



@ FILE NAME: M_CTC_ID_013.txt

@ TEST SCOPE: M PLANE O-RAN CONFORMANCE

@ Software Release for Garuda: v4.2.0

Test Description : The minimum functions of the TER described in section 2.1 that support validation of the M-Plane are operational, configured and connected to the O-RU

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******* Connect to the NETCONF Server *******

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> listen --ssh --login operator

Waiting 60s for an SSH Call Home connection on port 4334...

The authenticity of the host '192.168.208.37' cannot be established.

ssh-rsa key fingerprint is c0:7c:63:5d:4b:85:e7:27:e0:7e:f0:44:38:4e:ab:83

Interactive SSH Authentication done.

> status

Current NETCONF session:

ID : 2

Host : 192.168.208.37

Port : 830

Transport : SSH

Capabilities:

urn:ietf:params:netconf:base:1.0 urn:ietf:params:netconf:base:1.1 urn:ietf:params:netconf:capability:writable-running:1.0

urn:ietf:params:netconf:capability:candidate:1.0 urn:ietf:params:netconf:capability:rollback-on-error:1.0

urn:ietf:params:netconf:capability:validate:1.1 urn:ietf:params:netconf:capability:startup:1.0 urn:ietf:params:netconf:capability:xpath:1.0

urn:ietf:params:netconf:capability:with-defaults:1.0?basic-mode=explicit&also-supported=report-all,report-all-tagged,trim,explicit

urn:ietf:params:netconf:capability:notification:1.0 urn:ietf:params:netconf:capability:interleave:1.0

urn:ietf:params:xml:ns:yang:ietf-yang-metadata?module=ietf-yang-metadata&revision=2016-08-05

urn:ietf:params:xml:ns:yang:1?module=yang&revision=2017-02-20

urn:ietf:params:xml:ns:yang:ietf-inet-types?module=ietf-inet-types&revision=2013-07-15

urn:ietf:params:xml:ns:yang:ietf-yang-types?module=ietf-yang-types&revision=2013-07-15

urn:ietf:params:netconf:capability:yang-library:1.1?revision=2019-01-04&content-id=61

urn:sysrepo:plugind?module=sysrepo-plugind&revision=2020-12-10

urn:ietf:params:xml:ns:yang:ietf-netconf-acm?module=ietf-netconf-acm&revision=2018-02-14

urn:ietf:params:xml:ns:netconf:base:1.0?module=ietf-netconf&revision=2013-09-29&features=writable-running,candidate,rollback-on-error,valid

ate,startup,url,xpath urn:ietf:params:xml:ns:yang:ietf-netconf-with-defaults?module=ietf-netconf-with-defaults&revision=2011-06-01

urn:ietf:params:xml:ns:yang:ietf-netconf-notifications?module=ietf-netconf-notifications&revision=2012-02-06

urn:ietf:params:xml:ns:yang:ietf-netconf-monitoring?module=ietf-netconf-monitoring&revision=2010-10-04

urn:ietf:params:xml:ns:netconf:notification:1.0?module=notifications&revision=2008-07-14

urn:ietf:params:xml:ns:netmod:notification?module=nc-notifications&revision=2008-07-14

urn:ietf:params:xml:ns:yang:ietf-x509-cert-to-name?module=ietf-x509-cert-to-name&revision=2014-12-10

urn:ietf:params:xml:ns:yang:iana-crypt-hash?module=iana-crypt-hash&revision=2014-08-06 urn:notification_history?module=notification_history

urn:ietf:params:xml:ns:yang:iana-if-type?module=iana-if-type&revision=2017-01-19

=====

> subscribe

=====

Ok

=====

Step 1 The TER NETCONF Client sends the O-RU NETCONF Server a command to get the active-alarm-list.

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=====

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> get --filter-xpath /o-ran-fm:active-alarm-list/active-alarms
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SYSTEM LOGS

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Apr 14 05:29:56 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:56 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:29:56 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:56 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:29:57 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:57 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:29:57 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:57 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Successfully connected to 192.168.208.15:4334 over IPv4.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Session 101 (user "root", CID 1) created.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Received an SSH message "request-service" of subtype "ssh-userauth".

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Received an SSH message "request-auth" of subtype "password".

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: User "operator" authenticated.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Received an SSH message "request-channel-open" of subtype "session".

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Received an SSH message "request-channel" of subtype "subsystem".

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Call Home client "default-client" session 2 established.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Session 102 (user "root", CID 1) created.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There are no subscribers for "ietf-netconf-notifications" notifications.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Generated new event (netconf-session-start).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Published event "rpc" "/ietf-netconf:get" with ID 3 priority 0 for 1 subscribers.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Processing "/ietf-netconf:get" "rpc" event with ID 3 priority 0 (remaining 1 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Successful processing of "rpc" event with ID 3 priority 0 (remaining 0 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Event "rpc" with ID 3 priority 0 succeeded.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event new RPC.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Published event "rpc" "/ietf-netconf:get" with ID 4 priority 0 for 1 subscribers.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Processing "/ietf-netconf:get" "rpc" event with ID 4 priority 0 (remaining 1 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Published event "operational" "/o-ran-software-management:software-inventory" with ID 2.

Apr 14 05:29:58 garuda user.notice fw_manager[936]: RPC #2 recieved. xpath -> /o-ran-software-management:software-inventory

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Event "operational" with ID 2 succeeded.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "STL=O-RU", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "STL=O-RU", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Successful processing of "rpc" event with ID 4 priority 0 (remaining 0 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Event "rpc" with ID 4 priority 0 succeeded.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "STL=O-RU", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/o-ran-hardware:product-code" with the value "STL=O-RU", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event new RPC.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Published event "rpc" "/ietf-netconf:get-config" with ID 3 priority 0 for 1 subscribers.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Processing "/ietf-netconf:get-config" "rpc" event with ID 3 priority 0 (remaining 1 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Successful processing of "rpc" event with ID 3 priority 0 (remaining 0 subscribers).

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Event "rpc" with ID 3 priority 0 succeeded.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/ietf-hardware:name" with the value "ru-port0", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/ietf-hardware:name" with the value "ru-port0", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: There is no leafref
"/ietf-hardware:hardware/ietf-hardware:component/ietf-hardware:name" with the value "ru-port0", but it is not required.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.

Apr 14 05:29:58 garuda daemon.info netopeer2-server[859]: Session 2: thread 3 event new RPC.

Apr 14 05:29:59 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:29:59 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:30:00 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:30:00 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:30:01 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:30:01 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:30:02 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:30:02 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).

Apr 14 05:30:03 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:03 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:04 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:04 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:05 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:05 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:06 garuda user.notice SYNCMNGR[1182]: Received message from S-Plane
Apr 14 05:30:06 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:06 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:07 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:07 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:08 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:08 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:09 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:09 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:10 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:10 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:11 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:11 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Published event "rpc" "/notifications:create-subscription" with ID 2 priority 0 for 1 subscribers.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Processing "/notifications:create-subscription" "rpc" event with ID 2 priority 0 (remaining 1 subscribers).
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Successful processing of "rpc" event with ID 2 priority 0 (remaining 0 subscribers).
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Event "rpc" with ID 2 priority 0 succeeded.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event new RPC.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Published event "rpc" "/ietf-netconf:get" with ID 5 priority 0 for 1 subscribers.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Processing "/ietf-netconf:get" "rpc" event with ID 5 priority 0 (remaining 1 subscribers).
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Published event "operational" "/o-ran-fm:active-alarm-list/active-alarms" with ID 1.
Apr 14 05:30:12 garuda user.info FAULT MANAGEMENT[915]: ===== DATA FOR "o-ran-fm"
"/o-ran-fm:active-alarm-list/active-alarms" REQUESTED=====

Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Event "operational" with ID 1 succeeded.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Successful processing of "rpc" event with ID 5 priority 0 (remaining 0 subscribers).
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Event "rpc" with ID 5 priority 0 succeeded.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Resolving unresolved data nodes and their constraints...
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: All data nodes and constraints resolved.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event new RPC.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:12 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:13 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.

Apr 14 05:30:13 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:14 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:14 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:15 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:15 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:16 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:16 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event new RPC.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Session 2: thread 1 event session terminated.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: There are no subscribers for "ietf-netconf-notifications" notifications.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Generated new event (netconf-session-end).
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Call Home client "default-client" session terminated.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: Trying to connect via IPv4 to 192.168.208.15:4334.
Apr 14 05:30:17 garuda daemon.info netopeer2-server[859]: getsockopt() error (Connection refused).
Apr 14 05:30:17 garuda auth.info sshd[3625]: Accepted password for operator from 192.168.208.15 port 54332 ssh2
Apr 14 05:30:17 garuda authpriv.info sshd[3625]: pam_unix(sshd:session): session opened for user operator by (uid=0)

Expected Result : The O-RU NETCONF Server responds with <rpc-reply><data> where <data> contains at least the same alarm as reported in measurement atleast alarm 17: No external sync source

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***** **Actual Result** *****

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***** **FAIL_REASON** *****

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```
<?xml version="1.0" ?>
<data xmlns="urn:ietf:params:xml:ns:netconf:base:1.0" xmlns:nc="urn:ietf:params:xml:ns:netconf:base:1.0">
  <active-alarm-list xmlns="urn:o-ran:fm:1.0">
    <active-alarms>
      <fault-id>18</fault-id>
      <fault-source>Module</fault-source>
      <affected-objects>
        <name>Sync Module</name>
      </affected-objects>
      <fault-severity>CRITICAL</fault-severity>
      <is-cleared>>false</is-cleared>
      <fault-text>Synchronization Error</fault-text>
      <event-time>2027-04-14T05:28:28Z</event-time>
    </active-alarms>
  </active-alarm-list>
</data>
```

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Retrieval of Active Alarm List	=	FAIL
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