

FAQ Nx70 - SNMP explained

Introduction

On this page we would like to provide more details about the Nx70 SNMP and how to use a freeware tool for testing.

1. Download and install the freeware tool: <https://www.manageengine.com/products/mibbrowser-free-tool/>
2. N670 with the IP address 192.168.178.190
3. PC has the IP address: 192.168.178.14

From software 2.36 SNMP is disabled when the SNMP manager address = 0.0.0.0

Nx70 Settings

In the Nx70 web-interface go to: **SETTINGS - System - System log - SNMP statistics**

Enter the SNMP manager information, in this example my PC (192.168.178.14).

We used the default username and password.

SNMP statistics

SNMP manager address ?

192.168.178.14

SNMP manager port ?

162

SNMP username ?

admin


SNMP password ?

snmp-admin

 Use on all DECT Managers

Activate on all DECT Managers

Deactivate on all DECT Managers

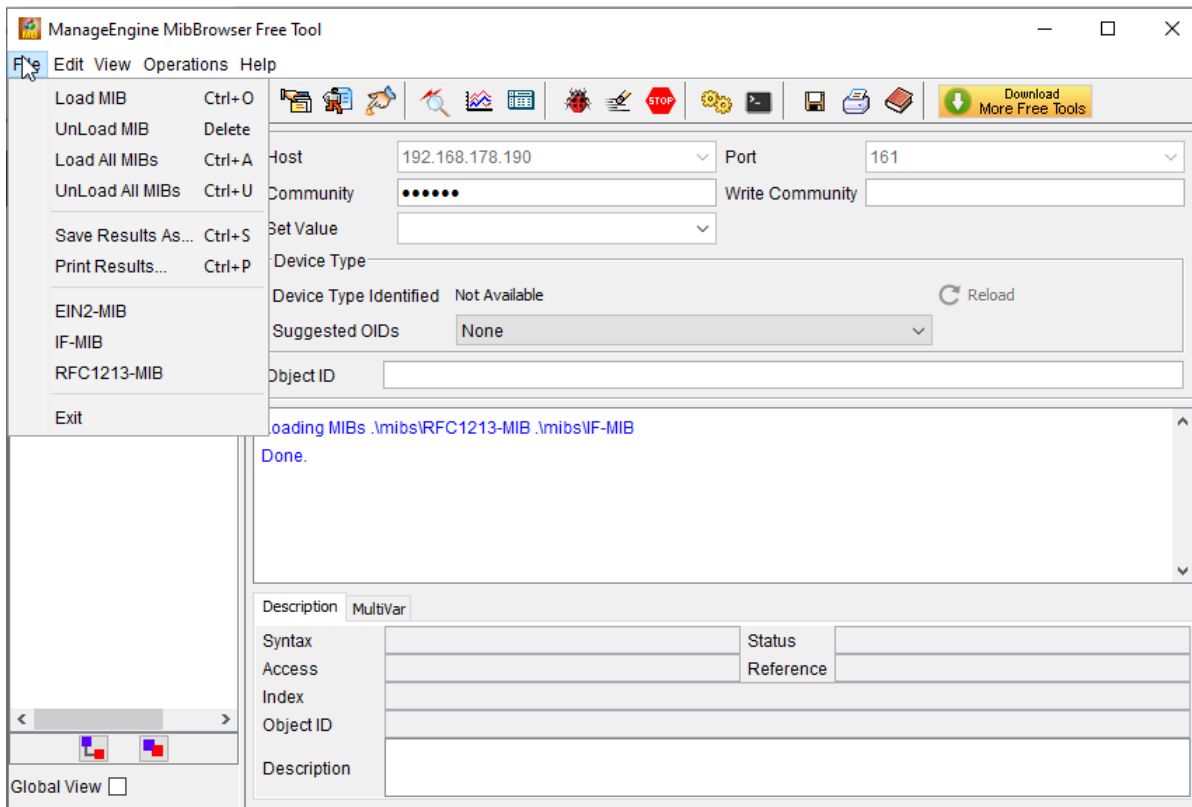
 Download MIB

On this page you can also download the Nx70 MIB file that you can then upload on your SNMP server.

SNMP tool settings

Import MIB file

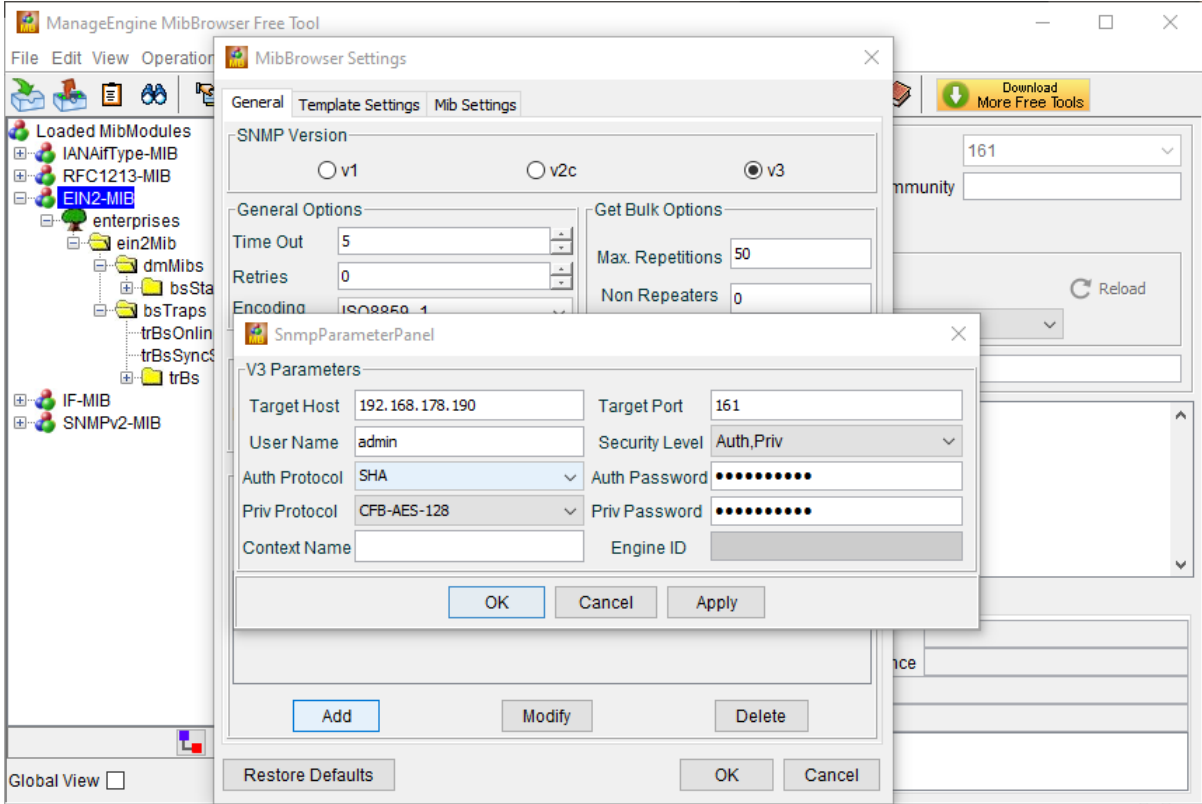
In the tool go to: File Load MIB



Enter login credentials.

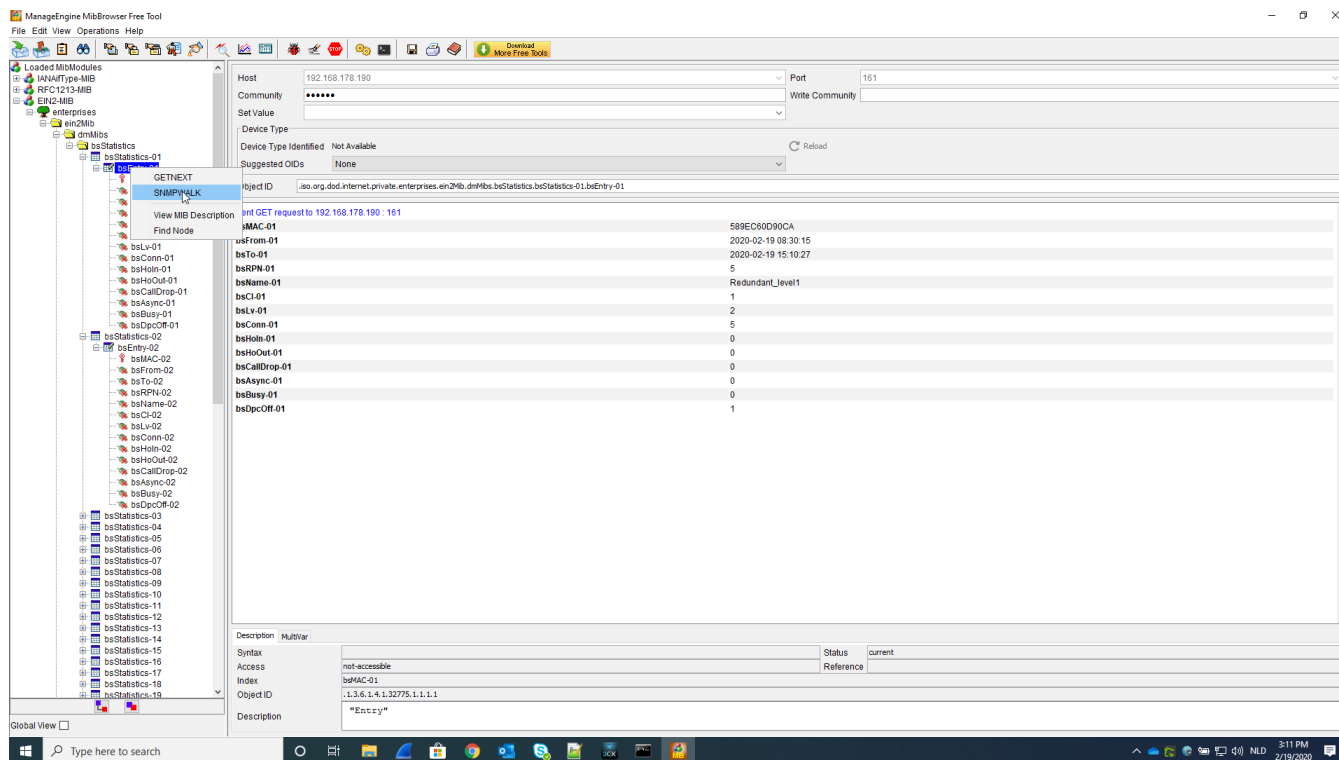
In the tool go to:

- **Edit - Settings**
- Select **SNMP v3**
- Click on **Add**
- **Target Host:** The IP address of the Nx70
- **Target port:** The port number (161)
- **Username:** The username configured in the Nx70 (admin)
- **Auth Password:** The password configured in the Nx70 (snmpadmin)
- **Priv Password:** The password configured in the Nx70 (snmpadmin)
- **Auth Protocol:** SHA
- **Priv Protocol:** CFB-AES-128



Read SNMP Values

- Select a base station
- Right click and select **SNMPWALK**
- You will get the supported SNMP values



Supported SNMP values	Description
bsMAC-xx	MAC address of Base station
bsFrom-..	BS start time when connection to DM
bsTo-..	actual time of BS connection to DM
bsRPN-..	RPN number
bsName-..	name of BS
bsCl-..	cluster level
bsLv-..	sync level
bsConn-..	DECT MAC layer connection setup
bsHoIn-..	Handover setup in
bsHoOut-..	Handover setup out
bsCallDrop-..	Call Drop
bsAsync-..	BS lost DECT synchronisation
bsBusy-..	Single module enter in busy state
bsDpcOff-..	TCP/IP connection toward base station was lost

SNMP Traps

Supported traps:

- BS synchronization status trap
- BS online/offline status trap

In the tool enabled the Trap viewer (ALT + P)

As mention above, Nx70 supports two Traps:

trBsOnlineState (OID: .1.3.6.1.4.1.32775.2.1) triggered when BS goes offline:

The screenshot shows the TrapViewer interface with a trap entry for trBsOnlineState. The trap details window is open, showing the following information:

- Timestamp: 0 hours, 30 minutes, 16 seconds.
- Enterprise: .1.3.6.1.4.1.32775.2.1.3.0
- Generic Type: .1.3.6.1.4.1.32775.2.1.3.0
- Specific Type: .1.3.6.1.4.1.32775.2.1.3.0
- Message: .1.3.6.1.4.1.32775.2.1.3.0: TimeTicks: 0 hours, 30 minutes, 16 seconds. .1.3.6.1.4.1.32775.2.1.3.0: BS TeléfonosMóvil: TRCF80CFDFA0
- Severity: Clear
- Entity: 172.29.19.176
- RemotePort: 43215
- LocalPort: 142
- Community: .1.3.6.1.4.1.32775.2.1.3.0
- Node: 172.29.19.176
- Source: 172.29.19.176
- TimeReceived: Thu Jan 10 09:50:46 CET 2019
- HelpURL: 0=0.html

trBsSyncState (OID: .1.3.6.1.4.1.32775.2.2) triggered when BS lost synchronization:

The screenshot shows the TrapViewer interface with a trap entry for trBsSyncState. The trap details window is open, showing the following information:

- Timestamp: 1 hours, 21 minutes, 16 seconds.
- Enterprise: .1.3.6.1.4.1.32775.2.1.3.0
- Generic Type: .1.3.6.1.4.1.32775.2.1.3.0
- Specific Type: .1.3.6.1.4.1.32775.2.1.3.0
- Message: .1.3.6.1.4.1.32775.2.1.3.0: TimeTicks: 1 hours, 21 minutes, 16 seconds. .1.3.6.1.4.1.32775.2.2: .180.org.dod.internet.private.enterprises.ein2Mib.bsTraps.trBs.trBsSeverity: 01 .01 .180.org.dod.internet.private.enterprises.ein2Mib.bsTraps.trBs.trBsEvent: 01 OutSync .180.org.dod.internet.private.enterprises.ein2Mib.bsTraps.trBs.trBsName: 01 BS TelefonosMóvil .180.org.dod.internet.private.enterprises.ein2Mib.bsTraps.trBs.trBsMAC: 01 TRCF80CFDFA0
- Severity: Clear
- Entity: 172.29.19.176
- RemotePort: 43215
- LocalPort: 142
- Community: .1.3.6.1.4.1.32775.2.1.3.0
- Node: 172.29.19.176
- Source: 172.29.19.176
- TimeReceived: Thu Jan 10 13:25:51 CET 2019
- HelpURL: 0=0.html