C/ 00 SC FM P3 L3 # 586

Healey, Adam Broadcom Inc.

Comment Type T Comment Status D EZ

The abstract is inconsistent with the title of the amendment. This inconsistency is also present on the title page (page 1, line 34) and on page 23, line 13.

SuggestedRemedy

Change ".on single balanced pair copper cabling." to "over a single balanced pair of conductors." Correct similar inconsistencies throughout the draft.

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Master comment 586. Resolve with 363, 606, and 426.

Replace "on single balanced pair copper cabling" with "over a single balanced pair of conductors" on page 3, line 3

Replace "over Single Balanced Twisted-pair Cabling and Associated Power Delivery" with "and Associated Power Delivery over a Single Balanced Pair of Conductors" on page 23, line 10

See comments 425 and 447 for new text to replace the sentence on page 1, line 20

CI 00 SC FM P3 L3 # 587
Healey, Adam Broadcom Inc.

Comment Type T Comment Status D

It seems worthy to highlight that "Physical Layer Collision Avoidance (PLCA)" is defined in this amendment.

SuggestedRemedy

Consider adding "Physical Layer Collision Avoidance" and/or "PLCA" to the list of keywords.

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Add ";PLCA; Physical Layer Collision Avoidance" to the list of keywords after Physical Medium Attachment

C/ 00 SC FM P11 L 33 # 354

Yseboodt, Lennart Signify

Comment Type E Comment Status D EZ

In the descriptive list of the amendments, the following is highlighted in yellow "x and its amendments", where only "x" should be highlighted.

Occurs on line 33, 39, and 47 of page 11.

SuggestedRemedy

Fix as appropriate.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Remove yellow highlighting from "z and its ammendments" on lines 33, 39, and 47 of page 11

Replace "201x" with "2018" on lines 33, 39, and 47 of page 11.

Replace "IEEE Std 802.3btT-201x" with "IEEE Std 802.3btT-2018" on line 37 and remove yellow highlight.

Replace "IEEE Std 802.3cbT-201x" with "IEEE Std 802.3cbT-2018" on line on line 31 and remove yellow highlight.

C/ **00** SC **FM** P**13** L **56** # 21 Anslow, Pete Ciena

Comment Type E Comment Status D

The variable copyright\_year is set to 2017 in the TOC file

SugaestedRemedy

ΕZ

Set the variable copyright year to 2018 in the TOC file

Proposed Response Response Status W
PROPOSED ACCEPT.

F7

CI 00 SC FM P 23 L 1 # 363

Trowbridge, Steve Nokia

Comment Type ER Comment Status D EZ

The title on page 23 does not match the title at the front of the draft. I think the title on page 1 is correct as the scope is no longer just twisted pair.

#### SuggestedRemedy

Change "Physical Layer Specifications and Management Parameters for 10 Mb/s Operation over Single Balanced Twisted-pair Cabling and Associated Power Delivery" to "Physical Layer Specifications and Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Pair of Conductors"

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Master comment 586. Resolve with 586, 426, and 606.

Replace "over Single Balanced Twisted-pair Cabling and Associated Power Delivery"

with "and Associated Power Delivery over a Single Balanced Pair of Conductors" on page 23, line 10

 CI 00
 SC 0
 P
 L
 # 664

 Donahue, Curtis
 UNH-IOL

 Comment Type
 E
 Comment Status
 D
 EZ

There are many variants of Auto-Negotiation throughout the draft.

#### SuggestedRemedy

Scrub draft and change all variants of Auto-Negotiation to "Auto-Negotiation"

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Globally search for "AutoNegotiation", "Auto Negotiation", "auto negotiation", and "Auto negotiation" and replace with "Auto-Negotiation".

Chief Editor to implement remedy when preparing the files for d2p1.

C/ 00 SC 0 Р 1 # 62 Anslow, Pete Ciena Comment Type E Comment Status D F7 Comment #10 against D1.0 of the 2008 revision: http://www.ieee802.org/3/axay/comments/D1.0/802.3ay D1p0.pdf changed all instances of 'state machine' to 'state diagram' (except in deprecated text). This draft contains 48 instances of "state machine" and 77 instances of "state diagram" SuggestedRemedy Change all instances of 'state machine' to 'state diagram' throughout the draft. Proposed Response Response Status W PROPOSED ACCEPT. C/ 00 SC 0 P L # 518 Beruto, Piergiorgio Canova Tech Srl Comment Type E Comment Status D

Timer done / not done events name in state diagrams are not inline with convenctions used in other clauses

#### SuggestedRemedy

Replace all occurrences of "XXX Done" with "XXX\_done" (all lowercase) and similarly "!XXX Done" or "XXX not Done" with "XXX\_done = FALSE" (all lowercase) throughout all the clauses. XXX is a placeholder for the timer name. NOTE: resolve this comment when all other comments are resolved already.

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Jon Lewis to implement remedy when state diagrams in Clauses 147 and 148 are generated in FrameMaker.

CI 00 SC 0 P 0 L 0 # 633

Thompson, Geoff GraCaSI S.A.

Comment Type ER Comment Status D EZ

Draft does not have page numbers that show up on 100% magnification printout on 8.5X11 in paper. I am working from a printout (for cl. 147 at least) so my comments wont include a page number reference.

#### SuggestedRemedy

Have page numbers included in the draft page format that will show up on copies printed in default mode (i.e. 100%) on 8.5X11 paper.

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Remove the extra paragraph mark between "subject to change" and the page number in both the odd and even master pages in all of the files in the draft.

 C/ 00
 SC 0
 P 1
 L 34
 # 447

 Booth, Brad
 Microsoft

 Comment Type
 ER
 Comment Status
 D
 EZ

The PAR calls out "single balanced pair of conductors" but there are multiple instances where the term has been modified to be "single balanced twisted-pair". While twisted-pair cabling could be used, that is different than single balanced pair.

#### SuggestedRemedy

Make sure the use of "twisted-pair" applies to a medium used to support the PHY; otherwise, the use of the term is in conflict with the PAR.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 447. Resolve with 425.

Replace, "This amendment adds 10 Mb/s Physical Layer (PHY) specifications and management parameters associated optional provision of power, on single balanced twisted-pair copper cabling."

with, "This amendment adds 10 Mb/s Physical Layer (PHY) specifications and management parameters and associated optional provision of power for operation over a single balanced pair of conductors."

C/ 00 SC 0 P 23 L 10 # 606 Bains, Amrik Cisco Comment Type ER Comment Status D F7 "Single Balanced Twisted-pair Cabling" SuggestedRemedy "Single Balanced pair of Conductors" Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Master comment 586. Resolve with 586, 426, and 363. Replace "over Single Balanced Twisted-pair Cabling and Associated Power Delivery" with "and Associated Power Delivery over a Single Balanced Pair of Conductors" on page 23, line 10

Cl 00 SC 0 P34 L1 # 44

Anslow, Pete Ciena

Comment Type E Comment Status D EZ

Recent IEEE published amendments have not included any blank pages between sections

Recent IEEE published amendments have not included any blank pages between sections and the IEEE 802.3 FrameMaker template was modified in this respect some time ago.

SuggestedRemedy

Remove blank pages between sections.

Proposed 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: Clause, Subclause, page, line

C/ **00** SC **0** 

Page 3 of 76 8/29/2018 11:27:58 AM

C/ 00 SC 0 P 89 L 19 # 89 C/ 00 SC 0 P 153 L 54 # 138 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type E Comment Type Comment Status D F7 Comment Status D F7 IEEE uses an en-dash as a minus sign rather than a hyphen. There are 4 instances in the draft where "i.e. " should be "i.e., " (comma missing) SuggestedRemedy SugaestedRemedy Scrub the draft for hyphens used as minus signs and replace them with en-dash (Ctrl-q Change "i.e. " to "i.e., " in: Shft-p). This includes: 147.3.2.5 (page 153, line 54) Page 89, line 19 "BI DA-" 147.3.3.1 (page 154, line 22) Page 92. line 7 147.3.3.5 (page 155. line 38) Page 98, line 19 148.4.5.1 (page 180, line 40) Page 104, line 31 Proposed Response Response Status W Table 146-1 (many instances) PROPOSED ACCEPT. Table 146-2 (7 instances) Table 146-3 (3 instances) C/ 00 SC A P 195 L 1 # 127 Figure 146-8 (2 instances of "Rxn-5") Figure 146-9 (many instances of "Rxn-5") Anslow. Pete Ciena Page 113, line 26 "BI DA-" EΖ Comment Type ER Comment Status D Page 114, line 14 "BI DA-" Page 115. line 9 "BI DA-" Either add some bibliography entries or delete Annex A before going to Sponsor ballot. Page 121, line 31 and line 35 SugaestedRemedy Page 124. line 40. line 53 Page 125, line 17 Either add some bibliography entries or delete Annex A before going to Sponsor ballot. Table 146-5 (4 instances) Proposed Response Response Status W Page 133, line 7 "BI DA-", line 42 "BI DA-" PROPOSED ACCEPT IN PRINCIPLE. Table 146-8 (2 instances of "BI DA-") Page 141, line 25, line 29 Master comment 6. Resolve with 6 and 590. Page 143, line 35, line 39 Figure 147-9 (6 instances of "RXn-?") Page 159, line 38 "BI DA-" Delete Annex A. Page 161, line 10 "BI DA-" C/ 00 SC A P 195 L 1 Page 162. line 29 Page 165, line 29, line 31, line 32 Hajduczenia, Marek Charter Page 168, line 24 "BI\_DA-" Comment Type E Comment Status D ΕZ Table 147-4 (2 instances of "BI DA-") Figure 148-7 (2 instances of "txdn-a") Annex A has no content Figure 146A-1 "RX-", "TX-" SuggestedRemedy Figure 146A-2 "RX-", "TX-" Figure 146A-3 "RX-", "TX-" Remove Annex A unless explicitly needed Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. Master comment 6. Resolve with 127 and 590. Delete Annex A.

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: Clause, Subclause, page, line

C/ 00

Page 4 of 76 8/29/2018 11:27:58 AM

C/ 00 SC A P 195 L 12 # 590 Healey, Adam Broadcom Inc. Comment Type Т Comment Status D F7

Bibliography entry "[B22a]" is not cited in the document and it seems unlikely to have the title "Name-Title".

SuggestedRemedy

Remove amendments to Annex A or list any informative references cited in the draft.

Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

Master comment 6. Resolve with 6 and 127.

Delete Annex A.

C/ 00 P 1 # 425 SC cover page L 34 Wienckowski. Natalie **General Motors** EΖ

Comment Type E Comment Status D

still have twisted-pair

SuggestedRemedy

Change "single balanced twisted-pair copper cabling" to "single balanced pair of conductors".

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 447. Resolve with 447

Replace, "This amendment adds 10 Mb/s Physical Layer (PHY) specifications and management parameters associated optional provision of power, on single balanced twisted-pair copper cabling."

with, "This amendment adds 10 Mb/s Physical Layer (PHY) specifications and management parameters and associated optional provision of power for operation over a single balanced pair of conductors."

C/ 00 SC Keywords P3 L 4 # 156 Graber, Steffen Pepperl+Fuchs GmbH Comment Type E Comment Status D F7 [EASY] 10BASE-T1; .; MASTER-SLAVE SuggestedRemedy 10BASE-T1L; 10BASE-T1S; .; Master-Slave Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

Replace "10BASE-T1" with "10BASE-T1L; 10BASE-T1S" on line 4.

C/ 01 SC 1 P 23 L 13 # 426 Wienckowski, Natalie General Motors ΕZ Comment Type E Comment Status X still have twisted-pair

SuggestedRemedy

Change "single balanced twisted-pair cabling" to "single balanced pair of conductors".

Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

Master comment 586. Resolve with 586, 363, and 606.

Replace "over Single Balanced Twisted-pair Cabling and Associated Power Delivery"

with "and Associated Power Delivery over a Single Balanced Pair of Conductors" on page 23. line 10

F7

Cl 01 SC 1.3 P 24 L 3 # 588
Healey, Adam Broadcom Inc.

Comment Type T Comment Status D

This amendment appears to add no new normative references.

SuggestedRemedy

Remove 1.3, or list the normative references added by this amendment.

Proposed Response Response Status W
PROPOSED ACCEPT IN PRINCIPLE.

Master comment 588. Resolve with 22.

Chief Editor to submit Maintenance Request to add references to IEC 60068-2-1:2007, IEC 60068-2-27:2008, IEC 60068-2-30:2005, IEC 60068-2-38:2009, IEC 60068-2-52:2017, IEC 60068-2-64:2008, and IEC 60068-2-78:2012 to next edition of 802.3.

Add the following normative references starting at line 9:

IEC 60068-2-2:2007, Environmental testing - Part 2-2: Tests - Test B: Dry heat.

IEC 60068-2-6:2007, Environmental testing - Part 2-6: Tests - Test Fc: Vibration (sinusoidal).

IEC 60068-2-14:2009, Environmental testing - Part 2-14: Tests - Test N: Change of temperature.

IEC 60068-2-27:2008, Environmental testing - Part 2-27: Tests - Test Ea and guidance: Shock.

IEC 60068-2-31:2008, Environmental testing - Part 2-31: Tests - Test Ec: Rough handling shocks, primarily for equipment-type specimens.

IEC 60079-0: 2014, Explosive atmospheres. Part 1. Equipment protection by flameproof enclosures.

IEC 60079-11: 2011, Explosive Atmospheres - Part 11: Equipment protection by intrinsic safety.

IEC 60529:2013. Degrees of Protection Provided by Enclosures (IP Code).

IEC 61000-4-4:2012, Electromagnetic compatibility (EMC) - Part 4-4: Testing and measurement techniques - Electrical fast transient/burst immunity test.

IEC 61000-4-5: 2017, Electromagnetic compatibility (EMC) - Part 4-5: Testing and measurement techniques - Surge immunity test.

IEC 61000-4-6:2013, Electromagnetic compatibility (EMC) - Part 4-6: Testing and

measurement techniques - Immunity to conducted disturbances, induced by radio-frequency fields.

IEC 61000-6-4:2018, Electromagnetic compatibility (EMC) - Part 6-4: Generic standards - Emission standard for industrial environments.

IEC 61010-1:2017, Safety requirements for electrical equipment for measurement, control, and laboratory use - Part 1: General requirements.

IEC 61156-13:201x, Multicore and symmetrical pair/quad cables for digital communications - Part 13: Symmetrical single pair cables with transmission characteristics up to 20 MHz - Horizontal floor wiring - Sectional specification.

IEC 62368-1:2014, Audio/video, information and communication technology equipment - Part 1: Safety requirements.

ISO 4892:1982, Plastics - Methods of exposure to laboratory light.

Insert the following Editor's note after IEC 61156-13:201x, Editor's Note (to be removed prior to publication): IEC NP 61156-13 is still in development and the specification reference will likely change prior to publication. The references will be considered for inclusion in the draft based on Task Force review of relevancy prior to publication.

F7

C/ 01 SC 1.3 P 24 L 5 # 22 Anslow, Pete Ciena

Comment Type TR Comment Status D

There are references in the draft that are not already in the base standard that should be added here. For example: IEC 62368-1 is referenced on page 133, line 52.

SuggestedRemedy

Scrub the draft for references that are not already in the base standard and add them to 1.3

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 588. Resolve with 588.

Chief Editor to submit Maintenance Request to add references to IEC 60068-2-1:2007, IEC 60068-2-27:2008, IEC 60068-2-30:2005, IEC 60068-2-38:2009, IEC 60068-2-52:2017, IEC 60068-2-64:2008, and IEC 60068-2-78:2012 to next edition of 802.3.

Add the following normative references starting at line 9:

IEC 60068-2-2:2007. Environmental testing - Part 2-2: Tests - Test B: Dry heat.

IEC 60068-2-6:2007, Environmental testing - Part 2-6: Tests - Test Fc: Vibration (sinusoidal).

IEC 60068-2-14:2009, Environmental testing - Part 2-14: Tests - Test N: Change of temperature.

IEC 60068-2-27:2008, Environmental testing - Part 2-27: Tests - Test Ea and guidance: Shock.

IEC 60068-2-31:2008, Environmental testing - Part 2-31: Tests - Test Ec: Rough handling shocks, primarily for equipment-type specimens.

IEC 60079-0: 2014, Explosive atmospheres. Part 1. Equipment protection by flameproof enclosures.

IEC 60079-11: 2011, Explosive Atmospheres - Part 11: Equipment protection by intrinsic safety.

IEC 60529:2013, Degrees of Protection Provided by Enclosures (IP Code).

IEC 61000-4-4:2012, Electromagnetic compatibility (EMC) - Part 4-4: Testing and measurement techniques - Electrical fast transient/burst immunity test.

IEC 61000-4-5: 2017, Electromagnetic compatibility (EMC) - Part 4-5: Testing and measurement techniques - Surge immunity test.

IEC 61000-4-6:2013, Electromagnetic compatibility (EMC) - Part 4-6: Testing and measurement techniques - Immunity to conducted disturbances, induced by radio-frequency fields.

IEC 61000-6-4:2018, Electromagnetic compatibility (EMC) - Part 6-4: Generic standards - Emission standard for industrial environments.

IEC 61010-1:2017, Safety requirements for electrical equipment for measurement, control, and laboratory use - Part 1: General requirements.

IEC 61156-13:201x, Multicore and symmetrical pair/quad cables for digital communications - Part 13: Symmetrical single pair cables with transmission characteristics up to 20 MHz - Horizontal floor wiring - Sectional specification.

IEC 62368-1:2014, Audio/video, information and communication technology equipment - Part 1: Safety requirements.

ISO 4892:1982, Plastics - Methods of exposure to laboratory light.

Insert the following Editor's note after IEC 61156-13:201x, Editor's Note (to be removed prior to publication): IEC NP 61156-13 is still in development and the specification reference will likely change prior to publication. The references will be considered for inclusion in the draft based on Task Force review of relevancy prior to publication.

 C/ 01
 SC 1.4
 P 24
 L 12
 # 23

 Anslow, Pete
 Ciena

 Comment Type
 E
 Comment Status
 D
 EZ

The definition numbering has been changed in the revision project. Also, P802.3bt D3.7 is deleting the definition for IPort (1.4.294), which affects the numbering for PLCA

SuggestedRemedy

Change the editing instruction on line 12 to:

"Insert the 10BASE-T1L and 10BASE-T1S definitions into the list after 1.4.50 10BASE-T as follows:"

re-number the definitions for 10BASE-T1L and 10BASE-T1S to be 1.4.50a and 1.4.50b, respectively.

Change the editing instruction on line 20 to:

"Insert the Physical Layer Collision Avoidance (PLCA) definition into the list after 1.4.389 physical header subframe (PHS) (re-numbered from 1.4.390 due to the deletion of 1.4.294 by IEEE Std 802.3bt-201x) as follows:"

re-number the definition for PLCA to be 1.4.389a

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: Clause, Subclause, page, line

C/ **01** SC **1.4** 

Page 7 of 76 8/29/2018 11:27:58 AM

C/ 01 SC 1.4.13a P 24 L 15 # 427 C/ 01 SC 1.5 P 24 L 32 # 266 Wienckowski, Natalie General Motors KIM, YONG NIO Comment Type E Comment Status D F7 Comment Type TR Comment Status D F7 still have twisted-pair At least I see FSM as a missing abbrivation (Fig 148-3). Please add and find other missing abbrivation and add them. SuggestedRemedy SuggestedRemedy Change "single balanced twisted-pair cabling" to "single balanced pair of conductors". please fix them. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 427. Resolve with 700. Add the following before PLCA abbreviation in clause 1.5: Change, "over single balanced twisted-pair cabling" to "over a single balanced pair of conductors" FSM Finite State Machine CI 22 SC 22 P 27 # 608 L 1 C/ 01 SC 1.4.13a P 24 L 15 # 700 Bains. Amrik Cisco Kabra, Lokesh Synopsys Inc ΕZ Comment Type ER Comment Status D F7 Comment Type Ε Comment Status X Correct "balanced twisted-pair cabling up to at least 1 000 m reach." 22.3 section is wrong SuggestedRemedy SuggestedRemedy 22.8 balanced pair of conductors up to at least 1000 m reach Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 427. Resolve with 427. Master comment 608. Resolve with 27. Change "22.3" to "22.8" on line 1 and renumber all subclauses accordingly. Change, "over single balanced twisted-pair cabling" to "over a single balanced pair of conductors" CI 22 SC 22 P 28 L 4 # 609 Bains, Amrik Cisco Comment Type TR Comment Status D ΕZ Empty tables SuggestedRemedy Add information to tables Proposed Response Response Status W

Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to identify and enter PICS.

Master comment 334. Resolve with 334, 631, 452, 8, 30, and 299.

PROPOSED 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: Clause, Subclause, page, line

CI 22 SC 22 Page 8 of 76 8/29/2018 11:27:59 AM

Cl 22 SC 22.2.2.4 P 25 L 9 # 24 Cl 22 SC 22.2.2.4 P 25 L 10 # 702 Anslow, Pete Ciena Kabra, Lokesh Synopsys Inc Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The editing instruction says "Insert new third and fourth paragraphs after existing second Change the instruction "Insert new third and fourth paragraphs after existing second paragraph in 22.2.4 as follows:" but this is a change to the second paragraph. paragraph in 22.2.4 as follows:" SuggestedRemedy SuggestedRemedy Change the editing instruction on line 10 to: Change second paragraph in 22.2.2.4 as follows "Change the second paragraph in 22.2.4 as follows:" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE Master comment 24. Resolve with 24 and 157. Master comment 24. Resolve with 157 and 702. Replace, "Insert new third and fourth paragraphs after the second paragraph in 22.2.4 as Replace. "Insert new third and fourth paragraphs after the second paragraph in 22.2.4 as follows:" follows:" with, "Change the second paragraph in 22.2.2.4 as follows:" with. "Change the second paragraph in 22.2.2.4 as follows:" SC 22.2.2.4 CI 22 P 25 L 15 # 158 CI 22 SC 22.2.2.4 P 25 L 10 # 157 Graber, Steffen Pepperl+Fuchs GmbH Graber, Steffen Pepperl+Fuchs GmbH Comment Type Comment Status D F7 Comment Status D Comment Type Ε EΖ [EASY] Insert new third and fourth paragraphs after the second paragraph in 22.2.4 as [EASY] Insert new third and fourth paragraphs after existing second paragraph in 22.2.4 as follows: follows: SuggestedRemedy SuggestedRemedy Insert a new third and fourth paragraph after the second paragraph in 22.2.2.4 as follows: Modify the second paragraph in 22.2.2.4 as follows: (the text is already in the second (add "a", remove "s" from paragraphs and correct Clause reference) paragraph, Clause is 22.2.2.4 instead of 22.2.4) Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Replace "22.2.4" with "22.2.2.4" on line 9. Master comment 24. Resolve with 24 and 702. Editor's note: Change to line 16 addressed by comment 24. Replace, "Insert new third and fourth paragraphs after the second paragraph in 22.2.4 as follows:" CI 22 SC 22.2.2.4 P 25 L 25 # 159 Graber, Steffen Pepperl+Fuchs GmbH with, "Change the second paragraph in 22.2.2.4 as follows:" ΕZ Comment Status D Comment Type Ε [EASY]:. SuggestedRemedy Remove "." after ":" at the end of the line. 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: Clause, Subclause, page, line

C/ 22 Page 9 of 76

8/29/2018 11:27:59 AM

# Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Power Delivery over a Sin

Cl 22 SC 22.2.2.5 P 25 / 44 # 25 Cl 22 SC 22.2.2.8 P 26 13 # 161 Anslow, Pete Ciena Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The editing instruction says "Change the second paragraph in 22.2.5 as follows:" but this is [EASY] 22.2.8 22.2.2.5. SuggestedRemedy Similar issue with: 22.2.2.8 (correct Clause reference) page 25, line 43, "22.2.5" should be "22.2.2.5" page 26. line 3. "22.2.8" should be "22.2.2.8" Proposed Response Response Status W page 26, line 30, "22.2.11" should be "22.2.2.11" PROPOSED ACCEPT. page 26, line 40, "22.2.12" should be "22.2.2.12" SuggestedRemedy Master comment 25. Consider with comment 25. In the editing instructions on: Cl 22 SC 22.2.2.8 P 26 L 10 # 26 page 25, line 43, change "22.2.5" to "22.2.2.5" page 26. line 3. change "22.2.8" to "22.2.2.8" Anslow, Pete Ciena page 26, line 30, change "22.2.11" to "22.2.2.11" ΕZ Comment Type E Comment Status D page 26. line 40. change "22.2.12" to "22.2.2.12" The editing instruction says "... Table 22-1 ..." but this is Table 22-2. Proposed Response Response Status W PROPOSED ACCEPT. SuggestedRemedy In the editing instruction, change "... Table 22-1 ..." to "... Table 22-2 .". Master comment 25. Resolve with 160, 161, 163, and 164. Proposed Response Response Status W CI 22 SC 22.2.2.5 P 25 L 44 # 160 PROPOSED ACCEPT IN PRINCIPLE. Graber, Steffen Pepperl+Fuchs GmbH Master comment 26. Resolve with 162. Comment Type Comment Status D F7 Ε [EASY] 22.2.5 Change "Table 22-1" to "Table 22-2" in editing instruction. SuggestedRemedy Cl 22 SC 22.2.2.8 P 26 L 10 # 162 22.2.2.5 (correct Clause reference) Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Status D F7 Comment Type E PROPOSED ACCEPT. [EASY] Table 22-1 Master comment 25. Consider with comment 25. SuggestedRemedy Table 22-2 (see table below) Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Master comment 26. Resolve with 26. Change "Table 22-1" to "Table 22-2" in editing instruction.

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: Clause, Subclause, page, line

CI 22 SC 22.2.2.8 Page 10 of 76 8/29/2018 11:27:59 AM

SC 22.2.2.11 Cl 22 P 26 L 30 # 163 Cl 22 SC 22.3 P 27 L 1 Graber, Steffen Pepperl+Fuchs GmbH Jones, Peter Cisco Comment Type Ε Comment Status D F7 Comment Type TR Comment Status D [EASY] 22.2.11 22.3 PICS is a place holder SuggestedRemedy SuggestedRemedy 22.2.2.11 (correct Clause reference) Complete this section as edit instructions from 22.8 (802.3-2015) considering text changes Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT Master comment 25. Consider with comment 25. Master comment 334. Resolve with 334, 631, 30, 609, and 299. Cl 22 SC 22.2.2.12 P 26 L 39 # 164 Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to identify and enter PICS. Graber, Steffen Pepperl+Fuchs GmbH ΕZ Comment Type Comment Status D Ε Editor's note: Clause numbering corrected by comment 608. [EASY] 22.2.12 Cl 22 SC 22.3 P 27 L 1 SuggestedRemedy Yseboodt, Lennart Signify 22.2.2.12 (correct Clause reference) Comment Type ER Comment Status D Proposed Response Response Status W Three empty PICS tables are shown in 22.3.3, 22.3.4.1, and 22.3.4.2. PROPOSED ACCEPT. SugaestedRemedy Master comment 25. Consider with comment 25. Either add the required changed PICS elements or remove 22.3 if no changes are needed to the PICS. Cl 22 SC 22.3 P 27 L 1 # 631 Proposed Response Response Status W Walker, Dylan Cisco PROPOSED ACCEPT IN PRINCIPLE. Comment Status D EΖ Comment Type TR Master comment 334. Resolve with 631, 452, 8, 30, 609, and 299. The PICS in sub-clause 22.3 are empty. SuggestedRemedy Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to identify and enter PICS. Populate the PICS entries. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Master comment 334. Resolve with 334, 452, 8, 30, 609, and 299.

Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to

identify and enter PICS.

# 452

# 334

F7

F7

Cl 22 SC 22.3 P 27 L 1 # 27 Cl 22 SC 22.3.2.2 P 27 L 35 # 662 Anslow, Pete Ciena Thompson, Geoff GraCaSI S.A. Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The text: "IEEE Std 802.3xx-201x, Clause..." is not up to date. The PICS for Clause 22 is in 22.8 not 22.3 SuggestedRemedy SugaestedRemedy Force the numbering of the level 2 heading for the PICS to be 22.8 and this should Change to read: "IEEE Std 802.3cq-201x, Clause..." in this instance and all equivalents renumber all of the following subclauses. throughout the draft. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 608. Resolve with 27. Master comment 29. Resolve with 662. Change "22.3" to "22.8" on line 1 and renumber all subclauses accordingly Change "IEEE Std 802.3xx-201x" to "IEEE Std 802.3cg-201x" in two places in clause 22.3.2.2. CI 22 P 27 # 28 SC 22.3.2.1 L 20 Cl 22 SC 22.3.2.2 P 27 L 35 # 29 Anslow. Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type Comment Status D F7 The table in 22.3.2.1 (should be 22.8.2.1) does not match the table in the base standard. In the table in 22.3.2.2 (should be 22.8.2.2) "IEEE Std 802.3xx-201x" should be "IEEE Std The spelling of enquiries has changed to inquiries, the notes are different, etc. 802.3cg-201x" in two places. SuggestedRemedy SuggestedRemedy Replace the table with the version from the base standard. Change "IEEE Std 802.3xx-201x" to "IEEE Std 802.3cg-201x" in two places. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Replace the existing first column headers and the notes with the first column headers and the notes from the base standard. Master comment 29. Resolve with 662. Cl 22 SC 22.3.3 P 28 L # 299 Editor's note: Clause numbering corrected by comment 608. KIM, YONG NIO F7 Comment Type Comment Status D TR PICs tables are blank. Draft is not complete.

SuggestedRemedy

Proposed Response

Please complete the PICS table.

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 334. Resolve with 334, 631, 452, 8, 30, and 609.

Response Status W

Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to identify and enter PICS.

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: Clause, Subclause, page, line

Cl 22 SC 22.3.3 Page 12 of 76

8/29/2018 11:27:59 AM

Cl 22 SC 22.3.3 P 28 L 1 # 8 C/ 30 SC 30.2.1 P 29 L 8 # 10 Hajduczenia, Marek Charter Hajduczenia, Marek Charter Comment Type ER Comment Status X F7 Comment Type ER Comment Status D F7 Missing PICS content. Multiple SHALL statements were added to text in Clause 22, but Unclear set of changes to Figure 30-3 PICS are missing. SuggestedRemedy SuggestedRemedy Figure is being wholesale replaced; it would be great to have a hint what has been Per comment. Applicable to 22.3.3, 22.3.4.1, 22.3.4.2 changed - either describe it in the editorial instruction / note, or alternatively draw a red box around what has been changed. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 334. Resolve with 334, 631, 452, 30, 609, and 299. Change editing instruction to read: "Replace Figure 30-3 to add oPLCA as follows:" Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to C/ 30 SC 30.2.1 P 30 L 8 # 433 identify and enter PICS. Wienckowski, Natalie General Motors CI 22 SC 22.3.3 P 28 L 1 # 30 Comment Type T Comment Status D ΕZ Anslow. Pete Ciena OAM 30.3.3 box was not removed from Figure 30-3 Comment Type Comment Status X ΕZ ER SuggestedRemedy With a blank placeholder for changes to the Clause 22 PICS, this draft is not ready to Remove OAM box from Figure 30-3. move to Sponsor ballot, hence this is a required comment. SuggestedRemedy Proposed Response Response Status W PROPOSED ACCEPT. Either remove this PICS section from the draft or populate it with changes. Proposed Response Response Status W Editor's note: Jon Lewis to implement. PROPOSED ACCEPT IN PRINCIPLE C/ 30 SC 30.2.1 P 30 L 25 Master comment 334. Resolve with 334, 631, 452, 8, 609, and 299. Hajduczenia, Marek Charter Comment Type E Comment Status D ΕZ Implement resolution to comment #28 and then Chief Editor to work with Curtis Donahue to identify and enter PICS. Extra symbol in oResourceTypeID block. Extra full stop in oEXTENSION block C/ 30 SC 30.2.1 P 29 L 6 # 31 SuggestedRemedy Anslow. Pete Ciena Remove garbage from referenced blocks Comment Type EΖ Proposed Response Response Status W Ε Comment Status D PROPOSED ACCEPT IN PRINCIPLE. Containment is 30.2.3 SuggestedRemedy Master comment 9. Resolve with 453 and 300. Change heading to "30.2.3 Containment" Delete extra symbol in oResourceTypeID block. Delete extra full stop in oEXTENSION Proposed Response Response Status W block. 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: Clause, Subclause, page, line

C/ **30** SC **30.2.1** 

Page 13 of 76 8/29/2018 11:27:59 AM

C/ 30 SC 30.2.1 P 30 L 25 # 453 C/ 30 SC 30.3.2.1.2 P 31 L 9 # 33 Jones, Peter Cisco Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 What's the | underneath oResourceTypeID Editing instructions should be explicit as to where the editing should be performed. SuggestedRemedy SugaestedRemedy Remove Change the editing instruction to: "Insert the following new entries in the APPROPRIATE SYNTAX section of 30.3.2.1.2 after Proposed Response Response Status W the entry for "10 Mb/s":" PROPOSED ACCEPT IN PRINCIPLE Proposed Response Response Status W PROPOSED ACCEPT. Master comment 9. Resolve with 9 and 300. C/ 30 SC 30.3.3 P 31 L 14 Delete extra symbol in oResourceTypeID block. Delete extra full stop in oEXTENSION # 34 block. Anslow, Pete Ciena SC 30.2.1 C/ 30 P 30 L 26 # 300 Comment Type Comment Status D ΕZ Ε KIM. YONG NIO After 30.3.2.1.2, there is a heading for 30.3.3, but there are no changes in 30.3.3, so this heading is not needed. ΕZ Comment Type ER Comment Status D SuggestedRemedy oResourceTypeID has erronous character that resembles block graphic rectangle. Remove the heading for 30.3.3 SuggestedRemedy Proposed Response Response Status W Please delete the charactyer. PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. C/ 30 SC 30.3.9 P 31 L 15 # 35 Anslow, Pete Ciena Master comment 9. Resolve with 9 and 453. F7 Comment Type E Comment Status D Delete extra symbol in oResourceTypeID block. Delete extra full stop in oEXTENSION The editing instruction lists several subclauses to be added, but misses some more out. block. SuggestedRemedy C/ 30 SC 30.2.1 P 30 L 51 # 454 Change the editing instruction to: Jones. Peter Cisco "Insert 30.3.9 (and its subclauses) after 30.3.8 as follows:" Proposed Response EΖ Response Status W Comment Type T Comment Status D PROPOSED ACCEPT. why isn't PLCA green like the others SuggestedRemedy fix if needed

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: Clause, Subclause, page, line

Proposed Response

PROPOSED ACCEPT IN PRINCIPLE.

Response Status W

Format text "30.3.9" under oPLCA on line 26 as an external reference (should be green).

C/ **30** SC **30.3.9**  Page 14 of 76 8/29/2018 11:27:59 AM

C/ 30 SC 30.3.9 P 31 / 19 # 36 Anslow, Pete Ciena Comment Type Ε Comment Status D F7 The 802.3 web page: http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#mib says: "In IEEE Std 802.3 the spelling 'behaviour' is used throughout MIB clauses and their associated Annexes, and in any references to the behaviours defined there." SuggestedRemedy

Change "behaviors" to "behaviours" on line 20
Change "behavior" to "behaviour" on lines 34 and 48

Proposed Response Response Status W PROPOSED ACCEPT.

C/ 30 SC 30.3.9.1.1 P 31 L 28 # 591

Healey, Adam Broadcom Inc.

Comment Type E Comment Status D EZ

The style of the appropriate syntax definition is inconsistent with the base standard.

SuggestedRemedy

List the enumerations for aPLCAAdminState in the same style as e.g., 30.3.2.1.7 aPhyAdminState. Make similar style changes in 30.3.9.2.2.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Apply the formating for the enumerations in 30.3.2.1.7 of 802.3-2018 to the enumerations in 30.3.9.1.1 and 30.3.9.2.2.

C/ 30 SC 30.3.9.1.1 P 31 L 32 # 37

Anslow, Pete Ciena

Comment Type E Comment Status D

In 30.3.9.1.1 "Clause 22" and "Clause 148" should be cross-references.

In 30.3.9.2.1 "Clause 148" and "Clause 147" should be cross-references.

In 30.3.9.2.2 "Clause 147" should be a cross-reference.

SuggestedRemedy

In 30.3.9.1.1 make "Clause 22" and "Clause 148" cross-references.

In 30.3.9.2.1 make "Clause 148" and "Clause 147" cross-references.

In 30.3.9.2.2 make "Clause 147" a cross-reference.

Proposed Response Response Status W

PROPOSED ACCEPT.

C/ 30 SC 30.3.9.1.1 P31 L33 # 593

Healey, Adam Broadcom Inc.

Comment Type E Comment Status D

"Clause 22" and "Clause 148" should be active cross-references.

SuggestedRemedy

This issue seems to exist for most, if not all, definitions of PLCA attributes. Make references to clauses contained in the amendment into active cross-references. Highlight references to clauses outside of the amendment in the "external cross-reference" style.

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 593. Resolve with 455.

Make "Clause 22" (line 32) and "Clause 148" (line 34) active cross-references.

Seach for Clause 22 and Clause 148 and ensure that they are active cross-references.

 Cl 30
 SC 30.3.9.1.1
 P 31
 L 34
 # [165]

 Graber, Steffen
 Pepperl+Fuchs GmbH

 Comment Type
 E
 Comment Status
 D
 EZ

 [EASY].;

[EASY].;

F7

SuggestedRemedy

Remove ";" after "." at the end of the line.

Proposed Response Status W

PROPOSED REJECT.

";." at the end of the last enumeration is the correct formating style. See clause 30.3.8 of the 802.3-2018 document for examples.

F7

SC 30.3.9.2 C/ 30 P 31 L 37 # 455 C/ 30 SC 30.3.9.2.1 P 31 L 50 # 166 Jones, Peter Cisco Graber, Steffen Pepperl+Fuchs GmbH Comment Type TR Comment Status D F7 Comment Type E Comment Status X F7 All BEHAVIOUR DEFINED descriptions should have cross references added [EASY]: SuggestedRemedy SuggestedRemedy Add them . (replace ";" by "." at the end of the sentence) Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE PROPOSED ACCEPT IN PRINCIPLE. Master comment 593. Resolve with 593. Master comment 355. Resolve with 355. Replace ";" with ".;" Make "Clause 22" (line 32) and "Clause 148" (line 34) active cross-references. C/ 30 SC 30.3.9.2.1 P 31 L 49 # 595 C/ 30 SC 30.3.9.2.2 P 31 L 52 # 308 KIM. YONG Healey, Adam Broadcom Inc. NIO Comment Status D F7 Comment Type Т F7 Comment Type TR Comment Status X It seems that ". Clause 147 PLCA." should be ". Clause 148 PLCA." since it is Clause 148 "Sublayer provided the PHY implements and enables optional Clause 147 PLCA " is not right. PLCA is an optional component to RS as proposed, and is NOT a part of PHY that defines PLCA. SuggestedRemedy SuggestedRemedy Change the reference and make it into an active cross-reference. Please reference correct lavers Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 595. Resolve with 308. Master comment 595. Resolve with 595. Replace "Clause 147 PLCA" with "Clause 148 PLCA" and add a cross-reference to clause Replace "Clause 147 PLCA" with "Clause 148 PLCA" and add a cross-reference to clause 148. 148. C/ 30 SC 30.3.9.2.1 P 31 L 49 C/ 30 SC 30.3.9.2.2 P 32 L 5 # 355 # 39 Yseboodt, Lennart Anslow, Pete Ciena Signify ΕZ ΕZ Comment Type E Comment Status D Comment Type E Comment Status D Period missing after sentence on line 49. "acPLCAReset" should not be allowed to split across two lines. SuggestedRemedy SuggestedRemedy Place the cursor in the word, then Esc n s (separate key presses) Add period. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Master comment 355. Resolve with 166. Remove hyphention from "acPLCAReset" Replace ";" with ".;"

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: Clause, Subclause, page, line

C/ **30** SC **30.3.9.2.2**  Page 16 of 76 8/29/2018 11:27:59 AM

C/ 30 SC 30.3.9.2.2 P 32 L 9 # 167 C/ 30 SC 30.3.9.2.5 P 32 L 41 Graber, Steffen Pepperl+Fuchs GmbH Jones, Peter Cisco Comment Type Ε Comment Status X F7 Comment Type TR Comment Status D [EASY] .: Replace "The value of PLCATransmitOpportunityTimer" with "This value" SuggestedRemedy SuggestedRemedy Remove ":" after "." at the end of the line. Make suggested change Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED REJECT. ";." at the end of the last enumeration is the correct formating style. See clause 30.3.8 of Replace "The value of PLCATransmitOpportunityTimer" the 802.3-2018 document for examples. with "The value" C/ 30 SC 30.3.9.2.3 P 32 / 19 # 456 C/ 30 SC 30.5.1.1.2 P 33 L 9 Jones, Peter Cisco Wienckowski. Natalie General Motors Comment Type ER Comment Status D EΖ Comment Type E Comment Status D Replace "The value of aPLCAMaxID" with "This value" Editor instruction is wrong. The 10BASE PHYs should all be together in the list. SuggestedRemedy SuggestedRemedy Make suggested change Change the editor's instruction to be: Insert the following new entries in APPROPRIATE Proposed Response Response Status W SYNTAX after the entry for "10PASS-TS". PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Replace, "The value of aPLCAMaxID" Master comment 41. Resolve with 41. with. "The value" C/ 30 SC 30.3.9.2.4 P **32** L 30 # 457 Replace, "Insert the following new entries in APPROPRIATE SYNTAX after the entry for "1000BASE-T":" Jones. Peter Cisco EΖ Comment Type TR Comment Status D with, "Insert the following new entries in the APPROPRIATE SYNTAX section of 30.5.1.1.2 after the entry for "10BASE-TS":" Replace "The value of aPLCALocalNodeID" with "This value" SuggestedRemedy Make suggested change Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Replace, "The value of aPLCALocalNodeID"

with. "The value"

# 458

# 445

F7

F7

C/ 30 SC 30.5.1.1.2 P 33 L 9 # 41 C/ 30 SC 30.6.1.1.5 P 33 L 28 # 43 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Editing instructions should be explicit as to where the editing should be performed. Also, Editing instructions should be explicit as to where the editing should be performed. after 100BASE-T does not seem like an appropriate place to put 10 Mb/s entries. SugaestedRemedy SuggestedRemedy Change the editing instruction to: Change the editing instruction to: "Insert the following new entries in the APPROPRIATE SYNTAX section of 30.6.1.1.5 after "Insert the following new entries in the APPROPRIATE SYNTAX section of 30.5.1.1.2 after the entry for "10BASE-T":" the entry for "10BASE-T":" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. Cl 45 SC 45.2.1 P 35 L 11 # 472 Master comment 41. Resolve with 445. Jones, Peter Cisco Replace, "Insert the following new entries in APPROPRIATE SYNTAX after the entry for Comment Type ER Comment Status D ΕZ "1000BASE-T": Why is there a gap between PMA status and test mode control with, "Insert the following new entries in the APPROPRIATE SYNTAX section of 30.5.1.1.2 SuggestedRemedy after the entry for "10BASE-TS":" Fix if needed C/ 30 SC 30.5.1.1.4 P 33 L 15 Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Anslow, Pete Ciena Comment Type Comment Status D ΕZ Ε Master comment 472. Consider with 471. Editing instructions should be explicit as to where the editing should be performed. Move three addresses, starting with 10BASE-T1L test mode control, to 1.2296, 1.2297, SuggestedRemedy and 1.2298. Change the reserved address from "1.2301 through 1.2302" to "1.2299 Change the editing instruction to: through 1.2302". "Change the fourth sentence of the third paragraph of the BEHAVIOUR DEFINED AS section of 30.5.1.1.4 as follows:" CI 45 SC 45.2.1 P 35 L 26 # 471 Proposed Response Jones, Peter Cisco Response Status W PROPOSED ACCEPT. Comment Type ER Comment Status D ΕZ Table 45-3 - different style than 1.2296 and 1.2296. Be consistent SuggestedRemedy Fix style Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Master comment 472. Consider with 472.

through 1.2302".

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/ 45

COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SC 45.2.1

SORT ORDER: Clause, Subclause, page, line

Page 18 of 76 8/29/2018 11:27:59 AM

Move three addresses, starting with 10BASE-T1L test mode control, to 1.2296, 1.2297, and 1.2298. Change the reserved address from "1.2301 through 1.2302" to "1.2299

F7

C/ 45 SC 45.2.1.173 P 35 L 51 # 45
Anslow, Pete Ciena

Comment Type E Comment Status D

The heading for Register 1.2100 is now 45.2.1.185 in IEEE 802.3-2018 and the corresponding table is Table 45-149

SuggestedRemedy

Change the heading for Register 1.2100 to 45.2.1.185 and change Table 45-141 to Table 45-149 (and also the reference to it in the editing instruction).

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 424. Resolve with 424.

Replace, "45.2.1.173 BASE-T1" with "45.2.1.185 BASE-T1" on line 51.

Replace, "Change the row for 1.2100.3:0 in Table 45-141" with "Change the row for 1.2100.3:0 in Table 45-149" on line 53.

Replace, "Table 45-141-BASE-T1" with "Table 45-149-BASE-T1" on page 36, line 1.

 CI 45
 SC 45.2.1.173
 P 35
 L 52
 # 424

 Wienckowski, Natalie
 General Motors

Comment Type T Comment Status D

This is not the correct section based on P8023 D3p2.

SuggestedRemedy

Change to Section 45.2.1.185 and change Table 45-141 to 45-149.

Also change 45.2.1.174x and all subsections to 45.2.1.186x and change Tables 45-142x to Tablex 45-150x.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Master comment 424. Resolve with 45 and 47.

Replace, "45.2.1.173 BASE-T1" with "45.2.1.185 BASE-T1" on line 51.

Replace, "Change the row for 1.2100.3:0 in Table 45-141" with "Change the row for 1.2100.3:0 in Table 45-149" on line 53.

Replace, "Table 45-141-BASE-T1" with "Table 45-149-BASE-T1" on page 36, line 1.

Change the editing instruction on page 36, line 15 to "Insert 45.2.1.186a through 45.2.1.186 after 45.2.1.186 as follows:"

Change the inserted clauses from 45.2.1.174a through 45.2.1.174f to 45.2.1.186a through 45.2.1.186f

Change the inserted tables from Table 45-142a through Table 45-142f to Table 45-150a through Table 45-150f

F7

Cl 45 SC 45.2.1.174a P 36 L 15 # 47 Cl 45 SC 45.2.1.174a.1 P36 / 44 Anslow, Pete Ciena Yseboodt, Lennart Signify Comment Type Ε Comment Status D F7 Comment Type ER Comment Status D The numbering in the editing instruction: "Insert 45.2.1.174a through 45.2.1.174h after "Resetting the 10BASE-T1L PMA/PMD is accomplished by setting bit 1.2294.15 to a one." 45.2.1.174 as follows:" does not match the numbering in the base standard and includes more subclauses than are in the current draft. The draft mixes use of "set to one" and "set to a one", the same with zero. Also, the inserted Table numbers are not correct. Looking at the rest of 802.3. (which of course is inconsistent, what did you expect), use of SuggestedRemedy "set to one" and "set to zero" is much more prevalent than "set to a one". Change the editing instruction to: "Insert 45.2.1.186a through 45.2.1.186f after 45.2.1.186 SuggestedRemedy as follows:" Change the inserted tables from Table 45-142a through Table 45-142f to be Table 45-150a Double-check with Pete Anslow. through Table 45-150f Replace throughout the draft: Proposed Response Response Status W "to a one" ==> "to one" [35 occurences] PROPOSED ACCEPT IN PRINCIPLE. "to a zero" ==> "to zero" [11 occurences]

Change the editing instruction on page 36, line 15 to "Insert 45.2.1.186a through 45.2.1.186f after 45.2.1.186 as follows:"

Master comment 424. Resolve with 424.

Change the inserted clauses from 45.2.1.174a through 45.2.1.174f to 45.2.1.186a through 45.2.1.186f

Change the inserted tables from Table 45-142a through Table 45-142f to Table 45-150a through Table 45-150f

C/ 45 P 37 SC 45.2.1.174a.5 L 36 # 168 Graber, Steffen Pepperl+Fuchs GmbH EΖ

Globally search for "to a one" and replace with "to one". Globally search for "to a zero" and

Comment Type E Comment Status D

PROPOSED ACCEPT IN PRINCIPLE.

[EASY] . 10BASE-T1L PMD ...

SuggestedRemedy

Proposed Response

replace with "to zero".

Adapt the Font Size of "10BASE-T1L PMD" to the rest of the text in the note.

Response Status W

Proposed Response Response Status W PROPOSED ACCEPT.

Cl 45 P 40 SC 45.2.1.174d L 44 # 707

Kabra, Lokesh Synopsys Inc

Comment Type Ε Comment Status D

net-work

SuggestedRemedy

network

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Remove breaking hypen.

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: Clause, Subclause, page, line

C/ 45

Page 20 of 76

ΕZ

SC 45.2.1.174d

8/29/2018 11:27:59 AM

# 335

F7

Cl 45 SC 45.2.1.174d.1 P 41 L 3 # 356 Cl 45 SC 45.2.3.58a P 44 L 26 # 48 Yseboodt, Lennart Signify Anslow, Pete Ciena Comment Type E Comment Status D F7 Comment Type E Comment Status D F7 "Resetting the 10BASE-T1S PMA/PMD is accomplished by setting bit 1.2299.15 to a one." The numbering in the editing instruction: "Insert 45.2.3.58a through 45.2.3.58i after 45.2.3.58 as follows:" does not match the numbering in the base standard and includes Change 'a one' to 'one'. more subclauses than are in the current draft. Also, the inserted Table numbers are not correct. SuggestedRemedy SuggestedRemedy Replace by: "Resetting the 10BASE-T1S PMA/PMD is accomplished by setting bit 1.2299.15 to a one." Change the editing instruction to: "Insert 45.2.3.68a through 45.2.3.68f after 45.2.3.68 as follows:" Proposed Response Response Status W Change the inserted tables from Table 45-220a through Table 45-220f to be Table 45-237a PROPOSED ACCEPT IN PRINCIPLE. through Table 45-237f Proposed Response Response Status W Replace, "by setting bit 1.2299.15 to a one" with, "by setting bit 1.2299.15 to one". PROPOSED ACCEPT. Cl 45 SC 45.2.1.174d.5 P 41 L 53 # 357 Cl 45 SC 45.2.3.58a P 44 L 28 # 435 Yseboodt, Lennart Signify **General Motors** Wienckowski. Natalie Comment Type E Comment Status D ΕZ Comment Type E Comment Status D ΕZ "The 10BASE-T1S PMA/PMD shall operate in multidrop mode over a mixing segment network when bit 1.2299.10 is set to a one." Assuming the registers are supposed to be in order, this is not the correct subsection. SuggestedRemedy SuggestedRemedy Change "a one" to "one". Change 45.2.3.58x to 45.2.3.68x. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. Cl 45 SC 45.2.3 P 44 # 146 Cl 45 SC 45.2.3.58b P 45 / 46 # 171 Lewis. Jon Dell EMC Graber, Steffen Pepperl+Fuchs GmbH Comment Status D Comment Type Ε EΖ F7 Comment Type E Comment Status D remove the '1' in both register names: 10BASE-T1L PCS status 1 and 10BASE-T1S PCS RO = Read only status 1. We removed the second register and this is to clean up the names of the remaining registers. SuggestedRemedy RO = Read only, LH = Latching high, LL = Latching low (LH and LL definitions are missing) SuggestedRemedy Change to: 10BASE-T1L PCS status and 10BASE-T1S PCS status Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Replace, "RO = Read only" with "RO = Read only, LH = Latching high, LL = Latching low"

Change to 10BASE-T1L PCS status on line 14 and 10BASE-T1S PCS status on line 21

Cl 45 SC 45.2.3.58c P 47 L 1 # 49 C/ 45 SC 45.5.3.3 P 51 L 1 # 52 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 In the title of 45.2.3.58c and the title of Table 45-220c "10BASET1S-PLCA" should be Editing instructions should be explicit as to where the editing should be performed. "10BASE-T1S PLCA" SuggestedRemedy SuggestedRemedy Change the editing instruction to: "Insert PICS items MM152 through MM192 at the end of In the title of 45.2.3.58c and the title of Table 45-220c, change "10BASET1S-PLCA" to the table in 45.5.3.3 as follows:" "10BASE-T1S PLCA" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. Cl 45 SC 45.5.3.3 P 51 L 9 # 172 Cl 45 SC 45.2.3.58c P 47 L 27 # 50 Graber, Steffen Pepperl+Fuchs GmbH Anslow. Pete Ciena EΖ Comment Type Comment Status D Comment Status D EΖ Comment Type Ε [EASY] othersie In the title of 45.2.3.58d and the title of Table 45-220d "10BASET1S-PLCA" should be SuggestedRemedy "10BASE-T1S PLCA" otherwise SuggestedRemedy Proposed Response Response Status W In the title of 45.2.3.58d and the title of Table 45-220d, change "10BASET1S-PLCA" to "10BASE-T1S PLCA" PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W Replace, "othersie" with "otherwise" PROPOSED ACCEPT. Cl 45 P 51 # 173 SC 45.5.3.3 L 37 Cl 45 SC 45.5.3.3 P 50 # 51 L 8 Graber, Steffen Pepperl+Fuchs GmbH Anslow, Pete Ciena EΖ Comment Type E Comment Status D Comment Type E Comment Status D EΖ [EASY] . disable the transmitter Most of page 50 is blank. SugaestedRemedy SuggestedRemedy . disables the transmitter (add "s" after disable) move the editing instruction and the start of the PICS table on to page 50. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Replace, "disable the transmitter" with "disables the transmitter"

Cl 45 SC 45 Graber, Steffen		52 L 10 perl+Fuchs GmbH	# 174	C/ 45 SC 45.5.3.3 P 53 L 6 # 177  Graber, Steffen Pepperl+Fuchs GmbH
Comment Type <b>E</b> [EASY] 1.2294.1		s D	EZ	Comment Type <b>E</b> Comment Status <b>D</b> EZ  [EASY] . disable the transmitter
SuggestedRemedy 1.2294.10 (EEE	bit is 1.2294.10 instead of	1.2294.11)		SuggestedRemedy . disables the transmitter (add "s" after disable)
Proposed Response PROPOSED AC	Response Status CEPT IN PRINCIPLE.	W		Proposed Response Response Status <b>W</b> PROPOSED ACCEPT IN PRINCIPLE.
Replace, "1.2294.11" with "1.2294.10"				Replace, "disable the transmitter" with "disables the transmitter"
Cl 45 SC 45 Graber, Steffen		52 L 13 perl+Fuchs GmbH	# 175	Cl 45       SC 45.5.3.3       P 53       L 18       # 178         Graber, Steffen       Pepperl+Fuchs GmbH
Comment Type E [EASY] 1.2294.1		s <b>X</b>	EZ	Comment Type E Comment Status D EZ  [EASY] Setting either 1.2299.12 or 1.0.12 sets the other
SuggestedRemedy 1.2294.10 (EEE bit is 1.2294.10 instead of 1.2294.11)				SuggestedRemedy Setting either 1.2299.11 or 1.0.11 sets the other (Low Power Bit is 11 not 12)
Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.				Proposed Response Response Status <b>W</b> PROPOSED ACCEPT IN PRINCIPLE.
Replace, "1.2294.11" with "1.2294.10"				Replace: "Setting either 1.2299.12 or 1.0.12" with "Setting either 1.2299.11 or 1.0.11"
Cl 45 SC 45 Graber, Steffen		52 L 19 perl+Fuchs GmbH	# 176	Cl 45 SC 45.5.3.3 P 53 L 20 # 179  Graber, Steffen Pepperl+Fuchs GmbH
Comment Type <b>E</b> [EASY] othersie	Comment Status	5 <b>D</b>	EZ	Comment Type E Comment Status D EZ  [EASY] Clearing either 1.2299.12 or 1.0.12 clears the other
SuggestedRemedy otherwise				SuggestedRemedy Clearing either 1.2299.11 or 1.0.11 clears the other (Low Power Bit is 11 not 12)
Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.				Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.
Replace, "othersie" with "otherwise"				Replace: "Clearing either 1.2299.12 or 1.0.12" with "Clearing either 1.2299.11 or 1.0.11"

SC 45.5.3.7 Cl 45 P 54 L 3 # 53 CI 78 SC 78.1.3.3.1 P 57 L 20 # 54 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Е Comment Status D F7 Comment Type E Comment Status D F7 Editing instructions should be explicit as to where the editing should be performed. The order of entries in Table 78-1 was established via Comment #65 against P802.3cj D2.0. See: SuggestedRemedy http://www.ieee802.org/3/cj/comments/P8023-D2p0-Comments-Final-byID.pdf#page=14 Change the editing instruction to: "Insert PICS items RM158 through RM186 at the end of According to these rules the order after insertion of the two new PHYs should be: the table in 45.5.3.7 as follows:" 10BASE-T1S 10BASE-Te Proposed Response Response Status W 10BASE-T1L PROPOSED ACCEPT. SuggestedRemedy C/ 45 SC 45.5.3.7 P 54 L 17 # 181 Change the editing instruction to: Graber, Steffen Pepperl+Fuchs GmbH "Insert a row for 10BASE-T1S at the top and a row for 10BASE-T1L after 10BASE-Te in EΖ Comment Type Ε Comment Status D Table 78-1 as follows (unchanged rows not shown):" Change the excerpt from Table 78-1 to be: [EASY] 3.2304.15 "10BASE-T1S", "147" SuggestedRemedy ellipsis row "10BASE-T1L", "146" 3.2278.15 (PCS Control Register of 10BASE-T1L) ellipsis row Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Replace "3.2304.15" with "3.2278.15" Cl 78 P 57 SC 78.2 L 39 CI 78 SC 78.1.3.3.1 P 57 L 10 # 431 Anslow, Pete Ciena Wienckowski, Natalie General Motors Comment Type E Comment Status D EΖ Comment Type T Comment Status D EΖ The new row for 10BASE-T1L is being inserted into a table column that already contains This is not the correct section based on P8023 D3p2. numbers above 10 000. In this case according to the rules set out in: http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers SuggestedRemedy any four digit numbers should contain a space as a thousands separator. Move "Table 78-1 - Clauses associated with each PHY or interface type" to section "78.1.4 SuggestedRemedy PHY types optionally supporting EEE". In Table 78-2 replace "2000" with "2 000" and replace "2100" with "2 100" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT.

PROPOSED ACCEPT.

Cl 78 SC 78.5 P 58 L 3 # 1 Cl 98 SC 98.2.1.1.2 P 59 L 15 # 20 Hajduczenia, Marek Charter Lusted, Kent Intel Comment Type E Comment Status D F7 Comment Type ER Comment Status D F7 Extra full stop at the end of editorial note Using an uppercase "B" for bit is uncommon. Usually, it is "bit" not "Bit". There are approximately 33 instances of "kb/s" in 802.3 Revision Draft 3.2 section 4. There are no SuggestedRemedy instances of "kBit/s". Remove extra full stop SuggestedRemedy Proposed Response Response Status W change "625 kBit/s" to "625 kb/s" PROPOSED ACCEPT IN PRINCIPLE Proposed Response Response Status W Delete "." after ":" on line 3. PROPOSED ACCEPT. Cl 98 SC 98 P 59 L 1 # 464 Cl 98 SC 98.2.1.1.2 P 59 L 15 # 18 Jones, Peter Cisco Lusted, Kent Intel Comment Status D ΕZ Comment Type ER Comment Type ER Comment Status D ΕZ Why use "single differential-pair media" instead of "Single-Pair Ethernet" as used in the Using an uppercase "B" for bit is uncommon. Usually, it is "bit" not "Bit". There are title of this standard approximately 43 instances of "Mb/s" in 802.3 Revision Draft 3.2 section 4. There are no instances of "MBit/s". SuggestedRemedy SuggestedRemedy Change to "Single-Pair Ethernet" change "16.667 MBit/s" to "16.667 Mb/s". Proposed Response Response Status W Proposed Response Response Status W PROPOSED REJECT. PROPOSED ACCEPT. This is the title of exisiting clause 98. Changing the title requires a maintenance request. C/ 98 SC 98.2.1.1.2 P 59 L 16 # 56 Cl 98 SC 98.2.1.1.2 P 59 L 13 # 592 Anslow. Pete Ciena Healey, Adam Broadcom Inc. EΖ Comment Type Ε Comment Status D Comment Type Ε Comment Status D F7 The 802.3 web page: "auto negotiation" should be "Auto-Negotiation" in two instances (see http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#bps http://www.ieee802.org/3/WG tools/editorial/requirements/words.html). savs: "only Mb/s and Gb/s should be used" SuggestedRemedy SuggestedRemedy Change per comment. Change "16.667 MBit/s." to "16.667 Mb/s." Change "625 kBit/s." to "625 kb/s." Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE.

Cl 98 SC 98.2.1.1.2 P 59 L 18 # 343 Yseboodt, Lennart Signify Comment Type T Comment Status X F7 "If both auto negotiation speeds are supported, a state machine shall be implemented to automatically choose between the different auto negotiation speeds, as described in

98.5.6."

This shall is duplicate to the one on 98.5.6:

"A PHY supporting two different Auto-Negotiation speeds, as described in 98.2.1.1.2 shall implement the behavior shown in Figure 98â?"11."

As a standalone sentence it is vague and untestable.

SuggestedRemedy

Change it to an informative sentence:

"If both auto negotiation speeds are supported, a mechanism is defined in 98.5.6 that automatically makes a choice between the different speeds."

Proposed Response Response Status 0

Cl 98 SC 98.2.1.1.2 P 59 L 25 # 3 Hajduczenia, Marek Charter Comment Type E Comment Status D F7

Compound adjectives: low-speed and high-speed

SugaestedRemedy

Please use "high-speed mode" and "low-speed mode"

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Globally replace "high speed mode" with "high-speed mode" and replace "low speed mode" with "low-speed mode".

Cl 98 SC 98.2.1.1.2 P 59 L 26 # 57 Anslow, Pete Ciena

Comment Type E Comment Status D

1.2.6 of the base standard says "Unless otherwise stated, numerical limits in this standard are to be taken as exact, with the number of significant digits and trailing zeros having no significance."

Also, usual practice in 802.3 is to not have a space between a number and %.

SuggestedRemedy

Show "shall be 30.0 ns  $\pm$  0.01%." as changing to "shall be 30 ns  $\pm$  0.01%." Change "800.0 ns  $\pm$  0.005 %" to "800 ns  $\pm$  0.005%"

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Show "shall be 30.0 ns  $\pm$  0.01%." as changing to "shall be 30 ns  $\pm$  0.01%." Change "800.0 ns  $\pm$  0.005 %" to "800 ns  $\pm$  0.005%"

Ensure non-breaking spaces between numbers, units, and symbols

Cl 98 SC 98.2.1.1.2 P 60 L 11 Anslow. Pete Ciena

Comment Type E Comment Status D

According to the rules set out in:

http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers in columns containing numbers with 5 or more digits to the left of the decimal point, any numbers with four or more digits to the left of the decimal point contain a space as a thousands separator.

Also, according to 1.2.8 of the base standard, empty cells in a table should contain an emdash.

SuggestedRemedy

Add an underlined space as a thousands separator to the nine numbers with 4 or more digits to the left of the decimal point in Table 98-1. Replace the four hyphens with em-dashes

Proposed Response Response Status W

PROPOSED ACCEPT.

F7

EΖ

Cl 98 SC 98.2.1.1.2 P 60 L 15 # 336 Cl 98 SC 98.5.5 P 64 L 6 # 4 Yseboodt, Lennart Signify Hajduczenia, Marek Charter Comment Type ER Comment Status D F7 Comment Type E Comment Status D F7 Empty cell in a Table should be marked as such with an em-dash. Extra symbol in transition between ABILITY DETECT and TRANSMIT DISABLE states Table 98-1 uses hyphens "-". SugaestedRemedy SuggestedRemedy Remove reference symbol Replace by em-dashes. Similar changes needed in Figure 98-8, Figue 98-9, and Figure 98-10 (seems like change bars were enabled?) Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. Cl 98 SC 98.5.2 P 62 L 17 # 59 Delete extraneous symbol that looks like a vertical bar in figures on, Anslow. Pete Ciena EΖ Comment Type Ε Comment Status D page 64, line 6 page 65, line 33 According to the rules set out in: page 65, line 38 http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers page 66, line 12 "In text, where this improves clarity, follow the IEEE Editorial Style Manual: Use spaces page 66. line 17 instead of commas between numbers in tens or hundreds of thousands (e.g., 62 000, 100 page 66, line 23 000, but 4000)." page 66, line 25 SuggestedRemedy page 67, line 12 page 67. line 17 For the numbers with 5 digits or more in the definitions of : page 67, line 22 "backoff timer [LSM]" "blind timer [LSM]" oage 67, line 29 "page\_test\_max\_timer\_[LSM]" "receive DME timer [LSM]" Cl 98 SC 98.5.5 P 64 L 6 "silent timer [LSM]" Hajduczenia, Marek Charter Add an underlined space as a thousands separator. (16 instances in total). Comment Type ER Comment Status D EΖ Proposed Response Response Status W Unclear set of changes to Figure 98-7, Figure 98-8, Figure 98-9, and Figure 98-10 PROPOSED ACCEPT. SuggestedRemedy Figure is being wholesale replaced; it would be great to have a hint what has been changed - either describe it in the editorial instruction / note, or alternatively draw a red box around what has been changed. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.

Jon Lewis to use a note/editorial instruction to identify the changes that have been made to

Figure 98-7. Figure 98-8. Figure 98-9. and Figure 98-10.

Cl 98 SC 98.5.5 P 64 L 25 # 345 Cl 98 SC 98.5.6.3 P 69 L 28 # 63 Yseboodt, Lennart Signify Anslow, Pete Ciena Comment Type TR Comment Status D F7 Comment Type E Comment Status D F7 In Figure 98-7, transition from COMPLETE ACKNOWLEDGE to NEXT PAGE WAIT, is Incorrect multiply symbol used missing a closing paren at the end. SuggestedRemedy SuggestedRemedy replace with correct multiply symbol (Ctrl-q 0) Replace arc logic as follows: Proposed Response Response Status W "ack finished = true \* mr next page loaded = true \* ((tx link code word[NP] = 1) + (np rx PROPOSED ACCEPT. = 1))"Proposed Response Response Status W Cl 98 SC 98.6.2a P 70 L 6 PROPOSED ACCEPT. Anslow. Pete Ciena # 60 Cl 98 SC 98.5.6 P 68 L 2 Comment Type Comment Status D F7 Ciena Anslow. Pete Space missing from Autonumber format. "98.6.2aMajor" should be "98.6.2a Major" Comment Type Ε Comment Status D ΕZ SugaestedRemedy In the text "A PHY supporting only one Auto-Negotiation speed shall implement the Fix Autonumber format. behavior as shown in Figure 98-7, Figure 98-8, Figure 98-9, and Figure 98-10 without any Proposed Response Response Status W further modification, using the associated timer values .", the phrase "without any further modification" does not belong. PROPOSED ACCEPT IN PRINCIPLE. A PHY supporting two different Auto-Negotiation speeds implements Figure 98-11. A PHY supporting only one Auto-Negotiation speed implements Figure 98-8. Figure 98-9. Confirm that a space can be inserted between "98.6.2a" and "Major" and insert space if and Figure 98-10. possible. There is no modification involved. C/ 98 SC 98.6.2a P 70 L 11 # 65 SuggestedRemedy Anslow. Pete Ciena Delete "without any further modification." Comment Type E Comment Status D F7 Proposed Response Response Status W The convention for PICS items is that when another item depends on whether or not this PROPOSED ACCEPT. item is supported, its name is preceded by a "\*". SuggestedRemedy SC 98.5.6 CI 98 P 68 L 6 # 147 Dell EMC In the table in 98.6.2a, change: Lewis, Jon "ANSM" to "\*ANSM" Comment Type E Comment Status D F7 "HSM" to "\*HSM" "LSM" to "\*LSM" Arrows in state diagram should be the same. "10T1L" to "\*10T1L" SuggestedRemedy Proposed Response Response Status W Change Arrows at the top of the state diagram where the 3 inputs are going into the PROPOSED ACCEPT. "SPEED DETECTION" state to be the same format as the other Arrows in the diagram. 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: Clause, Subclause, page, line

PROPOSED ACCEPT.

Cl 98 SC 98.6.2a Page 28 of 76 8/29/2018 11:27:59 AM

# Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Power Delivery over a Sin

Cl 98 SC 98.6.8 P 71 L 36 # 67 Cl 98 SC 98B.3 P 197 L 15 # 7 Anslow, Pete Ciena Hajduczenia, Marek Charter Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 According to the rules set out in: Table 98B-1 should show rows A3-A25 and associated values are inserted i.e., with http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers underline - this is new content "In text, where this improves clarity, follow the IEEE Editorial Style Manual: Use spaces SuggestedRemedy instead of commas between numbers in tens or hundreds of thousands (e.g., 62 000, 100 Per comment. 000. but 4000)." Despite these being table entries, they are in the form of text, so it seems appropriate to Proposed Response Response Status W use this version of the rule. PROPOSED REJECT. SuggestedRemedy In item SD4a, SD12a, SD13a, and SDE15A add a non-breaking space (Ctrl space) as a Underline annotations are not shown for insert instructions. The only changed row is the original "A3 to A26" row and change marks are shown appropriately. thousands separator in all numbers above 9999. Proposed Response Response Status W Cl 98 SC 98B.4 P 198 L 20 # 142 PROPOSED ACCEPT. Anslow, Pete Ciena Comment Type E Comment Status D ΕZ Cl 98 SC 98.6.8 P 72 L 39 # 68 Underline missing from last em-dash Anslow, Pete Ciena SuggestedRemedy F7 Comment Type Ε Comment Status D Underline it Item "SDE15a" should be "SD15a" Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. Change "SDE15a" to "SD15a" Proposed Response Response Status W Р C/ 104 SC 104 1 # 155 PROPOSED ACCEPT. DiMinico, Christopher MC Communications Comment Type TR Comment Status D F7 Cl 98 SC 98B.3 P 197 L 11 # 128 Accepted changes to the draft shown in stewart\_3q\_01f\_0518.pdf slides 7-10 were not Anslow. Pete Ciena implemented. 104.1, 104.3, 104.7,45-340 (802.3-2018). F7 Comment Type Ε Comment Status D SuggestedRemedy While the editing instruction for Table 98B-1 and the lack of underlining for the inserted Make changes shown in stewart 3g 01f 0518.pdf slides 7-10, changing table 45-211r rows is technically correct (except that it is not stated where the insertion should be), the reference (from 802.3bu-2016) to 45-340 (802.3-2018), as agreed by Motion #8 in May result is rather confusing. 2018 (the change on slide 11 was made). SuggestedRemedy Proposed Response Response Status W Change the editing instruction to: PROPOSED ACCEPT. "Change the row for "A3 through A26" in Table 98B-1 as follows (unchanged rows not shown): Master comment 155. Resolve with 616. 183. and 585. Underline the new rows.

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: Clause, Subclause, page, line

Proposed Response

PROPOSED ACCEPT.

Response Status W

C/ 104 SC 104 Page 29 of 76 8/29/2018 11:27:59 AM

C/ 104 SC 104 P 73 L 1 # 69 C/ 104 SC 104.4.1 P 73 L 23 # 70 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The title of Clause 104 is incorrect. The comma and space after "Type D" have been added, so should be underlined SuggestedRemedy SugaestedRemedy Change the title to: "Power over Data Lines (PoDL) of Single Balanced Twisted-Pair underline the added comma and space. Fthernet" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED REJECT. C/ 104 SC 104.4.4.1 P 73 L 33 "Single-Pair Ethernet" is aligned with the text in bullets 7, 8, and 16 in the project objectives. Anslow. Pete Ciena C/ 104 SC 104 P 73 L 1 # 183 Comment Type E Comment Status D F7 Graber, Steffen Pepperl+Fuchs GmbH It is Table 104-3 that is being modified Comment Type Comment Status D ΕZ Т SuggestedRemedy New PoDL definitions as agreed in Pittsburgh are missing. Change the table number to Table 104-3 SuggestedRemedy Proposed Response Response Status W Add changes as described in PROPOSED ACCEPT. "http://www.ieee802.org/3/cg/public/May2018/stewart 3g 01f 0518.pdf", pages 7, 8, 9 and C/ 104 SC 104.4.4.1 P 73 L 47 # 72 Proposed Response Response Status W Anslow, Pete Ciena PROPOSED ACCEPT. ΕZ Comment Type T Comment Status D In item 5 of Table 104-3 in the base standard, the unit is "uF" and the maximum value is Master comment 155. Resolve with 155, 616, and 585. In the draft, the units has been changed to "nF" and the value for A, B, C, and D changed C/ 104 SC 104 P 73 # 616 L 1 to "200" without any change marking. Stover, David **Analog Devices** SuggestedRemedy Comment Type T Comment Status D ΕZ Show the unit as "uF" in strikethrough font and "nF" in underline font (where u is the Greek A set of changes against Draft 1.2 was adopted from stewart\_3g\_01f\_0518.pdf. This change set was not fully adopted. Show the value for A. B. C. and D as "2.64" in strikethrough font and "200" in underline SuggestedRemedy font. Adopt full set of changes outlined in stewart 3g 01f 0518.pdf, slides 7-11, as adopted by Proposed Response Response Status W motion #8 of motions\_3cg\_01a\_0518.pdf. PROPOSED ACCEPT. Proposed Response Response Status W

PROPOSED ACCEPT.

Master comment 155. Resolve with 155, 183, and 585.

# Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Power Delivery over a Sin

C/ 104 SC 104.4.4.1 P 74 L 13 # 73 C/ 104 SC 104.4.6.3 P 75 L 38 # 75 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The width of the "Symbol" column in Table 104-1 is such that two entries wrap across two Usual practice in 802.3 is to not have a space between a number and %. lines with just "E" on the second line. SugaestedRemedy SuggestedRemedy Change to "± 1%." Increase the width of the "Symbol" column to avoid the wrap. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Replace "± 1%." with "±1%." C/ 104 SC 104.4.6 P 75 L 6 # 74 C/ 104 SC 104.4.6.3 P 75 L 41 # 337 Anslow. Pete Ciena Yseboodt, Lennart Signify Comment Type F7 Ε Comment Status D ΕZ Comment Type Comment Status D ER It is Table 104-4 that is being modified Equations 104-1, 104-2, and 104-3 are missing accolades { SuggestedRemedy SuggestedRemedy Change the table number to Table 104-4. Add accolades and unit where applicable. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. C/ 104 SC 104.4.6.3 P 75 L 32 # 360 Move omega symbol in equation 104-1 to the end of the equation and enclose in Yseboodt, Lennart Signify parenthesis. Comment Type E Comment Status D ΕZ Editor's note: There are no units for the transfer functions in equations 104-2 and 104-3. "A digital oscilloscope or data acquisition module with a differential probe is used to observe the voltage at the MDI/PI of the PSE device under test (DUT) as shown in Figure C/ 104 SC 104.5.6 P 76 L 40 104 7." Anslow. Pete Ciena Dash missing in Figure 104-7. EΖ Comment Type Comment Status D Т SuggestedRemedy In Table 104-7. Item 6b should have "uF" in the Unit column and "All classes" in the Add dash. Additional information column (as per the base standard). Also, the base standard has "All" in the PD type column for Item 6b Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. Add "uF" to the Unit cell (where u is the Greek letter mu). In the upper of the two PD Type cells, show "All" in strikethrough font and "A, B, C, D" in underline font. Merge the two "Additional information" cells and put "All classes" in the merged cell. 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: Clause, Subclause, page, line

C/ 104 SC 104.5.6 Page 31 of 76 8/29/2018 11:27:59 AM

C/ 104 SC 104.5.6.4 P 77 L8 # 78 C/ 104 SC 104.7.1.3 P 79 L 41 # 80 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 "Figure 104 9" should be "Figure 104-9" In Table 104-8, the added column heading is "PD type", which is inconsistent with the heading change in Table 104-7 SuggestedRemedy SuggestedRemedy Change "Figure 104 9" to "Figure 104-9" Change to "PD Type" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 104 SC 104.5.6.4 P 77 L 15 # 79 C/ 104 SC 104.7.1.3 P 79 L 41 # 361 Anslow. Pete Ciena Yseboodt, Lennart Signify Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 "Clause 146" should be a cross-reference In the previous Table 104-7 and earlier text the word "Type" (when referring to PSE or PD) SuggestedRemedy was capitalized. Make "Clause 146" a cross-reference In this Table it is not. SuggestedRemedy Proposed Response Response Status W Change "type" to Type. PROPOSED ACCEPT. Proposed Response Response Status W C/ 104 SC 104.7 P 78 *L* 1 # 585 PROPOSED ACCEPT. Stewart, Heath **Analog Devices** SC 104.7.1.3 C/ 104 P80 L 27 # 81 Comment Type TR Comment Status D ΕZ Anslow, Pete Ciena Resistance measurements, as proposed in Pittsburgh, are enabling for long cable reach applications. Resistance measurements allow power recovery for sub-maximum cable Comment Status D Comment Type E F7 lengths in an interoperable manner. 1.2.6 of the base standard says "Unless otherwise stated, numerical limits in this standard SuggestedRemedy are to be taken as exact, with the number of significant digits and trailing zeros having no See stewart 0918 01.pdf significance." SugaestedRemedy Proposed Response Response Status W PROPOSED ACCEPT. Remove the trailing zeros from the numbers in Table 104-8 (4 numbers) Proposed Response Response Status W Master comment 155. Resolve with 155, 616, and 183. PROPOSED ACCEPT.

C/ 104 SC 104.9 P 82 L 2 # 82 C/ 104 SC 104.9.4.3 P 82 L 42 # 84 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 In the heading for 104.9, the title of Clause 104 is incorrect. "Clause 146" should be a cross-reference SuggestedRemedy SuggestedRemedy Change: Make "Clause 146" a cross-reference "Clause 104, Reconciliation Sublayer (RS) and Media Independent Interface (MII)" to: Proposed Response Response Status W "Clause 104, Power over Data Lines (PoDL) of Single Balanced Twisted-Pair Ethernet" PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE SC 146 Cl 146 P 85 L 2 Anslow. Pete Ciena Replace "Clause 104, Reconciliation Sublayer (RS) and Media Independent Interface (MII)" with "Clause 104. Power over Data Lines (PoDL) of Single-Pair Ethernet" Comment Type E Comment Status D EΖ The heading for Clause 146 has an inappropriate footnote related to PICS proformas. C/ 104 SC 104.9.4 P 82 L 25 # 83 SugaestedRemedy Anslow. Pete Ciena Remove the footnote Comment Type Ε Comment Status D F7 Proposed Response Response Status W In the heading for 104.9.4. "ICS" should be "PICS" PROPOSED ACCEPT. SuggestedRemedy In the heading for 104.9.4, change "ICS" to "PICS" C/ 146 SC 146 P 85 L 53 # 467 Proposed Response Response Status W Jones, Peter Cisco PROPOSED ACCEPT. Comment Type Comment Status D ΕZ I don't see the note about PICS proforma copyright release in other 802.3 standards, why P **82** C/ 104 SC 104.9.4 L 26 # 429 is it needed Wienckowski, Natalie General Motors SuggestedRemedy Comment Type E Comment Status D ΕZ Remove still have twisted-pair Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT IN PRINCIPLE. Change "single balanced twisted-pair" to "single balanced pair of conductors". Implemented by comment i-85. Proposed Response Response Status W

PROPOSED ACCEPT.

C/ 146 SC 146.1 P 85 L 9 # 86 C/ 146 SC 146.1.2 P 85 L 37 # 88 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 The text: "Provided in this clause are fully functional and electrical specifications for ..." "3 level" should be "3-level" when used as a compound adjective doesn't make sense. SuggestedRemedy SuggestedRemedy Change "3 level" to "3-level" Change to: "Provided in this clause are functional and electrical specifications for ...". Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.1.2 P 86 L 19 # 436 C/ 146 SC 146.1 P 85 L 12 Wienckowski. Natalie General Motors Anslow. Pete Ciena Comment Type T Comment Status D EΖ EΖ Comment Type Ε Comment Status D The MDI is not part of the PHY and should not be shaded in Figure 146-1. "10BASE-T1L" should not be split across two lines. SugaestedRemedy Same issue in 146.7.2.2 Remove shading on MDI "box" in Figure 146-1. SuggestedRemedy Proposed Response Response Status W Replace the hyphen with a non-breaking hyphen (Esc, -, h) (three key presses) Make the same change in 146.7.2.2 (page 132, line 13) PROPOSED ACCEPT. Proposed Response Response Status W C/ 146 SC 146.1.2 P86 L 34 # 437 PROPOSED ACCEPT. Wienckowski, Natalie General Motors C/ 146 SC 146.1.2 P 85 # 668 L 34 ΕZ Comment Type E Comment Status D Donahue, Curtis **UNH-IOL** missing period Comment Type E Comment Status D EΖ SuggestedRemedy Clause 146 uses the term "single balanced pair of condustors" a lot, but there are some Add period at end of last sentence in the paragraph. instances where "single balanced pair cabling" is used. Suggest scrubbing the Clause and Proposed Response Response Status W being consistent. PROPOSED ACCEPT. SuggestedRemedy

Change instances of "single balanced pair cabling" to "single balanced pair of conductors"

Response Status W

Proposed Response

PROPOSED ACCEPT.

C/ 146 SC 146.1.2 P 86 L 48 # 19 C/ 146 SC 146.1.2 P86 L 48 # 669 Lusted, Kent Intel Donahue, Curtis UNH-IOL Comment Type ER Comment Status D Comment Type E Comment Status D The paragraph starting on P86 line 48 is almost identical to the paragraph starting on Page The paragraph starting on line 48 has nearly the same content as the paragraph starting on 86 line 36. It may be a duplicate since both reference 10BASE-T1L PHY and optional EEE line 36. Suggest removing the paragraph on line 48. support. SuggestedRemedy SuggestedRemedy Remove text from line 48 to 50. Consider removing one of the 2 paragraphs cited above. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. implemented by comment 381 (duplicate) - resolution was: delete paragraph at Page 86 implemented by comment 381 (duplicate) - resolution was: delete Line 48: "A 10BASE-T1L PHY optionally supports Energy-Efficient Ethernet (see Clause 78). The EEE capability is a mechanism by which 10BASE-T1L PHYs are able to reduce C/ 146 SC 146.1.2 P 86 L 48 # 717 power consumption during periods of low link utilization." McClellan, Brett Marvell C/ 146 P 87 # 712 SC 146.1.2.1 L 3 Comment Type Comment Status D ΕZ Ε Kabra, Lokesh Synopsys Inc paragraph is redundant to line 36. Comment Type Ε Comment Status D SuggestedRemedy Overview paragraph structure/content different from other similar PCS sections in standard Delete the paragraph SuggestedRemedy Proposed Response Response Status W Change to "The 10BASE-T1L PCS couples a Media Independent Interface (MII), as PROPOSED ACCEPT IN PRINCIPLE. described in Clause 22, to the 10BASE-T1L Physical Medium Attachment (PMA) sublayer" implemented by comment 381 (duplicate) - resolution was: delete paragraph at Page 86 Proposed Response Response Status W Line 48: "A 10BASE-T1L PHY optionally supports Energy-Efficient Ethernet (see Clause PROPOSED ACCEPT. 78). The EEE capability is a mechanism by which 10BASE-T1L PHYs are able to reduce power consumption during periods of low link utilization.' SC 146.1.2.2 P 87 C/ 146 L 8 # 713 C/ 146 P 86 L 48 SC 146.1.2 # 381 Kabra, Lokesh Synopsys Inc Jones, Chad Cisco ΕZ Comment Type Comment Status D Comment Type ER Comment Status D F7 First line structure/content different from other similar PMA sections in standard Text in this paragraph is a repeat of the paragraph at line 36. Delete this redundant SuggestedRemedy paragraph. Change to "The 10BASE-T1L PMA couples messages from the PCS service interface SuggestedRemedy onto a single balanced pair of conductors and supports the link management and the delete paragraph at Page 86 Line 48: "A 10BASE-T1L PHY optionally supports Energy-10BASE-T1L PHY Control function." Efficient Ethernet (see Clause 78). The EEE capability is a mechanism by which 10BASE-Proposed Response Response Status W T1L PHYs are able to reduce power consumption during periods of low link utilization."

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: Clause, Subclause, page, line

Proposed Response

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Response Status W

C/ 146 SC 146.1.2.2 Page 35 of 76 8/29/2018 11:27:59 AM

C/ 146 SC 146.1.2.2 P 87 L 10 # 468 C/ 146 SC 146.1.2.3 P 87 L 30 # 384 Jones, Peter Cisco Jones, Chad Cisco Comment Type Ε Comment Status D F7 Comment Type ER Comment Status D F7 Strike out "at 7.5 MBd" Please translate to English: "The PHY is now starting to transmit an IDLE symbol stream, where loc loi reg is de-asserted, thus indicating to the remote PHY, that this PHY is going SuggestedRemedy back to normal transmit mode again." Make suggested change SuggestedRemedy Proposed Response Response Status W CHANGE TO: "The PHY transmits an IDLE symbol stream with loc\_lpi\_req is de-asserted, PROPOSED ACCEPT. indicating to the remote PHY that the local PHY is back to normal transmit mode." Proposed Response Response Status W C/ 146 SC 146.1.2.3 P 87 L 21 # 382 PROPOSED ACCEPT. Jones. Chad Cisco C/ 146 SC 146.1.3 P88 L 4 # 438 Comment Type Ε Comment Status D F7 **General Motors** Wienckowski. Natalie missing comma "In the transmit direction the transition to the LPI transmit mode begins when the PCS transmit function" Comment Type E Comment Status D ΕZ SuggestedRemedy poor wording, remove "a" in front of "descriptive text" CHANGE TO: "In the transmit direction, the transition to the LPI transmit mode begins SuggestedRemedy when the PCS transmit function" Change: discrepancy between a state diagram and a descriptive text Proposed Response Response Status W To: discrepancy between a state diagram and descriptive text PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. C/ 146 SC 146.1.2.3 P 87 L 27 # 383 Jones, Chad Cisco C/ 146 SC 146.2 P89 L 2 # 148 Comment Type E Comment Status D ΕZ Lewis, Jon Dell EMC missing comma: "Periodically the transmit function of the local" ΕZ Comment Type Comment Status D SuggestedRemedy Align arrows and lines between the PCS block and the PMA block with the blocks CHANGE TO: "Periodically, the transmit function of the local" themselves. SuggestedRemedy Proposed Response Response Status W Align arrow PMA RXSTATUS.indication with the PCS block; Align arrow PROPOSED ACCEPT. PMA\_RX\_LPI\_STATUS.request with the PMA block Proposed Response Response Status W PROPOSED ACCEPT.

C/ 146 SC 146.2 P 89 L 5 # 367 C/ 146 SC 146.2.4.1 P 91 L 35 # 387 BMW AG Jones, Chad Cisco Matheus, Kirsten Comment Type ER Comment Status D F7 Comment Type ER Comment Status D F7 MDIO arrow needs to go in both directions. missing commas: "During reception the PMA UNITDATA.indication conveys to the PCS via the parameter rx symb vector the value of symbols detected on the MDI during each SuggestedRemedy cycle of the recovered clock." Edit picture accordingly SugaestedRemedy Proposed Response Response Status W CHANGE TO: "During reception, the PMA UNITDATA indication convevs to the PCS, via PROPOSED ACCEPT the parameter rx symb vector, the value of symbols detected on the MDI during each cycle of the recovered clock." C/ 146 SC 146.2.3 P 90 L 51 # 385 Proposed Response Response Status W Jones. Chad Cisco PROPOSED ACCEPT. Comment Type Ε Comment Status D F7 C/ 146 SC 146.2.5.1 P 92 L 5 # 388 fix the grammar: "The transmitter in a 10BASE-T1L link normally sends over the MDI Jones, Chad Cisco symbols that represent a MII data stream with framing, scrambling and encoding of data, control information, or idles." Comment Type Comment Status D ΕZ SuggestedRemedy missing commas: "During transmission, the PMA UNITDATA.request simultaneously CHANGE TO: "The transmitter in a 10BASE-T1L link normally sends symbols over the MDI conveys to the PMA via the parameter tx symb vector the value of the symbols to be sent that represent an MII data stream with framing, scrambling and encoding of data, control over the MDI. information, or idles." SuggestedRemedy Proposed Response Response Status W CHANGE TO: "During transmission, the PMA\_UNITDATA.request simultaneously conveys PROPOSED ACCEPT. to the PMA, via the parameter tx symb vector, the value of the symbols to be sent over the MDI." C/ 146 SC 146.2.3.1 P 91 L 5 # 386 Proposed Response Response Status W Jones. Chad Cisco PROPOSED ACCEPT. Comment Type ER Comment Status D EΖ C/ 146 SC 146.2.6.3 P 92 L 44 # 184 missing commas: "The PMA\_TXMODE.indication specifies to PCS Transmit via the Graber, Steffen Pepperl+Fuchs GmbH parameter tx mode what sequence of symbols the PCS should be transmitting." ΕZ SuggestedRemedy Comment Type Comment Status D Ε CHANGE TO: "The PMA\_TXMODE.indication specifies to PCS Transmit, via the [EASY] . Figure 146-8, and Figure 146-15. parameter tx\_mode, what sequence of symbols the PCS should be transmitting." SuggestedRemedy Proposed Response Response Status W . Figure 146-8, Figure 146-14, and Figure 146-15. (Reference to Figure 146-14 is missing). PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT.

C/ 146 SC 146.2.7 P 92 L 51 # 389 C/ 146 SC 146.3 P 96 L 6 # 580 Jones, Chad Cisco Fitzgerald, Niall Acuitas Silicon Comment Type ER Comment Status D F7 Comment Type Ε Comment Status D F7 typo, extra unintentional character: "operation o of " Figure 146-3 - PCS reference diagram omits the loc lpi reg signal from the PMA. SuggestedRemedy I understand that this is used by the PCS TRANSMIT function, as shown later in Figure delete the 'o' 146-6-PCS transmit symbol generation. Proposed Response SuggestedRemedy Response Status W PROPOSED ACCEPT Add loc Ipi reg to Figure 146-3-PCS reference diagram. Proposed Response Response Status W C/ 146 SC 146.2.7 P 92 L 51 # 439 PROPOSED ACCEPT. Wienckowski, Natalie **General Motors** Comment Type Ε Comment Status D EΖ C/ 146 SC 146.3 P 96 L 6 # 578 Fitzgerald, Niall Acuitas Silicon extraneous "o" SuggestedRemedy Comment Type Comment Status D F7 Figure 146-3 - PCS reference diagram shows rx lpi active as an input to the PCS Change: whether reliable operation o of the To: whether reliable operation of the RECEIVE module, coming from the PMA SERVICE INTERFACE. Proposed Response Response Status W The actual direction is the reverse; rx\_lpi\_active is an output from the PCS receive state PROPOSED ACCEPT. diagram and is used in the PMA. SuggestedRemedy C/ 146 SC 146.2.7 P 92 L 52 # 185 Reverse the direction of the rx lpi active signal in Figure 146-3 - PCS reference diagram. Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Type E Comment Status D ΕZ PROPOSED ACCEPT. [EASY] . operations o of the . SuggestedRemedy C/ 146 SC 146.3 P 96 L 10 # 566 . operations of the . ("o" too much) Laubach, Mark Broadcom Proposed Response Response Status W EΖ Comment Type Comment Status D PROPOSED ACCEPT. Both line 10 "config" and line 29 "receiving" the text could be horizontal rather than vertical. To me easier readying. Same for Page 113, Line 7 "config" and line 25 "recovery clock". SuggestedRemedy Suggest make both horizontal. Proposed Response Response Status W

PROPOSED ACCEPT.

C/ 146 SC 146.3.2.1 P 98 14 # 517 C/ 146 SC 146.3.3.1 P 101 14 # 90 Maguire, Valerie The Siemon Company Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D Clause 22.2.2.5 is in the amendment. In Figure 146-5, the label for the centre arrow at the top of the SEND IDLE state is offset to the left so that it appears to relate to the transition from the bottom of the state. SuggestedRemedy SuggestedRemedy Make 22.2.2.5 a cross-reference and remove the "External" character tag Move the label to be centred on the middle arrow. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT PROPOSED ACCEPT. C/ 146 SC 146.3.2.1 P 98 L4 # 111 C/ 146 SC 146.3.3.2.1 P 102 L 41 # 264 Anslow. Pete Ciena Andre, Szczepanek **HSZ** Consulting Comment Type Ε Comment Status D F7 Comment Type Comment Status D F7 "22.2.2.5" should be a cross-reference. I fund this sub-clause very confusing because it uses the term "transmitter side-stream Same issue in 147.3.2.2 (page 149, line 36) scrambler" to describe the generator polynomial LSFR. The LSFR is the subject of further SuggestedRemedy scrambling by the auxillary generator polynomial to produce SCn[3:0]. Figure 146-6 has a Make "22.2.2.5" a cross-reference here and in 147.3.2.2 (page 149, line 36). single box called "Side stream scrambler" that produces SCn[3:0], so text such as "An implementation of master and slave PHY side-stream scramblers by linear-feedback shift Proposed Response Response Status W registers is shown in Figure-146-7" is mis-leading. PROPOSED ACCEPT. SuggestedRemedy Change C/ 146 SC 146.3.3.1 P 101 L 1 # 362 "An implementation of master and slave PHY side-stream scramblers by linear-feedback Yseboodt, Lennart Signify shift registers is shown in Figure-146-7" Comment Type E Comment Status D ΕZ "An implementation of master and slave PHY side-stream generator polynomials by linear-The state diagram in Figure 146-5 is drawn with a different style from the other state feedback shift registers is shown in Figure-146-7" diagrams in this Clause. Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. - Black dots are used to denote where lines are merged. No other state diagram does this. Remove the dots (line 36 and 40) C/ 146 # 319 SC 146.3.3.2.1 P 102 L 47 - Label A is in a circle, change this to the typical label drawing (make a consistent style across Clause 146 and 147, they seem to differ on this) Yseboodt, Lennart Signify - The arc from TRANSMIT DATA to itself is drawn very close to the state box. Move the Comment Type E Comment Status D EΖ TRANSMIT DATA state to the right to avoid this. "In no case shall the scrambler state be initialized to all zeros." Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Akward wording. Remove dots at line 36 and 40. Labels in circles as inputs are correct 802.3 style. SuggestedRemedy Commenter to consider maintenance request on clause 96 (100BASE-T1) where the

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: Clause, Subclause, page, line

incorrect symbol in clause 147 came from. Fix labels in clause 147 to be in circles.... (THERE APPEARS TO BE NO COMMENT ON CLAUSE 147 ON THIS ISSUE)

C/ 146 SC 146.3.3.2.1

"The scrambler state not be initialized to all zeros."

Response Status W

Proposed Response

PROPOSED ACCEPT.

Page 39 of 76 8/29/2018 11:27:59 AM

C/ 146 SC 146.3.3.2.5 P 104 L 29 # 91 C/ 146 SC 146.3.3.2.7 P 105 L 35 # 321 Anslow, Pete Ciena Yseboodt, Lennart Signify Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 When the triplet "TAn, TBn, TCn" is introduced in 146.3.3.2 and every where else, the "n"'s Table 146-2 and 146-3 use hyphens to indicate negative numbers. are subscripted. Here they are not. SugaestedRemedy SuggestedRemedy Change hyphen to minus symbol. Subscript the three "n"'s in "(TAn, TBn, TCn)" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.3.4.1 P 106 L 19 # 470 C/ 146 SC 146.3.3.2.7 P 104 L 51 Jones. Peter Cisco Anslow. Pete Ciena Comment Type ER Comment Status D F7 EΖ Comment Type Ε Comment Status D Replace "ESD4 and ERR\_ESD4, see 1" with ""ESD4 and ERR\_ESD4 values see" "shall be a sent in the following order" contains a spurious "a" SugaestedRemedy SuggestedRemedy Make suggested change Change to "shall be sent in the following order". Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.3.4.1 P 107 L 28 # 187 C/ 146 SC 146.3.3.2.7 P 105 L7 # 320 Graber, Steffen Pepperl+Fuchs GmbH Yseboodt, Lennart Signify ΕZ Comment Type E Comment Status D Comment Type E Comment Status D ΕZ [EASY] (scr status = OK)\* In Table 146-1 the 4B3T encoding is listed using the symbols -, +, and 0. SuggestedRemedy (scr status = OK) \* (space before "\*" is missing) Legibility can be improved. SuggestedRemedy Proposed Response Response Status W - Replace "-" by a real minus symbol, not a hyphen PROPOSED ACCEPT. - Insert a non-breakable space (with fixed width, Frame: Ctrl+Space) between the symbols P 109 C/ 146 SC 146.3.4.1.1 L 29 # 263 Proposed Response Response Status W Andre, Szczepanek **HSZ** Consulting PROPOSED ACCEPT. Comment Type E Comment Status D F7 It is normal practise for state diagrams to follow the definition of Variables, Functions, & Timers. This convention is followed for the PCS TX SM, but not for the RX SM. SugaestedRemedy Move PCS Rx and JAB state diagrams after 146.3.4.1.3 (Timers) Proposed Response Response Status W

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/ 146 Page 40 of 76

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C/ 146 SC 146.3.4.3 P 112 L 12 # 322 C/ 146 SC 146.4.3 P114 L 37 # 391 Yseboodt, Lennart Signify Jones, Chad Cisco Comment Type E Comment Status D F7 Comment Type ER Comment Status D There is a spurious period after equation 146-5. extra word in sentence: "PMA Receive has the ability to translate the received signals on at the MDI into the PMA\_UNITDATA.indication parameter rx\_symb\_vector." SuggestedRemedy SuggestedRemedy Remove period. delete 'at' from the sentence: "PMA Receive has the ability to translate the received signals Proposed Response Response Status W on the MDI into the PMA\_UNITDATA.indication parameter rx\_symb\_vector." PROPOSED ACCEPT Proposed Response Response Status W PROPOSED ACCEPT. P 113 C/ 146 SC 146.4 L 3 # 581 Fitzgerald, Niall Acuitas Silicon C/ 146 SC 146.4.4 P115 L 27 # 476 Comment Type Ε Comment Status D EΖ Jones. Peter Cisco Figure 146-11-PMA functional block diagram shows rx\_lpi\_active twice, i.e. as two Comment Type TR Comment Status D separate inputs, one for PHY CONTROL and one for PMA RECEIVE. This says "via management control during initialization or via default hardware setup." I think these are the same thing from this documents point of view. We don't say where the This conflicts with convention, used for other signals in the diagram, e.g. scr\_status is manangement control got it's data, and we don't define hardware. shown as a single input going to two separate places. SuggestedRemedy SuggestedRemedy Strike out via "default hardware setup" Change Figure 146-11-PMA functional block diagram to show rx\_lpi\_active as a single input that goes to PHY CONTROL and PMA RECEIVE. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.4.4 P 115 L 31 # 93 C/ 146 SC 146.4.3 P 114 L 36 # 262 Anslow, Pete Ciena **HSZ** Consulting Andre, Szczepanek Comment Type Comment Status D ΕZ Comment Type E Comment Status D "10BASE-T1L" should not be split across two lines. "received signals on at the MDI" SuggestedRemedy SuggestedRemedy Replace the hyphen with a non-breaking hyphen (Esc. -, h) (three key presses) Change Proposed Response Response Status W "received signals on at the MDI" PROPOSED ACCEPT.

"received signals on the MDI"

PROPOSED ACCEPT.

Response Status W

Proposed Response

F7

EΖ

ΕZ

C/ 146 SC 146.4.4 P 115 / 44 # 94 C/ 146 SC 146.4.4.1 P116 1 22 # 188 Anslow, Pete Ciena Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D Comment Type E Comment Status D F7 Notes start with "NOTE-" i.e., an em-dash and no spaces before the first word of the note. [EASY] Possible values are missing. Same issue with the note in 146.4.4.2, the note in 146.5.5.3, the note in 146.8.4, and the SuggestedRemedy note in 147.3.3.1. Add: Values: TRUE or FALSE SuggestedRemedy Proposed Response Response Status W In 146.4.4. change "NOTE - Fast" to "NOTE-Fast" In 146.4.4.2, change "NOTE - After" to "NOTE-After" PROPOSED ACCEPT. In 146.5.5.3, change "Note: If" to "NOTE-If" In 146.8.4, change "Note: Typically" to "NOTE-Typically" C/ 146 SC 146.4.4.2 P 117 L 28 In 147.3.3.1, change "Note: A" to "NOTE-A" Yseboodt, Lennart Signify Proposed Response Response Status W Comment Type E Comment Status D F7 PROPOSED ACCEPT. The note at the end of 146.4.4.2 is incorrectly formatted. C/ 146 SC 146.4.4.1 P 116 L 2 # 564 SuggestedRemedy Laubach, Mark Broadcom Notes starts with 'NOTE' in capitals, followed by an em-dash. Comment Status D F7 Proposed Response Comment Type TR Response Status W "This variable is generated by management or set by default" is unclear to me. The PROPOSED ACCEPT. variable is always defined in the standard, so "not generated", "set by management"? If "set by default" what is the default value? Looking at 146.4.5, there is closer wording that C/ 146 SC 146.4.4.3 P118 L 42 # 189 might have better clarity. Graber, Steffen Pepperl+Fuchs GmbH SuggestedRemedy ΕZ Comment Type E Comment Status D Suggest "This variable is set by management control or via hardware." [EASY] '... + (scr status = NOT OK) ]\* Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. . + (scr status = NOT OK) \* (remove "]" after (scr status = NOT OK), only the scr status check is intended to be disabled, if lpi is active. C/ 146 SC 146.4.4.1 P 116 L 5 # 565 Response Status W Proposed Response Laubach, Mark Broadcom PROPOSED ACCEPT. ΕZ Comment Type TR Comment Status D "set by default", what is the default value? C/ 146 SC 146.4.4.3 P 118 L 42 # 190 Graber, Steffen Pepperl+Fuchs GmbH SuggestedRemedy Indicate the default value. Comment Type E Comment Status D EΖ [EASY] loc\_lp\_req <= FALSE (within state "SEND IDLE OR DATA") Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. SugaestedRemedy delete "set by default" loc\_lpi\_req <= FALSE (add "i" after "lp").</pre> Proposed Response Response Status W PROPOSED ACCEPT.

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/ 146 COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Clause, Subclause, page, line

SC 146.4.4.3

Page 42 of 76 8/29/2018 11:27:59 AM

C/ 146 SC 146.4.4.3 P 118 L 50 # 441 C/ 146 SC 146.5.4 P 122 L 28 # 395 Wienckowski, Natalie General Motors Jones, Chad Cisco Comment Type Ε Comment Status D Comment Type ER Comment Status D F7 Inconsistancy of naming diagram when broken into 2, 146-14 (part a), 146-15 (part b) while "the transmitter shall meet the requirements of this section with a..." which section? You 147- 4 (1 of 2), 147-5 (2 of 2) and 147-8 (1 of 2), 147-9 (2 of 2). mean subclause 146.5.4? If so please state that. SuggestedRemedy SuggestedRemedy Pick one method and use it throughout the entire document. replace 'section' with the appropriate subclause link or 'this clause'. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Use "part a" or "part b" consistentaly (change clause 147). replace "section" with <cross-ref> "146.5.4" C/ 146 SC 146.5.2 P 121 L 20 # 670 C/ 146 SC 146.5.4.4 P 123 L 32 # 150 Donahue, Curtis UNH-IOI Lewis. Jon Dell EMC Comment Type E Comment Status D EΖ Comment Type E Comment Status D F7 Equations 146-6.7.8.9 need non-breaking spaces between the number and the units Change "sub clause" to "subclause". SuggestedRemedy SugaestedRemedy Change "sub clause" to "subclause". Add non-breaking spaces between the number and units across all equations listed. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.5.3 P 122 L 2 # 149 C/ 146 SC 146.5.4.4 P 124 L 10 # 95 Lewis, Jon Dell EMC Anslow, Pete Ciena Comment Type Comment Status D ΕZ Comment Type Comment Status D ΕZ Figure 146-19 and Figure 146-23 are bit maps. This makes the draft larger than it needs to Resistor isn't aligned properly be and stops the text from being searchable. SuggestedRemedy SuggestedRemedy Replace figure with the figure from 147.5.4.1 Replace Figure 146-19 and Figure 146-23 with vector-based versions (as per Figure 146-Proposed Response Response Status W 22 for example). PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT.

Cl 146 SC 146.5.5.3 P125 Lewis, Jon Dell EMC	<b>19</b> # <u>151</u>	Cl 146 SC 146.6.2 P126 L 52 # 134 Anslow, Pete Ciena
Comment Type <b>E</b> Comment Status <b>D</b> Resistor isn't aligned properly	ı	Z Comment Type T Comment Status D EZ  "45.2.1.131" is not the correct reference for register 1.2100
SuggestedRemedy Align resistor(s) properly with the connection lines in the d	rawing.	SuggestedRemedy Change "45.2.1.131" to "45.2.1.185" here and in 146.11.4.3 item MI3
Proposed Response Response Status W PROPOSED ACCEPT.		Proposed Response Response Status <b>W</b> PROPOSED ACCEPT.
Cl 146 SC 146.5.5.3 P125 Anslow, Pete Ciena	L <b>18</b> # <u>96</u>	Cl 146 SC 146.7.1.2 P129 L41 # 154 Hidaka, Yasuo Independent
Comment Type E Comment Status D  The 802.3 standard uses capital omega rather than "ohm"		Z Comment Type <b>E</b> Comment Status <b>D</b> Equation (146-12) has an unnecessary "dB".
SuggestedRemedy Change "ohm" to capital omega in: The note in 146.5.5.3 The note in 146.8.4 The heading row of Table 146B-1 (5 instances)		SuggestedRemedy Remove the unnecessary "dB".  Proposed Response Response Status W  PROPOSED ACCEPT.
Proposed Response Response Status W PROPOSED ACCEPT.		Cl 146 SC 146.7.1.4 P130 L 37 # 97 Anslow, Pete Ciena
CI 146 SC 146.5.7 P125 Anslow, Pete Ciena	<b>L 29</b> # <u>133</u>	Comment Type <b>E</b> Comment Status <b>D</b> EZ  In "E1 or E2", the "1" and "2" should be subscripted.
Comment Type E Comment Status D  "45.2.1.1" is an external cross-reference, so it should be in		Z SuggestedRemedy In "E1 or E2", subscript the "1" and "2".
SuggestedRemedy Apply character tag "External" to "45.2.1.1"		Proposed Response Response Status <b>W</b> PROPOSED ACCEPT.
Proposed Response Response Status W PROPOSED ACCEPT.		Cl 146 SC 146.7.1.4 P130 L41 # 326  Yseboodt, Lennart Signify
		Comment Type <b>E</b> Comment Status <b>D</b> EZ  Table 146-5 does not use a minus symbol in the equations (4 occurences).
		SuggestedRemedy Replace hyphen by minus symbol.
		Proposed Response Response Status <b>W</b> 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: Clause, Subclause, page, line

C/ 146 SC 146.7.1.4 Page 44 of 76 8/29/2018 11:27:59 AM

C/ 146 SC 146.7.1.4 P 130 L 44 # 327 C/ 146 SC 146.7.1.5 P 131 L 19 # 99 Yseboodt, Lennart Signify Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Table 146-5: "TCL .1 <= f <= 20" The Frequency (MHz) entry is ".1  $\leq$  f  $\leq$  20". ".1" should be "0.1" and "f" is not used anywhere, so it would be better to replace with "0.1 .1 should be 0.1 per the IEEE style guide (see 12.2). to 20" SuggestedRemedy SuggestedRemedy Replace ".1 <= f <= 20 with "0.1 to 20". Fix here and on line 46. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Resolved by comment 98 C/ 146 SC 146.7.1.5 P 131 L 19 # 329 C/ 146 SC 146.7.1.4 P 130 L 44 # 98 Yseboodt, Lennart Signify Anslow, Pete Ciena Comment Type E Comment Status D ΕZ Comment Type E Comment Status D ΕZ Table 146-6: ".1 <= f <= 20" The formatting in Table 146-5 is not according to the IEEE style manual. .1 should be 0.1 per the IEEE style guide (see 12.2). SuggestedRemedy SuggestedRemedy In Table 146-5: change ".1" to "0.1" (2 instances) Change to 0.1. "log" should be in upright font (4 instances) Proposed Response Response Status W The base of the log should be explicit. Replace "log" with "log10" where the "10" is a subscript. PROPOSED ACCEPT IN PRINCIPLE. "f" should be in italic font (6 instances) Resolve with comment#99 The minus signs should be en-dashes (included in another comment) C/ 146 SC 146.7.2.2 P 132 L 17 # 448 Proposed Response Response Status W GlobalFoundries Ewen, John PROPOSED ACCEPT. Resolve with comment#327 Comment Type E Comment Status D F7 Equation 146-14 uses "log" without the subscript "10" while similar equations in this section C/ 146 SC 146.7.1.5 P 131 L 16 # 328 include the subscript. Yseboodt, Lennart Signify SuggestedRemedy Comment Type E Comment Status D EΖ Add the "10" subscript to "log" to be consistent with similar equations within the sub-clause In Table 146-6 there is a missing horizontal lines between "(dB)" and "E1 E2 E3". Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. Add horizontal line.

Proposed Response

PROPOSED ACCEPT.

Response Status W

C/ 146 SC 146.8.3 P 133 L 31 # 675 C/ 146 SC 146.11.2.1 P 136 L 21 # 100 Donahue, Curtis **UNH-IOL** Anslow, Pete Ciena Comment Type Е Comment Status D F7 Comment Type E Comment Status D F7 Rogue equation number. should be centered with with equation (around line 26). Comment i-52 against the P802.3bx revision project D3.0 changed all instances of "enquiries" to "inquiries" in the PICS front sheet. SuggestedRemedy SuggestedRemedy Fix equation number position Change "enquiries" to "inquiries" in: Proposed Response Response Status W 146.11.2.1 PROPOSED ACCEPT. 147.12.2.1 148.5.2.1 # 449 22.3.2.1 (covered in another comment). C/ 146 SC 146.8.4 P 133 L 41 Ewen. John GlobalFoundries Proposed Response Response Status W PROPOSED ACCEPT. Comment Type Ε Comment Status D EΖ The phrase "The following table" is not a specific reference. C/ 146 SC 146.11.2.2 P 136 L 33 # 101 SuggestedRemedy Anslow. Pete Ciena Replace "The following table" with "Table 146-8" Comment Status D EΖ Comment Type Ε Proposed Response Response Status W 146.11.2.2 should be on the same page as the rest of the PICS initial text. PROPOSED ACCEPT. SuggestedRemedy Uncheck "Keep with next" for the heading of 146.11.2.2 C/ 146 SC 146.9.2.2 P 134 L 48 # 399 Jones, Chad Cisco Proposed Response Response Status W PROPOSED ACCEPT. ΕZ Comment Type ER Comment Status D missing comma and word AND extra word: "Where applicable, \*also\* testing according to C/ 146 SC 146.11.2.2 P 137 L 4 # 102 IEC 61326 and NE21 test methods, which are similar \*to\* or even more severe than a Anslow, Pete MICE E3 environment \*,\* shall be done and the following industrial EMC requirements shall Ciena be met:" ΕZ Comment Type Ε Comment Status D SuggestedRemedy "IEEE Std 802.3xx-201x" should be "IEEE Std 802.3cg-201x" in two places. CHANGE TO: "Where applicable, testing according to IEC 61326 and NE21 test methods. SuggestedRemedy which are similar to or even more severe than a MICE E3 environment, shall be done and Change "IEEE Std 802.3xx-201x" to "IEEE Std 802.3cg-201x" in two places. the following industrial EMC requirements shall be met:" Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT.

C/ 146 SC 146.11.3 P 137 L 25 # 103 C/ 146 SC 146.11.4.2.2 P 142 L 3 # 106 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type T Comment Status D F7 There are two items "EEE" and it is not clear what the difference between them is. The Status entry for Item PMAE12 is: "ANEG: SuggestedRemedy RTDL: If there is intended to be a difference between them, clarify what this is and give them MDIO: different Item entries. M" Otherwise, consolidate them into one row: "ANEG" is undefined. This should be "AN" "EEE", "Energy-Efficient Ethernet capability", "146.1.1, 78", "", "Yes [] No []" It is not clear what the intent of this entry is. The syntax for multiple elements ORed together used elsewhere (e.g., 104,9,4,4) is similar Proposed Response Response Status W but different from that used here. PROPOSED ACCEPT. The text in 146.5.4.1 does not seem to match ORed elements: Mandatory for Auto-Negotiation or MDIO capability or 2.4 Vpp operating mode. C/ 146 SC 146.11.3 P 137 L 27 # 104 The syntax for multiple elements ANDed together is defined in 21.6.2 as Anslow, Pete Ciena "<item1>\*<item2>:" This seems to fit the text in 146.5.4.1 better (except that it says "If MDIO is not F7 Comment Type Ε Comment Status D implemented a similar functionality shall be provided by another interface") The convention for PICS items is that when another item depends on whether or not this SuggestedRemedy item is supported, its name is preceded by a "\*". If the intent is for the conditions to be ANDed, then change the Status entry for Item SuggestedRemedy PMAE12 to: "AN\* In the table in 146.11.3, change: "AN" to "\*AN" RTDI\* "MDIO" to "\*MDIO" MDIO:M" "FAST" to "\*FAST" If the intent is otherwise, change to some other valid entry such as: "RTDL" to "\*RTDL" "AN:M RTDL:M Proposed Response Response Status W MDIO:M" PROPOSED ACCEPT. Increase the width of the Status column (in all of the PICS tables) and decrease the width of the Status column to compensate, so that individual elements such as MDIO:M do not C/ 146 / 41 SC 146.11.4.2.2 P 141 # 105 wrap. Anslow. Pete Ciena Proposed Response Response Status W Comment Type E Comment Status D EΖ PROPOSED ACCEPT. The Item text for PMAE10 through PMAE23 is difficult to read due to being squashed. SuggestedRemedy Increase the width of the Item column and decrease the width of the Feature column to

compensate.

Proposed Response

PROPOSED ACCEPT.

Response Status W

C/ 146 SC 146.11.4.3 P 143 L 15 # 107 C/ 146 SC 146.11.4.4 P 143 L 34 # 109 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Т Comment Status D F7 Comment Type E Comment Status D F7 The Status entry for Item MI3 is: According to the rules set out in: "ANEG: http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers MDIO: "In text, where this improves clarity, follow the IEEE Editorial Style Manual: Use spaces instead of commas between numbers in tens or hundreds of thousands (e.g., 62 000, 100 M" "ANEG" is undefined. This should be "AN" 000. but 4000)." Despite these being table entries, they are in the form of text, so it seems appropriate to It is not clear what the intent of this entry is. use this version of the rule. The syntax for multiple elements ORed together used elsewhere (e.g., 104.9.4.4) is similar but different from that used here. SuggestedRemedy The text in 146.6.2 seems to match ORed elements: Mandatory for Auto-Negotiation or In the third item LMF1 (should be LMF3) remove the space used as a thousands separator MDIO capability. in 8 834. Alternatively, the syntax for multiple elements ANDed together is defined in 21.6.2 as "<item1>\*<item2>:" Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. If the intent is for the conditions to be ORed, then change the Status entry for Item MI3 to: C/ 146 SC 146.11.4.4 P 143 L 38 # 110 MDIO:M" Anslow, Pete Ciena If the intent is otherwise, change to some other valid entry such as: F7 Comment Type Comment Status D "AN\* MDIO:M" "10BASE-T1L" should not be split across two lines. Increase the width of the Status column (in all of the PICS tables) and decrease the width SuggestedRemedy of the Status column to compensate, so that individual elements such as MDIO:M do not Replace the hyphen with a non-breaking hyphen (Esc. -, h) (three key presses) in 4 places wrap. in 146.11.4.4. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 146 SC 146.11.4.4 P 143 L 32 # 108 Cl 146 SC 146.20 P 199 L 34 # 143 Anslow, Pete Ciena Anslow, Pete Ciena F7 Comment Type Ε Comment Status D Comment Type E Comment Status D EΖ All of the items in 146.11.4.4 have the same entry in the Item column. The number for an IEC standard should be preceded by "IEC" SuggestedRemedy SugaestedRemedy Re-number them to be LMF1 through LMF5 Change "and 60079-11" to "and IEC 60079-11" here and on page 201, line 1 Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT.

C/ 146	L <b>27</b> Il Automation	# 698		Cl 146 SC 146B Graber, Steffen	<i>P</i> <b>205</b> Pepperl+Fuc	<i>L</i> <b>11</b> hs GmbH	# 254	
Comment Type <b>E</b> Comment Status <b>D</b> Repeteated text" DC Powering link sections" in			EZ	Comment Type <b>E</b> [EASY] No spaces bet	Comment Status <b>D</b> ween numbers and units in F	Figure 146B-2.		ΕZ
SuggestedRemedy  Delete one " DC Powering link sections"				SuggestedRemedy  Add spaces between r	numbers and units in Figure 1	146B-2.		
Proposed Response Response Status <b>V</b> PROPOSED ACCEPT.	V			Proposed Response PROPOSED ACCEPT	Response Status <b>W</b>			
C/ 146 SC 146.20.1.1.1 P 204 Jones, Chad Cisco	L 16	# 420		Cl 146 SC 146B Graber, Steffen	P <b>205</b> Pepperl+Fuc	L <b>12</b> hs GmbH	# 255	
Comment Type ER Comment Status Commas in table that should be decimals  SuggestedRemedy the rows for 18 and 19AWG, CHANGE "0,023	3" to "0.0233" and "0,	0294" to "0.0294"	EZ	Comment Type E  [EASY] dcpower  SuggestedRemedy  dc power (add space)	Comment Status D			EZ
Proposed Response Response Status V PROPOSED ACCEPT.	V			Proposed Response PROPOSED ACCEPT	Response Status <b>W</b>			
C/ 146 SC 146.20.1.2 P 204 Jones, Chad Cisco	L <b>32</b>	# 421		C/ 146 SC 146B.1.1 Anslow, Pete	.1 P 204 Ciena	<i>L</i> 10	# 131	
Comment Type ER Comment Status D "The spur link sections provides power" Sput SuggestedRemedy CHANGE TO: "The spur link sections provide	r Link sections PROV	IDE power	EZ	are to be taken as exa significance."	Comment Status <b>D</b> dard says "Unless otherwise of signification, with the number of signification have a comma instead of	cant digits and tra		
Proposed Response Response Status <b>V</b> PROPOSED ACCEPT.	V				ros from the numbers in Tab .0233" and change "0,0294"			
Cl 146 SC 146.20.B.1.1 P 203 Donahue, Curtis UNH-IO		# 686		Proposed Response PROPOSED ACCEPT	Response Status W	3.020		
Comment Type E Comment Status D  Duplicated text "DC powering link sections".  SuggestedRemedy	)		EZ					

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: Clause, Subclause, page, line

Remove one of the "DC powering link sections" instances.

PROPOSED ACCEPT IN PRINCIPLE.

Resolve with comment#698

Response Status W

Proposed Response

C/ 146 SC 146B.1.1.1 Page 49 of 76 8/29/2018 11:28:00 AM

C/ 146 SC 146B.1.2 P 205 L 11 # 132 C/ 147 SC 147.1 Р L 19 # 636 Anslow, Pete Ciena Thompson, Geoff GraCaSI S.A. Comment Type Ε Comment Status D F7 Comment Type ER Comment Status D F7 Missing article, also since this is the first use of the term DME, the full expansion of it The text in Figure 146B-2 does not have a space between a number and its unit in multiple should be moved here from line 49. Also, the IEEE Style Manual says: SuggestedRemedy "Ranges should repeat the unit (e.g., 115 V to 125 V). Dashes should never be used Change text to read: "The Differential Manchester Encoding (DME) based..." and adjust the because they can be misconstrued as subtraction signs." text in line 49 appropriately. SuggestedRemedy Proposed Response Response Status W Change "48V" to "48 V" PROPOSED ACCEPT. Change "14-18 AWG cable." to "14 AWG to 18 AWG cable." Change "24V dcpower" to "24 V dc power" C/ 147 SC 147.1 P 145 L 10 # 676 Change "1000m" to "1000 m" Change "12V" to "12 V" in 2 places Donahue, Curtis **UNH-IOL** Change "200m" to "200 m" in 2 places EΖ Comment Type Ε Comment Status D Proposed Response Response Status W This paragraph is nearly identical to that in 146.1, but with a small change in the last PROPOSED ACCEPT. sentence, suggest making these paragraphs consistent. SuggestedRemedy C/ 147 SC 147 P 164 L 4 # 13 Change "10BASE-T1S PCS and PMA." to "10BASE-T1S PCS, PMA and MDI." Huszak, Gergely Kone Proposed Response Response Status W Comment Type Comment Status D ΕZ Ε PROPOSED ACCEPT. The "value unit +/- tolerance value tolerance unit" format of literals is not harmonized evervwhere C/ 147 SC 147.1 P 145 L 12 # 194 SuggestedRemedy Graber, Steffen Pepperl+Fuchs GmbH Make sure all places the following format (not all parts are always present): Comment Type E Comment Status D ΕZ valueNBSunitNBS+/-NBStolerance valueNBStolerance unit where: [EASY] full/half-duplex - NBS is a non-breaking space SuggestedRemedy - +/- is the single-character version full-/half-duplex Proposed Response Response Status W PROPOSED ACCEPT. Proposed Response Response Status W See also #244

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: Clause, Subclause, page, line

C/ 147 SC 147.1 Page 50 of 76 8/29/2018 11:28:00 AM

### Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Power Delivery over a Sin

C/ 147 SC 147.1 P 145 L 16 # 488 C/ 147 SC 147.1 P 145 L 19 # 375 Jones, Peter Cisco Matheus, Kirsten BMW AG Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Replace "allowing implementers to provide their own cabling" with "allowing implementers is "idle symbols" the right word? to specify their own cabling". SuggestedRemedy SuggestedRemedy I suggest to use "idle time" or "idle period" or "IDLE" Make suggested change Proposed Response Response Status W Response Status W Proposed Response PROPOSED ACCEPT. PROPOSED ACCEPT. Already dealt with by #677 C/ 147 SC 147.1 P 145 L 19 # 677 C/ 147 SC 147.1 P 145 L 19 # 489 UNH-IOI Jones. Peter Cisco Donahue, Curtis Comment Type TR Comment Status D F7 Comment Type Ε Comment Status D F7 no idle symbols, replace "silent during idle symbols making it inherently" with "silent during This paragraph seems to be justifying why there isn't an optional EEE feature specified for idle making it inherently" 10BASE-T1S. While informative to the reader, it is unnecessary. SuggestedRemedy SuggestedRemedy Make suggested change Suggest removing paragraph from line 19 to 20. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. Already dealt with by #677 C/ 147 SC 147.1 P 145 L 19 C/ 147 SC 147.1 P 145 L 24 # 665 # 195 Donahue, Curtis UNH-IOL Graber, Steffen Pepperl+Fuchs GmbH Comment Type E Comment Status D ΕZ Comment Type Comment Status D ΕZ "multi-drop" should be "multidrop" [EASY] . inherently energy efficient and without the need .. SuggestedRemedy SuggestedRemedy Change "multi-drop" to "multidrop" . inherently energy efficient, without the need . (add comma and remove "and") Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. Already dealt with by #677

C/ 147 SC 147.1.1 Р L 26 # 638 C/ 147 SC 147.1.2 Р L 46 Thompson, Geoff GraCaSI S.A. Thompson, Geoff GraCaSI S.A. Comment Type TR Comment Status D F7 Comment Type ER Comment Status D The text and Fig 147-1 do not align to Fig 1-1 of the standard which is intended to Desktop application are an equally valid application area for this proposed standard comprehensively cover 802.3. SuggestedRemedy SuggestedRemedy Add "desktop" to this list of applications in the paragraph you are going to delete. Remove Fig 147-1 and reference Fig 1-1 or duplicate the 10 Mb/s portion of 1.1 here. Alter Proposed Response Response Status W the implementation of 10BASE-T1S to align to the 1.1 model. PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W Already dealt with by #639 PROPOSED REJECT. Ρ C/ 147 SC 147.1.2 L 46 P 145 C/ 147 SC 147.1.1 / 31 # 196 Thompson, Geoff GraCaSI S.A. Graber, Steffen Pepperl+Fuchs GmbH Comment Type ER Comment Status D Comment Type E Comment Status D EΖ Non-normative marketing BS that adds nothing to the technical content of the standard. [EASY] Auto negotiation is not defined for 10BASE-T1S PHY. SuggestedRemedy SuggestedRemedy Delete this paragraph. Auto-Negotiation is not defined for a 10BASE-T1S PHY, (correct Auto-Negotiation and add Proposed Response Response Status W "a" before 10BASE-T1S) PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT. C/ 147 SC 147.1.2 P L 46 # 641 GraCaSI S.A. Thompson, Geoff Comment Type TR Comment Status D ΕZ Out of band signaling is beyond the scope of clause 1.1 and therefore outside the scope of the PAR.

SuggestedRemedy

Proposed Response

Remove "Out of Band Signaling" from the draft

PROPOSED ACCEPT IN PRINCIPLE.

Response Status W

Change "perform out-of-band signaling" to "perform signaling"

# 640

# 639

F7

F7

"The 10BASE-T1S PHY may operate using full-duplex or half-duplex point-to-point communications on a link segment using a single balanced pair of conductors and supporting up to four in-line connectors and up to at least 15 meters with an effective rate of 10 Mb/s in each direction simultaneously." need comma usage fixes.

#### SuggestedRemedy

CHANGE TO: "The 10BASE-T1S PHY may operate using full-duplex or half-duplex point-to-point communications on a link segment using a single balanced pair of conductors, supporting up to four in-line connectors and up to at least 15 meters, with an effective rate of 10 Mb/s in each direction simultaneously."

Proposed Response R

Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Change:

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The 10BASE-T1S PHY may operate using full-duplex or half-duplex point-to-point communications on a link segment using a single balanced pair of conductors and supporting up to four in-line connectors and up to at least 15 meters with an effective rate of 10 Mb/s in each direction simultaneously.

====

to

The 10BASE-T1S PHY may operate using full-duplex or half-duplex point-to-point communications on a link segment using a single balanced pair of conductors, supporting up to four in-line connectors and up to at least 15 meters in reach, with an effective rate of 10 Mb/s in each direction simultaneously.

====

Note: the 2 non-breaking white-spaces

C/ 147 SC 147.1.2 P145 L 37 # 679

Donahue, Curtis UNH-IOL

Comment Type E Comment Status D

EΖ

ΕZ

F7

Clause 147 uses several similar terms to describe the channel the 10BASE-T1S is specificed for. Observed terms are:

#### SuggestedRemedy

Suggest scubbing Clause 147 and making all references to the channel consistent.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Use "single balanced pair of conductors" everywhere

Cl 147 SC 147.1.2 P145 L 38 # 197

Graber, Steffen Pepperl+Fuchs GmbH

Comment Type E Comment Status D

[EASY] . at least 15 meters

SuggestedRemedy

. at least 15 meters cable .

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Already dealt with by #401

Vienckowski, Natalie General Motors

Comment Type E Comment Status D

still have twisted-pair

SuggestedRemedy

Change "single balanced twisted-pair copper cable" to "single balanced pair of conductors".

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Already dealt with by #679

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: Clause, Subclause, page, line

C/ 147 SC 147.1.2 Page 53 of 76 8/29/2018 11:28:00 AM

<sup>&</sup>quot;single balanced pair of conductors" - CL:147.1.2 P:145 L:37

<sup>&</sup>quot;single twisted-pair copped cable" - CL:147.1.2 P:145 L:41

<sup>&</sup>quot;single balanced pair" - CL:147.4.3 P:161 L:20&21

<sup>&</sup>quot;single balanced pair cabling" - CL:147.8 P:167 L:25

P 145 C/ 147 SC 147.1.2 P 145 / 41 # 689 C/ 147 SC 147.1.2 L 46 # 380 Xu, Dayin Rockwell Automation Jones, Chad Cisco Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Should not use "single twisted-pair copper cable" "low cost" should be "low-cost" SuggestedRemedy SuggestedRemedy Change ". using a single twisted-pair copper cable ..." to ". using a single balanced pair of CHANGE TO: "low-cost" conductors." Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Already dealt with by #639 Already dealt with by #679 C/ 147 SC 147.1.2 P 145 L 46 # 490 C/ 147 SC 147.1.2 P 145 / 41 # 198 Jones. Peter Cisco Graber, Steffen Pepperl+Fuchs GmbH Comment Type TR Comment Status D F7 Comment Type E Comment Status D EΖ Many parts of the text missing building automation as an applucation.. Replace "industrial, [EASY] . interconnecting up to at least 8 PHYs, to a trunk up to . automotive and automation controls" with "industrial, automotive and building automation controls". SuggestedRemedy SuggestedRemedy . interconnecting up to at least 8 PHYs to a trunk up to . (remove comma) Make suggested change Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Change: Already dealt with by #639 least 8 PHYs, to a trunk up to at least 25 m. P 145 C/ 147 SC 147.1.2 L 46 # 152 to Lewis, Jon Dell EMC Comment Type E Comment Status D EΖ least 8 PHYs to a trunk up to at least 25 m in reach. Sentence doesn't add value to the specification and provides no new information to the reader. Note: the 2 non-breaking white-spaces SuggestedRemedy C/ 147 SC 147.1.2 P 145 L 42 # 199 Remove the sentence. Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Type E Comment Status D ΕZ PROPOSED ACCEPT. Already dealt with by #639 [EASY] . at the end of stubs up to 10 cm. SuggestedRemedy

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: Clause, Subclause, page, line

. at the end of stubs with a length of up to 10 cm.

Response Status W

Proposed Response

PROPOSED ACCEPT.

C/ 147 SC 147.1.2 Page 54 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.1.2 P 145 L 46 # 200 C/ 147 SC 147.1.2 P 146 L 20 # 440 Graber, Steffen Pepperl+Fuchs GmbH Wienckowski, Natalie General Motors Comment Type Ε Comment Status D F7 Comment Type T Comment Status D F7 Should we talk in any way about "low cost" here? The shaded boxes are supposed to represent PHY sublayers. The MDI is not a PHY SuggestedRemedy SuggestedRemedy If it is ok to do so, keep this paragraph in, otherwise just remove the paragraph. Remove the shading from the MDI box in Figure 147-1. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT IN PRINCIPLE. Already dealt with by #639 TODO: Harmonize 147-1 to 1-1 C/ 147 SC 147.1.2 P 145 L 46 # 678 Note: "Figure 1-1-IEEE 802.3 standard relationship to the ISO/IEC Open Systems Interconnection (OSI) reference model" does have shading (even more extensive and in Donahue, Curtis **UNH-IOL** different style) Comment Type Ε Comment Status D F7 C/ 147 SC 147.2 P 147 L # 714 Not sure what the intent of this paragraph is. Only contains text suggesting markets that a 10BASE-T1S PHY can be applied. Kabra, Lokesh Synopsys Inc SuggestedRemedy Comment Type E Comment Status D F7 Suggest removing paragraph from line 46 to 47. CRS & COL signals missing in Figure 147-2 Proposed Response Response Status W SugaestedRemedy PROPOSED ACCEPT. Add CRS, COL signals towards MII in Fig 147-2 Already dealt with by #639 Proposed Response Response Status W C/ 147 SC 147.1.2 P 146 L 2 # 201 PROPOSED ACCEPT. Graber, Steffen Pepperl+Fuchs GmbH C/ 147 SC 147.2 P 147 L 4 # 202 Comment Type E Comment Status D ΕZ Graber, Steffen Pepperl+Fuchs GmbH [EASY] . are contained in the PCS . Comment Type T Comment Status D ΕZ SuggestedRemedy COL and CRS signals are missing in Figure 147-2. . are contained within the PCS . SuggestedRemedy Proposed Response Response Status W Please add signals COL and CRS leading from the PCS to the MII. PROPOSED ACCEPT. Proposed Response Response Status W PROPOSED ACCEPT.

# 643

# 205

EΖ

F7

C/ 147 SC 147.2 P 147 14 # 203 C/ 147 SC 147.3.1 Р L 3 Graber, Steffen Pepperl+Fuchs GmbH Thompson, Geoff GraCaSI S.A. Comment Type Т Comment Status D F7 Comment Type TR Comment Status D BI DA+/BI DA- signal is missing in Figure 147-2 It is not clear from the description whether "PCS Reset" produces a level or a pulse on its output. i.e. does it take a !PCS Reset to complete the reset and release the device for SuggestedRemedy operation. Please add bidirectional differential signal BI DA+/BI DA- between PMA and MDI. SuggestedRemedy Proposed Response Response Status W Clarify PROPOSED ACCEPT IN PRINCIPI F. Proposed Response Response Status W Already dealt with by #376 PROPOSED ACCEPT IN PRINCIPLE. C/ 147 SC 147.2 P 147 L 6 # 376 WORK WITH PIER ON THIS Change this: Matheus, Kirsten BMW AG ==== Comment Type ER Comment Status D F7 PCS reset initializes all PCS functions. The PCS Reset function shall be executed whenever one of the following conditions occur: The MDIO arrow in the picture is missing an arrow head in the other direction. The output a) Power on (see 36.2.5.1.3). from the PMA is missing. I am not sure, but should not be the COL and CRS be added? B) The receipt of a request for reset from the management entity. SuggestedRemedy PCS Reset shall set pcs reset = ON while any of the above reset conditions holds true. All MDIO arrow heads in both directions. Add BI DA+ and BI DA- to the PMA. Potentially state diagrams take the open-ended pcs reset branch upon execution of PCS Reset. The dashed COL and CRS from PCS. reference diagrams do not explicitly show the PCS Reset function. Proposed Response Response Status W to this: PROPOSED ACCEPT IN PRINCIPLE. TODO: PCS reset initializes all PCS functions. The PCS Reset function shall be executed - Add bidi MDIO arrows to both 147-2 and 147-3 whenever any of the following conditions occur: - Add BI DA+ and BI DA- (steal from 147-10) a) Power on causes power on = TRUE (see 36.2.5.1.3) while pcs reset = OFF. - Add dashed COL, CRS and PCS B) The receipt of a request for reset from the management entity (see 3.2291.15 in 45.2.3.58e.1), independently from the current state of pcs reset. SC 147.2 P 147 # 690 C/ 147 L 33 All state diagrams take the open-ended pcs reset branch upon execution of PCS Reset. Xu. Davin Rockwell Automation PCS Reset shall keep pcs reset = ON until the complete execution of the PCS Reset function, after which it is set to pcs reset = OFF. The reference diagrams do not explicitly Comment Type T Comment Status D EΖ show the PCS Reset function. Lack of COL and CRS signals on MII interface side in the figure 147-2 \_\_\_\_ SuggestedRemedy C/ 147 SC 147.3.1 P148 / 14 Add COL and CRS signals into the MII interface in Figure 147-2 Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Type Comment Status D Ε PROPOSED ACCEPT. [EASY] Connection dots in Figure 147-3 are missing. SuggestedRemedy Please add signal nets connection dots to Figure 147-3. Proposed Response Response Status W

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/ 147 Page 56 of 76 COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SC 147.3.1 8/29/2018 11:28:00 AM SORT ORDER: Clause, Subclause, page, line

PROPOSED ACCEPT.

C/ 147 SC 147.3.2 P 152 L 34 # 693 C/ 147 SC 147.3.2.1 P 149 / 14 # 206 Xu, Dayin Rockwell Automation Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Better to move "tx sym <= SSD" before "err <= err + pcs txer" to make the sequence [EASY] replaces consistent with other status (e.g. SILENT and SYNC1) SuggestedRemedy SuggestedRemedy replace (plural) move "tx sym <= SSD" before "err <= err + pcs txer" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. Cl 147 P 149 SC 147.3.2.1 L 21 # 207 C/ 147 SC 147.3.2.1 P 149 L 13 # 691 Graber, Steffen Pepperl+Fuchs GmbH Xu. Davin Rockwell Automation Comment Type E Comment Status D EΖ EΖ Comment Type Ε Comment Status D [EASY] The 10BASE-T1S Delete "a group of" SuggestedRemedy SuggestedRemedy The 10BASE-T1S PHY. Change ". passes a group of two SYNC ." to ". passes two SYNC ..." Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 147 SC 147.3.2.2 P 149 L 48 # 692 C/ 147 SC 147.3.2.1 P 149 L 14 # 403 Xu, Davin Rockwell Automation Jones, Chad Cisco Comment Type T Comment Status D ΕZ Comment Status D ΕZ Comment Type E Use "TRUE or FALSE" or "ON or OFF"? pcs txen on line 30 use "TRUE or FALSE" but "followed by two SSD symbols which replaces the first 16 bits of the packet preamble" here use "ON or OFF". It seems not consistent. symbols replace the first. SuggestedRemedy SuggestedRemedy Task Fore needs to discuss to determine when to use "TRUE or FALSE" and when to use CHANGE TO: "followed by two SSD symbols which replace the first 16 bits of the packet "ON or OFF". The change should be made based on the outcome of the discussion. preamble" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED REJECT. Change the definition of all references (also in figures) to pcs reset and plca en to use Already dealt with by #206 "TRUE or FALSE" instead of "ON or OFF" Notes: - In figures shortening from "signal = TRUE" to "pcs reset", and "pcs reset = FALSE" to "!pcs\_reset" not only works but preferred (note; pcs\_reset is just an example of a signal that now becomes "TRUE or FALSE") - Clauses 146 and 148 are also affected

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: Clause, Subclause, page, line

C/ **147** SC **147.3.2.2**  Page 57 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.3.2.2 P149 L 54 # 208	Cl 147 SC 147.3.2.3 P151 L3 # 14
Graber, Steffen Pepperl+Fuchs GmbH	Huszak, Gergely Kone
Comment Type E Comment Status D EZ  [EASY] Commas at end of lines [54 and next page 1] are missing.	Comment Type E Comment Status D EZ  Table format is not harmonized with the rest of the clause
SuggestedRemedy Add 2 x a comma after "asserted".	SuggestedRemedy Put em-dash to 16 places to under "Special function" for 0-F
Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE.	Proposed Response Response Status <b>W</b> PROPOSED ACCEPT.
<ul> <li>Add a period (dot) after "when a BEACON request is asserted", making it "when a BEACON request is asserted."</li> <li>Add a period (dot) after "COMMIT request is asserted", making it "COMMIT request is asserted."</li> </ul>	Cl 147 SC 147.3.2.5 P153 L 50 # 112 Anslow, Pete Ciena
CI 147 SC 147.3.2.2 P150 L11 # 209 Graber, Steffen Pepperl+Fuchs GmbH	Comment Type E Comment Status D EZ  Spurious extra "figure" in "shift register is shown in figure Figure 147-6"
Comment Type E Comment Status D EZ  [EASY] When this variable is set to TRUE it indicates .	SuggestedRemedy  Delete "figure"
SuggestedRemedy When this variable is set to TRUE, it indicates . (comma is missing).	Proposed Response Response Status <b>W</b> PROPOSED ACCEPT.
Proposed Response Response Status W PROPOSED ACCEPT.	Cl 147 SC 147.3.2.5 P153 L 50 # 210  Graber, Steffen Pepperl+Fuchs GmbH
Cl 147 SC 147.3.2.3 P151 L1 # 330  Yseboodt, Lennart Signify	Comment Type E Comment Status D EZ  [EASY] . of self-synchronizing scrambler by linear-feedback shift register
Comment Type E Comment Status D EZ  In Table 147-1 there are a number of empty cells. Empty table shalls should be notes as intentionally empty with an em-dash.  SuggestedRemedy	SuggestedRemedy . of a self-synchronizing scrambler by a linear-feedback shift register . (add 2 x "a").  Proposed Response Response Status W  PROPOSED ACCEPT.
Add em-dash to the empty cells.  Proposed Response Response Status W	C/ 147
PROPOSED ACCEPT. Already dealt with by #14	Comment Type E Comment Status D EZ  [EASY] At every MII clock cycle, for each bit of TXD[3:0] the scrambler .
	SuggestedRemedy  At each MII clock cycle, for each bit of TXD[3:0], the scrambler . (replace every by each and add a comma)
	Proposed Response Response Status <b>W</b> 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 C/ 147 SORT ORDER: Clause, Subclause, page, line

SC 147.3.2.5

Page 58 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.3.3.1 P 154 / 21 # 694 C/ 147 SC 147.3.3.1 P 154 / 28 # 212 Xu, Dayin Rockwell Automation Graber, Steffen Pepperl+Fuchs GmbH Comment Type E Comment Status D F7 Comment Type E Comment Status D F7 It is a little strange to have this note here because it does not specify anything actually. [EASY] Transmit functions SuggestedRemedy SuggestedRemedy Delete the note. Transmit function (there is only one function) Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT PROPOSED ACCEPT IN PRINCIPLE. SC 147.3.3.1 Cl 147 P 154 C/ 147 P 154 L 21 # 15 SC 147.3.3.1 L 40 # 213 Huszak, Gergely Kone Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D EΖ Comment Type E Comment Status D EΖ Text of text "Note:" does not harmonize with the rest of the clauses [EASY] . ESDOK and ESDERR see 147.3.2.2. SuggestedRemedy SugaestedRemedy Remove bold attribute from "Note:" . ESDOK, and ESDERR see 147.3.2.2. (add comma after ESDOK). Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED REJECT. Already dealt with by #694 C/ 147 SC 147.3.3.2 P 154 L 47 # 214 C/ 147 SC 147.3.3.1 P 154 # 405 L 21 Graber, Steffen Pepperl+Fuchs GmbH Jones, Chad Cisco ΕZ Comment Type E Comment Status D Comment Type Ε Comment Status D ΕZ [EASY] When it is set to TRUE it indicates . missing word: "can still be detected by the PMA exploiting the absence of DME activity on SuggestedRemedy the line." BY exploiting the absence? When it it set to TRUE, it indicates . (add comma). SuggestedRemedy CHANGE TO: "can still be detected by the PMA by exploiting the absence of DME activity Proposed Response Response Status W on the line." PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W P 154 C/ 147 SC 147.3.3.2 L 53 # 215 PROPOSED ACCEPT IN PRINCIPLE. Graber, Steffen Pepperl+Fuchs GmbH Already dealt with by #694 Comment Type E Comment Status D EΖ [EASY] This variable is set after bit 8 in MDIO register 0 defined in Table 22-7. SuggestedRemedy If MDIO is being implemented, this variable is set according to bit 8 in MDIO register 0, defined in Table 22-7. Proposed Response Response Status W

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/ 147 Page 59 of 76 COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Clause, Subclause, page, line RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SC 147.3.3.2 8/29/2018 11:28:00 AM

PROPOSED ACCEPT.

## Management Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Parameters for 10 Mb/s Operation and Associated Power Delivery over a Single Balanced Power Delivery over a Sin

C/ 147 SC 147.3.3.2 P 155 L 12 # 216 C/ 147 SC 147.3.3.5 P 155 L 37 # 219 Graber, Steffen Pepperl+Fuchs GmbH Graber, Steffen Pepperl+Fuchs GmbH Comment Status D Comment Type E Comment Status D F7 Comment Type E F7 [EASY] Received 5b symbol. [EASY] exclusive OR SuggestedRemedy SuggestedRemedy Received 5B symbol. (B should be capital). exclusive-OR (to be aligned with the description in chapter 147.3.2.5). Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT IN PRINCIPLE. - Change all occurrences of "exclusive OR" to "exclusive-OR" P 155 - Inform other editors, if other clauses are affected C/ 147 SC 147.3.3.2 L 19 # 217 Graber, Steffen Pepperl+Fuchs GmbH C/ 147 SC 147.3.3.5 P 156 L 1 # 220 Comment Type E Comment Status D EΖ Graber, Steffen Pepperl+Fuchs GmbH [EASY] PCS Receive process Comment Type Comment Status D ΕZ SuggestedRemedy In Figures 147-8 and 147-9 the pcs rxd vector is net set into quotation marks (as in clause PCS receive function (which is the terminology in the rest of the document). SuggestedRemedy Proposed Response Response Status W Set the 4-bit binary vectors in quotation marks or remove the quotation marks in Clause PROPOSED ACCEPT IN PRINCIPLE. 146 - 155/19: Change "PCS Receive process" to "PCS Receive Function" - 111/6: If accepted, inform Steffen about it Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. C/ 147 SC 147.3.3.2 P 155 L 27 # 218 TODO: remove the quotation marks on binary numbers/vectors Graber, Steffen Pepperl+Fuchs GmbH Note: clauses 146 and 148 may also be affected Comment Type E Comment Status D EΖ C/ 147 SC 147.3.3.5 P 156 L 21 # 525 [EASY] Dot is missing at end of line. Beruto, Piergiorgio Canova Tech Srl SuggestedRemedy F7 Comment Type E Comment Status D Add "." after . PCS RX clock. In figure 147-8 the state named "SYNC" could be renamed to "SYNCING" for Proposed Response Response Status W disambiguation with "SYNC" symbol. PROPOSED ACCEPT. SugaestedRemedy In figure 147-8 rename "SYNC" state to "SYNCING". Proposed Response Response Status W PROPOSED ACCEPT.

C/ 147 SC 147.3.3.5 P 156 L 21 # 519 C/ 147 SC 147.3.5 P 158 L 17 # 223 Beruto, Piergiorgio Canova Tech Srl Graber, Steffen Pepperl+Fuchs GmbH Comment Type E Comment Status D F7 Comment Type E Comment Status D F7 Recirculating arc in WAIT SSD state of figure 147-8 is not needed [EASY] . in the symbol sequence. SuggestedRemedy SuggestedRemedy In figure 147-8 delete the recirculating arc along with the ELSE condition. . within the symbol sequence. Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. P 156 Cl 147 C/ 147 SC 147.3.3.5 L 30 # 221 SC 147.3.6 P 158 L 23 # 135 Graber, Steffen Pepperl+Fuchs GmbH Anslow, Pete Ciena Comment Type Ε Comment Status D EΖ Comment Type E Comment Status D F7 [EASY] RSCD \* precnt != 9 22.2.2.11 and 22.2.2.12 are included in the draft, so references to them should be crossreferences. SuggestedRemedy SuggestedRemedy For better reading the condition should not be divided by the arrow line. Change "22.2.2.11" to be a cross-reference in: Proposed Response Response Status W 147.3.6 (page 158, line 23) PROPOSED ACCEPT IN PRINCIPLE. 148.4.5.1 (page 180, line 36) Stretch the bottom part of the arrow downwards and out both lines of the text above the Change "22.2.2.12" to be a cross-reference in: 148.4.5.1 (page 180, line 36) arrow's bottom Proposed Response Response Status W SC 147.3.3.5 P 157 C/ 147 L 20 # 222 PROPOSED ACCEPT. Graber, Steffen Pepperl+Fuchs GmbH Comment Type E Comment Status D EΖ P 159 C/ 147 SC 147.3.7 L 3 # 224 [EASY] Font style of 0000 (left side) does not fit rest of document. Graber, Steffen Pepperl+Fuchs GmbH SuggestedRemedy ΕZ Comment Type Ε Comment Status D Change font style according to document style rules. [EASY] When PLCA. Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. If PLCA . (on page 159 there are several "when" conditions, likely they need to be converted to "if" conditions, as there is no timely reference, but it is meant to be conditional). Proposed Response Response Status W PROPOSED REJECT.

C/ 147 SC 147.3.7.1 P 159 L 12 # 225 C/ 147 SC 147.4 P 159 L 35 # 228 Graber, Steffen Pepperl+Fuchs GmbH Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D F7 Comment Type Т Comment Status D F7 [EASY] . than a 'N' code. PMA UNITDATA.indication (rx sym) and PMA UNITDATA.request (tx sym) seem to be SuggestedRemedy SuggestedRemedy . than an 'N' code. ('an' instead of 'a'). Please move PMA UNITDATA.request (tx sym) to PMA Transmit block and Proposed Response Response Status W PMA UNITDATA indication (rx sym) to PMA Receive block (direction of arrows is already PROPOSED ACCEPT ok and needs no change, only the text) Proposed Response Response Status W SC 147.3.7.2 P 159 C/ 147 L 19 # 226 PROPOSED ACCEPT. Graber, Steffen Pepperl+Fuchs GmbH P 159 # 229 C/ 147 SC 147.4 L 35 Comment Type Ε Comment Status D F7 Graber, Steffen Pepperl+Fuchs GmbH [EASY] . the MII signals RX\_DV, RX\_ER and RXD shall . Comment Type E Comment Status D ΕZ SuggestedRemedy [EASY] Arrow from PMA transmit to BI\_DA+/- is missing. . the MII signals RX\_DV, RX\_ER, and RXD<3:0> shall . (add comma and <3:0>) SuggestedRemedy Proposed Response Response Status W Add an arrow in line 35 from PMA Transmit to BI DA+/-. PROPOSED ACCEPT. Proposed Response Response Status W C/ 147 SC 147.4 L 2 # 651 PROPOSED ACCEPT. Thompson, Geoff GraCaSI S.A. C/ 147 ΕZ SC 147.4.2 Ρ L 17 # 652 Comment Type ER Comment Status D GraCaSI S.A. Thompson, Geoff The PHY doesn't provide "both" half-duplex and full duplex communication. SuggestedRemedy Comment Type ER Comment Status D F7 There is no obvious antecedent for the word "these". Additionally this entire sentence Change "both" to "either" seems badly out of place. Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. Move the sentence to wherever the output waveform is spec'd in terms of voltage. 147.5.4.1 doesn't seem to fit so the answer is not obvious to me. P 159 C/ 147 SC 147.4 L 34 # 227 Proposed Response Response Status W Graber, Steffen Pepperl+Fuchs GmbH PROPOSED ACCEPT IN PRINCIPLE. Comment Type E Comment Status D EΖ Remove the single paragraph at 160/17-19 [EASY] Font style of Figure 147-10 does not match rest of the document. SuggestedRemedy Please change font style of Figure 147-10 to match other drawings.

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: Clause, Subclause, page, line

Proposed Response

PROPOSED ACCEPT.

Response Status W

C/ 147 SC 147.4.2 Page 62 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.4.2 Huszak, Gergely	<i>P</i> <b>160</b> Kone	L <b>47</b>	# 12		Cl 147 SC 147.4.2 Graber, Steffen	P 161 Pepperl+Fuchs	L <b>15</b> GmbH	# 233	
	Comment Status <b>D</b> ble 147-2-DME Timings" are dance limit parameters")	off (do not harm	nonize with those	EZ	Comment Type E  [EASY] . until next bit.  SuggestedRemedy	Comment Status D			ΕZ
SuggestedRemedy					. until the next bit (add	"the").			
Make the following cha - "" (first column) to "Pa - "Parameters" to "Deso - "Min" to "Minimum val	arameter name" cription"				Proposed Response PROPOSED ACCEPT	Response Status <b>W</b>			
- "Typ" to "Nominal valu - "Max" to "Maximum va - "Units" to "Unit of mea	ue" alue"				Cl 147 SC 147.4.3 Graber, Steffen	P 161 Pepperl+Fuchs	L <b>24</b> GmbH	# 234	
Proposed Response PROPOSED ACCEPT.	Response Status W				Comment Type <b>E</b> [EASY] The PMA recei	Comment Status <b>D</b> ive function .			EZ
C/ 147 SC 147.4.2 Graber, Steffen	P 161 Pepperl+Fuch	L 5	# 231		SuggestedRemedy The PMA Receive fund	ction . (capital "R").			
Comment Type <b>E</b> [EASY] comma before	Comment Status D	io Ombri		EZ	Proposed Response PROPOSED ACCEPT	Response Status <b>W</b>			
SuggestedRemedy Add a comma before "i	Ç				Cl <b>147</b> SC <b>147.4.3</b> Graber, Steffen	P 161 Pepperl+Fuchs	<i>L</i> <b>25</b> GmbH	# 235	
Proposed Response PROPOSED ACCEPT.	Response Status W				Comment Type <b>E</b> [EASY] . the PMA Rec	Comment Status <b>D</b> eive .			EZ
C/ 147 SC 147.4.2	P 161	L 14	# 232		SuggestedRemedy . the PMA Receive fun-	ction .			
Graber, Steffen	Pepperl+Fuch	ns GmbH			Proposed Response	Response Status W			
Comment Type <b>E</b> [EASY] comma before	Comment Status <b>D</b> if is missing.			EZ	PROPOSED ACCEPT				
SuggestedRemedy									

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: Clause, Subclause, page, line

Add a comma before "if".

PROPOSED ACCEPT.

Response Status W

Proposed Response

C/ 147 SC 147.4.3 Page 63 of 76 8/29/2018 11:28:00 AM

F7

F7

CI 147 SC 147.4.4 P L 30 # 655
Thompson, Geoff GraCaSI S.A.

Comment Type TR Comment Status D

What is this clause? Is it normative or informative? If it is informative then it is not needed. If it is normative then it actually needs to include actual specifications

SuggestedRemedy

Fix.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Remove "147.4.4 PMA Clock recovery" and its contant (effectively 161/28-32)

Cl 147 SC 147.5.1.2 P 162 L 4 # 407

Jones, Chad Cisco

Comment Type TR Comment Status D

another inappropriate instance of customer and supplier: "and may need to comply with more stringent requirements as agreed upon between customer and supplier."

SuggestedRemedy

CHANGE TO: "and may need to comply with more stringent requirements ."

Proposed Response Response Status W PROPOSED ACCEPT.

C/ 147 SC 147.5.3 P162 L 36 # 681

Donahue, Curtis UNH-IOL

Comment Type E Comment Status D

This is the Test Fixture subclause but has no mention of the two test fixture figures defined in this Clause.

SuggestedRemedy

Suggest the following changes:

- 1. modifying the text in the first paragraph to be similar to that in "55.5.2.1 Test Fixtures".
- 2. Move Figure 147-12 and 147-14 to subclause 147.5.3.
- 3. Rename Figure 147-12 to "Transmitter test fixture 1 for transmitter voltage, transmitter droop, and transmitter timing jitter".
- 4. Rename Figure 147-14 to "Transmitter test fixture 2 for power spectral density measurement".

Proposed Response Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

TODO

1. Add the following text above the first paragraph in 147.5.3:

===

The following fixtures (illustrated by Figure 147-12, and Figure 147-14), or their functional equivalents, can be used for measuring the transmitter specifications described in 147.5.4.

- 2. Move Figure 147-12 and 147-14 to subclause 147.5.3.
- 3. Rename "Figure 147-12-Test fixture" to "Figure 147-12-Transmitter test fixture 1 for transmitter voltage, transmitter droop, and transmitter timing jitter"
- 4. Rename "Figure 147-14-Transmitter test fixture 2 for PSD mask" to "Figure 147-13-Transmitter test fixture 2 for power spectral density measurement"

Note: verify renumbering 147-14->147-13, which should happen because of point 2 Note: clause 146 also affected F7

C/ 147 SC 147.5.4.1 Р L 3 # 654 C/ 147 SC 147.5.4.1 P 163 L 8 # 620 Thompson, Geoff GraCaSI S.A. Brandt, David Rockwell Automation Comment Type ER Comment Status D F7 Comment Type Т Comment Status D F7 This clause should actually start with the content claimed in the title, not the test for it. Figure does not show different impedances for link segment and mixing segment Further, the tests for that spec (rest of this para plus next cl./droop should be subordinate SuggestedRemedy to this clause. Replace: SuggestedRemedy 100 O + 0.1 % Move 1st sentence & figure to new subordinate clause. Make 147.5.4.2 also a subordinate clause. With: Transmitter Load Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. TODO: PROPOSED ACCEPT. - "147.5.4.1 Transmitter output voltage" will have only "The transmitter output voltage shall be 1 V ± 20 % peak-to-peak differential." C/ 147 SC 147.5.4.1 P 163 L 23 # 331 - The new chapter "147.5.4.1.1 Transmitter tests" having "Transmitter output voltage shall Yseboodt, Lennart Signify be tested using test mode 1 in combination with the test fixture shown in Figure 147-12." and "Figure 147-12-Test fixture" EΖ Comment Type E Comment Status D - Change "147.5.4.2 Transmitter output droop" to "147.5.4.1.2 Transmitter output droop" The title of Figure 147-12 is "Test fixture". That isn't very descriptive / specific... C/ 147 SC 147.5.4.1 P 163 L 6 # 16 SuggestedRemedy Huszak, Gergely Kone Change to "Transmitter output voltage test fixture" Comment Status D ΕZ Comment Type E Proposed Response Response Status W Fonts and alignments in the figure are off PROPOSED ACCEPT IN PRINCIPLE. SuggestedRemedy Already dealt with by #681 Make the fonts same within this figure and other figures in the clause, and fix text C/ 147 SC 147.5.4.3 P 164 # 238 alignments L 7 Pepperl+Fuchs GmbH Graber, Steffen Proposed Response Response Status W PROPOSED ACCEPT. ΕZ Comment Type Comment Status D [EASY] Figure 147-14 belongs to Clause 147.5.4.4. C/ 147 SC 147.5.4.1 P 163 L 6 # 11 SuggestedRemedy Huszak, Gergely Kone Move Figure 147-14 into Clause 147.5.4.4. Comment Type Comment Status D ΕZ Ε Proposed Response Response Status W Resistor is off PROPOSED ACCEPT IN PRINCIPLE. SuggestedRemedy It may already be there and we discussed to let Frame decide location of figures, even if it Make it a polygon is a bit off sometimes (also given the fact that the references are OK) 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: Clause, Subclause, page, line

PROPOSED ACCEPT.

C/ 147 SC 147.5.4.3 Page 65 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.5.4.3 P 164 / 10 # 621 C/ 147 SC 147.5.4.4 P 164 L 21 # 113 Brandt, David Rockwell Automation Anslow, Pete Ciena Comment Type Т Comment Status D F7 Comment Type E Comment Status D F7 Figure does not show different impedances for link segment and mixing segment This says: "The measured PSD shall be between the upper and lower bounds specified in the table below." SuggestedRemedy There is no table below (and anyway the table should be specifically cross-referenced). Replace: SuggestedRemedy 100 O Change to: "The measured PSD shall be between the upper and lower bounds specified in With: 147.5.4.4.1 and 147.5.4.4.2, respectively." 50 O (multidrop mode) or 100 O Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. P 165 C/ 147 SC 147.5.4.6 L 36 # 623 # 332 C/ 147 SC 147.5.4.3 P 164 L 13 Brandt, David Rockwell Automation Yseboodt, Lennart Signify Comment Type T Comment Status D ΕZ EΖ Comment Type E Comment Status D Test setup is not specific enough for repeatability The title of Figure 147-14 is "Transmitter test fixture 2 for PSD mask". SuggestedRemedy Replace: I can't seem to find the first test fixture. Link Segment SuggestedRemedy Change to "Transmitter test fixture for PSD mask" With: 25 m Link Segment Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. Change "Link Segment" to "Link or Mixing Segment" C/ 147 SC 147.5.4.4 P 164 / 13 # 695 Xu, Dayin Rockwell Automation C/ 147 SC 147.5.4.6 P 165 / 40 # 153 Comment Status D EΖ Comment Type Lewis, Jon Dell EMC The Figure 147-14 should not appear before the text. Comment Type E Comment Status D F7 SuggestedRemedy Resistor isn't aligned properly Move the Figure 147-14 after line 20 page 164 SuggestedRemedy Proposed Response Response Status W Align resistor(s) properly with the connection lines in the drawing. PROPOSED ACCEPT IN PRINCIPLE. Proposed Response Response Status W Already dealt with by #238 PROPOSED ACCEPT IN PRINCIPLE. Note: use polygon

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: Clause, Subclause, page, line

C/ 147 SC 147.5.4.6 Page 66 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.5.4.6 P 165 / 48 # 241 C/ 147 SC 147.5.4.6 P166 L 5 # 408 Graber, Steffen Pepperl+Fuchs GmbH Jones, Chad Cisco Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 Headline PMA Local Loopback (and assigned chapter number) are missing. "When the PHY is in the PMA local loopback mode, if the PHY supports full-duplex mode of operation, the PMA Receive function utilizes the echo signals from the unterminated SuggestedRemedy MDI and decodes these signals to pass the data back to the MII Receive interface. Add a new headline "PMA Local Loopback" and asign an appropriate chapter number (it If the PHY supports half-duplex mode of operation, the PMA and PCS Receive functions may be reasonable to move this chapter after chapter 147.5.4.7). shall pass to the MII RX the data decoded from the signal which is normally received during a transmission for the purpose of detecting collisions." Proposed Response Response Status W seems the second paragraph also needs the "When the PHY is in the PMA local loopback PROPOSED ACCEPT IN PRINCIPLE. mode" TODO: SuggestedRemedy - Create "147.5.4.8 PMA Local Loopback" - Move 4 paragraphs (165/48-166/10) to under that Either: Add "When the PHY is in the PMA local loopback mode." to the front of the paragraph at C/ 147 SC 147.5.4.6 P 165 L 48 # 624 line 5. Brandt, David Rockwell Automation or: delete line feed at line 5, adding the sentence at line 5 to the paragraph at line 1. Comment Type Comment Status D ΕZ Ε Proposed Response Response Status W Topic is changed without new section header PROPOSED ACCEPT IN PRINCIPLE. SuggestedRemedy Already dealt with by #241 Insert header and renumber: C/ 147 SC 147.6 P 166 L 19 # 243 147.5.4.7 PMA local loopback mode Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Type EΖ Ε Comment Status D PROPOSED ACCEPT IN PRINCIPLE. See also #241, #696 and #408 and put "Already dealt with by" here [EASY] 10BASE-T1S C/ 147 SC 147.5.4.6 P 165 L 48 # 696 SuggestedRemedy A 10BASE-T1S PHY Xu. Davin Rockwell Automation F7 Proposed Response Response Status W Comment Type Ε Comment Status D PROPOSED ACCEPT IN PRINCIPLE. The paragraphes (Line 48-51 on page 165 and line 1-10 on page 166) does not belong to this sub-clause (147.5.4.6) C/ 147 SC 147.7 P 166 L 27 # 493 SuggestedRemedy Jones, Peter Cisco The paragraphes (Line 48-51 on page 165 and line 1-10 on page 166) should be moved before 147.5 PMA electrical specifications as a new sub-clause 147.4.5 PMA Loopback ΕZ Comment Type TR Comment Status D Change "such as industrial, automotive and automation controls" to "such as industrial, Proposed Response Response Status W automotive and building automation controls" PROPOSED ACCEPT IN PRINCIPLE. Already dealt with by #241 SuggestedRemedy Make suggested change Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Already dealt with by #639

TYPE: TR/technical required ER/editorial required GR/general required T/technical E/editorial G/general C/C 147 Page 67 of 76 COMMENT STATUS: D/dispatched A/accepted R/rejected RESPONSE STATUS: O/open W/written C/closed U/unsatisfied Z/withdrawn SORT ORDER: Clause, Subclause, page, line Page 67 of 76 8/29/2018 11:28:00 AM

C/ 147 SC 147.7.2 P 166 L 48 # 245 C/ 147 SC 147.7.3 P 167 L 16 # 246 Graber, Steffen Pepperl+Fuchs GmbH Graber, Steffen Pepperl+Fuchs GmbH Comment Type Т Comment Status D F7 Comment Type Т Comment Status D F7 The text defines 0.1 MHz to 20 MHz, the equation specifies 0.3 MHz to 40 MHz. Mode Conversion is specified for up to 200 MHz, while the frequency limits in line 20 are 0.3 to 40 MHz. Needs to be adjusted. SuggestedRemedy SuggestedRemedy As for 10BASE-T1S most parameters are specified from 0.3 MHz to 40 MHz, the text Likely the 200 MHz are a copying error and need to be set to 40 MHz. needs to be adapted to 0.3 MHz to 40 MHz. Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT. PROPOSED ACCEPT. C/ 147 SC 147.7.2 P 166 L 48 # 244 C/ 147 SC 147.8 P 167 L 24 # 247 Pepperl+Fuchs GmbH Graber, Steffen Pepperl+Fuchs GmbH Graber, Steffen EΖ Comment Type Ε Comment Status D EΖ Comment Type Ε Comment Status D 20 (line break) MHz [EASY], that meet the requirements. SuggestedRemedy SugaestedRemedy 20 MHz (add a non breakable space between 20 and MHz). . that meets the requirements . (add "s") Proposed Response Proposed Response Response Status W Response Status W PROPOSED ACCEPT. PROPOSED REJECT. Media is the plural of medium, thus the plural form of the verb. Already dealt with by #13 C/ 147 SC 147.7.2 P 166 L 49 # 562 C/ 147 SC 147.8 P 167 L 28 # 494 DiBiaso, Eric TE Connectivity Jones, Peter Cisco Comment Status D ΕZ Comment Type TR Comment Status D ΕZ Comment Type ER The text ".... using Equation (147-4) at all frequencies from 0.1 MHz to 20 MHz." Change "A mixing segment is specified based on automotive cabling" to "A mixing segment is specified based on cabling". The frequency limits do not align with equation 147-4 which is 0.3 MHz to 40 MHz. SuggestedRemedy SuggestedRemedy Make suggested change Replace text with the following to align with equation 147-4. Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. ".... using Equation (147-4) at all frequencies from 0.3 MHz to 40 MHz." Change "A mixing segment is specified based on automotive cabling supporting up to at Proposed Response Response Status W least eight nodes and 25 m of PROPOSED ACCEPT. cabling." to "A mixing segment is specified based on cabling that supports up to at least 8 Already dealt with by #245 nodes and 25 m in reach." Note: Handle with #414

C/ 147 SC 147.8 P 167 L 28 # 414 C/ 147 SC 147.8.1 P 168 / 1 # 250 Jones, Chad Cisco Graber, Steffen Pepperl+Fuchs GmbH Comment Type TR Comment Status D F7 Comment Type E Comment Status D F7 "A mixing segment is specified based on automotive cabling supporting up to at least eight Ordering of Return Loss and Insertion loss is different to Clause 147.7.1 and 147.7.2. nodes and 25 m of cabling." this sentence implies that only automotive cabling is allowed. SugaestedRemedy discussed this with the Chair, he informs that the mixing channel was DERIVED based Reverse ordering of Clauses 147.8.1 and 147.8.2 to be aligned with the previous Clause upon automotive cabling. Therefore, it is much more accurate to say that. Also, let people know you can do more if you meet the cabling requirements. orderina. Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. CHANGE TO: "The mixing segment specification is derived from automotive cabling supporting up to at least eight nodes and 25 m of cabling. Larger PHY count and reach may be achieved provided the mixing segment specifications in this subclause are met." C/ 147 SC 147.8.2 P 168 L 10 # 688 UNH-IOI Donahue, Curtis Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. Comment Type Comment Status D F7 First sentence of the paragraph has already been dealt with by #494, so the following is The "and" in "MDI attachment and at the end of stubs of length up to 10 cm" seems to be a proposed here: "A mixing segment is specified based on cabling that supports up to at typo. least 8 nodes and 25 m in reach. Larger PHY count and/or reach may be achieved SuggestedRemedy provided the mixing segment specifications in this subclause are met." Remove the "and" so the section of text reads as "MDI attachment at the end of stubs of C/ 147 SC 147.8 P 167 L 28 # 248 length up to 10 cm" Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Status D ΕZ Comment Type E PROPOSED ACCEPT. [EASY] . based on automotive cabling supporting up to at least . C/ 147 SC 147.9 P 168 L 24 # 251 SuggestedRemedy Graber, Steffen Pepperl+Fuchs GmbH based on automotive cabling, supporting up to at least, (add comma) Comment Type T Comment Status D ΕZ Proposed Response Response Status W The MDI interface connector definition is still requiring shieldid connections. PROPOSED ACCEPT. SuggestedRemedy C/ 147 SC 147.8 P 167 / 29 # 249 Likely a 2 pin connector (BI DA+ and BI DA-) needs to be defined and all references to the shield need to be removed from the text. Graber, Steffen Pepperl+Fuchs GmbH Proposed Response Response Status W Comment Status D EΖ Comment Type E PROPOSED REJECT. [EASY] . and reference points is shown . The text 147.9.1 does not require a shielded cable. SuggestedRemedy

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: Clause, Subclause, page, line

. and reference points are shown . (plural)

Response Status W

Proposed Response

PROPOSED ACCEPT.

C/ 147 SC 147.9 Page 69 of 76 8/29/2018 11:28:00 AM

Cl 147 SC 147.9.2 Jones, Chad	<i>P</i> <b>168</b> Cisco	L <b>31</b>	# 409		C/ 147	]
Comment Type E "based on imped- ance	Comment Status <b>D</b> Equation (147-6) "			EZ	Comment Type ER Comment Status D EQ 147-6. The font for the numerator is HUGE. Fix it.	Z
SuggestedRemedy CHANGE TO: "based of	on THE impedance IN Equatio	n (147-6)			SuggestedRemedy change font in numerator of Eq 147-6 to match the rest of the Eq.	
Proposed Response PROPOSED ACCEPT Change "based on impe	Response Status <b>W</b> IN PRINCIPLE. edance Equation (147-6)" to "	per"			Proposed Response Response Status W PROPOSED ACCEPT. Already dealt with by #333	
Cl <b>147</b> SC <b>147.9.2</b> Donahue, Curtis	<i>P</i> <b>168</b> UNH-IOL	L <b>33</b>	# 684		Cl 147 SC 147.9.2 P168 L37 # 333 Yseboodt, Lennart Signify	]
Comment Type E  Ctot is defined in the pa	Comment Status <b>D</b> aragraph, but not actually used	d in Equation 14	7-6.	EZ	Comment Type <b>E</b> Comment Status <b>D</b> Equation 147-6 has a formatting issue (inflated '1').	Z
SuggestedRemedy  Remove references and	d language specific to Ctot.				SuggestedRemedy  Make '1' a normal size.	
Proposed Response PROPOSED ACCEPT.	Response Status W				Proposed Response Response Status W PROPOSED ACCEPT.	
Cl 147 SC 147.9.2 Brandt, David	P 168 Rockwell Autor	L 37 mation	# 630		C/ 147 SC 147.9.2 P168 L38 # 17 Lusted, Kent Intel	
Comment Type E  Numerator 1 is too large	Comment Status <b>D</b> e of a font			EZ	Comment Type <b>E</b> Comment Status <b>D</b> Example 147-6 is usually large.	Z
SuggestedRemedy  Match fonts in equation					SuggestedRemedy  Consider making the numerator uniform in size with the fonts in the denominator.	
Proposed Response PROPOSED ACCEPT Already dealt with by #3	_				Proposed Response Response Status W  PROPOSED ACCEPT IN PRINCIPLE.  Already dealt with by #333	

Cl 147 SC 147.9.3 P 168 L 45 # 422

Jones, Chad Cisco

Comment Type TR Comment Status D

This section is titled MDI fault tolerance but includes tolerance of PoDL voltages which is a normal operating condition. On top of it, this compound shall statement potentially makes it difficult to parse the requirements. Suggest to split this into two sections and split the requirements into two shalls.

I also took the liberty to rearrange the sentence structure for easier parsing.

#### SuggestedRemedy

Break 147.9.3 into two sections.

REPLACE 147.9.3 with:

147.9.3 MDI PoDL voltage tolerance

The wire pair of the MDI shall withstand without damage the application of positive voltages of up to 60 V dc with the source current limited to 1200 mA, under all operating conditions, for an indefinite period of time. This requirement ensures that all devices tolerate PoDL voltages even if the device does not require power.

147.9.4 MDI fault tolerance

The wire pair of the MDI shall withstand without damage the application of short circuits of any wire to the other wire of the same pair or ground potential, as per Table 147-4, under all operating conditions, for an indefinite period of time. Normal operation shall resume after the short circuit(s) is/are removed.

Proposed Response

Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

TODO:

- Change "147.9.3 MDI fault tolerance" to "147.9.3 MDI PoDL voltage tolerance"
- Put the following text under "147.9.3 MDI fault tolerance":

====

The wire pair of the MDI shall withstand without damage the application of positive voltages of up to 60 V dc with the source current limited to 1200 mA, under all operating conditions indefinitely. This requirement ensures that all devices tolerate PoDL voltages even if the device does not require power.

====

- Create new chapter "147.9.4 MDI fault tolerance"
- Put the following text under "147.9.4 MDI fault tolerance":

===

The wire pair of the MDI shall withstand without damage the application of short circuits of any wire to the other wire of the same pair or ground potential, as per Table 147-4, under all operating conditions indefinitely. Normal operation shall resume after all short circuits have been removed.

====

Note: mind the links

C/ 147 SC 147.10.2 P169 L 42 # 497

Jones, Peter Cisco

Comment Type TR Comment Status D

Add "The designer is urged to consult the relevant local, national, and international safety regulations to ensure compliance with the appropriate requirements." from 3bz 126.9.2 Network safety

SuggestedRemedy

Make suggested change

Proposed Response Response Status W

PROPOSED ACCEPT.

C/ 147 SC 147.10.2.2 P170 L25 # 413

Jones, Chad Cisco

TR

yet another inappropriate customer and supplier reference. "In addition, the system may need to comply with more stringent requirements as agreed upon between customer and supplier, for the limitation of electromagnetic interference."

SuggestedRemedy

Comment Type

CHANGE TO: "In addition, the system may need to comply with more stringent requirements for the limitation of electromagnetic interference."

Comment Status D

Comment Status D

Proposed Response Status W

PROPOSED ACCEPT.

C/ 147 SC 147.10.2.2 P170 L 28 # 499

Jones, Peter Cisco

TR

The text says "10BASE-T1S PHY shall be tested according to IEC CISPR 25 test methods...". CISPR 25 seems to be only applicable to automotive environments (https://webstore.iec.ch/publication/26122 CISPR 25:2016 Vehicles, boats and internal combustion engines - Radio disturbance characteristics - Limits and methods of measurement for the protection of on-board receiver)

SuggestedRemedy

Comment Type

Either remove the CISPR 25 tesr, add equievelent tests for industrial and building environments, or expalin how CISPR 25 applies to industrial and building environments.

Proposed Response Status W

PROPOSED ACCEPT IN PRINCIPLE.

Remove 170/27-29, namely "A 10BASE-T1S PHY shall be tested according to IEC CISPR 25 test methods defined to measure the PHY's EMC performance in terms of radio frequency (RF) immunity and RF emissions."

F7

ΕZ

EΖ

C/ 147 SC 147.12.1 P 171 L7 # 115 C/ 148 SC 148.3 P 174 L 27 # 253 Anslow, Pete Ciena Graber, Steffen Pepperl+Fuchs GmbH Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 ". claimed to conform to Clause 147, clause title, shall ." should be ". claimed to conform to [EASY] "PMA" text is overlaying the Figure 148-1 description. Clause 147, Physical Coding Sublaver (PCS), Physical Medium Attachment (PMA) SugaestedRemedy sublayer and baseband medium, type 10BASE-T1S, shall." Remove "PMA" from line 27. SuggestedRemedy Proposed Response Response Status W Change ". claimed to conform to Clause 147, clause title, shall," to ", claimed to conform to Clause 147, Physical Coding Sublayer (PCS), Physical Medium Attachment (PMA) PROPOSED ACCEPT sublayer and baseband medium, type 10BASE-T1S, shall." C/ 148 SC 148.3 P 174 L 28 # 687 Proposed Response Response Status W Donahue, Curtis **UNH-IOL** PROPOSED ACCEPT. Comment Type E Comment Status D F7 C/ 147 SC 147.12.2.2 P 171 L 35 # 116 Looks like there is a strange image artificate in the title of Figure 148-1. "PMA" appears in Anslow, Pete Ciena small text overlaying "model and". Comment Type Ε Comment Status D ΕZ SugaestedRemedy "IEEE Std 802.3xx-201x" should be "IEEE Std 802.3cg-201x" in two places. Remove roque "PMA" text from figure ". clause title" should be ". Physical Coding Sublayer (PCS). Physical Medium Attachment Proposed Response Response Status W (PMA) sublayer and baseband medium, type 10BASE-T1S" PROPOSED ACCEPT IN PRINCIPLE. SuggestedRemedy Solved by #253 Change "IEEE Std 802.3xx-201x" to "IEEE Std 802.3cg-201x" in two places. Change ", clause title" to ", Physical Coding Sublayer (PCS), Physical Medium Attachment C/ 148 SC 148.3 P 174 L 28 # 697 (PMA) sublayer and baseband medium, type 10BASE-T1S" Xu, Davin **Rockwell Automation** Proposed Response Response Status W Comment Type Comment Status D ΕZ PROPOSED ACCEPT. A strange "PMA" text shown in the Figure Title C/ 148 SC 148.3 P 173 L 38 # 118 SuggestedRemedy Anslow, Pete Ciena Clean up the title and delete "PMA" Comment Status D ΕZ Proposed Response Comment Type Ε Response Status W PROPOSED ACCEPT IN PRINCIPLE. "Clause 90" is an external cross-reference, so should be in forest green Solved by #253 SuggestedRemedy Apply Character Tag "External" to "Clause 90"

Proposed Response

PROPOSED ACCEPT.

Response Status W

C/ 148 SC 148.3 P 174 L 28 # 119 C/ 148 SC 148.4.3.5 P 178 L 14 # 121 Anslow, Pete Ciena Anslow, Pete Ciena Comment Type Ε Comment Status D F7 Comment Type E Comment Status D F7 There is a spurious "PMA" just above the second line of the title of Figure 148-1 References to other subclauses in the 802.3 standard are not prefaced by "clause". Same issue in 148.4.3.6 and 148.4.3.7 SuggestedRemedy SuggestedRemedy Delete it. In 148.4.3.5, 148.4.3.6, and 148.4.3.7 delete "clause" Proposed Response Response Status W Proposed Response Response Status W PROPOSED ACCEPT IN PRINCIPLE. PROPOSED ACCEPT. Solved by #253 C/ 148 SC 148.4.1 P 176 L 19 # 366 C/ 148 SC 148.4.4.1.1 P 178 L 34 # 137 Matheus, Kirsten BMW AG Anslow. Pete Ciena Comment Type Comment Status D F7 Comment Type E Comment Status D F7 in the text the variable is called rx cmd with underscore. Is it correct that there is no 22.2.2.4 and 22.2.2.8 are included in the draft, so references to them should be crosstx cmd in the picture? references. SuggestedRemedy SuggestedRemedy exchange "rxcmd" with "rx cmd" Change "22.2.2.4" to be a cross-reference in: 148.4.4.1.1 (page 178, line 34) Response Status W Proposed Response 148.4.4.1.2 (page 178, line 49) PROPOSED ACCEPT. Change "22.2.2.8" to be a cross-reference in: In Figure 148-3 replace "rxcmd" with "rx cmd" 148.4.4.1.1 (page 178, line 37) 148.4.4.1.3 (page 179, line 8) C/ 148 SC 148.4.3.4 P 177 L 48 # 120 Proposed Response Response Status W Anslow, Pete Ciena PROPOSED ACCEPT. Comment Type Comment Status D ΕZ Ε C/ 148 P 178 In "shall be the one specified in clause 22.2.1.4" the word "clause" should not be there and SC 148.4.4.1.1 L 43 # 415 22.2.1.4 should be in forest green. Jones, Chad Cisco SuggestedRemedy Comment Type ER Comment Status D F7 change to "shall be the one specified in 22.2.1.4" and apply character tag "External" to "PHY specifications are free to map the BEACON request to any suitable line coding as "22.2.1.4". long as the requirement defined herein are met." a requirement IS met. REQUIREMENTS are met. Proposed Response Response Status W PROPOSED ACCEPT. SuggestedRemedy Make requirement plural. Also, make the same change in 148.4.4.1.2 on page 179, line 1. 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: Clause, Subclause, page, line

C/ 148 SC 148.4.4.1.1 Page 73 of 76 8/29/2018 11:28:00 AM

Cl 148 Jones, Pete	SC <b>148.4.5.1</b>	<i>P</i> <b>180</b> Cisco	L <b>23</b>	# 511		Cl 148 SC 148.4.5.1 Anslow, Pete	<i>P</i> <b>182</b> Ciena	<i>L</i> 1	# 139
Comment Ty Why is t	ype <b>ER</b> this equation bu	Comment Status <b>D</b> rried in text			EZ	Comment Type <b>E</b> Blank page	Comment Status D		EZ
SuggestedF Fix.	Remedy					SuggestedRemedy Remove it.			
	SED ACCEPT	Response Status W IN PRINCIPLE. It text and add reference to it	in the original te	xt instead.		Proposed Response PROPOSED ACCEPT.	Response Status W		
Cl 148 Jones, Chad	SC <b>148.4.5.1</b>	<i>P</i> <b>180</b> Cisco	L <b>43</b>	# 417		Cl 148 SC 148.4.5.4 Jones, Peter	P <b>185</b> Cisco	L <b>35</b>	# 515
Comment T	ype ER	Comment Status <b>D</b> point, if the plca_crs variable	is set to TRUE	the central state	EZ	Comment Type ER Change "Timer" to "The	Comment Status <b>D</b> e timer"		EZ
	e goes to RECE	IVE state *for actually receiv		the control state		SuggestedRemedy make suggested chang	e		
CHANG	GE TO: ""At this	point, if the plca_crs variable		the control state		Proposed Response PROPOSED ACCEPT.	Response Status W		
	Response DSED ACCEPT by #510	Response Status <b>W</b> IN PRINCIPLE.				CI 148 SC 148.4.5.4 Jones, Peter	<i>P</i> <b>185</b> Cisco	L 35	# 514
Cl 148 Anslow, Pet	SC <b>148.4.5.1</b>	<i>P</i> <b>181</b> Ciena	L <b>5</b>	# 122			Comment Status <b>D</b> w any PHY that meets its or low the transmitting PHY to		
Comment T		Comment Status <b>D</b> a cross-reference.			EZ	SuggestedRemedy make suggested chang	е		
SuggestedF Make "T	Re <i>medy</i> Fable 22-1" a cr	oss-reference.				Proposed Response PROPOSED ACCEPT	Response Status <b>W</b> IN PRINCIPLE.		
Proposed R	Response	Response Status W				Fix typo in resolution.			
	OSED ACCEPT by #510	IN PRINCIPLE.					w any PHY that meets its or llow the transmitting PHY to		

C/ 148 SC 148.4.5.4 P 185 L 41 # 140 C/ 148 SC 148.4.6.1 P186 / 41 # 419 Anslow, Pete Ciena Jones, Chad Cisco Comment Type Comment Type Е Comment Status D F7 ER Comment Status D F7 According to the rules set out in: fixing the English: "... to prevent the MAC \*to make\* new transmit attempts until PLCA ." http://www.ieee802.org/3/WG tools/editorial/requirements/words.html#numbers SugaestedRemedy "In text, where this improves clarity, follow the IEEE Editorial Style Manual: Use spaces CHANGE TO: "... to prevent the MAC \*from making\* new transmit attempts until PLCA ." instead of commas between numbers in tens or hundreds of thousands (e.g., 62 000, 100 000. but 4000)." Proposed Response Response Status W SuggestedRemedy PROPOSED ACCEPT. In the definition of TO TIMER, change "65535" to "65 535" C/ 148 SC 148.5.2.2 P 190 L 35 # 123 Proposed Response Response Status W Anslow. Pete Ciena PROPOSED ACCEPT. Comment Type Comment Status D F7 # 418 C/ 148 SC 148.4.6.1 P 186 L 1 "IEEE Std 802.3xx-201x" should be "IEEE Std 802.3cg-201x" in two places. Jones, Chad Cisco SugaestedRemedy Comment Type ER Comment Status D EΖ Change "IEEE Std 802.3xx-201x" to "IEEE Std 802.3cg-201x" in two places. another State Diagram split across two figures. Proposed Response Response Status W "The PLCA Data function shall conform to the PLCA Data state diagram in Figure 148-6 PROPOSED ACCEPT. and Figure 148-7 and associated state variables, functions, timers and messages." SuggestedRemedv C/ 148 SC 148.5.3 P 191 L 6 # 125 delete "and Figure 148-7" Anslow, Pete Ciena combine Figures 148-6 and 148-7 into one figure. Rename "Figure 148-7" to "Figure 148-6 (continued)" Comment Type Comment Status D ΕZ Search for other instances of "Figure 148-7" and delete or correct as needed. In the Subclause column of the table in 148.5.3 "22" and "146" should be cross-references. Likewise, in the Value/Comment column of the table in 148.5.4.1 and the table in Proposed Response Response Status W 148.5.4.4. "Clause 22" should be cross-references. PROPOSED ACCEPT. NOTE FOR EDITORS: resolve this comment after any other SuggestedRemedy In the Subclause column of the table in 148.5.3 make "22" and "146" cross-references. C/ 148 SC 148.4.6.1 P 186 L 26 # 141 In the Value/Comment column of the table in 148.5.4.1 and the table in 148.5.4.4. make Anslow, Pete Ciena "Clause 22" a cross-reference. ΕZ Comment Type E Comment Status D Proposed Response Response Status W Incorrect multiply symbol used PROPOSED ACCEPT. SuggestedRemedy replace with correct multiply symbol (Ctrl-q 0)

Proposed Response

PROPOSED ACCEPT.

Response Status W

Cl 148 SC 148.5.4.3 P 192 L 26 # 126

Anslow, Pete Ciena

Comment Type E Comment Status D EZ

In the Value/Comment column of the table in 148.5.4.3, "See 148-1" should be "See Equation (148-1)" and "See 148-2" should be "See Equation (148-2)"

SuggestedRemedy

In the Value/Comment column of the table in 148.5.4.3, change "See 148-1" to "See Equation (148-1)" and change "See 148-2" to "See Equation (148-2)" by changing the cross-reference format to "EquationNumber" in both cases.

Proposed Response Status W PROPOSED ACCEPT.