

# T10/01-083R1

Date: July 16, 2001

To: T10 Committee

From: Paul Entzel, Quantum

Subject: Proposed change to Table 9 in SSC-2, revision 2

## Overview

Table 9 in SSC-2 revision 2 describes which commands are allowed and which should return Reservation Conflict in the presence of various types of reservations. The columns labeled "Write Exclusive" and "Write Exclusive RO" are filled with N/A. The N/A presumably indicates not applicable, although this is not defined in the specification.

Barring convincing arguments to the contrary, Quantum would like to define values for these columns. This proposal includes recommendations for each entry. Additionally, we recommend extending the table to include the new commands that have been added to SSC-2.

## Proposed Changes

Commands currently included in the table:

Command	From any initiator Write Exclusive	From initiator not registered Write Exclusive RO
ERASE	Conflict	Conflict
FORMAT MEDIUM	Conflict	Conflict
LOAD UNLOAD	Conflict	Conflict
LOCATE	Allowed	Allowed
READ	Allowed	Allowed
READ BLOCK LIMITS	Allowed	Allowed
READ POSITION	Allowed	Allowed
READ REVERSE	Allowed	Allowed
RECOVERED BUFFERED DATA	Allowed	Allowed
REPORT DENSITY SUPPORT	Allowed	Allowed
REWIND	Allowed	Allowed
SET CAPACITY	Conflict	Conflict
SPACE	Allowed	Allowed
VERIFY	Allowed	Allowed
WRITE	Conflict	Conflict
WRITE FILEMARK	Conflict	Conflict

Add text or a note near the table:

Due to the nature of streaming type devices, Write Exclusive and Write Exclusive, Registrants Only modes of reservation do not protect an initiator's continuity of operations when using the Implicit Command set. While these modes do protect unauthorized modification of the data, they do not protect from medium position changes that could result in errors due to incorrect position. It is the responsibility of the initiators to manage this using means beyond the scope of this specification. Initiators should use exclusive modes of reservation while actively accessing the medium to prevent interference from other initiators.

Commands that have been added in SSC-2, or were already referenced in SSC and are not listed in the table:

Command	Addressed LU is Reserved by another initiator (A)	Addressed LU has this type of persistent reservation held by another initiator (B)				
		From any initiator		From registered initiator (all RO types)	From initiator not registered	
		Write Excl	Excl Access		Write Excl RO	Excl Access RO
ERASE (16)	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
LOCATE (16)	Conflict	Allowed	Conflict	Allowed	Allowed	Conflict
MOVE MEDIUM	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
MOVE MEDIUM ATTACHED	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
PREVENT ALLOW MEDIUM REMOVAL	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
READ (16)	Conflict	Allowed	Conflict	Allowed	Allowed	Conflict
READ ELEMENT STATUS	Allowed	Allowed	Allowed	Allowed	Allowed	Allowed
READ ELEMENT STATUS ATTACHED	Allowed	Allowed	Allowed	Allowed	Allowed	Allowed
READ REVERSE (16)	Conflict	Allowed	Conflict	Allowed	Allowed	Conflict
RECOVER BUFFERED DATA (16)	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
SPACE (16)	Conflict	Allowed	Conflict	Allowed	Allowed	Conflict
VERIFY (16)	Conflict	Allowed	Conflict	Allowed	Allowed	Conflict
WRITE (16)	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict
WRITE FILEMARK (16)	Conflict	Conflict	Conflict	Allowed	Conflict	Conflict