

14 Management entities

14.6 Branch 0xDD “extended actions”

This subclause specifies a set of extended management actions used by the OLT to enforce a specific behavior in the ONU. The extended management actions shown in Table 14-212 shall be supported.

Table 14-212—Extended actions defined in branch 0xDD

Leaf	Attribute	Defined in
Object group: ONU management		
0x00-01	acOnuReboot	14.6.1.1
Object group: Bridging		
0x01-01	acMacClearDynamicTable	14.6.2.1
0x01-02	acMacAddDynamicAddress	14.6.2.2
0x01-03	acMacDeleteDynamicAddress	14.6.2.3
0x01-04	acMacClearStaticTable	14.6.2.4
0x01-05	acMacAddStaticAddress	14.6.2.5
0x01-06	acMacDeleteStaticAddress	14.6.2.6
0x01-08	acGetUniMacLearned	14.6.2.7
0x01-20	acConfigLlid	14.6.2.8
0x01-21	acConfigServicePort	14.6.2.9
0x01-23	acConfigGlid	14.6.2.10
0x01-24	acConfigGlidMember	14.6.2.11
Object group: Statistics and counters		
0x02-01	acCountersClear	14.6.3.1
Object group: Alarms		
0x03-01	acAlarmGetCurrentSummary	14.6.4.1
Object group: Encryption		
0x04-01	acConfigEncrKey	14.6.5.1
0x04-02	acSyncCipherClock	14.6.5.2
Object group: Frame processing		
0x05-01	acRulesClearAll	14.6.6.1
0x05-02	acRulesAddOne	14.6.6.2
0x05-03	acRulesDeleteOne	14.6.6.3
Object group: Transmission control		
0x06-01	acEnableUserTraffic	14.6.7.1
0x06-02	acDisableUserTraffic	14.6.7.2
0x06-03	acLoopbackEnable	14.6.7.3
0x06-04	acLoopbackDisable	14.6.7.4
0x06-05	acLaserTxPowerOff	14.6.7.5
Object group: Power management		
0x07-01	acEeeChangeState	14.6.8.1
0x07-02	acPoeChangeState	14.6.8.2

All other Leaf values are reserved and ignored on reception.

14.6.1 ONU management

14.6.2 Bridging

14.6.3 Statistics and counters

14.6.4 Alarms

14.6.5 Encryption

14.6.5.1 Action *acConfigEncrKey* (0xDD/0x04-01)

14.6.5.2 Action *acSyncCipherClock* (0xDD/0x04-02)

This action is used by the OLT to synchronize the ONU's *TxCipherClock* and *RxCipherClock* to the OLT's *CipherClock* (see 11.7.4.1). This action consists of the following sub-attributes: *sRxCipherClock* and *sTxCipherClock*.

Sub-attribute *acSyncCipherClock.sRxCipherClock*:

Syntax: 48-bit unsigned integer

Remote access: Write-Only

Description: This sub-attribute represents the value of *RxCipherClock*. The value of this sub-attribute is set according to the cipher clock synchronization procedure described in 11.7.4.1.3.

Sub-attribute *acSyncCipherClock.sTxCipherClock*:

Syntax: 48-bit unsigned integer

Remote access: Write-Only

Description: This sub-attribute represents the value of *TxCipherClock*. The value of this sub-attribute is set according to the cipher clock synchronization procedure described in 11.7.4.1.3.

The *acSyncCipherClock* action is associated with the ONU object (see 14.2.1). The Variable Container TLV for the *acSyncCipherClock* action shall be as specified in Table 14-227.

Table 14-227—Sync Cipher Clock TLV (0xDD/0x04-02)

Size (octets)	Field name	Value	Notes
1	<i>Branch</i>	0xDD	Branch identifier
2	<i>Leaf</i>	0x04-02	Leaf identifier
1	<i>Length</i>	12	The size of TLV fields following the <i>Length</i> field.
6	<i>RxCipherTimestamp</i>	Varies	Value used to synchronize the <i>RxCipherClock</i> .
6	<i>TxCipherTimestamp</i>	Varies	Value used to synchronize the <i>TxCipherClock</i> .