1. IDENTIFICATION OF PROPOSED PROJECT

Development of a standard to define the specific commands and protocols for devices attached to the IEEE 1394-1995 bus.

1.1 Title: SBP-2 Device Attachment

1.2 Proposer: T10

1.3 Date Submitted: 9/11/97

1.4 Project Type: D

2. Justification of Proposed Standard

2.1 Needs

Within the Personal Computer industry, work has begun to attach devices such as hard disk drives, CD-ROMs, DVD, etc. via the IEEE 1394-1995 bus. Such devices utilize the Serial Bus Protocol-2 (SBP-2) transport protocol currently under development in T10, and commands defined by command set standards developed in or currently under development in T10. The 1394 Device Command Standard allows devices to be utilized in an industry standard manner on the 1394-1995 bus.

2.2 Recommended Scope of Standard

This standard will define for a variety of devices, e.g., hard disk, CD-ROM, DVD, etc.:

– the subset of the SBP-2 protocol to be utilized;
– the commands to be utilized by a variety of device types;
– the device operation;
– the security requirements;
– the configuration ROM and CSR requirements;

2.3 Existing Practice in Area of Proposed Standard

No standard exists today defining attachment protocol and command usage for devices on IEEE 1394-1995.

2.4 Expected Stability of Proposed Standard with Respect to Current and Potential Technological Advance

The useful life of the proposed standard is expected to be at least five years.

3. Description of Proposed Project

3.1 Type of Document: Standard

3.2 Definitions of Concepts and Special Terms: None.

3.3 Expected Relationship with Approved NCITS Reference Models (e.g., DBMS, OSI)

The standard addresses closed systems and has no relationship to NCITS Reference Models.

3.4 Recommended Program of Work

Develop a set of goals for the standard; solicit additional participants for the development of the standard; solicit technical contributions for the standard; review the contributions for compatibility with the family of T10 standards and for logical expansions to those standards; format the standard in accordance with NCITS requirements; and forward the resultant standard to NCITS for further processing.

3.5 Resources - Individuals and Organizations Competent in Subject Matter

T10 presently includes membership with the necessary technical expertise to complete the standard. However additional participation will be solicited to broaden the representation for the standard.

3.6 Recommended NCITS Development Technical Committee: T10

3.7 Anticipated Frequency and Duration of Meetings

T10 presently meets bimonthly and authorizes ad hoc meetings as warranted for the needs of the projects. It is anticipated that these meetings are adequate to address this project as one of the agenda items for these meetings.

3.8 Target Date for Initial Public Review (Milestone 4): May 1999

3.9 Estimated Useful Life of Standard

It is estimated that the useful life of the standard will be at least five years.

4. Implementation Impacts

4.1 Impact on Existing User Practices and Investments

Since no 1394 products exist today utilizing SBP-2 but plans are underway to develop such products, timely development of this standard will ensure quick adoption and conformity within the industry. Without this standard incompatibilities will soon exist.

4.2 Impact on Supplier Products and Support

See 4.1.

4.3 Techniques and Costs for Conformity Assessment

It is intended that the standard will provide an unambiguous definition of the protocols so that suppliers, users, and others can readily determine product conformance.

4.4 Legal Considerations

No additional items are known beyond those required for IEEE 1394-1995, but regular calls for patents will be made.

5. Closely Related Standards Activities

5.1 Existing Standards

- IEEE 1394-1995
- ISO/IEC 13213:1994

5.2 NCITS Standards Development Projects

- SPC-2 (T10/1236D)
- SBP-2 (T10/1155D)
- MMC-2 (T10/1228D)

5.3 NCITS Study Groups: None

5.4 Other Related Domestic Standards Efforts:

- IEEE P1394A
- IEEE P1394B

5.5 ISO/IEC JTC 1 Standards Development Projects None

5.6 Other Related International Standards Development Projects None

5.7 Recommendations for Coordinating Liaison None

5.8 Recommendations for Close Liaison
– IEEE P1394A
– IEEE P1394B