

Draft Minutes
Automation/Drive Interface (ADI) Working Group
Ad Hoc Teleconference
T10/08-256r0
4 June 2008
7:38 am – 08:57 am PDT

1 Introductions:

Paul Suhler called the meeting to order at 7:38 AM PDT. He thanked Quantum for hosting the meeting.

2 Approval of the agenda:

Paul Suhler reviewed the agenda with the group.

Paul Suhler proposed deferring items 9.1 and 9.3.

Kevin Butt made a motion for acceptance of the agenda as modified. Paul Stone seconded the motion. The group approved the motion unanimously.

3 Attendance and Membership:

Paul Suhler discussed the attendance, membership, and voting rules for this meeting.

The listing below captures the attendance at this meeting:

Name	S	Organization
Mr. Noud Snelder	V	BDT
Mr. Curtis Ballard	A	Hewlett Packard Co.
Mr. Kevin Butt	P	IBM Corp.
Mr. Geoffrey Barton	V	Overland Storage
Mr. Paul Stone	A	Quantum Corp.
Dr. Paul Suhler	P	Quantum Corp.
Mr. Rod Wideman	A	Quantum Corp.
Mr. Jon Allen	A	Sun Microsystems
Mr. Georg Boasson	AV	Tandberg Storage
Mr. Halvard Ericksson	AV	Tandberg Storage

10 People Present

Status Key: P - Principal
A - Alternate
AV - Advisory Member
E - Emeritus
L - Liaison
V - Visitor

4 INCITS Patent Policy:

Paul Suhler reviewed the INCITS patent policy.

5 INCITS Antitrust Guidelines

Paul Suhler reviewed the guidelines around avoidance of antitrust issues.

6 Approval of previous meeting minutes:

5 May 2008 meeting

[08-223r0](#)

Paul Suhler requested comments for the minutes of the 5 May 2008 meeting (see above). No one provided comments or corrections.

7 Call for secretary [Suhler]:

Paul Suhler noted that ADI remains without a permanent secretary. He asked if anyone wished to volunteer to fill this role. No one volunteered, so Paul encouraged participants to consider taking up the role. Rod Wideman agreed to serve as secretary for this meeting.

8 Review of action items:

- 08-006 Rod Wideman will revise [08-021r0](#) per Old Business item 8.3 of [08-104r0](#).
Carryover
- 08-011 Curtis Ballard to revise and post 08-195r0 per new business item 10.2 of [08-223r0](#).
Carryover
- 08-012 Paul Stone to incorporate 08-195r1 into ADC-3. *Carryover*
- 08-013 Curtis Ballard to revise and post 08-200r0 per new business item 10.3 of [08-223r0](#).
Carryover
- 08-014 Paul Stone to incorporate 08-200r1 into ADC-3. *Carryover*
- 08-015 Paul Suhler to revise and post 07-469r3 per old business item 9.2 of [08-223r0](#).
Complete

9 Old business:

9.1 **ADC-3 Automation Device Serial Number subpage ([08-021r0](#)) [Wideman]**

This item was deferred at the author's request.

9.2 **ADT-2: Internet ADT (iADT) (07-469r4) [Suhler]**

Paul Suhler gave an update on where he felt we were with iADT.

Paul started by summarizing the changes from the last meeting. He described the introduction of an interconnect port, and other changes noted in the revision.

Kevin Butt commented that the alternate figure was preferable. Paul agreed that this would be the figure to use, so as to not include items not described by the standard. Paul further described the elements of the layering.

Paul noted that leaving the term 'ADT port' intact allowed several existing clauses to remain unchanged. He further noted that modifications to other existing terms (e.g., 'ADT serial bus').

Paul pointed out that his intent is for ADT ports to have one to one mapping. One advantage is that we don't have to do anything new for I_T nexuses. This concept is at a higher level

than the interconnect ports. Paul wondered whether it was clear that an 'ADT serial port' included the physical layer and interconnect port. Kevin noted some usage of ADT port that seemed to need to be more specific. Kevin thinks there needs to be a distinction between ADT port and ADT interconnect. Paul agreed to review.

Kevin asked what the reasoning was for 9,600 baud rate in 4.10.1. Paul said it was just to make sure there was sufficient timeout allocated. Rod Wideman asked if we could just specify a direct timeout value. Paul agreed to consider it in terms of seconds. Paul noted that one RFC specified a timeout of 4 minutes. The consensus was to review in more detail.

Paul then moved to a review of the Physical layer and the changes, starting with the introduction of LED connections. Curtis Ballard agreed with the wording for the description. We discussed the whether the term 'open-collector' was standard. Paul asked for a suitable reference for the term. Curtis suggested 'tri-state' may be an alternative.

Kevin asked if the LED current and voltage values were the standard Ethernet RJ45 values. Paul stated that he was not aware of standard values, that these values are intended to give designers a reasonably wide selection of parts, and that working group members should have their electrical designers review the values.

Kevin confirmed that the bus composition intent was to define the connections only, not a connector, which Paul confirmed. Kevin pointed out that Sense(d) is driven by the DTD instead of the automation device. Kevin asked if the LED connections would be suitable for the automation device in addition to the DTD, but further that the LEDs were local to the port only, and not on the bus. Paul agreed to separate them by moving into 5.2.6. Kevin asked if we specified how to use the LEDs. Paul noted that it is currently specified in table w, but requiring certain behavior may be a challenge.

Curtis wondered if the Sense(a) and Sense(d) could be provided via a different connector. Table w seems to imply there is a single connector, which may be problematic with respect to the intent. Curtis suggested maybe using multiple tables.

Paul stated that he thought Reset should affect only that port. There could be multiple Resets (i.e., per port). We explored the approach of separating the Reset and Sense signals into a table, and referencing. But we will need to make sure we can still allow for multiple reset lines (e.g., resets all ports or just the one).

Paul then moved to clause 6. Kevin questioned whether 'ADT port' was appropriate or whether 'ADT interconnect port' was needed (e.g., "ADT port sends encoded characters..."). Kevin wondered if a model clause was needed, and Paul stated that the proposed changes to Clause 4 are intended to be the basis of a model clause. Paul wondered whether UML was needed. Kevin suggested wording things in terms of one device side only. Perhaps 'connection' is already defining that it is 'to another ADT port'. Paul agreed to consider ways to make it clearer. One suggestion was to add a figure depicting the usage, and move the Interconnect layer introduction up into the model clause.

Kevin asked if the terms used followed those used in the RFCs. Paul said he would review RFC 793 (TCP) and the Berkeley Sockets API. Rod asked if there was a correlating service for Reset. He also suggested that a table might be useful. Kevin suggested that a table similar to table 197 in SAS-2 may be useful. Paul agreed to consider it in the next revision. Paul agreed to add a correlating Reset service.

Kevin asked about 6.2.1 and the wording about establishing not more than one connection. He pointed out that it really means not more than one concurrent connection. Paul noted that the connections go through the ports.

9.3 ADI: Features for ADC-3 and ADT-3 ([08-147r1](#)) [Suhler]

This item was deferred at the author's request.

10 New Business**10.1 ADT-2: Support QUERY TASK SET Task Management Function ([08-148r0](#)) [Suhler]**

This item was deferred.

10.2 ADC-3: Add Port and Node Name to Fibre Channel Port Status Data ([08-226r0](#)) [Suhler]

This item was deferred.

10.3 ADC-3: Remove Configure Encryption Policy mounted volume restriction ([08-247r0](#)) [Wideman]

This item was deferred.

11 Next meeting requirements:

The group will hold a teleconference 18 June 2008 at 8:00 AM PDT until 10 AM PDT. Curtis Ballard offered to have HP host the teleconference.

The group will hold a meeting on 14 July 2008 during T10 plenary week in Anchorage, Alaska beginning when the SMC-3 working group adjourns and concluding at 6:30 PM PDT.

12 Review new action items:

08-016 Paul Suhler to revise 07-469r4 and post per old business item 9.2 of [08-256r0](#)

13 Adjournment:

Kevin Butt made a motion for adjournment. Rod Wideman seconded the motion. The group passed the motion unanimously. Paul Suhler adjourned the group at 8:57 AM PDT.