

To: T10 Technical Committee  
From: Bob Sheffield ([Robert.L.Sheffield@Intel.com](mailto:Robert.L.Sheffield@Intel.com)), Intel Corporation  
Date: March 4, 2003  
Subject: T10/03-059r0, SES-2 Enclosure/Array Control Device Element for device activity

### **Revision History**

Revision 0 (March 4, 2003) first revision

### **Related Documents**

SES2-r02 – SCSI Enclosure Services – 2 revision 2

### **Overview**

This proposal recommends changes to the Enclosure Control and Array Control diagnostic page Device Element to provide for device identification signaled to a user via a flashing LED.

### **Suggested Changes**

Change **Table 34 — Device element for Enclosure Control diagnostic page** to add the ACTIVE bit to byte-2, bit-7 as follows:

Bits Bytes	7	6	5	4	3	2	1	0
0	COMMON CONTROL							
1	Reserved							
2	ACTIVE	DO NOT REMOVE	Reserved		RQST INSERT	RQST REMOVE	RQST IDENT	Rsvd
3	Reserved		RQST FAULT	DEVICE OFF	ENABLE BYP A	ENABLE BYP B	Reserved	

### **Add the following text to paragraph 7.3.2**

#### **7.3.2 Device element defined for Enclosure Control and Enclosure Status diagnostic pages**

The device activity indication bit (ACTIVE) may be set to one by the application client to cause a visual indication that the device is active. The enclosure services processor shall sustain active the device activity indication, if present, for 0,5 seconds. The enclosure services processor shall automatically deassert the ACTIVE bit to zero (and cease the visual activity indication) 0,5 seconds after receiving the last control diagnostic page with the ACTIVE bit set to one. If the activity indication is still in effect from a previous Enclosure Control diagnostic page with the ACTIVE bit set to one, the activity indication shall be sustained for 0,5 seconds from the last time the ACTIVE bit is set to one.

NOTE: to maintain the active indication asserted (if present), the application client must set the bit to one at least once every 0,5 seconds.

Change **Table 36 — Device element for Array Control diagnostic page** to add the ACTIVE bit to byte-2, bit-7 as follows:

Bits Bytes	7	6	5	4	3	2	1	0
0	COMMON CONTROL							
1	RQST OK	RQST RSVD DEVICE	RQST HOT SPARE	RQST CONS CHECK	RQST IN CRIT ARRAY	RQST IN FAILED ARRAY	RQST REBUILD/ REMAP	RQST R/R ABORT
2	ACTIVE	DO NOT REMOVE	Reserved			RQST REMOVE	RQST IDENT	Rsvd
3	Reserved				ENABLE BYP A	ENABLE BYP B	Reserved	

**Add the following text to paragraph 7.3.3**

**7.3.3 Device element defined for Array Control and Array Status diagnostic pages**

The device activity indication bit (ACTIVE) may be set to one by the application client to cause a visual indication that the device is active. When the ACTIVE bit is set to zero it has no effect. The array processor shall sustain active the device activity indication, if present, for 0,5 seconds. The array processor shall automatically deassert the ACTIVE bit to zero (and cease the visual activity indication) 0,5 seconds after receiving the last control diagnostic page with the ACTIVE bit set to one. If the activity indication is still in effect from a previous Enclosure Control diagnostic page with the ACTIVE bit set to one, the activity indication shall be sustained for 0,5 seconds from the last time the ACTIVE bit is set to one.

NOTE: to maintain the active indication asserted (if present), the application client must set the bit to one at least once every 0,5 seconds.