

Minutes of IEEE P1394c Working Group Meeting (7/26/2004)

The IEEE P1394c Working Group was held on July 26, 2004 in conjunction with the third quarter meeting of the 1394 Trade Association at the Embassy Suites in South San Francisco. The attendees were:

Colin Whitby-Strevens	Apple	colinws@apple.com
Kevin Brown	Broadcom	kbrown@broadcom.com
Walter Hurwitz	Broadcom	whurwitz@broadcom.com
Pascal Lagrange	Canon	pascal.lagrange@crf.canon.fr
Les Baxter	Commscope	les@baxter-enterprises.com
Don Harwood	Oxford Semiconductor	don.harwood@oxsemi.com
David James	Self	dvj@mit.alum.edu
Michael Johas Teener	Self	mike@teener.com

Agenda:

- 1) Welcome and introductions
- 2) IEEE Patent Policy – Chairman Michael Johas Teener reviewed the IEEE's patent policy.
- 3) Minutes from June meeting were approved by acclamation.
- 4) Review of old action items
- 5) Review Residential Ethernet status (formerly Synchronous Ethernet)
- 6) 1394c page-turning review
- 7) Next Meeting

Previous Action Items:

(Note – comments from this meeting are in red.)

No.	Name	Description	Opened	Closed
30	Mike	Add language to the 1394c draft to specify that IEEE 802.3af powering will be used with both S800-T ports and 1394b S100 UTP ports. – (Done)		7/26/2004
33	Mike	Follow up w/Bob Grow regarding technical liaison (Still no response.)	2/17/2004	
36	Burke	Confirm characteristics of 1394b UTP signal detect implementation to make sure they will not be confused by 802.3 link pulses or fast link pulses. 3/23/2004 -- Colin and Mike will discuss w/Burke at the Shanghai mtg. (Colin will check w/Burke)	2/17/2004	
45	Dave James	Review OUI mapping in section 14.11.2.6 (Still open)	4/27/2004	
50	Mike	Distribute candidate draft by July 12 for page-turning review at July 26 mtg. (Posted on the web site 7/25/2004)	4/27/2004	7/26/2004
51	Mike	Distribute a draft copy of the presentation for the IEEE 802.3 plenary. (Presentation is on the 802.3 web site.)	6/8/2004	7/26/2004
52	Mike	After the 1394 draft specification is ready for ballot, send out a patent LoA email to companies who submitted LoAs for 802.3 and 1394. (Still open.)	6/8/2004	
53	Colin	Explore the difference between PMD_TPORT_CONNECTED and PMD_TPORT_FW. (Done after the June meeting.)	6/8/2004	7/26/2004

Residential Ethernet

Michael Teener and Kevin Brown attended a CFI for Residential Ethernet at the July 802.3 meeting. The meeting was attended by about 100 people. Richard Brand (Nortel) has become the leader of the group. Some (e.g., Cisco) said that this effort is not necessary. The CFI proposal passed by a wide majority, so the project now has study group status. It is not clear exactly what the PAR will address. People oriented towards IEEE 1394 and consumer electronics are encouraged to participate in this group.

Michael and Kevin presented a tutorial about 1394 after the CFI meeting. They pointed out that Residential Ethernet must provide a seamless backbone for 1394 networks to be successful. Both the CFI and 1394 presentations are available on the 802.3 web site.

1394c page-turning review

A new draft of the IEEE 1394c specification was posted on the 1394c web site on 7/25/2004. Some issues which were discussed include:

- Walter's updates on negotiation have been "stuck in" Clause 14.11 without all the wordsmithing that will be needed.
- Need a name for a device that supports both 1000BASE-T and S800T modes. Colin suggested "twin mode."
- During the alternate pair negotiation, there are two identical state machines running in parallel for the Ethernet and FireWire negotiations. We need a notation to describe this situation (action item 58).
- As a general principle, variable names should use lower case letters. Upper case letters are reserved for constants.

New Action Items

No.	Name	Description	Opened	Closed
54	Mike	Reproduce the negotiation state machine with the edits put in as an Annex.	7/26/2004	
55	Mike	Clause 14.11.22 – put in the normative text that corresponds to the wonderful explanation.	7/26/2004	
56	Mike and Colin	Specify appropriate registers for 1394c negotiation and link management (Clause 28.2.4)	7/26/2004	
57	Mike	Fix up clause 14.12 (S100T parallel negotiation) so it matches both 1394b and 802.3	7/26/2004	
58	Dave	Propose a notation to describe the 2 autonegotiation state machines that run in parallel during the alternate pair negotiation.	7/26/2004	
59	Walter	In clause 14.12.2, Verify AB/CD finish first, second, together, long wait scenarios. (last note on page 21 of draft 0.3)	7/26/2004	
60	Colin	Provide a list of changes from 1394b (resulting from the errata) to the arbitration and port state machines and the state machine description text. (Completed during the meeting.)	7/26/2004	7/26/2004
61	Mike	Add a figure to Clause 21 describing the mapping between 1394c and 802.3 signals.	7/26/2004	
62	Mike	Add proper pointers and references for power management to Clause 21.5 (power over UTP)	7/26/2004	
63	Les	Wordsmith some text about Cat 5 vs. Cat 5e UTP for the definitions and the Summary Description (Clause 3)	7/26/2004	
64	Mike	Replace instances of "Cat-5", "Category 5" and similar terms with "UTP" as defined in action item 63.	7/26/2004	
65	Mike	Check the current style guide and update page margins, fonts, etc.	7/26/2004	
66	Mike	Overview section should be numbered 0, not 1.	7/26/2004	
67	Mike	Add definition for "twin-mode" to the technical glossary and change all instances of "dual-mode" to "twin-mode".	7/26/2004	
68	Mike	In summary, add section on the relationship to 802.3	7/26/2004	
69	Mike	Add clause 3.18, Twin-mode connections	7/26/2004	
70	Mike	Replace all instances of "T mode" and T_mode" with "T-mode"	7/26/2004	

No.	Name	Description	Opened	Closed
71	Mike	Change clause 14.11.2.4 to editing instructions.	7/26/2004	
72	Mike	Distribute a draft which has incorporated all the editing requests by mid-August.	7/26/2004	
73	Les	Compile and distribute a list of eligible voters for the Oxford meeting. (Done)	7/26/2004	7/27/2004

Next Meeting

The plan of record is to come to agreement on the document and do an email ballot without any further meetings. If necessary, a final meeting will be held on Monday, October 11, 2004 at the 1394 TA meeting in Oxford.

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