Alarm Indication & Events

Self-clearing Event Table

Procedure

- Event occurs
- Event put in event table
 - Event table defined to hold all outstanding events
- Event notification PDU MAY be sent (optional)
- Whenever something in event table, EI bit set
- Events self-clearing after 10 seconds

Problems

- Lose information if not gotten "quick" enough
- Flag doesn't tell you if there's more than last time

Key Points

- Event table defined to hold all events
- Event table self-clearing
- Flag represents "state"

What does event table look like?

- Use "Event" term rather than "Alarm" term throughout
- Table contents
 - Event type, timestamp, data
- OAM sends Event Notification PDU when something added to table
 - if possible, no guarantee
- Link Fault, Dying gasp independent of this general event notification
- Whenever receiver gets EI bit in OAM PDU, should read remote event table within 3 seconds and continue to re-read periodically til EI bit cleared

What events does 802.3 define?

- Standardized Events
 - Errored symbol period, severely errored symbol period, errored frame period, severely errored frame period
 - Defined/provisioned threshold
 - Defined/provisioned timer
 - If exceed threshold in timed window, severely errored
 - If exceed greater than zero but lower than threshold in timed window, errored
 - Power, temperature
 - Tied to MIB variable
 - Management can set bit in variable, indicates temperature or power threshold event
 - MAC/PHY not responsible for maintaining or thresholding temperature or power
 - Vendor specific
 - Management (or other method) adds data to table