Proposal for a new work item on

Title: Information technology --- SCSI Parallel Interface-5 (SPI-5)

PROPOSAL FOR A NEW WORK ITEM

Date of presentation of proposal: 2002-11-10	Proposer: SC25
Secretariat: Germany(DIN)	ISO/IEC JTC 1 / SC 25 N

A **proposal for a new work item** shall be submitted to the secretariat of the Subcommittee of ISO/IEC joint technical committee 1 concerned with a copy to the secretariat of ISO/IEC JTC1 and to the ISO Central Secretariat. **Presentation of the proposal** - to be completed by the proposer Guidelines for proposing and justifying a new work item are given in ISO Guide 26.

Title ISO/IEC: INFORMATION TECHNOLOGY - SCSI - Parallel Interface-5 (SPI-5)

Scope: This standard defines the mechanical, electrical, timing, and protocol requirements of the SCSI parallel interface to allow conforming SCSI devices to inter-operate. The SCSI parallel interface is a local I/O bus that may be operated over a wide range of transfer rates.

Purpose and justification:

The objectives of the SCSI parallel interface are:

- a) To provide host computers with device independence within a class of devices. Thus, different disk drives, tape drives, printers, optical media drives, and other SCSI devices may be added to the host computers without requiring modifications to generic system hardware. Provision is made for the addition of special features and functions through the use of vendor-specific options. Reserved areas are provided for future standardization.
- b) To provide compatibility such that conforming SPI-3 and SPI-4 devices may interoperate with SPI-5 devices given that the systems engineering is correctly done. Conforming SPI-3 and SPI-4 devices should respond in an acceptable manner to reject SPI-5 protocol extensions. SPI-5 protocol extensions are designed to be permissive of such rejections and thus allow SPI-3 and SPI-4 devices to continue operation without requiring the use of the extensions.

The interface protocol includes provision for the connection of multiple initiators (SCSI devices capable of initiating an I/O process) and multiple targets (SCSI devices capable of responding to a request to perform an I/O process). Distributed arbitration (i.e., bus-contention logic) is built into the architecture of this standard. A default priority system awards interface control to the highest priority SCSI device that is contending for use of the bus and an optional fairness algorithm is defined.

This standard defines the physical attributes of an input/output bus for interconnecting computers and peripheral devices.

Programme of work: If the proposed new work item is approved, which of the following document(s)is (are) expected to be developed?

X a single International Standard more than one International Standard

Relevant documents to be considered: Small Computer System Interface (SCSI) - : Parallel Interface-5 (SPI-5), available now.					
Cooperation and liaison: None.					
Preparatory work offered wit Interface-5 (SPI-5), available no		t date(s): Small Con	mpute	r System Interface (SCSI) - : Parallel	
Signature:					
Will the service of a maintenand there any known requirements f known patented items? No.				be required?No Are the proposed standard concern	
	his nev	v item to JTC 1 ember of the IS	/SC 2	nmendations thereon: 25 as project 1.25.13.13.nn . CC JTC 1/SC 25 has an obligat	ion to vote
		ng date for voting: Signature			
NEW WORK ITEM PROPOSAL - PROJ ACCEPTANCECRI	IECT				
A Criterion		Validity	Exp	lanation	_
A Business Require	ment				
A.1 Market Requiren	nent	Essential _X Desirable Supportive		s interface is widely available or er, and multimedia devices.	n PC,
A.2 Regulatory Cont	ext	Essential DesirableX_ Supportive Not Relevant			
B. Related Work					
B.1 Completion/Mainten	ance	Yes NoX_			

of current standards		
B.2 Commitment to other organization	Yes NoX_	
B.3 Other Source of standards	Yes NoX_	
C. Technical Status		
C.1 Mature Technology	Yes _X_ No	The technology for SCSI is mature.
C.2 Prospective Technology	Yes NoX_	The standard is needed now.
C.3 Models/Tools	Yes NoX_	
D. Conformity Assessment and Interoperability		
D.1 Conformity Assessment	Yes NoX_	
D.2 Interoperability	Yes _X No	If standard approved as this is the prime objective.
E. Other Justification		

Notes to Proforma

A. Business Relevance. That which identifies market place relevance in terms of what problem is being solved and or need being addressed.

A.1. Market Requirement. When submitting a NP, the proposer shall identify the nature of the Market Requirement, assessing the extent to which it is essential, desirable or merely supportive of some other project.

A.2 Technical Regulation. If a Regulatory requirement is deemed to exist- e.g. for an area of public concern e.g. Information Security, Data protection, potentially leading to

regulatory/public interest action based on the use of this voluntary international standard - the proposer shall identify this here.

- **B. Related Work.** Aspects of the relationship of this NP to other areas of standardization work shall be identified in this section.
- B.1 Competition/Maintenance. If this NP is concerned with completing or maintaining existing standards, those concerned shall be identified here.
- B.2 External Commitment. Groups, bodies, or for a external to JTC1 to which a commitment has been made by JTC for cooperation and or collaboration on this NP shall be identified here.
- B.3 External Std/Specification. If other activities creating standards or specifications in this topic area are known to exist or be planned, and which might be available to JTC1 as PAS, they shall be identified here.
- **C. Technical Status.** The proposer shall indicate here an assessment of the extent to which the proposed standard is supported by current technology.
- C.1 Mature Technology. Indicate here the extent to which the technology is reasonably stable and ripe for standardization.
- C.2 Prospective Technology. If the NP is anticipatory in nature based on expected or forecasted need, this shall be indicated here.
- C.3 Models/Tools. If the NP relates to the creation of supportive reference models or tools, this shall be indicated here.
- D. Any other aspects of background information justifying this NP shall be indicated here.

D. Conformity Assessment and Interoperability

- D.1 Indicate here if Conformity Assessment is relevant to your project. If so, indicate how it is addressed in your project plan.
- D.2 Indicate here if Interoperability is relevant to your project. If so, indicate how it is addressed in your project plan.