment Status A Ε This number of this standard is known. Grow. Robert RMG Consulting Comment Type E Comment Status A SuggestedRemedy The WG ballot group list is now known. 802.3cp SuggestedRemedy Response Response Status C Fill in WG list. ACCEPT. Response Response Status C C/ FM SC FM P**7** L9 # 49 ACCEPT IN PRINCIPLE. Lewis, Jon Dell EMC Add WG ballot group member list when D2.0 was announced on Page 7 Comment Type ER Comment Status A Pete Anslow is no longer the 802.3 WG secretary C/ 00 SC 0 P**9** L15 # 232 SuggestedRemedy Thompson, Geoff GraCaSI S.A./Independent Change "Pete Anslow" to "Jon Lewis" Comment Type E Comment Status D The word "Ethernet" in this line is incorrect Response Response Status W ACCEPT. SuggestedRemedy See maintenance request 1350 Proposed Response Response Status W PROPOSED REJECT. This is from the template FM document.

C/ FM SC FM L1 # 15 P10 Charter Hajduczenia, Marek Comment Type ER Comment Status A Front Matter is not up to date SuggestedRemedy Update FM text and content to match the latest amendments published. Yes, it is a constant process. Response Status C Response ACCEPT. C/ 00 SC 0 P12 **L1** Dell FMC Lewis. Jon Comment Type Ε Comment Status A blank page SuggestedRemedy Remove the blank page. Also page 16, 20, 38 is blank. Please remove all blank pages in the document. The latest template has instructions for removing blank pages throughout the draft if necessary. Response Response Status C ACCEPT. C/ FM SC FM P13 L49 92 Grow. Robert **RMG** Consulting Comment Type E Comment Status A For some reason, a 43 is added to the end of the clause title. Same thing with clause 159

For some reason, a 43 is added to the end of the clause title. Same thing with clause 159 and clause 160. Each ends with "-BR40+", and each has a different number tacked onto the title.

SuggestedRemedy

If this is a FrameMaker "feature" perhaps appending spaces or something to the end of the title may help eliinate the TOC problem. It is a mystery to me though what to do if this is a FrameMaker problem with a title ending in "+".

Response Status C

ACCEPT IN PRINCIPLE.

Fix these places

Comment Type ER Comment Status A

No normative references, no need for 1.3

SuggestedRemedy

Strike 1.3

Response Status C

ACCEPT.

CI 1 SC 1.4 P18 L8 # 228

D'Ambrosia, John Futurewei, U.S. Subsidiary of Huawei

Comment Type TR Comment Status D

Definition of all PHYs in 1.4, indicate that each PHY includes two different specifications for -D and _U. However, the scope of the approved PAR for 802.3cp states -

The scope of the project defines physical layer specifications and management parameters for symmetric bidirectional 10 Gb/s, 25 Gb/s, and 50 Gb/s operation over single strand of single mode fiber of at least 10 km.

It does not appear that specifications for symmetric bidirectional links were defined, as there are different specifications for upstream and downstream.

Therefore, this specification is not per the scope of the approved PAR.

SuggestedRemedy

It is assumed that different specifications are necessary for upstream / downstream. Therefore, the scope of the PAR needs to be updated.

Proposed Response Response Status W

PROPOSED REJECT.

802.3cp BiDi links use different wavelengths for upstream and downstream.

As a good precedent, the PAR of 802.3av says "5.2 Scope of Proposed Standard: The scope of this project is to amend IEEE Std 802.3 to add physical layer specifications and management parameters for symmetric and/or asymmetric operation at 10 Gb/s on point-to-multipoint passive optical networks."

C/ 1 SC 1.4.52a P18 L12 # 69 C/ 1 SC 1.4 P18 L20 # 229 Nicholl, Shawn Xilinx D'Ambrosia, John Futurewei, U.S. Subsidiary of Huawei Comment Type ER Comment Status A Comment Type TR Comment Status D Definitions contain a reference to IEEE Std 802.3cp which should be IEEE Std 802.3 once Distinct Identiy concerns. Each of the speeds has two PHYs that address at least 40km (BR40 and BR40+) which are noted as differing by -40+ having a larger loss budget, which the amendment is approved. means that there are two different solutions that can address the lower loss budget. SuggestedRemedy SuggestedRemedy Propose to replace "See IEEE Std 802.3cp" with "See IEEE Std 802.3" in this sub-clause and other sub-clauses found in sub-clause 1.4 Choose 1 solution for 40km for each rate. Response Response Status C Proposed Response Response Status W ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. See#187, Remove BR40+ from .3cp draft, BR40 is the single solution to 40 km reach C/ 1 SC 1.4 P18 L13 # C/ 1 SC 1.4.128 P18 L45 # 93 Hajduczenia, Marek Charter RMG Consulting Grow. Robert Comment Type ER Comment Status A Comment Type Е Comment Status A Units need to be separated from numeric value/ Insert point is wrong. SuggestedRemedy SuggestedRemedy Insert a space (non-breaking) before "km" The insert should be after 1.4.128aac which was inserted by IEEE Std 802.3ca-20xx. Scrub the draft Inserts are then numbered 1.4.128aad through 1.4.128aag. Response Response Status C Response Response Status C ACCEPT. ACCEPT IN PRINCIPLE. C/ 1 SC 1.4 P18 L14 # 17 Use the numbers provided by Jon Lewis Charter Hajduczenia, Marek C/ 30 SC 30.5.1.1.2 P21 L16 # 20 Comment Type ER Comment Status A Hajduczenia, Marek We do not reference amendments, but baseline standard Charter Comment Type E Comment Status A SuggestedRemedy Seems like "..." should be in a separate line above? Change "IEEE Std 802.3cp" to "IEEE Std 802.3", all definitions in 1.4 SugaestedRemedy Response Response Status C Fix the location of "..." ACCEPT. Response Response Status C ACCEPT.

C/ 30 SC 30.5.1.1.2 **L1** # 166 C/ 45 P24 L4 # 153 P22 SC 45.2.1.16 Cadence Design Systems Dudek, Mike Marvell Marris, Arthur Comment Type T Comment Status D Comment Type Ε Comment Status D All the other -D Phys are OLT I thought 802.3ct was amending 802.3cp SuggestedRemedy SuggestedRemedy Change ONU to OLT Delete reference to 802.3ct and review the changes indicated in the bit description in Table 45-7. Deleting both 11xxxxx and 1111001 does not seem right. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. C/ 30 SC 30.5.1.1.2 P22 L14 # 21 Need to check this out Charter Hajduczenia, Marek CI 45 SC 45.2.1.7 P25 **L7** # 41 Comment Status A Comment Type Zimmerman, George ADI. Cisco, CommScope, Marvell, SenTekSe Comment Type E Comment Status A SuggestedRemedy Tables 45-9 and 45-10 are commonly modified, modifying amendments are generally left Fix line spacing in 30.5.1.1.2 out. However, if they are to be included, at least 802.3cg and 802.3ch which modified these Response Response Status C tables should be included ACCEPT. SuggestedRemedy Delete "(as modified by ...)" from editing instructions for Tables 45-9 and 45-10 SC 45.2.1 P23 **L8** # 40 C/ 45 Response Response Status C Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe ACCEPT. Comment Type E Comment Status A Editing instruction lists modifying amendments to Table 45-3, and includes "802.3xx" which C/ 45 SC 45.2.1.7 P25 L18 does not exist. Additionally, omits at least 802,3cq-2019 and 802,3ch-2020, which Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe modified this table. Since most amendments modify this table, the 'modified by' list is generally left out. Comment Type E Comment Status A SuggestedRemedy 130.6.8, 71.6.10, 113.4.2.2, and 137.8.9 should be marked as external references in Table 45-9. Similarly for 130.6.9, 71.6.11, 89.5.9, and 137.8.10 in Table 45-10, and 130.6.5, Delete "(as modified by ... 802.3xx)" from editing instruction 71.6.6. 113.4.2.3. and 137.8.10 in Table 45-12 Response Response Status C SuggestedRemedy ACCEPT. Change references not in the draft to externals Response Response Status C ACCEPT.

Cl 45 SC 45.2.1.7.1 L20 # 8 Cl 56 SC 56.1.1 P34 L1 # 23 P25 Anslow, Pete Self Hajduczenia, Marek Charter Comment Type Ε Comment Status A Comment Type E Comment Status A Table 45-9 and Table 45-10 do not include "and" in any of the existing rows (although Table What does text in {} mean? 45-12 does). SuggestedRemedy SuggestedRemedy Use known designation for text and editorial instructions Delete all instances of "and" from Table 45-9 and Table 45-10 Response Response Status C Response Response Status C ACCEPT IN PRINCIPLE. ACCEPT. Delete "{from IEEE Std 802.3-2018}." Cl 45 SC 45.2.1.27a.4 P29 L25 168 CI 56 SC 56.1.1.1 P34 L18 # 43 Dudek. Mike Marvell Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe Comment Type TR Comment Status D Comment Type E Comment Status A 25GBASE-BR20-U should not be described in a section titles 25GBASE-BR40-D and it 66.1 and 66.2 (line 20) should be external cross references needs its own bit. SuggestedRemedy SuggestedRemedy Make this paragraph a different section with its own bit and title and renumber the rest of Change references not in the draft to externals the sub-clauses. Response Response Status C Proposed Response Response Status W ACCEPT. PROPOSED ACCEPT. Cl 56 SC 56.1.1.1 P34 / 18 Make "25GBASE-BR20-U ability (1.34.11)" a subsection Hajduczenia, Marek Charter C/ 45 SC 45.2.1.27b P31 L7 Comment Type ER Comment Status A Charter Hajduczenia, Marek External references (not live) are to be marked in Forest Green - "as defined in >>66.1<<" Comment Type TR Comment Status A SuggestedRemedy Title says "25G" and all entries show "50GBASE Multiple locations in the draft - please scrub accordingly. SuggestedRemedy Response Status C Response Fix the table title to say "50G PMA/PMD" ACCEPT IN PRINCIPLE.

Use suggested remedy to fix Table 45-31b title. Also fix Table 45-31a title as "10G and 25G..."

Response Status C

Table 45-31a, line 1.34.6. missing RO

ACCEPT IN PRINCIPLE.

Response

Other locations are Line 18 "66.1", line 20 "66.2"

Cl 56 SC 56.1.2.1 L40 # 25 Cl 56 SC 56.1.3 P37 L21 # 203 P34 Charter Hewlett Packard Enterprise Hajduczenia, Marek Law, David Comment Type E Comment Status A Comment Type Т Comment Status D Seems like subclause number is doubled? The title for Clause 49 is 'Physical Coding Sublayer (PCS) for 64B/66B, type 10GBASE-R' therefore the text in the Clause 49 heading in Table 56-2 should read '10GBASE-R PCS'. SuggestedRemedy This matches the existing Clause 66 column wich is labelled '1000BASE-X PCS, PMA' remove one instance of 56.1.2.1 even though the PCS is used to from the 1000BASE-LX10 and 1000BASE-BX10 PHYs. A similar changed needs to be made to the Clause 107 and 133 column headings. Response Response Status C SuggestedRemedy ACCEPT. Change '10GBASE-BRx PCS to read '10GBASE-R PCS' for the Clause 49 column heading, '25GBASE-BRx PCS' to read '25GBASE-R PCS' for the Clause 107 heading, and C/ 56 SC 56.1.2.1 P34 **L40** # 61 '50GBASE-BRx PCS' to read '50GBASE-R PCS' for the Clause 133 heading. Kramer, Glen Broadcom Proposed Response Response Status W Comment Type Comment Status A Ε PROPOSED ACCEPT. Subclause number repeated twice Group #244, 203, 204 SuggestedRemedy delete an extra "56.1.2.1" P37 Cl 56 SC 56.1.3 L21 # 204 Response Response Status C Law, David **Hewlett Packard Enterprise** ACCEPT. Comment Type Comment Status D The title for Clause 51 is 'Physical Medium Attachment (PMA) sublayer, type Serial' C/ 56 SC 56.1.3 P35 **L9** # therefore the text in the Clause 51 heading in Table 56-2 should read '10GBASE-R PMA'. Hajduczenia, Marek Charter This matches the existing Clause 66 column wich is labelled '1000BASE-X PCS, PMA' even though the PCS is used to from the 1000BASE-LX10 and 1000BASE-BX10 PHYs. A Comment Type E Comment Status A similar changed needs to be made to the Clause 109 and 153 column headings. None of the lists added in 56.1.3 need to be lettered, we do not reference them. SuggestedRemedy SuggestedRemedy Change '10GBASE-BRx PMA' to read '10GBASE-R PMA' for the Clause 51 column Convert lettered lists into bulleted ones heading, '25GBASE-BRx PMA' to read '25GBASE-R PMA' for the Clause 109 heading, and Other locations include page / line: 39/31, ' 50GBASE-BRx PMA' to read '50GBASE-R PMA' for the Clause 133 heading. Response Response Status C Proposed Response Response Status W ACCEPT. PROPOSED ACCEPT Group #244, 203, 204

Cl 56 SC 56.1.4 P37 L50 # 27 C/ 157 SC 157.1.2 P38 L31 # 30 Charter Charter Hajduczenia, Marek Hajduczenia, Marek Comment Type E Comment Status A Comment Type E Comment Status A 56.1.4 is empty Seems like "see Clause XXX" should be in (), or at least preceded with a comma SuggestedRemedy SuggestedRemedy Remove it please Add comma before "see" in lines 31, 33, and 35 Response Response Response Status C Response Status C ACCEPT. ACCEPT. C/ 157 SC 157 P38 L1 # 28 Page number is 39 Hajduczenia, Marek Charter C/ 157 SC P39 **L1** Comment Type E Comment Status A Baggett, Tim Microchip Title missing "and' when listing speeds Comment Type Ε Comment Status A SuggestedRemedy The term BiDi is used extensively throughout the document, but it there isn't a clear definition, nor is it found anywhere else in the existing standard. Change to "Introduction to 10 Gbps, 25 Gbps, and 50 Gbps BiDi PHYs" SuggestedRemedy Response Response Status C Consider if BiDi definition should be added to clause 1.4 ACCEPT IN PRINCIPLE. Response Response Status C Change to "Introduction to 10 Gb/s, 25 Gb/s, and 50 Gb/s BiDi PHYs" ACCEPT IN PRINCIPLE. C/ 157 SC 157.1.1 P38 / 11 # 29 Add "BiDi" as an abbreviation for "Bidirectional" in Clause 1.5 Hajduczenia, Marek Charter C/ 157 SC 157 P39 **L1** Comment Type ER Comment Status A Extra "-" in Net-work Anslow. Pete Self Comment Type E Comment Status A SuggestedRemedy 802.3 uses Gb/s rather than Gbps. See: Scrub the draft, there are multiple instances where likely import from Word resulted in http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#bps spurious "-" characters which states: "only Mb/s and Gb/s should be used" Response Response Status C SuggestedRemedy ACCEPT Change the title of Clause 157 to "Introduction to 10 Gb/s, 25 Gb/s, 50 Gb/s BiDi PHYs" Response Response Status C ACCEPT IN PRINCIPLE. Change to "Introduction to 10 Gb/s, 25 Gb/s, and 50 Gb/s BiDi PHYs"

C/ 157 SC 157.1.1 P39 L10 # 144 C/ 157 SC 157.1.3 P39 L39 Intel Corporation Lusted, Kent Baggett, Tim Microchip Comment Type TR Comment Status A Comment Type Ε Comment Status A the term "BiDi" is used repeatedly throughout the document as an abbreviation for There are six occurances of "Bidi" when I suspect the intention is "BiDi". Bidirectional. However, it is not defined as an abbreviation in the base standard. P39 L39 P44 L11 SuggestedRemedy P44 L17 Add "BiDi" as an abbreviation for "Bidirectional" in Clause 1.5 P44 L27 P44 L38 Response Response Status W P44 L45 ACCEPT. SuggestedRemedy C/ 157 SC 157.1.1 P39 L11 Search for "Bidi" and replace with "BiDi" Nicholl, Shawn Xilinx Response Response Status C Comment Type ER Comment Status A ACCEPT. Typo "Net-work" C/ 157 SC 157.1.3 P39 L47 # 221 SuggestedRemedy Trowbridge, Steve Nokia Replace "Net-work" with "Network" Comment Type E Comment Status D Response Response Status C The "x" should go as the next element of the list other than BR. The text describing x ACCEPT. should retain the hanging indent instead of wrapping back to the next line. SuggestedRemedy L23 C/ 157 SC 157.1.1 P39 197 See comment Law. David **Hewlett Packard Enterprise** Proposed Response Response Status W Comment Status D Comment Type T PROPOSED ACCEPT IN PRINCIPLE. The PMA sublayer is listed twice, yet the PMD sublayer is missing. In addition the list ends See#31, use a table similar to Table 141-6 for .3cp nomenclature with '... Coding Sublayer (PCS) sublayers and ...'. C/ 157 SC 157.1.3 P39 L47 # 75 SuggestedRemedy Suggest the text '... Physical Medium Attachment (PMA), Physical Medium Attachment Laubach, Mark Self (PMA), forward error correction (FEC), and Physical Coding Sublayer (PCS) sublayers ...' Comment Type E Comment Status A be changed to read '... Physical Coding Sublayer (PCS), forward error correction (FEC), For readability, suggest a tab physical medium attachment (PMA), physical medium dependent (PMD) sublayers ...'. Proposed Response Response Status W SuggestedRemedy add tabs to align "(40 km)..." under "Bidirectional" PROPOSED ACCEPT Response Response Status C ACCEPT IN PRINCIPLE. See #31, use a table as Table 141-6 for .cp nomenclature

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

C/ 157 SC 157.1.3 L53 # 170 C/ 157 SC 157.1.3 P41 L37 # 202 P39 Hewlett Packard Enterprise Dudek, Mike Marvell Law, David Comment Type т Comment Status D Comment Type т Comment Status D GMII is for 1G which isn't part of this project. The PCS used for all three PHY speeds in a 'BASE-R PCS', not a 'BASE-X PCS'. SuggestedRemedy SuggestedRemedy Change GMII to XGMII Suggest that the text '10GBASE-X PCS' be changed to read '10GBASE-R PCS', '25GBASE-X PCS' be changed to read '25GBASE-R PCS' and '50GBASE-X PCS' be Proposed Response Response Status W changed to read '50GBASE-R PCS'. PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. C/ 157 SC 157.1.3 P40 L5 # 44 Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe P41 # 156 C/ 157 SC 157.1.3 L37 Comment Type E Comment Status A Marris. Arthur Cadence Design Systems All phy names in Tables 157-1, 157-2, 157-3, and 157-4 have an extra hyphen (e.g., 10G-Comment Type Comment Status D TR BASE-BR10-D should be 10GBASE-BR10-D as it is elsewhere). These are BASE-R PCSes SuggestedRemedy SuggestedRemedy Change names in Table 157-1 to remove hyphen after speed Change BASE-X to BASE-R in Figure 157-1 Response Response Status C Proposed Response Response Status W ACCEPT. PROPOSED ACCEPT. # 10 C/ 157 SC 157.1.3 P40 **L** 5 C/ 157 SC 157.1.3 P41 L37 # 145 Anslow, Pete Self Lusted, Kent Intel Corporation Comment Status A Comment Type E Comment Type TR Comment Status D The draft contains 52 instances of "xxG-BASE", which should all be "xxGBASE" Figure 157-1 uses "10GBASE-X PCS", "25GBASE-X PCS", and "50GBASE-X PCS" in the The first example is in Table 157-1 where "10G-BASE-BR10-D" should be "10GBASE-BR10-D" architectural diagrams, which are not the correct names for these PCS layers. However, the PCS sections referenced in Table 157-2, 157-3, and 157-4 have them correct. SuggestedRemedy SuggestedRemedy Change all 52 instances of "xxG-BASE" to "xxGBASE" Change "10GBASE-X PCS" to "10GBASE-R PCS", "25GBASE-X PCS" to "25GBASE-R Response Response Status C PCS", and "50GBASE-X PCS" to "50GBASE-R PCS" ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT

C/ 157 SC 157.1.3 L40 # 211 C/ 157 SC 157.1.4 P42 L13 # 34 P41 Charter Law, David **Hewlett Packard Enterprise** Hajduczenia, Marek Comment Type т Comment Status D Comment Type E Comment Status A The MDI is part of the Physical Layer of the OSI reference model, see IEEE Std 802.3-Clause 158 should not be marked in gree, but linked live 2018 figure 1-1. SuggestedRemedy SuggestedRemedy Same applies to Tables 157-3, and 157-4 for Clauses 159, and 160, respectively Move the dotted line from the bottom of the Physical Layer to the bottom of the PMD box to Response Response Status C be from the bottom of the Physical Laver to the bottom of the MDI box. ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. C/ 157 SC 157.1.4 P42 L13 # 76 Laubach, Mark Self C/ 157 SC 157.1.3 P41 L47 # Ε Comment Status A Comment Type Charter Hajduczenia, Marek "158" is indicated forest green, yet it is included in this addendum. Same respective issue Comment Type ER Comment Status A on line 41 with "159". GMII is defined in Figure 157-1, but not used in the figure. XGMII, 25GMII, and 50GMII are SuggestedRemedy used and not defined change clause numbers included in this addendum tp active cross references. SuggestedRemedy Response Response Status C Fix the xMII definition issues ACCEPT IN PRINCIPLE Response Response Status C ACCEPT IN PRINCIPLE See#34, same change applies to Tables 157-3, and 157-4 for Clauses 159, and 160, respectively In Figure 157-1, remove "GMII = GIGABIT MEDIA INDEPENDENT INTERFACE", add "XGMII = 10 GIGABIT MEDIA INDEPENDENT INTERFACE", "25GMII = 25 GIGABIT SC 157.1.4 P42 # 201 C/ 157 L20 MEDIA INDEPENDENT INTERFACE", and "50GMII = 50 GIGABIT MEDIA INDEPENDENT Law. David Hewlett Packard Enterprise INTERFACE" Apply same changes to other figures using XGMII, 25GMII, and 50GMII Comment Type T Comment Status D As the title for Clause 49 is 'Physical Coding Sublayer (PCS) for 64B/66B, type 10GBASE-C/ 157 SC 157.1.4 P42 15 # 33 R', and since the 'PCS' column for Table 157-3 and 157-4 are labelled '25GBASE-R PCS' Hajduczenia, Marek Charter and '50GABSE-R PCS' respectively, please change the Table 157-2 'PCS' column to '10GBASE-R PCS'. Comment Type ER Comment Status A

SuggestedRemedy

Suggest that the text '64B/66B PCS' be changed to read '10GBASE-R PCS'.

Proposed Response Response Status W

PROPOSED ACCEPT.

In IEEE 802.3 standard, we do not use "must" except for specific cases outlined in Style

"PHY types must meet the requirements" - change to "shall"?

Response Status C

Manual

Response

SuggestedRemedy

ACCEPT

C/ 157 SC 157.1.4 L20 # 205 C/ 157 SC 157.2.2 P44 L15 # 214 P42 Hewlett Packard Enterprise Law, David **Hewlett Packard Enterprise** Law, David Comment Type Т Comment Status D Comment Type т Comment Status D Clause 46 specifies the XGMII, not the GMII. Suggest that '... the MII ...' should be changed to read '... the xMII ...' hear and on line 17. SuggestedRemedy SuggestedRemedy See comment. Change the text 'GMII' to read 'XGMII' in the right hand Clause 46 column. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. # 235 C/ 157 SC 157.1.4 P42 L36 C/ 157 SC 157.2.2 P44 L16 # 65 Thompson, Geoff GraCaSI S.A./Independent Kramer, Glen Broadcom Comment Type ER Comment Status D Comment Type Comment Status A Е The way Table 157-3 is split across the page break is, at a minimum, confusing. It needs The draft uses "sublayer" everywhere except in three places on page 44, where it uses to be controlled appropriately. SuggestedRemedy SuggestedRemedy Remove hyphens in "sub-layer" on lines 16 (two ninstances) and line Keep the table on a single page or pro-actively control the row split at a logical point with new column headings on the new page. Change the title on the 2nd piece to Table 157-3 Response Response Status C (continued). ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. SC 157.2.4 C/ 157 P44 L35 # 237 Remove all BR40+ items, try to keep table on a single page GraCaSI S.A./Independent Thompson, Geoff C/ 157 SC 157.2.1 P44 L11 # 45 Comment Type TR Comment Status D The statement "The PMA also may provide an observable electrical interface for the Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe 25GAUI or 50GAUI chip-to-chip 35 (C2C) or chip-to-module (C2M)." has no meaning within Comment Type E Comment Status A the scope of the standard. Anything that is not forbidden in the standard may be provided. Is it BiDi or Bidi ...? SuggestedRemedy SuggestedRemedy If optional standardized test points are specified or called out then say so. If that is not the Change Bidi to BiDi on P44, Lines 11, 17, 24, 38, 45, and page 39 line 39 case then delete the text.

This follows last sentence in 105.3.4

Proposed Response

PROPOSED REJECT.

Response

ACCEPT.

Response Status C

Response Status W

C/ 157 SC 157.4 L18 # 238 P45

Thompson, Geoff GraCaSI S.A./Independent

Comment Type TR Comment Status D

I believe that PAUSE operation is not the only reason that demands that there be an upper bound on the propagation delays through the network. I am given to understand that both maximum and minimum transit time need to be specified to support TSN.

SuggestedRemedy

Generalize the reasons for specifying delay and include specification of minimum delay as well.

Proposed Response Response Status W

PROPOSED REJECT.

Remedy is not specific enough.

Can you please provide an 802.3 reference clause for the minimum delay constrain spec?

C/ 157 SC 157.4 P45 1 25 # 72 Xilinx

Comment Status A ER Comment Type

Currently, the sentence reads "The maximum delay ... are specified". This is improper grammar.

SuggestedRemedy

Nicholl, Shawn

Proposed to replace "The maximum delay for" with "The maximum delay values for". Another alternative is "The maximum delay constraints for".

Response Response Status C

ACCEPT

Replace it with "The maximum delay constraints for" in 3 places

C/ 157 SC 157.6 P45 L43 # 66

Kramer, Glen Broadcom Comment Type Т Comment Status A

"All members of the Multi-Gigabit Ethernet BiDi PHY family are required to include PCS registers or variable equivalents that:

- 1) indicate the receive status of the PCS (see 49.2.14.1 and 45.2.3.15.1), and
- 2) disable the PHYs transmitter(see 45.2.1.8)."

As described, both OLT and ONU will disable the transmitter. This is not what should happen.

SuggestedRemedy

The setting to use silent mode must be pre-configured before a device is connected to a network. Using PCS registers or variables is an implementation choice irrelevant here. It is better to introduce Active/Passive Mode for all BRx PHY. If BRx is pre-configured to be in Active Mode, it does not disable the TX. In Passive Mode, the TX disabled until a valid Rx is confirmed. (see 57.2.9 for a similar issue resolved for OAM peers)

Response Response Status C

ACCEPT IN PRINCIPLE.

Add "ONU" to subclause 157.6 title.

At the end of 157.6, add a note "Note silent start does not apply to the OLT PHY types."

C/ 157 SC 157.6 P45 # 213 L45

Law. David Hewlett Packard Enterprise

Comment Type ER Comment Status D

I'm not sure if it is the case that 'The access network ... by nature, are less well controlled than other telecommunications networks.', but I don't see a need to provide this text.

SuggestedRemedy

Replace the entire first paragraph of subclause 157.6 with the text 'Silent Start is provided by Multi-Gigabit Ethernet BiDi ONU PHYs to reduce the likelihood of disruption to established services if a Multi-Gigabit Ethernet BiDi ONU PHY is inadvertently attached to a Point-to-Multipoint network.'.

Proposed Response Response Status W PROPOSED ACCEPT.

C/ 157 SC 157.6 L46 # 212 C/ 157 SC 157.6 P46 L10 # 67 P45 Kramer, Glen Law, David **Hewlett Packard Enterprise** Broadcom Comment Type Е Comment Status D Comment Type т Comment Status A If my comment to replace this paragrpah is not accepted, suggest that '... are, by nature, "Once transmission is enable it should not be disabled until the receive signal is lost." less well ...' should be changed to read '... are, by their nature, less well ...'. SuggestedRemedy SuggestedRemedy This sentence is not intended as an optional requirement and no corresponding PICS exists. Also, a typo in "is enable". Proposed Response Response Status W Rephrase as "Once transmission is enabled, it is not be disabled until the receive signal is PROPOSED REJECT. lost " See #213 resolution A better explanation would be this: "Once transmission is enabled, it remains enabled until the optical receive power is lost, C/ 157 SC 157.6 P45 L52 # 35 even if the PCS detects the received signal fault." Hajduczenia, Marek Charter Response Response Status C Comment Status A Comment Type ER ACCEPT IN PRINCIPLE A hidden "shall" in "All members of the Multi-Gigabit Ethernet BiDi PHY family are required to include PCS registers" Remove this sentence, See #37 SuggestedRemedy C/ 157 SC 157.6 P46 L10 # 37 convert this text into "shall" statement if this is intended as a requirement. Otherwise. Hajduczenia, Marek Charter soften the language. Comment Type Comment Status A Response Response Status C Is this intended to be an optional requirement: "Once transmission is enable it should not ACCEPT IN PRINCIPLE. be disabled until the receive signal is lost." SuggestedRemedy Change "are required to" to "shall". Add Clause 49 to the first sentence of 157.7 Add to PICS if intended, or change the language to avoid "should" C/ 157 SC 157.6 P46 *L*1 # 36 Response Response Status C ACCEPT IN PRINCIPLE. Hajduczenia, Marek Charter Comment Type E Comment Status A Remove this sentence Missing space in "transmitter(see" See #67 SuggestedRemedy

Add missing space

Response Status C

Response

ACCEPT.

C/ 158 SC 158.1 P47 **L7** # 186 Stassar, Peter Huawei Comment Type ER Comment Status A Despite the fact that in the past for 10G PHYs reference was made to "baseband medium" in more recent optical PMDs this term has not been used, as in new clauses 159 and 160. Also no reference is made to "serial" in 159.1 and 160.1, so it shouldn't be needed in 158.1. Thus comments also applies to 159.1 and 160.1 SuggestedRemedy Make wording consistent with 159.1 and 160.1 Response Response Status C ACCEPT IN PRINCIPLE. Change first sentence in 158.1 to "This clause specifies the 10GBASE-BR10, 10GBASE-BR20. 10GBASE-BR40. and 10GBASE-BR40+ PMDs together with the single-mode fiber medium."

 C/
 158
 SC
 158.1
 P47
 L17
 # 46

 Zimmerman, George
 ADI, Cisco, CommScope, Marvell, SenTekSe

Comment Type E Comment Status A

"defined in 45" - the cross reference should read "Clause 45" (same thing in 159.1 and 160.1)

SuggestedRemedy

Change cross reference to read "Clause 45"

Response Status C

ACCEPT.

CI 158 SC 158.1 P47 L32 # 210

Law, David Hewlett Packard Enterprise

Comment Type TR Comment Status D

According to Table 158–1, Clause 108 RS—FEC is optional for both a 10GBASE-BR10 and 10GBASE-BR40 PHY. It is not clear that a 10GBASE-BR10 PHY that implements the optional RS-FEC sublayer can interoperate with a 10GBASE-BR10 PHY that does not implement the optional RS-FEC sublayer. Since the IEEE P802.3cp nomenclature doesn't provide a way to indicate if a 10GBASE-BR10 or a 10GBASE-BR40 PHY does or does not implement optional FEC, it appears that user has no way to know if a 10GBASE-BR10 or a 10GBASE-BR40 PHY implements RS-FEC or not. This seems to mean that a user won't know if one particular 10GBASE-BR10 PHY will interoperate with another 10GBASE-BR10 PHY, similarly for any two 10GBASE-BR40 PHYs.

SuggestedRemedy

If a 10GBASE-BR10 (or 10GBASE-BR40) PHY that implements the optional RS-FEC sublayer can't interoperate with a 10GBASE-BR10 (or 10GBASE-BR40) PHY that does not implement the optional RS-FEC sublayer, add a way to indicate if the optional RS-FEC sublayer is implemented to the IEEE P802.3cp nomenclature.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

BR10 and BR40 do not need RS-FEC. Suggest changing the cell in Table 158-1 from "optional" to "not required"

C/ 158 SC 158.1 P47 L34 # 77

Laubach, Mark Self

Comment Type **E** Comment Status **A**Cross reference not colored in table footnote.

SuggestedRemedy

Change "Clause 108" for forest green.

Response Status C

ACCEPT.

CI 158 SC 158.1.1 P47 L45 # 47

 ${\sf Zimmerman, George} \qquad \qquad {\sf ADI, Cisco, CommScope, Marvell, SenTekSe}$

Comment Type TR Comment Status D

The BER is specified to be at the "PHY service interface" - I can't find any other reference to a "PHY service interface" in this draft. Clauses 58, 59, and 75 use the term as well, but it is undefined. Clause 113 (25GBASE-T) defines its PHY service interface as the 25GMII (see 113.1.2). However, this clause is only specifying a PMD sublayer, and references a PMD service interface elsewhere - as just a PMD, Clause 158 cannot specify a BER at the xMII. Is the PMD service interface meant? (otherwise this requirement needs to go in the PMA, and something needs to be partitioned to the PMD)

SuggestedRemedy

Change "PHY service interface" to "PMD service interface"

Proposed Response Status W

PROPOSED ACCEPT.

C/ 158 SC 158.5.1 P49 L37 # 64

Kramer, Glen Broadcom

Comment Type E Comment Status A

Per IEE style manual, the word "will" is deprecated.

SuggestedRemedy

Change the sentences containing "will" to use present tense at the following locations:

P49-L37

P56-L20

P56-L21

P68-L2

P86-L37

Response Response Status C

ACCEPT.

C/ 158 SC 158.5.2

P**49**

L40

78

Laubach, Mark

Comment Type T

PMD_UNITDATA.request is neither defined or referenced in this draft. Same for

Self

Comment Status A

PMD UNITDATA.indication on line 49.

SuggestedRemedy

Response

Either provide the definitions of these functions in this draft or a cross reference to where

they are defined.

Response Status C

ACCEPT IN PRINCIPLE.

52.1.1.1 defines PMD_UNITDATA.request, 52.1.1.2 defines PMD_UNITDATA.indication.

Use them as cross references in Lines 40 and 49 and use forest green color.

Cl 158 SC 158.5.2 P49 L44 # 79

Laubach, Mark Self

Comment Type T Comment Status D

and line 50. The constant "ONE" is not defined in this draft. There are only these two occurences.

SuggestedRemedy

Definitions should be fixed when implementing the proposed change for

PMD_UNITDATA.request and PMD_UNITDATA.indication.

Proposed Response Response Status Z

REJECT.

This comment was WITHDRAWN by the commenter.

802.3 convention ONE is a well-known constant

C/ 158 SC 158.5.6 P51 L11 # 48

Zimmerman, George ADI, Cisco, CommScope, Marvell, SenTekSe

Comment Type E Comment Status A

It seems the font size in 158.5.6 has gotten smaller.

SuggestedRemedy

Correct font size in 158.5.6 to be consistent with the rest of the draft

Response Status C

ACCEPT.

C/ 158 L11 # 73 C/ 158 SC 158.6.2 P53 **L40** SC 158.5.6 P51 Xilinx Stassar, Peter Nicholl, Shawn Huawei Comment Type ER Comment Status A Comment Type TR Comment Status A Small font in paragraphs in this sub-clause. It looks different than surrounding sub-clauses. In latest optical PMD specifications no longer "Receive electrical 3 dB upper cutoff frequency (max)" is included because it cannot be measured at TP3 and is part of the SuggestedRemedy implementation Check the font and paragraph spacing in this sub-clause. SuggestedRemedy Response Response Status C Remove row for "Receive electrical 3 dB upper cutoff frequency (max)" ACCEPT. Response Response Status C ACCEPT C/ 158 SC 158.6.1 P52 L29 # 218 Law. David **Hewlett Packard Enterprise** P54 L14 C/ 158 SC 158.6.3 Comment Status D Comment Type TR Stassar, Peter Huawei Doesn't the -D PHY Tx centre wavelength range have to match the -U PHY Rx centre TR Comment Status A Comment Type wavelength range, and vice versa? As an example, the 10GBASE-BRx-D PHY Tx centre It doesn't make sense to have 15 dB for 20km and 18 dB for 40km. 15 dB would rather be wavelength (range) is 1320 to 1340 nm in Table 158-6 (page 52, line 29) which is the same as the 10GBASE-BRx-D PHY Rx centre wavelength (range) of 1320 to 1340 nm in Table a channel loss for a 30km channel as in clause 114 for 25GBASE-ER. Also applies to 159 and 160 158-7 (page 53, line 24), while the 10GBASE-BRx-U PHY Rx centre wavelength (range) is 1260 to 1280 nm in Table 158-7 (page 53, line 26). This doesn't seem correct. SuggestedRemedy SuggestedRemedy Define an appropriate channel insertion loss for 20km, e.g. 11 or 12 dB, and optimize power values in Table 158-6 and Table 158-7. Also in 159 and 160 Correct here, and for other PHYs, if necessary. Response Response Status U Proposed Response Response Status W ACCEPT IN PRINCIPLE. PROPOSED REJECT. Editorial license: To justify 15 dB add text to describe 0.5 dB/km fiber loss and 5 dB connection loss in Clauses 158-160

BRx-U and BRx-D use different wavelengths

Response

C/ 158 SC 158.6.3 P54 L14 # 191 # 80 C/ 158 SC 158.6.1 P52 L48

SuggestedRemedy

Stassar, Peter Huawei Laubach, Mark Self

Comment Type TR Comment Status R Comment Type Т Comment Status A Channel insertion loss numbers do not add up using the attenuation coefficient and the

and line 50. The unit cells are blanks for eve mask. Same for Table 159-6 on page 71. Table 159-7 on page 72.

SuggestedRemedy

Response Status C

Insert "UI" for the Unit value in the table for these two rows (or other appropriate unit value).

Make numbers consistent for channel insertion loss in Clauses 158, 159 and 160 ACCEPT IN PRINCIPLE. Response

Response Status U REJECT Use a long dash to the two unit cells

No consensus reached from the group to make changes to the draft.

182

allocation for connector and splice loss of 2 dB. This comment is related to another

PMDs and make numbers consistent between Clauses 158, 159 and 160.

comment requesting a change in attenuation coefficient. Compare with other recent optical

C/ 158 SC 158.6.3 L21 # 81 C/ 158 SC 158.8 P54 L47 # 178 P54 Self Stassar, Peter Laubach, Mark Huawei Comment Type Ε Comment Status A Comment Type TR Comment Status A Suggest a cross reference for table footnote c. The dispersion equation provides too high values for current latest G.652 fibers. Value of 0.2325 should be 0.23. Applies also to 160.7 SuggestedRemedy SuggestedRemedy Add a cross reference to CL158.11.1 Change 0.2325 to 0.23. In Clauses 158 and 160 Response Response Status C Response Response Status C ACCEPT IN PRINCIPLE. ACCEPT. Remove the second sentence beginning with "Attenuation" from footnote c. C/ 158 SC 158.8 P 54 L49 # 179 See#194 Stassar, Peter Huawei # C/ 158 SC 158.6.3 P54 1 22 190 Comment Type TR Comment Status A Stassar, Peter Huawei The dispersion equation provides too high values for current latest G.652 fibers. Value of Comment Type TR Comment Status R 0.465 should be 0.46. Applies also to 160.7 An attenuation of 0.4 dB/km is used, 0.43 dB/km in Table 159-8 and 0.5 dB/km in Table SuggestedRemedy 160-6. Use a single value for all 3 clauses, preferably 0.5 dB/km to make the specifications Change 0.465 to 0.46. In Clauses 158 and 160 consistent. Now they are all different. Applies similarly to 159 and 160 Response SuggestedRemedy Response Status C Change loss to 0.5 dB/km consistent with other recent PMDs like P802.3cu in 158 and 159 ACCEPT. and with clause 160 SC 158.8 P54 C/ 158 L 51 180 Response Response Status U Stassar, Peter Huawei REJECT. Comment Type TR Comment Status A No consensus reached from the group to make changes to the draft. The dispersion equation provides too high values for current latest G.652 fibers. Value of 0.93 should be 0.92. Plus the negative dispersion is not zero but similar equation as for # 189 C/ 158 SC 158.6.3 P54 L22 minimum dispersion for 20km but with 0.92 as a coefficient. Applies also to 160.7 Stassar, Peter Huawei SuggestedRemedy Comment Type TR Comment Status A Change 0.93 to 0.92, plus add equation for minimum dispersion. In Clauses 158 and 160 Reference is made to Table 52-11 and cross reference is missing. Change to Table 158-5 Response Response Status C with cross reference

ACCEPT IN PRINCIPLE.

SuggestedRemedy

Change to Table 158-5 with cross reference

Response Response Status C

ACCEPT.

Revise values in Comments #178-180 and apply changes to dispersion values

Topic

Cl 158 SC 158.9 P55 L6 # 94

Grow, Robert RMG Consulting

Comment Type TR Comment Status A

An indirect reference like this should not be used because of the difficulty of properly maintaining the document. Because the subclauses of 52.10 specifically reference port types, it could be argued that the requirements do not apply because clause 52 does not reference 10BASE-BRx port types.

SuggestedRemedy

A general safety subclause should copy P802.3cr 52.10.1, and the other clauses can copy the relevant subclauses of the latest revision or amendment that changes the text of the relevant subclause.

If indirection is still desired, the port type lists in Clause 52 need to be deleted (preferred) or expanded to include 10GBASE-BRx.

Response Status U

ACCEPT IN PRINCIPLE.

See #184, editorial license to add safety requirements as .3cu, .3ct

C/ 158 SC 158.9 P55 L6 # 184

Stassar, Peter Huawei

Comment Type TR Comment Status A

Safety requirements have recently been changed. Please refer to P802.3cu requirements. Also applies to 159 and 160

SuggestedRemedy

Implement safety requirements as in P802.3cu D2.2 151.9. Also in 159.8 and 160.8

Response Status C

ACCEPT IN PRINCIPLE.

Follow .3cu D3.0 to refer to J.2, apply same statement to Clauses 159 and 160.

CI 158 SC 158.10 P56 L4 # 216

Law, David Hewlett Packard Enterprise

Comment Type T Comment Status D

The vertical bar separating the top two rows of Table 158–10 'Fiber optic cabling (channel) characteristics' seem to exclude the fibre type and wavelength rows for 40+ which doesn't seem to be correct.

SuggestedRemedy

Delete the vertical bar separating the top two rows of Table 158–10.

Proposed Response Response Status W

PROPOSED ACCEPT.

Cl 158 SC 158.10 P56 L12 # 193

Stassar, Peter Huawei

Comment Type TR Comment Status A

Reference is made to Table 158-9 so that the reader will need to calculate maximum dispersion numbers themselves. Chromatic dispersion values at nominal wavelengths are likely to provide too optimistic estimates for worst case TDP (or TDECQ in 160). The applicable values at extreme wavelengths need to be in this Table as in other recent optical PMDs. Also applies to 159 and 160

SuggestedRemedy

Add chromatic dispersion numbers at extreme wavelengths for each PMD, e.g. as in Clause 114, Table 114-11 for 25GBASE-LR/ER and use similar Table formatting as for Clause 114.

Response Status C

ACCEPT IN PRINCIPLE.

Editorial license to calculate "Positive dispersion (max)" and "Negtive dispersion (min)", fill into Table 158-10, update Note d.

C/ 158 SC 158.11.1 L33 # 194 C/ 158 SC 158.12.4.3 P61 L19 # 38 P56 Stassar, Peter Huawei Charter Hajduczenia, Marek Comment Type TR Comment Status A Comment Type ER Comment Status A For recent optical PMDs, reference is made to ITU-T G.652 or G.657 fibers as in P802.3cu. Empty subclause or table anchor was moved? Also applies to 159.10 and 160.10 SuggestedRemedy SuggestedRemedy Fix the table placement Change to fiber types in P802.3cu, D2.2, Subclause 151.11.1 "The optical fiber cable The same applies for 158.12.4.5, 158.12.4.8 requirements are satisfied by cables containing ITU-T G.652.B (dispersion unshifted), type Response Response Status C G.652.D (low water peak, dispersion unshifted), or type G.657.A1, or type G.657.A2 (bend ACCEPT. insensitive) fibers...." or similar. In 158, 159 and 160 Response Status C Response C/ 158 SC 158.12.4.3 P61 L21 ACCEPT IN PRINCIPLE Dell FMC Lewis. Jon Editorial license to change reference to ITU-T G.652 or G.657 fibers as in P802.3cu. Comment Type Ε Comment Status A Headings are listed with the tables out of order. Table with BR101 should be before C/ 158 SC 158.12.2.2 P58 / 40 # 54 158.12.4.4 Lewis, Jon Dell EMC SuggestedRemedy Comment Status A Comment Type E Move Table with BR101 above the heading line for 158.12.4.4 Date is shown specifically and should be 202x as the draft isn't published Response Response Status C SuggestedRemedy ACCEPT. Change "IEEE Std 802.3cp-2020" to "IEEE Std 802.3cp-202x" SC 158.12.4.5 P62 **L3** C/ 158 Response Status C Response Lewis. Jon Dell FMC ACCEPT. Comment Type Ε Comment Status A Global update of this item Headings are listed with the tables out of order. Table with BR401 should be before 158.1.4.6 # 82 C/ 158 SC 158.12.4.3 P61 L19 SuggestedRemedy Self Laubach, Mark Move Table with BR401 above the heading line for 158.12.4.6 Comment Status A Comment Type Ε Response Response Status C This subclause looks empty. Same for 158.12.4.5 on the next page. And same for 158.12.4.8. ACCEPT. SuggestedRemedy Adjust framemaker to have the tables flow properly with the headings.

Response

ACCEPT.

Response Status C

39 C/ 158 SC 158.12.4.7 L32 C/ 158 SC 158.12.4.9 P63 L8 # 95 P62 Charter Grow, Robert RMG Consulting Hajduczenia, Marek Comment Type Ε Comment Status A Comment Type TR Comment Status A Text format in 158.12.4.7 table is incosistent with the rest of PICS tables In E1 through E4, the subclause should not be pointing to something in clause 52. SuggestedRemedy SuggestedRemedy Align the formatting Point to whatever the result is in clause 158 based on changes from other comments. Response Response Response Status C Response Status C ACCEPT. ACCEPT. # 57 C/ 158 SC 158.12.4.8 P63 L3 Point to 158.9 Lewis, Jon Dell EMC C/ 158 SC 158.12.4.8 P63 **L8** # 58 Comment Type Comment Status A Ε Lewis, Jon Dell EMC Headings are listed with the tables out of order. Table with ES1 should be before Comment Type TR Comment Status A 158.12.4.9 Clause 52 is currently part of P802.3cr. The referenced text needs to align with P802.3cr. SuggestedRemedy SuggestedRemedy Move Table with ES1 above the heading line for 158.12.4.9 Change the Value/Comment field to "Conforms with J.2" where J.2 is green for external Response Response Status C cross reference. ACCEPT. Response Response Status W ACCEPT. # 96 C/ 158 SC 158.12.4.9 P63 **L8** Grow, Robert RMG Consulting C/ 159 SC 159.1 P65 **L8** # 74 Comment Type TR Comment Status A Nicholl, Shawn Xilinx E1 is not properly written. P802.3cr is eliminating references to IEC 60950-1. Comment Type ER Comment Status A SuggestedRemedy PMDS should have a lowercase "S". The PICs should point to J.2 which is being inserted by P802.3cr. If indirection is retained, SuggestedRemedy the PICs could be written more like E1 in Clause 159 to eliminate a contradiction to Replace "PMDS together" with "PMDs together" P8023cr. Response Response Response Status U Response Status C ACCEPT.

See #184, follow .3cu D3.0 to refer to J.2, apply same statement to Clauses 159 and 160.

ACCEPT IN PRINCIPLE.

C/ 159 SC 5.4 **L9** # C/ 159 SC 159.6.1 P71 L15 # 134 P69 ZTE TX Inc DeAndrea, John Finisar/ /II-VI Wey, Jun Shan Comment Type Т Comment Status A Comment Type TR Comment Status A Table 159-4 The Table shows a value of -20 dBm for 25GBASE-BR10 and -26 dBm for Propose to revise Average launch power (min) for BR40+ in Table 159-6 in order to align with the ITU-T G.9806 25GBASE-BR-10. I believe there is a typo, because the PMD has (4) types, -BR10. -BR20, -BR40, and -BR40+ SuggestedRemedy SuggestedRemedy Table 159-6 Suggest modifying, from "-26 dBm for 25GBASE-BR-10" to "-26 dBm for 25GBASE-BR-20" Revise the average launch power (min) spec from +2 dBm to +0.5 dBm Response Response Status C Response Response Status C ACCEPT IN PRINCIPLE. ACCEPT IN PRINCIPLE. See #187. BR40+ PHYs are removed from this document See #1, Change text to show -20 dBm is for BR10, -26 dBm is for BR20/40 L15 # 133 C/ 159 SC 159.6.1 P71 C/ 159 SC 5.4 P69 **L9** Wev. Jun Shan ZTE TX Inc DeAndrea, John Finisar/ /II-VI Comment Type Comment Status A TR Comment Type Comment Status A Propose to revise Average launch power (min) for BR20 in Table 159-6 in order to align Table 159-4, SIGNAL DETECT value, FAIL, outlines (2) average powers for the PMD with the ITU-T G.9806 options. of (4) types. -10. -20. -40. and -40+ SuggestedRemedy SuggestedRemedy Table 159-6 Suggested change: add other (2) PMD types and comment for power levels Revise the average launch power (min) spec from -6 dBm to -7.5 dBm Response Response Status C Response Response Status C ACCEPT IN PRINCIPLE. ACCEPT. Change text to show -20 dBm is for BR10, -26 dBm is for BR20/40 C/ 159 SC 159.6.1 P71 L21 # 136 C/ 159 SC 159.5.4 P69 L13 # 172 ZTE TX Inc Wey, Jun Shan Dudek. Mike Marvell Comment Type TR Comment Status A Comment Type TR Comment Status D Propose to revise Optical Modulation Amplitude (min) for BR40+ in Table 159-6 in order to align with the ITU-T G.9806 It is inappropriate in a standard to say "and poor 25GBASE-BR20 is left to the wind". SuggestedRemedy SuggestedRemedy Table 159-6 This problem needs to be fixed to create an inter-operable standard. Revise the Optical Modulation Amplitude (min) spec from +5.0 dBm to +3.5 dBm Proposed Response Response Status W Response Response Status C PROPOSED ACCEPT IN PRINCIPLE. ACCEPT IN PRINCIPLE.

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

See #1, Change text to show -20 dBm is for BR10, -26 dBm is for BR20/40

Page 22 of 52 7/19/2020 10:55:52 PM

See #187, BR40+ PHYs are removed from this document

Topic

C/ 159 SC 159.6.1 P71 # 135 C/ 159 SC 159.6.2 P72 L17 # 140 L21 Wey, Jun Shan ZTE TX Inc ZTE TX Inc Wey, Jun Shan Comment Type TR Comment Status A Comment Type TR Comment Status A Propose to revise Optical Modulation Amplitude (min) for BR20 in Table 159-6 in order to Propose to revise Average receive power (min) for BR 40+ in Table 159-7 in order to align with the ITU-T G.9806 align with the ITU-T G.9806 SuggestedRemedy SuggestedRemedy Table 159-6 Table 159-7 Revise the Optical Modulation Amplitude (min) spec from -3.0 dBm to -4.5 dBm Revise the Average receive power (min) spec from -21.0 dBm to -22.5 dBm Response Response Status C Response Response Status C ACCEPT. ACCEPT IN PRINCIPLE. See #187. BR40+ PHYs are removed from this document C/ 159 SC 159.6.1 P71 L22 # 137 C/ 159 SC 159.6.2 P72 L17 # 139 Wey, Jun Shan ZTE TX Inc Wey, Jun Shan 7TF TX Inc. Comment Type TR Comment Status A Comment Status A Comment Type TR Propose to revise Launch power OMA minus TDP (min) for BR20 in Table 159-6 in order to Propose to revise Average receive power (min) for BR 20 in Table 159-7 in order to align align with the ITU-T G.9806 with the ITU-T G.9806 SuggestedRemedy SuggestedRemedy Table 159-6 Table 159-7 Revise the Launch power OMA minus TDP (min) spec from -4.0 dBm to -5.5 dBm Revise the Average receive power (min) spec from -21.0 dBm to -22.5 dBm Response Response Status C Response Response Status C ACCEPT. ACCEPT. 138 C/ 159 SC 159.6.1 P71 L22 # C/ 159 SC 159.6.2 P72 L23 142 Wev. Jun Shan 7TF TX Inc. Wey, Jun Shan ZTE TX Inc Comment Status A Comment Type TR Comment Type TR Comment Status A Propose to revise Launch power OMA minus TDP (min) for BR40+ in Table 159-6 in order Propose to revise Rx sensitivity (max) in OMA for BR 40+ in Table 159-7 in order to align to align with the ITU-T G.9806 with the ITU-T G.9806 SuggestedRemedy SuggestedRemedy Table 159-6 Table 159-7 Revise the Launch power OMA minus TDP (min) spec from +4.0 dBm to +2.5 dBm Revise the Rx sensitivity (max) in OMA spec from -19.0 dBm to -20.5 dBm

Response

ACCEPT IN PRINCIPLE.

Response

ACCEPT IN PRINCIPLE.

Response Status C

See #187, BR40+ PHYs are removed from this document

Response Status C

See #187, BR40+ PHYs are removed from this document

C/ 159 SC 159.6.2 L23 # 141 C/ 159 SC 159.8 P73 L33 # 97 P72 Wey, Jun Shan ZTE TX Inc RMG Consulting Grow, Robert Comment Type TR Comment Status A Comment Type ER Comment Status A Propose to revise Rx sensitivity (max) in OMA for BR 20 in Table 159-7 in order to align The indirection is getting a bit absurd. This points to 114.8, and 114.8 points to 112.8. with the ITU-T G.9806 Then you have the same problem of 112.8 specifications being specific to 25GBASE-SR. SuggestedRemedy SuggestedRemedy If still using indirection, remove the two levels of indirection and point to 112.8. Fix Table 159-7 corresponding PICS items in 159.11.4.8. Revise the Rx sensitivity (max) in OMA spec from -19.0 dBm to -20.5 dBm Response Response Response Status C Response Status U ACCEPT. ACCEPT IN PRINCIPLE. Editorial license to use content in 802.3cu D2.2 Clause 151.9 for .3cp 159.8 C/ 159 SC 159.6 P73 L19 # 83 Laubach, Mark Self C/ 159 SC 159.11.2.2 P76 L42 Comment Type Ε Comment Status A Lewis. Jon Dell FMC 88 11 2 1 needs to be an indicated cross reference Comment Type E Comment Status A SuggestedRemedy Date is shown specifically and should be 202x as the draft isn't published Change text color to forest green SuggestedRemedy Response Response Status C Change "IEEE Std 802.3cp-2020" to "IEEE Std 802.3cp-202x" ACCEPT. Response Response Status C ACCEPT. SC 159.7 P73 C/ 159 L20 # 183 Stassar, Peter Huawei C/ 160 SC 160.3 P85 # 195 Comment Type TR Comment Status A Stassar, Peter Huawei By referring to 114.7 automatically all the requirements of 114 are followed, introducing a Comment Type TR Comment Status A lot of differences with the values in 159.6. Add full details as in other reject optical PMDs Skew constraints as in 139.3.2 as missing and apply all changes appropriate for 159. Especially the channel requirement in 114.7 refer to 88.8.5.2. Missing are requirements for 20km. Also applies to 158.8 referring to 52.9 SuggestedRemedy and 160.7 referring to 139.7 Add skew constraints consistent with 139.3.2 SuggestedRemedy Response Response Status C Add full details as in other reject optical PMDs and apply all changes appropriate for 159,

Add full details as in other reject optical PMDs and apply all changes appropriate for 159 and also 158 and 160. Including table for Transmitter compliance channel specifications

Response Status C

ACCEPT IN PRINCIPLE.

Line number should be 26.

SORT ORDER: Topic

Editorial license to make inline changes to 114.7 (25G), 52.9 (10G),139.7/CU/140/151

ACCEPT IN PRINCIPLE.

139.3.2 to Clause 160.

Add "and Skew" to the title. Editorial license to add skew constraints consistent with

C/ 160 L42 # 174 C/ 160 SC 160.6 P88 L 54 # 227 SC 160.5.4 P87 Dudek, Mike Marvell Maki, Jeffery Juniper Networks Comment Type TR Comment Status D Comment Type TR Comment Status D The average receive power min fo BR20 etc. is -17.6dB. So a power of -17dB should have "The 50GBASE-BR40 PMD interoperates with the 50GBASE-BR10...". The 50GBASEsignal detect =OK, but the other line says <-16dB is Fail. It can't meet both lines BR40 transmit and receive wavelength is not compatible with 50GBASE-BR10. 50GBASE-BR10-D center wavelengths (range): 1320nm to 1340 mm SuggestedRemedy 50GBASE-BR10-U center wavelengths (range): 1260nm to 1280 nm Change the signal detect FAIL level from <-16dBm to <-20dBm for BR20 etc. 50GBASE-BR40-D center wavelengths (range): 1306nm to 1322nm 50GBASE-BR40-U center wavelengths (range): 1281nm to 1297nm Proposed Response Response Status W SugaestedRemedy PROPOSED ACCEPT. Remove 50GBASE-BR10 PMD as an example of interoperability with the 50GBASE-BR40 C/ 160 SC 160.6 P88 1 52 # 220 PMD leaving one example, the 50GBASE-BR20 PMD. Hewlett Packard Enterprise Proposed Response Response Status W Law. David PROPOSED ACCEPT IN PRINCIPLE. Comment Type Comment Status D See#181 to add interop content The text 'A PMD that exceeds the operating range requirement ...' is followed by the example 'e.g., a 50GBASE-BR10 PMD operating at 2.5 km ...'. This however isn't an P89 # 84 C/ 160 SC 160.6.1 L14 example of a PMD that exceeds the operating range requirement as 2.5 km is within the operating range requirement of 2 m to 10 km. Laubach, Mark Self Comment Type Ε Comment Status A SuggestedRemedy 121.8.5.3 needs to be an indicated cross reference. Same in footnote of next table. Suggest that the text '... at 2.5 km ...' be changed to read '... at 12.5 km ...'. SuggestedRemedy Proposed Response Response Status W Change text color to forest green PROPOSED ACCEPT. Response Response Status C C/ 160 SC 160.6 P88 L 53 # 226 ACCEPT. Maki, Jeffery Juniper Networks C/ 160 SC 160.6.1 P89 L51 # 175 Comment Type TR Comment Status D The provide example (e.g., a 50GBASE-BR10 PMD operating at 2.5 km meets the Dudek, Mike Marvell Comment Type TR Comment Status D range requirement of 2 m to 10 km) has a typo. The Average launch power of OFF transmitter must be less than the Fail level of the Signal SuggestedRemedy detect for the signal detect to work properly. Replace 2.5km with 12.5km. SuggestedRemedy Proposed Response Response Status W Change the value for BR20 etc. to -20dBm (see other comment for why -20 not -16) PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT.

C/ 160

SC 160.11.2.2

C/ 160 L42 # 176 SC 160.6.2 P90 Dudek, Mike Marvell Comment Type TR Comment Status D The receive power (OMAouter) max values are wrong for BR20 and BR40+. (or the Tx OMA outer max values are wrong) The min attenuation for 20km is 0dB, for 40km 10dB. SuggestedRemedy Change BR20 to 4.4dBm, and BR40+ to 2.4dBm. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

BR20's MAX OMA should be 4.4 dBm, BR40 remains at -2.6 dBm, BR40+ should be 2.4

C/ 160 SC 160.7 P91 L35 # 177

Dudek, Mike Marvell

Comment Type T Comment Status D

The sentence is wrong. Measurements don't meet the specifications and there are exceptions.

SuggestedRemedy

Change to "Optical measurement methods are defined in 139.7 with the following exceptions.

- 1 The transmitter is tested using an optical channel that meets the requirements listed in Table 160–9.
- 2 The stressed receiver conformance test shall be conducted under the additional condition that the transmitted optical signal and the reflectance of the optical link should be at their maximum levels."

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE

See#183, add full details and apply all changes appropriate for 159, and also 158 and 160. Including table for Transmitter compliance channel specifications. Editorial license to make inline changes to 114.7 (25G), 52.9 (10G),139.7/CU/140/151 (50G)

C/ 160 SC 160.8 P92 L6 # 98

Grow, Robert RMG Consulting

Comment Type TR Comment Status D

Another example of indirection problems. Laser safety descriptions include port types in the description. General safety is changed by P802.3cr, etc.

SuggestedRemedy

Change (or not) consistent with changes made to 158 and 159.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See#184, follow .3cu D3.0 to refer to J.2, apply same statement to Clauses 159 and 160.

Dell EMC Lewis, Jon Comment Type Е Comment Status D Date is shown specifically and should be 202x as the draft isn't published SuggestedRemedy Change "IEEE Std 802.3cp-2020" to "IEEE Std 802.3cp-202x" Proposed Response Response Status W PROPOSED ACCEPT. C/ 160 SC 160.11.3.1 P96 **L1** # 85 Laubach, Mark Self Comment Type Ε Comment Status A The heading text is broken across two pages. SuggestedRemedy Keep the entire heading text on the same page. Response Response Status C ACCEPT. C/ 158 SC 158.6 Р # 187 Stassar, Peter Huawei Comment Type TR Comment Status A 40+

P94

L40

60

It is very confusing why 2 PMDs 40km and 40+km are specified to satisfy a single 40km objective, also considering that in Table 158-5 only one 40km distance is given. It is also not clear what "+" refers to. If the 40+km spec is technically and economically feasible, delete the 40km spec. This comment also applies to 159 and 160.

SuggestedRemedy

Remove one of 40km/40+km and create a single 40km specification optimized for lowest cost. This can be done via a single power budget with 2 distance options as in Clause 114 for 25GBASE-ER. Applies to 158. 159 and 160

Response Status C

ACCEPT IN PRINCIPLE.

The project has three distance reach objectives, we should have three pairs of PHYs. Remove -BR40+ PHYs for all speeds from .3cp draft D2.0

Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic **40+**

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C/ 1 SC 1.4.91d L23 # 233 C/ 1 SC 1.4.52d P18 L25 # 70 P18 Thompson, Geoff GraCaSI S.A./Independent Nicholl, Shawn Xilinx Comment Type E Comment Status D Comment Type TR Comment Status A I believe that introducing a new symbol other than dash (and dash has been bad enough) Concerns about readability of "+-" in 10GBASE-BR40+-D and 10GBASE-B40+-U PMD will be problematical over the long haul in the popular press editorial sense. names. SuggestedRemedy SuggestedRemedy Change from "25GBASE-BR40+" to "25GBASE-BR40plus" here and throughout the draft. Propose to replace "10GBASE-BR40+" with something else. Perhaps "10GBASE-BR40X", where X is a letter A-Z (perhaps "L" for "Legacy" or "Long"). Perhaps "10GBASE-BR40-X". Proposed Response Response Status W where X is a number (i.e. in the format of 400GBASE-LR4-6 found in P802.3cu). PROPOSED ACCEPT IN PRINCIPLE. Response Response Status C See#187 to remove BR40+ from .3cp ACCEPT IN PRINCIPLE. Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 C/ 1 SC 1.4.52d P18 L24 # 219 See#187, remove all BR40+ PHYs from .3cp Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 Law. David **Hewlett Packard Enterprise** Comment Status D C/ 1 SC 1.4 P18 / 26 Comment Type TR Please do not use '+' as part of the PHY name, due to its position it is resulting in the string Hajduczenia, Marek Charter '+-' in PHY names. Comment Type Comment Status A 40+ SuggestedRemedy "10GBASE-BR40+-D" looks and reads terrible. Please clarify the difference between the 40 and 40+ PHYs and based on the difference SuggestedRemedy choose an additional letter to add after the '40' separated with a dash. This would be of the format 10GBASE-BR40-X, with a 10GBASE-BR40-X-D and 10GBASE-BR40-X-U where 'X' Change the PMD name to "10GBASE-BR50-D" or any other combination that avoids the is the chosen letter. use of + followed by - sign Scrub the draft Proposed Response Response Status W Response Response Status C PROPOSED ACCEPT IN PRINCIPLE. ACCEPT IN PRINCIPLE. See #187, remove all BR40+ PHYs from .3cp Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 See#187, remove all BR40+ PHYs from .3cp draft Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 C/ 1 SC 1.4.128d P19 L5 # 234 Thompson, Geoff GraCaSI S.A./Independent Comment Type E Comment Status D 40+

I believe that introducing a new symbol other than dash (and dash has been bad enough) will be problematical over the long haul in the popular press editorial sense.

SuggestedRemedy

Change from "50GBASE-BR40+" to "50GBASE-BR40plus" here and throughout the draft.

Topic 40+

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.
See#187 to remove BR40+ from .3cp

Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

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C/ 157 SC 157.1.3 L40 # 31 C/ 157 SC 157.1.3 P39 L48 # 215 P38 Hewlett Packard Enterprise Hajduczenia, Marek Charter Law, David Comment Type ER Comment Status A Comment Type TR Comment Status D use the formatting for naming nomenclature defined in 802.3ca - it is way more readable It is not clear what is mean by '40+ (legacy 40 km)', perhaps it is in reference to the optical SuggestedRemedy SuggestedRemedy See 141.2.6 PMD naming for reference Please provide a description of the technical difference is between '40' and '40+'. Response Response Status C Proposed Response Response Status W ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. See#187, remove all BR40+ PHYs from .3cp Follow style in Table 141-6 Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 C/ 157 SC 157.1.3 P40 L12 # 199 Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 Law. David Hewlett Packard Enterprise C/ 157 SC 157.1.3 P39 L41 # 155 Comment Type TR Comment Status D 40+ Marris. Arthur Cadence Design Systems The description of the 10G-BASE-BR40-D and 10G-BASE-BR40+-D both read '10 Gb/s Comment Type E Comment Status D 40+ OLT PHY using 10GBASE-R encoding over one single-mode fiber, with reach up to at least "rr" is hard to decipher in the nomenclature 40 km (see Clause 158).'. This is also the case for the other five BR40 and BR40+ PHYs. As their descriptions are identical it makes it very difficult for a user to decide which of SuggestedRemedy these two PHYs to select. Consider changing "rr" to "r" SugaestedRemedy Proposed Response Response Status W Provide a distinct description for BR40 and BR40+ PHYs. PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W See#31, use a table for .3cp nomenclature PROPOSED ACCEPT IN PRINCIPLE. Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 See#187, remove all BR40+ PHYs from .3cp draft C/ 157 L47 # 63 SC 157.1.3 P39 Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 Broadcom Kramer, Glen C/ 158 SC 158 P46 L2 # 163 Comment Type Т Comment Status A Dawe. Piers Nvidia In Sentence "Bidirectional 64B/66B encoding.x refers to the PHY reach; 10 (10 km), 20 (20 Comment Type ER Comment Status D 40+ km), 40 (40 km), or 40+ (legacy 40 km)" it is not clear what "legacy 40 km" means. Is 10GBASF-BR40+ is a bad name and 10GBASF-BR40+-U is even worse legacy 40 km different than a "new 40 km"? SuggestedRemedy SuggestedRemedy Either strike the "(legacy 40 km)" or add an explanation of what that means. Choose something else e.g. 10GBASE-BR40p. 10GBASE-BR50 Proposed Response Response Response Status C Response Status W ACCEPT IN PRINCIPLE PROPOSED ACCEPT IN PRINCIPLE See#187, remove all BR40+ PHYs from .3cp draft See#187, remove all BR40+ PHYs from .3cp draft Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217 Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic **40+**

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217

40+

CI 158 SC 158 P47 L1 # 62

Kramer, Glen Broadcom

PMD name 50GBASE-BR40+-D is confusing as it reads like BR40 "plus/minus" D.

SuggestedRemedy

Comment Type

Consider the following PMD names instead: 50GBASE-BR41 - "BR41" PMD class slightly better than class "BR40".

Comment Status A

50GBASE-BR40XB - "XB" for "eXtended Budget"

Response Response Status C
ACCEPT IN PRINCIPLE.

Е

See#187, remove all BR40+ PHYs from .3cp

Group comments #19, 219, 70, 233, 234, 31, 155, 63, 215, 199, 163, 62, 187, 217

Comment Type TR Comment Status D

The operating distance (max) specified in Table 158–10 'Fiber optic cabling (channel) characteristics' is really a 'minimum operating distance (max)', for example a 10GBASE-BR20 PHY that can operate at 25 km is a conformant 10GBASE-BR20 PHY even though it exceeds the 20 km operating distance (max) specified in Table 158–10 for that PHY type. For the same reason a 10GBASE-BR40 PHY that can operate in excess of 40 km is a conformant 10GBASE-BR40 PHY. It is therefore not clear what the difference is between a 10GBASE-BR40 PHY and a 10GBASE-BR40+ PHY as it is conformant for both to operate in excess of 40 km.

SuggestedRemedy

Please clarify what the reach difference is between a 10GBASE-BR40 PHY and a 10GBASE-BR40+ PHY, as well as for the 25GBASE-BR40 PHY and a 25GBASE-BR40+ PHY and the 40GBASE-BR40 PHY and a 40GBASE-BR40+ PHY.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.
See#187, remove all BR40+ PHYs from .3cp

Group comments #19, 219, 70, 234, 31, 155, 63, 214, 199, 163, 62, 187, 217

C/ FM SC FM P10 L47 # 149

Marris, Arthur Cadence Design Systems

Comment Type ER Comment Status D 4to10

This list is missing amaendments 4 to 10

SuggestedRemedy

Add descriptions of amendments 4 to 10

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7, include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L48 # 103

Wienckowski, Natalie General Motors

Comment Type E Comment Status D

Missing ammendment descriptions

SuggestedRemedy

Add: IEEE Std 802.3cn™-2019

Amendment 4—This amendment includes changes to IEEE Std 802.3-2018 and adds 50 Gb/s, 200 Gb/s, and 400 Gb/s Physical Layer specifications and management parameters for operation over single-mode fiber with reaches of at least 40 km.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7, include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L48 # 107

Wienckowski, Natalie General Motors

Comment Type E Comment Status D

Missing ammendment descriptions

SuggestedRemedy

Add: IEEE Std 802.3ch™-2020

Amendment 8—This amendment includes changes to IEEE Std 802.3-2018 and adds Clause 149, Annex 149A, Annex 149B, and Annex 149C. This amendment adds physical layer specifications and management parameters for operation at 2.5 Gb/s, 5 Gb/s, and 10 Gb/s over a single balanced pair of conductors.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7. include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

4to10

4to10

C/ FM SC FM P10 L48 # 106 General Motors Wienckowski, Natalie Comment Type E Comment Status D 4to10

Missing ammendment descriptions

SuggestedRemedy

Add: IEEE Std 802.3cm™-2020

Amendment 7—This amendment includes changes to IEEE Std 802.3-2018 and adds Clause 150. This amendment adds Physical Layer (PHY) specifications and management parameters for 400 Gb/s operation on four pairs (400GBASE-SR4.2) and eight pairs (400GBASE-SR8) of multimode fiber, over reaches of at least 100 m.

Proposed Response

Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7, include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM # 108 P10 L48

General Motors Wienckowski. Natalie

Comment Type E Comment Status D 4to10

Missing ammendment descriptions

SuggestedRemedy

IEEE Std 802.3ca™-2020

Amendment 9—This amendment to IEEE Std 802.3-2018 extends the operation of Ethernet Passive Optical Networks (EPONs) to multiple channels of 25 Gb/s providing both symmetric and asymmetric operation for the following data rates (downstream/upstream): 25/10 Gb/s. 25/25 Gb/s. 50/10 Gb/s. 50/25 Gb/s. and 50/50 Gb/s. This amendment specifies the 25 Gb/s EPON Multi-Channel Reconciliation Sublayer (MCRS), 25GBASE-Nx25G-EPON PHYsical Coding Sublavers (PCSs). Physical Media Attachments (PMAs). and Physical Medium Dependent sublayers (PMDs) that support both symmetric and asymmetric data rates while maintaining backward compatibility with already deployed 10 Gb/s EPON equipment. The EPON operation is defined for distances of at least 20 km, and for a split ratio of at least 1:32.

Proposed Response

Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7, include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L48 # 104 General Motors Wienckowski, Natalie Comment Type E Comment Status D 4to10

Missing ammendment descriptions

SuggestedRemedy

Add: IEEE Std 802.3cg™-2019

Amendment 5—This amendment includes changes to IEEE Std 802.3-2018 and its amendments and adds Clause 146 through Clause 148 and Annex 146A and Annex 146B. This amendment adds 10 Mb/s Physical Layer specifications and management parameters

for operation on a single balanced pair of conductors.

Proposed Response

Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7. include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L48

Wienckowski. Natalie **General Motors**

Comment Type E Comment Status D 4to10

Missing ammendment descriptions

SuggestedRemedy

Add: IEEE Std 802.3cg™-2020

Amendment 6—This amendment includes editorial and technical corrections, refinements. and clarifications to Clause 33 and related portions of the standard.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See #7. include a list of amendments and summaries

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L49 # 91 C/ FM SC FM P10 # 52 L49 **RMG Consulting** Dell EMC Grow, Robert Lewis, Jon Comment Type TR Comment Status A 4to10 Comment Type Ε Comment Status A 4to10 Incomplete list of amendment descriptions, including a self description for IEEE Std Template is still in the draft for additional ammendments. 802.3cp-20xx which others can copy into their front matter. SuggestedRemedy SuggestedRemedy Update from line 49 to include prior amendments to the base standard. Add amendments 4 through 9 at a minimum, copying from the published or approved Response Response Status C drafts. If properly written, this draft should also be dependent on P802.3cu. Recommend ACCEPT IN PRINCIPLE. using Mr. Laws list of 24 June that has this project as Amendment 12. See #7. include a list of amendments and summaries Write a descripption of this amendment. Group comments #149, 107, 104, 105, 103, 108, 106, 91, 109, 52, 150, 7, 158 Response Response Status U C/ 00 SC 0 P10 L49 # 158 ACCEPT IN PRINCIPLE. Maguire, Valerie The Siemon Company See #7, include a list of amendments and summaries Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104 Comment Type E Comment Status D 4to10 Missing the descriptive content for amendments 4 through 11 C/ FM SC FM # 109 P10 L49 SuggestedRemedy Wienckowski. Natalie General Motors Replace content on lines 49 through 52 with descriptive content for amendments 4 through Comment Type E Comment Status D 4to10 11 in draft 2.0 of IEEE 802.3cv (lines 49 - 54 on page 10 and lines 1 -50 on page 11) Missing description of this ammendment. Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT IN PRINCIPLE. Change: IEEE Std 802.3xx[™]-20xx See #7, include a list of amendments and summaries This amendment includes [complete] Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104 To: IEEE Std 802.3cp™-20xx C/ FM SC FM P10 L 50 150 This amendment includes includes changes to IEEE Std 802.3-2018 and adds Clause 157, Clause 158, Clause 159, and Clause 160. This ammendment adds bidirectional 10 Marris. Arthur Cadence Design Systems Gb/s, 25 Gb/s, and 50 Gb/s Optical Access PHYs. Comment Type ER Comment Status D 4to10 Proposed Response Response Status W Missing description for "IEEE Std 802.3cp™-20xx" PROPOSED ACCEPT IN PRINCIPLE. See #7, include a list of amendments and summaries SugaestedRemedy

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

Proposed Response

Replace "[complete]" with suitable text

PROPOSED ACCEPT IN PRINCIPLE.

See #7, include a list of amendments and summaries

Response Status W

Group comments #7, 109, 108, 103, 106, 105, 107, 52, 158, 150, 149, 91, 104

C/ FM SC FM P10 L51 # 7

Anslow, Pete Self

Comment Type ER Comment Status D 4to10

The amendment summary is not populated

SuggestedRemedy

Add appropriate summary text

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

P10L51, populate Amendments 4-11 and 802.3cp summary as: IEEE Std 802.3cn™-2019

Amendment 4—This amendment includes changes to IEEE Std 802.3-2018 and adds 50 Gb/s, 200 Gb/s, and 400 Gb/s Physical Layer specifications and management parameters for operation over single-mode fiber with reaches of at least 40 km.

IEEE Std 802.3ca™-2019

Amendment 5—This amendment includes changes to IEEE Std 802.3-2018 and its amendments and adds Clause 146 through Clause 148 and Annex 146A and Annex 146B. This amendment adds 10 Mb/s Physical Layer specifications and management parameters for operation on a single balanced pair of conductors.

IEEE Std 802.3cg™-2020

Amendment 6—This amendment includes editorial and technical corrections, refinements, and clarifications to Clause 33 and related portions of the standard.

IEEE Std 802.3cm™-2020

Amendment 7—This amendment includes changes to IEEE Std 802.3-2018 and adds Clause 150. This amendment adds Physical Layer (PHY) specifications and management parameters for 400 Gb/s operation on four pairs (400GBASE-SR4.2) and eight pairs (400GBASE-SR8) of multimode fiber, over reaches of at least 100 m.

IEEE Std 802.3ch™-2020

Amendment 8—This amendment includes changes to IEEE Std 802.3-2018 and adds Clause 149, Annex 149A, Annex 149B, and Annex 149C. This amendment adds physical layer specifications and management parameters for operation at 2.5 Gb/s, 5 Gb/s, and 10 Gb/s over a single balanced pair of conductors.

IEEE Std 802.3ca™-2020

Amendment 9—This amendment to IEEE Std 802.3-2018 extends the operation of Ethernet passive optical networks (EPONs) to multiple channels of 25 Gb/s providing both symmetric and asymmetric operation for the following data rates (downstream/upstream): 25/10 Gb/s, 25/25 Gb/s, 50/10 Gb/s, 50/25 Gb/s, and 50/50 Gb/s. This amendment specifies the 25 Gb/s EPON Multi-Channel Reconciliation Sublayer (MCRS), Nx25G-EPON Physical Coding Sublayers (PCSs), Physical Media Attachment (PMA) sublayers, and Physical Medium Dependent (PMD) sublayers that support both symmetric and asymmetric data rates while maintaining backward compatibility with already deployed 10 Gb/s EPON

equipment. The EPON operation is defined for distances of at least 20 km, and for a split ratio of at least 1:32.

IEEE Std 802.3cr-20xx

Amendment 10— This amendment includes changes to IEEE Std 802.3-2018 and adds Annex J. This amendment replaces references to the IEC 60950 series of standards (including IEC 60950-1 "Information technology equipment—Safety—Part 1: General requirements") with appropriate references to the IEC 62368 "Audio/video, information and communication technology equipment" series and makes appropriate changes to the standard corresponding to the new references.

IEEE Std 802.3cu-20xx

Amendment 11— This amendment includes changes to IEEE Std 802.3-2018 and its amendments, and adds Clause 151. This amendment adds Physical Layer (PHY) specifications and management parameters for 100 Gb/s and 400 Gb/s operation over single-mode fiber, based on 100 Gb/s per wavelength optical signaling.

IEEE Std 802.3cp™-20xx

This amendment includes changes to IEEE Std 802.3-2018 and its amendments, and adds Clauses 157, Clause 158, Clause 159, and Clause 160. This amendment adds Physical Layer specifications and management parameters for 10 Gb/s, 25 Gb/s, and 50 Gb/s Ethernet bidirectional optical interfaces for operation over single-mode fiber.

Group comments #149, 107, 104, 105, 103, 108, 106, 91, 109, 52, 150, 7, 158

C/ FM SC FM P2 L1 # 87

Grow, Robert RMG Consulting

Comment Type E Comment Status D Abs

Front matter is incomplete.

SuggestedRemedy

Add Abstract.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE. See#6, change abstract to text in #6 resolution Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88

C/ FM SC FM P2 **L1** # Self Anslow, Pete Comment Type ER Comment Status D Abs The abstract and keywords are not populated SuggestedRemedy Add appropriate abstract text and suitable keywords

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Add abstract as "This amendment to IEEE Std 802.3-2018 adds Physical Laver specifications and Management Parameters for 10 Gb/s. 25 Gb/s. and 50 Gb/s Ethernet bidirectional optical interfaces for operation over single-mode fiber with reaches of at least 10 km. 20 km. and 40 km."

Add keywords as "Bidirectional (BiDi), Multi-Gigabit Ethernet Bidirectional Physical Layers, 10GBASE-BR10, 10GBASE-BR20, 10GBASE-BR40, 25GBASE-BR10, 25GBASE-BR20, 25GBASE-BR40, 50GBASE-BR10, 50GBAS ()E-BR20, 50GBASE-BR40, forward error correction (FEC), Physical Coding Sublayer (PCS), Physical Medium Attachment (PMA), Physical Medium Dependent (PMD)"

Comment group #6, 13, 87, 88, 99, 100, 148

L1 # 99 C/ FM SC FM P2 Wienckowski, Natalie General Motors Comment Type E Comment Status D Abs

Abstract needs to be completed.

SuggestedRemedy

Change: Abstract: This amendment to IEEE Std 802.3-2018 [abstract text]. To: Abstract: This amendment to IEEE Std 802.3-2018 adds bidirectional 10 Gb/s, 25 Gb/s, and 50 Gb/s Optical Access PHYs.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE. See#6, change abstract to text in #6 resolution

Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88

Proposed Response C/ FM Marris. Arthur Comment Type Missing abstract text

C/ FM

C/ FM

Hajduczenia, Marek

SuggestedRemedy

Comment Type ER

SC FM

SC FM

ER

Please fill in abstract and keywords Response Status W PROPOSED ACCEPT IN PRINCIPLE. See#6, change abstract and keywords in #6 resolution Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88 P2

Comment Status D

Comment Status D

Abstract and keywords should be filled in at this time

P2

Charter

L1

L1

L2

Cadence Design Systems

Abs

148

100

Abs

Abs

13

SuggestedRemedy

Add abstract text

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE. See#6, change abstract to text in #6 resolution Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88

SC FM Wienckowski. Natalie General Motors

Comment Type E Comment Status D

Keywords need to be completed.

SuggestedRemedy

Change: Keywords: Ethernet; [keywords list].

To: Keywords: Ethernet, rrGBASE-BRx-d, 10GBASE-BR10, 10GBASE-BR20, 10GBASE-BR40, and 10GBASE-BR40+, 25GBASE-BR10, 25GBASE-BR20, 25GBASE-BR40, and 25GBASE-BR40+, 50GBASE-BR10, 50GBASE-BR20, 50GBASE-BR40, and 50GBASE-BR40+, IEEE 802.3cp™

P2

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE. See#6, change keywords in #6 resolution Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88

C/ FM SC FM P2 L3 # 88 C/ FM SC FM P1 L24 # 86 **RMG** Consulting Grow, Robert RMG Consulting Grow, Robert Comment Type Ε Comment Status D Abs Comment Type т Comment Status A Amd Front matter is incomplete. The paragraph is dated. On the date of this comment, we now have 9 approved amendments, 6 of which are published, and at least 2 amendments likely to receive SuggestedRemedy amendment numbers 10 and 11 that are ahead of the 3 projects in initial WG ballot. Add Keywords. SugaestedRemedy Proposed Response Response Status W Add IEEE Std 802.3cr-20xx to the list as the 10th amendment (before IEEE Std 802.3cu-PROPOSED ACCEPT IN PRINCIPLE. 20xx). See#6, change keywords in #6 resolution Response Response Status C Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88 ACCEPT IN PRINCIPLE. C/ FM SC FM P1 **L10** # 147 See #147, use the amendment list in #147 resolution Marris. Arthur Cadence Design Systems Group comments #147, 86, 50, 68, 281 Comment Type ER Comment Status A Amd C/ FM SC FM P1 / 24 # 68 State this is amendment 11 and list the prior amendments Nicholl, Shawn Xilinx SuggestedRemedy Comment Type ER Comment Status A Amd "Amendment: 11" - "This draft is an amendment of IEEE Std 802.3-2018 as amended by Missing some existing amendments in the frontmatter. IEEE Std 802.3cb-2018. IEEE Std 802.3bt-2018. IEEE Std 802.3cd-2018. IEEE Std 802.3cn-2019, IEEE Std 802.3cg-2019, IEEE Std 802.3cg-2020, IEEE Std 802.3cm-2020, SuggestedRemedy IEEE Std 802.3ch-2020, IEEE Std 802.3ca-2020, and IEEE Std 802.3cr-20xx" Propose to replace ", and IEEE Std 802.3cd-2018" with ",IEEE Std 802.3cd-2018, IEEE Std Response Response Status C 802.3cn-2019, IEEE Std 802.3cg-2019, IEEE Std 802.3cq-2020, IEEE Std 802.3cm-2020" ACCEPT. as well as any other relevant in-progress amendments. Response Response Status C Group comments #147, 86, 50, 68, 281 ACCEPT IN PRINCIPLE. C/ FM SC FM P1 # 50 L23 See #147, use the amendment list in #147 resolution Lewis, Jon Dell EMC Group comments #147, 86, 50, 68, 281 Comment Type ER Comment Status A Amd C/ FM SC FM P1 L24 # 51 The list of "as amended by" is not up to date. Lewis. Jon Dell FMC SuggestedRemedy Comment Type E Comment Status A D2p1 Please align with the latest FM template available on the website. This should at a This draft is for Initial Working Group ballot minimum include "IEEE Std 802.3cb-2018. IEEE Std 802.3bt-2018. IEEE Std 802.3cd-2018, IEEE Std 802.3cn-2019, IEEE Std 802.3cq-2019, IEEE Std 802.3cq-2020, and IEEE SuggestedRemedy Std 802.3cm-2020" Change "Draft D1.3 is prepared for Task Force review [review/balloting stage]" to "Draft Response Response Status C D2.1 is prepared for the the first Working Group recirculation ballot" ACCEPT. Response Response Status C ACCEPT See #147, use the amendment list in #147 resolution Group comments #147, 86, 50, 68, 281 Group comments #51, 12, 283, 284

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic D2p1

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12 C/ FM SC FM P1 L24 C/ 00 SC 0 P7 L9 # 230 Charter Thompson, Geoff GraCaSI S.A./Independent Hajduczenia, Marek Comment Type ER Comment Status A D2p1 Comment Type ER Comment Status D EΖ This is not draft D1.3 Pete Anslow is no longer 802.3 WG Secretary SuggestedRemedy SuggestedRemedy FM summary must be filled in as well Replace "Pete Anslow" with "Jon Lewis" Response Status C Proposed Response Response Response Status W ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. See #51, change to "Draft D2.1 is prepared for the the first Working Group recirculation SC 0 C/ 00 **P7** L15 # 231 Group comments #51, 12, 283, 284 Thompson, Geoff GraCaSI S.A./Independent # 159 C/ 00 SC 0 P1 / 15 ΕZ Comment Type ER Comment Status A Duane Remein is no longer an editor or this project. Maguire, Valerie The Siemon Company Comment Type E Comment Status D EΖ SuggestedRemedy "50" and "Gb/s" should be on the same line Remove his name or revise the text. SuggestedRemedy Response Response Status W Insert non-breaking space between "50" and "Gb/s" in the title of the amendment ACCEPT IN PRINCIPLE. Proposed Response Response Status W See #14, follow style in 802.3cb to list Phase I and Phase II editors PROPOSED ACCEPT. C/ FM SC FM P9 14 # 101 C/ FM SC FM P7 L9 # 146 Wienckowski, Natalie General Motors Lusted. Kent Intel Corporation Comment Type E Comment Status D ΕZ Comment Type ER Comment Status D ΕZ Amendment title is not added in box. The IEEE 802.3 WG Recording Secretary is now "Jon Lewis", not "Pete Anslow" SuggestedRemedy SuggestedRemedy Change: Amendment: Amendment title (copy from PAR). Change to "Jon Lewis" To: Amendment: Bidirectional 10 Gb/s, 25 Gb/s, and 50 Gb/s Optical Access PHYs Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT

C/ FM SC FM P9 L29 # 102 C/ 30 SC 30.5.1.1.2 P21 L16 # 151 Wienckowski, Natalie General Motors Marris, Arthur Cadence Design Systems Comment Type E Comment Status D EΖ Comment Type Е Comment Status D EΖ Ammendment identifier not added. Missing line feed SuggestedRemedy SuggestedRemedy Change: IEEE Std 802.3xx-20xx Change "...10GBASE-BR10-D" to "... To: IEEE Std 802.3cp-20xx 10GBASE-BR10-D" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ FM P12 **L1** # 110 P23 SC FM Cl 45 SC 45.2.1 **L8** # 112 Wienckowski. Natalie General Motors Wienckowski. Natalie General Motors Comment Status D Comment Type E F7 Comment Type E Comment Status D F7 There should not be blank pages in the document. Incorrect editor instructions. Cb and cd didn't make any changes that impact the changed rows in cp. SuggestedRemedy SuggestedRemedy Delete blank page (Instruction on how to do this are in the 802.3 template on page 15 of Make editor instruction: Change Table 45–3 as shown (unchanged rows not shown): version 4p2 Also delete blank page 16, 20, 38, 64, and 82. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. CI 45 P23 SC 45.2.1 **L8** # 152 P18 # 111 C/ 1 SC 1.3 L1 Marris. Arthur Cadence Design Systems Wienckowski. Natalie General Motors Comment Type Ε Comment Status D ΕZ Comment Type E Comment Status D F7 What is IEEE Std 802.3xx? SuggestedRemedy SuggestedRemedy Delete 802.3xx or correct it to the right amendment Delete empty section. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Delete "(as modified by ... 802.3xx)"

Cl 45 SC 45.2.1 P23 L15 # 113 C/ 56 SC 56.1 P33 L5 # 116 Wienckowski, Natalie General Motors Wienckowski, Natalie General Motors Comment Type E Comment Status D EΖ Comment Type Ε Comment Status D ΕZ missing rows above and below changed rows to show there are rows above and below that The editorial instruction includes (as changed by P802.3ca) which is not the correct way to aren't changed. write this. SuggestedRemedy SuggestedRemedy Add row above and below the contented rows. "straddle" each row then add an "..." - See Change: (as changed by P802.3ca) To: (as modified by IEEE Std 802.3ca-2020) 45.2.1 in the 802.3 FM template for example. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 56 C/ 45 SC 45.2.1.6 P24 L12 # 115 SC 56.1 P33 L5 # 154 Wienckowski. Natalie General Motors Marris. Arthur Cadence Design Systems Comment Status D ΕZ Comment Type ΕZ Comment Type E Ε Comment Status D missing rows above and below changed rows to show there are rows above and below that Change P802.3ca to IEEE Std 802.3ca-2020 aren't changed. SuggestedRemedy SuggestedRemedy Change P802.3ca to IEEE Std 802.3ca-2020 Add row above and below the contented rows. "straddle" each row then add an "..." - See Proposed Response Response Status W 45.2.1 in the 802.3 FM template for example. PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. P33 CI 56 SC 56.1 L14 # 117 Wienckowski. Natalie General Motors C/ 45 SC 45.2.1.27a P28 L33 167 Comment Type E Comment Status D ΕZ Dudek. Mike Marvell This should show the changes made by ca. Comment Status D ΕZ Comment Type T SuggestedRemedy All the other bits are RO this one is blank. Change: and Figure 56–5 for EPoC topologies SuggestedRemedy To: Figure 56-5 for EPoC topologies, and Make it RO Figure 56-5a for Nx25G-EPON topologies. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT PROPOSED ACCEPT.

C/ 56	SC 56.1.2.2	P34	L 44	# 118		C/ 157	SC 157.1.1	P39	L 26	# 198
Wienckowski, Natalie		ckowski, Natalie General Motors		ors		Law, David	d	Hewlett Pack	ard Enterprise	
Comment ca was	<i>Type</i> E s approved in 202	Comment Status D			EZ	Comment mod	• •	Comment Status D Table 157–1.' should read '	. model are sho	wn in Figure 157–1.'.
To 802	je: 802.3ca-YYY\ 2.3ca-2020	Y				Suggested See co	omment.	Response Status W		
Also P Proposed	'36L1 Response	Response Status W				•	OSED ACCEPT	'		
PROP	OSED ACCEPT.					C/ 157	SC 157.1.2	P 39	L28	# <u>1</u> 69
C/ 157	SC 157.1.1	P39	<i>L</i> 11	# 196	-	Dudek, Mil	ke	Marvell		
_aw, David		Hewlett Packa	ard Enterprise			Comment Senter	,,	Comment Status D (has two verbs)		
Comment Net	• •	Comment Status D ead ' Network'.			EZ	Suggested	<i>IRemedy</i>	end of the sentence.		
	IRemedy omment. Response	Response Status W				Proposed		Response Status W		
PROP	OSED ACCEPT.					C/ 157	SC 157.1.3	P39	L47	# 143
C/ 157	SC 157.1.2	P 39	L 26	# 223		Lusted, Ke	ent	Intel Corporat	tion	
Frowbridge		Nokia				Comment the va	,,	Comment Status D associated text is on the san	ne line as the va	ariable "BR"
	ence to Table 157	Comment Status D -1 should be reference to Fig	gure 157-1.		EZ	Suggested	<i>IRemedy</i>	and its associated text a sepa		
Proposed	omment Response	Response Status W				Proposed PROP	Response OSED ACCEPT	Response Status W IN PRINCIPLE. imilar to Table 141–6 for .3cp		
PROP	OSED ACCEPT.					C/ 157	SC 157.1.3	P 40	L 5	# 119
						Wienckow	ski, Natalie	General Moto	rs	
						Comment There	· ·	Comment Status D mes after 10G/25G/50G here	e that aren't in tl	ne rest of the documer
						Suggested Remo	•	ne "G" in each of the names.		
						Proposed PROP	Response OSED ACCEPT	Response Status W		

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic **EZ**

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C/ 157 SC 157.1.	.3 P41	L 22	# 200	Cl 157 SC 157.1.4 P42 L36 # 20	7
Law, David	Hewlett Pack	ard Enterprise		Law, David Hewlett Packard Enterprise	
	Comment Status D cal dots on the right hand side of of the LLC as they do on the left		E.n so that the lowest	Comment Type E Comment Status D 25G-BASE-BRx' should read '25GBASE-BRx'. SuggestedRemedy See comment.	EZ
See comment.				Proposed Response Response Status W	
Proposed Response PROPOSED ACCE	Response Status W PT.			PROPOSED ACCEPT.	
C/ 157 SC 157.1 .	.2 P41	L34	# 222	Cl 157 SC 157.1.4 P42 L41 # 12 Wienckowski, Natalie General Motors	:1
	Nokia Comment Status D at the top of the XGMII should b			Comment Type E Comment Status D Clause 159 is in this draft. SuggestedRemedy	EZ
SuggestedRemedy See comment Proposed Response	econciliation Sublayer, as are the Response Status W	ose for the other t	wo rates.	Make the 159 in the heading a crosslink. Proposed Response Response Status W PROPOSED ACCEPT.	
PROPOSED ACCE	PT.			Cl 157 SC 157.1.4 P43 L1 # 20	9
C/ 157 SC 157.1 .	.4 P42	L 9	# 206	Law, David Hewlett Packard Enterprise	
Law, David Comment Type E	Hewlett Pack	ard Enterprise	E.	Comment Type E Comment Status D 25G-BASE-BRx' should read '25GBASE-BRx'.	EZ
10G-BASE-BRx' sho SuggestedRemedy See comment.	ould read '10GBASE-BRx'.			SuggestedRemedy See comment. Proposed Response Response Status W	
Proposed Response PROPOSED ACCE	Response Status W			PROPOSED ACCEPT.	
——————————————————————————————————————	.F.I.			C/ 157 SC 157.1.4 P43 L1 # 12	2
C/ 157 SC 157.1. Wienckowski, Natalie Comment Type E	.4 P42 General Moto Comment Status D	L13 ors	# <u>120</u>	Wienckowski, Natalie General Motors Comment Type E Comment Status D The table title needs (continued) in it.	EZ
Clause 158 is in this SuggestedRemedy				SuggestedRemedy See instructions in 200.1.1.1.1 in the 802.3 FM template.	
	e heading a crosslink. **Response Status W** **PT**			Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Remove all BR40+ items, use instructions in 200.1.1.1.1 of the 802.3 FM templa	te to keep
	 uired ER/editorial required GR/	/general required	T/technical E/editorial	table on a single page /general	9 of 52

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic **EZ**

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C/ 157 SC 1	157.1.4	P 43	L18	# 208		C/ 157	SC 157.3	P 45	L 25	# 124
Law, David		Hewlett Pack	ard Enterprise			Wienckow	ski, Natalie	General Motors	3	
Comment Type 50G-BASE-BF	E Rx' should	Comment Status D read '50GBASE-BRx'.			EZ	Comment Either	,	Comment Status D e possessive or the s should be	removed.	EZ
SuggestedRemed See comment	t.						dRemedy ge: PHYs sublay HY's sublayers	vers .		
Proposed Respon		Response Status W				Or To	: PHY sublayers on L27 and L29			
Cl 157 SC 1	157.1.4	P 43 General Moto	L 21	# 123		•	Response POSED ACCEPT	Response Status W IN PRINCIPLE.		
Comment Type	E	Comment Status D	,,,,		EZ	Chang	ge to PHY sublay	ers in three places		
Clause 160 is	in this dra	aft.				C/ 158	SC 158.1	P 47	L8	# 114
SuggestedRemed	•	alle e a como alle la				Wienckow	ski, Natalie	General Motors	3	
		ading a crosslink.				Comment	Type E	Comment Status D		EZ
Proposed Respon		Response Status W				typo				
PROPOSED /	ACCEPT.					Suggested	•			
	157.2	P 44	L1	# 236			ge: 10BASE-BR1)GBASE-BR10	10		
Thompson, Geoff Comment Type The definition	ER	GraCaSI S.A Comment Status D ers" is unknown to me.	./Independent		EZ	Proposed PROF	Response POSED ACCEPT	Response Status W		
SuggestedRemed	ly					Cl 158	SC 158.1	P 47	L 25	# 126
Change "sybla	ayers" to "s	sublayers."				Wienckow	ski, Natalie	General Motors	3	
Proposed Respon		Response Status W				Comment All the	71-	Comment Status D use"s in the table are not include	ded in the dra	EZ aft and should be external.
						Suggested Chang them	ge the character	tag on "46" (2x), "47", "49", "51	", "108" to Ex	ternal which will turn
						Proposed PROF	Response POSED ACCEPT	Response Status W		

C/ 158	SC 158.1	P 47	L34	# 125		C/ 158	SC 158.12.4	.9 P 64	L1	# <u>1</u> 60	
Wienckows	ski, Natalie	General Motors	3			Maguire, \	/alerie	The Siemor	Company		
Comment Clause		Comment Status D parked as an external link as	t isn't in this d	raft.	EZ	Comment Extra	<i>Type</i> E blank page	Comment Status D			EZ
Suggested Chang		ng on "Clause 108" to Externa	ıl which will tur	n it green.		Suggested Delete	Remedy blank page				
Proposed I	Response OSED ACCEPT.	Response Status W				Proposed PROP	Response POSED ACCEPT	Response Status W			
C/ 158	SC 158.1	P48	L13	# 224		C/ 159	SC 159.3	P67	L5	# 161	
Trowbridge	e, Steve	Nokia				Maguire, \	/alerie	The Siemor	Company		
Comment Sloppy	,,	Comment Status D angles for XGMII, PCS, RS-FI	EC in Figure 1	58-1	EZ	Comment "1" an	• •	Comment Status D um" should be on the same	line		EZ
Suggested Fix it	Remedy					Suggested Insert	-	ace between "1" and "paus	e_quantum"		
Proposed I	Response OSED ACCEPT.	Response Status W				Proposed PROP	Response POSED ACCEPT	Response Status W			
C/ 158	SC 158.5.6	P51	<i>L</i> 11	# 127		C/ 159	SC 159.5.9	P70	L9	# 128	
Wienckows	ski, Natalie	General Motors	3			Wienckow	ski, Natalie	General Mo	tors		
Comment This se		Comment Status D T. What's optional, the function	on? Th PMD?	The optical transm	<i>EZ</i> itter?	Comment typo	Type E	Comment Status D			EZ
Suggested	lRemedv					Suggested	dRemedv				
Chang functio	e: PMDs complia on which allows th	ant with this clause shall inclu e optical transmitter to be dis	abled is option		able	Chang	ge: 25BASE-BR 5GBASE-BRx-U				
		mpliant with this clause shall lisable function which allows t		smitter to be disab	oled.	Proposed	•	Response Status W			
Proposed I		Response Status W	•			PROP	OSED ACCEPT				
•	OSED ACCEPT.	,				C/ 159	SC 159.6.3	P 73	L 20	# 129	
						Wienckow	ski, Natalie	General Mo	tors		
						Comment	,,	Comment Status D			EZ
						88.11.	2.1 should be m	arked as an external link as	it isn't in this dra	ft.	
						Suggested Chang	•	tag on "88.11.2.1" to Extern	al which will turn	it green.	
						Proposed	Response	Response Status W			

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic **EZ**

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C/ 159 SC 159.9 L48 # 173 C/ 160 SC 160.6.1 P90 L14 P73 Wienckowski, Natalie General Motors Dudek, Mike Marvell Comment Type Ε Comment Status D EΖ Comment Type Ε Comment Status D Table 159-9 is split across a page break which makes it hard to read. 121.8.5.3 should be marked as an external link as it isn't in this draft. SuggestedRemedy SuggestedRemedy Change the character tag on "121.8.5.3" to External which will turn it green. Put it all on one page. Also on P91L8 Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. # 130 C/ 159 SC 159.9 P74 **L1** P47 C/ 158 SC 158.1 L34 Wienckowski. Natalie General Motors Cadence Design Systems Marris. Arthur F7 Comment Type E Comment Status D Comment Type TR Comment Status D The table title needs (continued) in it. Is it really adequate to just say "Clause 108 describes an FEC for 25 Gb/s PHY, but the SuggestedRemedy same scheme can be applied to 10 Gb/s PHYs"? See instructions in 200.1.1.1.1 in the 802.3 FM template. SuggestedRemedy Proposed Response Response Status W Consider opening up clause 108 to explain how it works with 10G PMDs PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. C/ 160 SC 160.1 P83 L16 # 131 See#248, In Cl. 108, add a new paragrph to the end of 108.1.1 "This RS-FEC sublayer also Wienckowski, Natalie General Motors applies to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, specified in Clause 158. When applying it to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, "25GBASE-R" and "25.78125 Comment Type E Comment Status D EΖ GBd" in this clause should be replaced by "10GBASE-BR20 or 10GBASE-BR40+" and When refering to the "top" of a Clause, you need to include "Clause" in the reference. "10.3125 GBd", respectively." Group comments #248, 157, 171, 225 SuggestedRemedy Change: 45 To: Clause 45 Proposed Response Response Status W PROPOSED ACCEPT. P85 C/ 160 SC 160.3 / 36 # 162 Maquire. Valerie The Siemon Company F7 Comment Type E Comment Status D "2" and "pause quantum" should be on the same line SuggestedRemedy Insert non-breaking space between "2" and "pause quantum"

Proposed Response

PROPOSED ACCEPT

Response Status W

132

157

EΖ

FFC

The footnote says the 108 RS-FEC is described for 25Gb/s. It should not be left to the reader to work out how to apply it to 10Gb/s

SuggestedRemedy

Bring appropriate edits to Clause 108 into the document. E.g. The delays in ns are probably wrong. The introduction would need work etc. Whether this RS FEC meets the delay constraints for 10G networks in Clause 44 should also be investigated if this has not already been done.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See#248, In Cl. 108, add a new paragrph to the end of 108.1.1 "This RS-FEC sublayer also applies to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, specified in Clause 158. When applying it to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, "25GBASE-R" and "25.78125 GBd" in this clause should be replaced by "10GBASE-BR20 or 10GBASE-BR40+" and "10.3125 GBd". respectively."

Group comments #248, 157, 171, 225

Comment Type T Comment Status D

I'm not aware there is an RS-FEC for 10GBASE-R PHYs

SuggestedRemedy

I suspect you may have intended Clause 74 Firewire FEC. Provide an appropriate reference to the correct FEC type and clause reference

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

It is RS-FEC in Cl. 108. see #248

In Cl. 108, add a new paragrph to the end of 108.1.1 "This RS-FEC sublayer also applies to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, specified in Clause 158. When applying it to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, "25GBASE-R" and "25.78125 GBd" in this clause should be replaced by "10GBASE-BR20 or 10GBASE-BR40+" and "10.3125 GBd", respectively."

Group comments #248, 157, 171, 225

CI 108 SC 108 P L # 248

Dawe, Piers Nvidia

Comment Type T Comment Status D LATE

Clause 108, Reed-Solomon Forward Error Correction (RS-FEC) sublayer for 25GBASE-R PHYs, will need some modifications for its new use as a 10G FEC.

SuggestedRemedy

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

In Cl. 108, add a new paragrph to the end of 108.1.1 "This RS-FEC sublayer also applies to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, specified in Clause 158. When applying it to 10GBASE-BR20 and 10GBASE-BR40+ PHYs, "25GBASE-R" and "25.78125 GBd" in this clause should be replaced by "10GBASE-BR20 or 10GBASE-BR40+" and "10.3125 GBd", respectively."

Cl 78 SC 78.1.4 P L # 247

Dawe, Piers Nvidia

Comment Type T Comment Status D

Need to modify the EEE clause

SuggestedRemedy

FEC

Modify Table 78-1 to show which PHYs may optionally support EEE. For each, footnote b applies: The deep sleep mode of EEE is not supported for this PHY.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Modify Table 78-1 to show 25GBASE-BRx and 50GBASE-BRx BiDi PHYs may optionally support EEE. Footnode b applies to the aformentioned PHYs.

I ATF

C/ FM SC FM P1 L24 # 282 C/ 1 SC 1.4 P18 L12 # 288 Dawe, Piers Nvidia Dawe, Piers Nvidia Comment Type Ε Comment Status D LATE Comment Type T Comment Status D LATE [complete] "The link includes two different specifications": I know this is copied from before but it disagrees with the definition of "link" and anyway a link is a thing not a document; it does SuggestedRemedy not contain specifications. Complete it SuggestedRemedy Proposed Response Response Status W Change to "There are different specifications for 10GBASE-BR10-D and 10GBASE-BR10-PROPOSED ACCEPT IN PRINCIPLE. U; a link connects one to the other."? Proposed Response Response Status W Propose to complete this setence as "This amendment adds Physical Layer (PHY) PROPOSED ACCEPT IN PRINCIPLE. specifications and management parameters for 10 Gb/s, 25 Gb/s, and 50 Gb/s Ethernet bidirectional optical interfaces for operation over single-mode fiber." Need group discussion C/ FM SC FM P2 **L1** # 285 C/ 1 SC 1.4.52d P18 L24 # 239 Nvidia Dawe Piers Dawe, Piers Nvidia Comment Type Ε Comment Status D LATE Comment Type E Comment Status D LATE Abstract with a larger loss budget: larger than what? SuggestedRemedy SuggestedRemedy Write it with a larger loss budget than 10GBASE-BR40. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. See#6, include abstract text in #6 resolution Remove BR40+ definition as BR40+ PHYs are removed from .3cp Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88 C/ FM # 286 SC FM P2 L2 Dawe, Piers Nvidia Comment Status D I ATF Comment Type Ε Keywords SuggestedRemedy List them

Proposed Response

PROPOSED ACCEPT IN PRINCIPLE. See#6, include keywords in #6 resolution

Comment group #99, 285, 6, 148, 87, 13, 100, 286, 88

Response Status W

Topic LATE

Cl 56 SC 56.1 P33 L38 # 241 C/ 56 SC 56.1.1.1 P34 L24 # 243 Dawe, Piers Dawe, Piers Nvidia Nvidia Comment Type Т Comment Status D LATE Comment Type Е Comment Status D LATE Wrong PCS; wrong font. As the lower sublayers are rate-specific too, I don't know that we Should mention the FEC sublayers too where they are required for all variants. need to give that detail in the figure. SuggestedRemedy SuggestedRemedy 25GBASE-R PCS, RS-FEC, and PMA sublayers Either change to 10GBASE-R PCS 25GBASE-R PCS 50GBASE-R PCS, in the usual font, 50GBASE-R PCS, RS-FEC, and PMA sublayers and make the stacks of boxes wider. Proposed Response Response Status W or change to PCS PCS, in the usual font. PROPOSED ACCEPT IN PRINCIPLE. Also Fig 157-1. Need group review and decision Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE Cl 56 P37 1 # 245 SC 56.1.3 Dawe, Piers Nvidia Change PCS blocks in Figures 56-1a and 157-1 into 10GBASE-R PCS, 25GBASE-R PCS, Comment Type Ε Comment Status D I ATF and 50GBASE-R PCS Order: should go down the layers. Compare Table 44-1, Table 105-2, Table 131-3 and In 802.3-2018 Fig. 56-1, there are blocks such as "Cu PCS", "100BASE-X PCS", and several others "1000BASE-X PCS". Those fonts are smaller than the usual. SuggestedRemedy CI 56 P34 # 242 SC 56.1.1.1 L21 10GBASE-R PCS 10GBASE-R PMA Dawe. Piers Nvidia 10GBASE-BRx PMD LATE Comment Type E Comment Status D 25GBASE-R PCS 25GBASE-R PMA Too much "support" 25GBASE-BRx PMD SuggestedRemedy 50GBASE-R PCS 50GBASE-R PMA Change sublayers are used to support a bit rate 50GBASE-BRx PMD Proposed Response Response Status W sublayers are used for a bit rate

PROPOSED ACCEPT.

Proposed Response Status W

PROPOSED REJECT.

four times

This type of wording is used throughout 56.1.1 to describe all EFM P2P links. In order to make 56.1.1.1 and 56.1.1.2 the same style, suggest to change "sublayers are used to support a bit rate" to "sublayers support a bit rate" (5 places)

Cl 56 SC 56.1.3 P37 L # 246 C/ 158 SC 158.8 L50 # 277 P37 Dawe, Piers Dawe, Piers Nvidia Nvidia Comment Type Т Comment Status D LATE Comment Type Т Comment Status D LATE RS-FEC is missing. Maybe EEE is missing. The minimum dispersion for a 40 km PMD was set at zero in 52.9.10.2 because the 1550 nm signal was always at a longer wavelength than the dispersion zero. Here, we don't SuggestedRemedy know that. All we know is that the 10GBASE-BRx-U signal is always at a shorter OAM wavelength than the dispersion zero. EEE SuggestedRemedy 100BASE-LX10 PMD The table could be split for U and D. If not, the simple solution is: PMD Min 10GBASE-R PCS BR10 min(f1(lambda), 0) max(f2(lambda), 0) 25GBASE-R RS-FEC 108 BR0 min(f3(lambda), 0) max(f4(lambda), 0) 10GBASE-R PMA BR40 min(f5(lambda), 0) max(f6(lambda), 0) 10GBASE-BRx PMD where f1 2 3 4 6 are as now, f5 is 0.93, lambda, [1- (1324 / lambda)^4] 25GBASE-R PCS 10GBASE-R RS-FEC 108 Proposed Response Response Status W 25GBASE-R PMA PROPOSED ACCEPT IN PRINCIPLE. 25GBASE-BRx PMD 50GBASE-R PCS Table 158-9, change cell "0" into "0.93*lambda*[1- (1324 / lambda)^4]" 50GBASE-R RS-FEC 134 See#178-180 50GBASE-R PMA ... Proposed Response Response Status W C/ 157 SC 157.1.3 P39 L39 # 253 PROPOSED ACCEPT IN PRINCIPLE. Dawe, Piers Nvidia Comment Status D LATE Comment Type EEE and RS-FEC are mentioned in Tables 158-1, 159-1, 160-1. Align Table 56-2 to the three tables. Within this clause the Multi-Gigabit Ethernet Bidi PHY device use the following nomenclature. C/ 56 SC 56.1.3 P37 L18 244 SuggestedRemedy Dawe. Piers Nvidia For Multi-Gigabit Ethernet Bidi PHYs, the following nomenclature is used. Comment Type E Comment Status D I ATF Proposed Response Response Status W Sublayer names PROPOSED ACCEPT. SuggestedRemedy Change: 10GBASE-BRx PMA to 10GBASE-R PMA 10GBASE-BRx PCS to 10GBASE-R PCS 25GBASE-BRx PMA to 25GBASE-R PMA 25GBASE-BRx PCS to 25GBASE-R PCS 50GBASE-BRx PMA to 50GBASE-R PMA 50GBASE-BRx PCS to 50GBASE-R PCS Proposed Response Response Status W PROPOSED ACCEPT.

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Group #244, 203, 204

Topic LATE

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C/ 157 SC 157.1.3 **L**5 # 257 C/ 157 SC 157.4 P45 L25 # 265 P40 Dawe, Piers Dawe, Piers Nvidia Nvidia Comment Type Ε Comment Status D LATE Comment Type T Comment Status D LATE This table is too long (spills over onto the next page) and too repetitive. 44.3 will need modification to include FEC delay SuggestedRemedy SuggestedRemedy Modify Table 44-2. Add a sentence of introduction including the common information (over one single-mode fiber), and instead of one Description column with a sentence in each cell, use columns for Proposed Response Response Status W rate, position (OLT or ONU), coding, reach, and clause reference. PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Add a new line "10GBASE-BRx RS-FEC" to Table 44-2, reuse time values in Table 105-3. line "25GBASE-R RS-FEC" for 10GBASE-BR20, bit time needs adjustment to 10G Update table 157-1 to remove all BR40+ rows, this will fit the table into a single paper C/ 158 SC 158.1 P47 1 32 # 267 SC 157.1.4 C/ 157 P42 L19 260 Dawe, Piers Nvidia Dawe, Piers Nvidia Comment Type E Comment Status D I ATF LATE Comment Type E Comment Status D Order of sublayers should be top to bottom. As it's Fast Wake only, EEE is above PCS the PCS at least; I believe it's above the RS. SuggestedRemedy SuggestedRemedy Move the row "108 RS-FEC Optional Required" to between PCS and PMA (as it is in 159 Move the EEE column to between "Nomenclature" and RS. and 160). Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Need group review and decision SC 158.6 C/ 158 P51 L45 # 270 C/ 157 SC 157.2.3 P44 1 22 262 Dawe. Piers Nvidia Dawe. Piers Nvidia Comment Type T Comment Status D I ATF Comment Type T Comment Status D I ATF There should be something about the possibilities (or not) for interoperation between the Now that FEC is required for some PMDs, "An FEC sublayer is available for all Multidifferent grades of PMD. Also for Clause 159. The text in 160 needs attention; a minimum Gigabit BiDi PHYs" is too weak. insertion loss would be needed. I think. SuggestedRemedy SuggestedRemedy An FEC sublaver is optional for 10G-BASE-BR10 and 10G-BASE-BR40, and required for See P802.3cu for examples of how to do this. all other Multi-Gigabit BiDi PHYs. Proposed Response Response Status W Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

See#181 to add introp of .3cp links

Change to "An FEC sublayer is required for all Multi-Gigabit BiDi PHYs except 10G-BASE-

PROPOSED ACCEPT IN PRINCIPLE.

BR10 and 10G-BASE-BR40"

C/ 158 SC 158.6.1 L49 # 272 C/ 158 SC 158.8 P54 L37 # 275 P52 Dawe, Piers Dawe, Piers Nvidia Nvidia Comment Type Т Comment Status D LATE Comment Type Т Comment Status D LATE Definition B is preferable "shall be conducted" isn't suitable wording, as there is no requirement to conduct the test. Here is example wording based on what has been used in 802.3ba and later projects: SuggestedRemedy SuggestedRemedy Suggest remove the obsolete transmitter eye mask definition A Stressed receiver sensitivity shall be within the limits given in Table 158-7 if measured Proposed Response Response Status W using the method defined by 52.9.9, with the additional condition that the transmitted optical signal and the reflectance of the optical link are at their maximum levels. PROPOSED REJECT. Proposed Response Response Status W Definitions A and B are in 10GBASE spec. Clause 158 copies both. Need group decision PROPOSED ACCEPT IN PRINCIPLE. See#183, add full details of optical measurement requirements and apply all changes C/ 158 SC 158.6.2 P53 L49 # 273 appropriate for 158, and also 159 and 160. Editorial license to make inline changes to Dawe. Piers Nvidia 114.7 (25G), 52.9 (10G),139.7/CU/140/151 (50G) Comment Type Т Comment Status D LATE C/ 158 SC 158.8 P54 L38 # 276 Extinction ratio: 3.5 dB is OK for 10GBASE-L, 3 dB for 10GBASE-E, 3 for 25GBASE-LR, 4 for 25GBASE-ER, why would 10GBASE-BR40 need 5.5 dB? Is this a typo? Dawe, Piers Nvidia Comment Status D LATE SuggestedRemedy Comment Type T Reduce to lower than 10GBASE-BR20 and 10GBASE-BR40+, e.g. 4.5 or 4 dB. What does "condition that the transmitted optical signal and ... should be at their maximum levels" mean? Proposed Response Response Status W SuggestedRemedy PROPOSED REJECT. Should this say that the transmitter reflectance should be at maximum? P52 L42 Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. ER 5.5 copies from 10GBASE-ER spec. BR20 and BR40+ specs are new. See#183, add full details of optical measurement requirements and apply all changes C/ 158 # 274 appropriate for 158, and also 159 and 160. Editorial license to make inline changes to SC 158.8 P 54 L33 114.7 (25G), 52.9 (10G), 139.7/CU/140/151 (50G) Dawe, Piers Nvidia C/ 158 SC 158.11.1 P56 L37 # 279 Comment Type T Comment Status D LATE "Optical measurement requirements" this was copied from Clause 38 to 52 then 58-60 but Dawe, Piers Nvidia later it was decided that this was incorrect: 802.3 is not a test spec, the measurements are I ATF Comment Type T Comment Status D not required, only the compliance is. So Clause 68 and later optical PMD clauses use This NOTE was written for a 1550 nm PMD. different wording. SuggestedRemedy SuggestedRemedy Needs review because different wavelength here Change to: Definition of optical parameters and measurement methods Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. See#183, add full details of optical measurement requirements and apply all changes Delete the note as it is not relevant appropriate for 158, and also 159 and 160. Editorial license to make inline changes to

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

114.7 (25G), 52.9 (10G),139.7/CU/140/151 (50G)

Topic LATE

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C/ 158 SC 158.12 **L1** # 280 C/ FM SC FM P1 L24 # 283 P58 Dawe, Piers Dawe, Piers Nvidia Nvidia Comment Type Ε Comment Status D LATE Comment Type Е Comment Status D LATE, EZ Subclause title is shorter than past clauses, which is an improvement. However, "for 158" D1.3 is too abrupt. SuggestedRemedy SuggestedRemedy Would be D2.1 next time Change the format of the cross-reference to 158 so that the title becomes: Proposed Response Response Status W Protocol implementation conformance statement (PICS) proforma for Clause 158 PROPOSED ACCEPT IN PRINCIPLE. Protocol implementation conformance statement (PICS) proforma for Clause 158, Physical Medium Dependent (PMD) sublaver and medium, types 10GBASE-BR10, 10GBASE-See #51, change to "Draft D2.1 is prepared for the the first Working Group recirculation BR20, 10GBASE-BR40, and 10GBASE-BR?? Similarly for 159.11 and 160.11. Group comments #51, 12, 283, 284 Proposed Response Response Status W PROPOSED ACCEPT. P1 C/ FM SC FM L25 # 284 Dawe. Piers Nvidia Add "Clause" before "158". Do same changes to Clauses 159 and 160. Comment Type Ε Comment Status D LATE. EZ P1 # 281 C/ FM SC FM L24 [review/balloting stage] Dawe, Piers Nvidia SuggestedRemedy Comment Status D LATE, EZ Comment Type Е Delete [list to be populated during publication process] Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. Populate it now, consistent with lines 23-24. If necessary, say that the list may be amended during the publication process. C/ FM SC FM P13 L28 # 287 Proposed Response Response Status W Dawe, Piers Nvidia PROPOSED ACCEPT IN PRINCIPLE. Comment Type Comment Status D LATE. EZ See #147 to populate the latest amendment list Formatting problem with the contents list for the new clauses. Missing tab in the template? Group comments #147, 86, 50, 68, 281 SuggestedRemedy Fix Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

Use the Content list from FM template

C/ 1 SC 1.4.52a	P18	L12	# 289	C/ 157 SC 157.1.1	P39	<i>L</i> 11	# 250
Dawe, Piers	Nvidia			Dawe, Piers	Nvidia		
Comment Type E 10km	Comment Status D		LATE, EZ	Comment Type E Net-work	Comment Status D		LATE, EZ
SuggestedRemedy 10 space km Severa	l places			SuggestedRemedy Network			
Proposed Response PROPOSED ACCEPT	Response Status W			Proposed Response PROPOSED ACCEPT	Response Status W		
C/ 45 SC 45.2.1.7	.1 P25	L 20	# 240	C/ 157 SC 157.1.2	P39	L 27	# 251
Dawe, Piers	Nvidia			Dawe, Piers	Nvidia		
Comment Type E This very long table ca	Comment Status D an be laid out better		LATE, EZ	Comment Type E are specified in 44.1.3 apply - not grammatica	Comment Status D (for 10 Gb/s), 105.1.2 (for 25 al.	5 Gb/s), and 131.	<i>LATE, EZ</i> 1.2 (for 50 Gb/s)
SuggestedRemedy Make the left column of the right column Also Table 45-10.	wider, at least wide enough to could be narrower.	o fit the contents,	as done for Table 45-	SuggestedRemedy Delete "are" or "apply"			
Proposed Response PROPOSED ACCEPT	Response Status W			Proposed Response PROPOSED ACCEPT	Response Status W		
C/ 157 SC 157	P39	L1	# 249	Delete "apply"			
Dawe, Piers	Nvidia	LI	π <u>249</u>	C/ 157 SC 157.1.3	P39	L37	# 252
Comment Type E 802.3 doesn't use Gbp	Comment Status D		LATE, EZ	Dawe, Piers Comment Type E Space before "Nomene	Nvidia Comment Status D clature"		LATE, EZ
SuggestedRemedy Change to Gb/s (3 times	,			SuggestedRemedy Remove			
Proposed Response PROPOSED ACCEPT	Response Status W Γ.			Proposed Response PROPOSED ACCEPT	Response Status W		

C/ 157 SC 157.1.3	P39	L47	# 254	C/ 157 SC 157.1.3 P41 L1 # 258	
Dawe, Piers	Nvidia			Dawe, Piers Nvidia	
Comment Type E encoding.x refers	Comment Status D		LATE, EZ	Comment Type E Comment Status D If the table spills over onto a second page, the continuation header should say (con in italics.	<i>LATE, EZ</i> ntinued)
SuggestedRemedy encoding. x refers				SuggestedRemedy There's a correct way to do this.	
Proposed Response PROPOSED ACCEPT See #31 to list nomeno				Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.	
C/ 157 SC 157.1.3	P39	L 53	# 255	See #257, try to use one page for this table	
Dawe, Piers	Nvidia			C/ 157 SC 157.1.4 P42 L9 # 259	
Comment Type E	Comment Status D		LATE, EZ	Dawe, Piers Nvidia	
GMII				Comment Type E Comment Status D	LATE, EZ
SuggestedRemedy XGMII				SuggestedRemedy	
Proposed Response PROPOSED ACCEPT	Response Status W			Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.	
C/ 157 SC 157.1.3	P 40	L 5	# 256	Delete "-"	
Dawe, Piers	Nvidia			C/ 157 SC 157.2 P44 L1 # 261	
Comment Type E	Comment Status D		LATE, EZ	Dawe, Piers Nvidia	
fi- ber				Comment Type E Comment Status D I	LATE, EZ
SuggestedRemedy Make the right hand co	lumn wider, set the hyphena	tion fragment ler	ngth to at least 3.	SuggestedRemedy	
Proposed Response	Response Status W			sublayers	
PROPOSED ACCEPT				Proposed Response Response Status W PROPOSED ACCEPT.	

C/ 157 SC 157.2.3	P 44	L10	# 263	C/ 158 SC 158.1.1	P 48	<i>L</i> 1	# 268
Dawe, Piers	Nvidia			Dawe, Piers	Nvidia		
Comment Type E specific RS and xMII spe	Comment Status D		LATE, EZ	Comment Type E Blank line	Comment Status D		LATE, EZ
SuggestedRemedy particular RS and xMII spor, delete the second "sp				SuggestedRemedy Remove			
Also in 157.2.2, 157.2.3,				Proposed Response PROPOSED ACCEPT.	Response Status W		
Proposed Response PROPOSED ACCEPT.	Response Status W				D40	/ 20	# 000
				C/ 158 SC 158.1.1	P48	L 30	# 269
Delete the seocnd "spec	ified" in all places			Dawe, Piers Comment Type E	Nvidia Comment Status D		LATE. EZ
C/ 157 SC 157.2.3	P 44	L11	# 264	Blank lines	Comment Status D		LATE, EZ
Dawe, Piers Comment Type E	Nvidia Comment Status D		LATE, EZ	SuggestedRemedy			
for a given is given				Remove			
SuggestedRemedy Change "for a given" to "	for each"			Proposed Response PROPOSED ACCEPT.	Response Status W		
Also in 157.2.2, 157.2.3,				C/ 158 SC 158.6.1	P 52	L19	# 271
Proposed Response	Response Status W			Dawe, Piers	Nvidia		<u> </u>
PROPOSED ACCEPT.				Comment Type E	Comment Status D		LATE, EZ
C/ 158 SC 158.1	P 47	L17	# 266	Blank line			
Dawe, Piers	Nvidia			SuggestedRemedy			
Comment Type T	Comment Status D		LATE, EZ	Remove			
Not the usual wording				Proposed Response	Response Status W		
SuggestedRemedy				PROPOSED ACCEPT.			
_	o "defined in Clause 45, or	equivalent"		C/ 158 SC 158.10	P56	L 25	# 278
Proposed Response	Response Status W			Dawe, Piers	Nvidia		
PROPOSED ACCEPT IN	N PRINCIPLE.			Comment Type E	Comment Status D		LATE, EZ
Change "defined in 45" to	o "defined in Clause 45"			Blank line			
				SuggestedRemedy -			
				Remove			
				Proposed Response	Response Status W		

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Topic

Topic LATE, EZ

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