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|                    8802-3/802.3 REVISION REQUEST                      |
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DATE:                   28th June, 2000
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REQUESTED REVISION:
  STANDARD:             IEEE Std 802.3-1998
  CLAUSE NUMBER:        28.3.1, 28.3.4 and Figure 28-16
  CLAUSE TITLE:         State diagram variables and State diagrams

PROPOSED REVISION TEXT:

Change the exit conditions to transition from the FLP LINK GOOD CHECK
state to the TRANSMIT DISABLE state in Figure 28-16 to read:

""
((link_status_[HCD]=FAIL + link_status_[HCD]=READY) *

link_fail_inhibit_timer_done) + incompatible_link=TRUE""

Add to 28.3.1 the variable definition for incompatible_link

""
incompatible_link
Parameter used following Priority Resolution to indicate the resolved
link is incompatible with the Local Device settings. A device's ability
to set this variable to true is optional.

Values: false; A compatible link exists between the Local Device and
               Link Partner (default).
        true;  Optional indication that Priority Resolution
               has determined no highest common denominator
               exists following the most recent negotiation.

NOTE - This variable is set by this definition; it is not set explicitly
in the state diagrams.
""

Ammend the NOTE at the bottom-right of the Figure 28-16 to include
the new "incompatible_link" variable:
"NOTE: ability_match, acknowledge_match, single_link_ready,
consistency_match, and incompatible_link are set according to the
variable definitions and are not set explicitly in the state diagrams."

RATIONALE FOR REVISION:

Currently the exit conditions to transition from the FLP LINK GOOD
CHECK state to the TRANSMIT DISABLE state read:

(link_status_[HCD]=FAIL + link_status_[HCD]=READY) *
link_fail_inhibit_timer_done

If a 1000Base-T device fails a Master-Slave resolution, it should not
have to wait link_fail_inhibit_timer (750 ms to 1000 ms) before
reattempting negotiation.  While this may be avoided by issuing an
auto-negotaition restart via management, this is inefficient and may
result in the ATMP_CNT being reset to zero, which would then prevent
management from being informed of repeated 1000Base-T Master-Slave
resolution failures.

IMPACT ON EXISTING NETWORKS:

None. This change will allow another negotiation attempt to occur
more quickly. Making optional a device's ability to set the variable
incompatible_link to true allows existing solutions which require
link_fail_inhibit_timer to expire to still be considered compliant.

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|Please attach supporting material, if any                            |
|Submit to:-  Geoffrey O. Thompson, Chair IEEE 802.3                  |
|             Nortel Networks, Inc.  M/S SC5-02                        |
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|                                                                     |
|             +------- For official 802.3 use -----------+           |
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|             | DATE RECEIVED: 28th June, 2000            |           |
|             | EDITORIAL/TECHNICAL                       |           |
|             | ACCEPTED/DENIED                           |           |
|             | BALLOT REQ'D    YES/NO                    |           |
|             | COMMENTS: Published IEEE Std 802.3-2002   |           |
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| For information about this Revision Request see -                   |
|http://www.ieee802.org/3/maint/requests/revision_history.html#REQ1041 |
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