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**C:\Users\karpon\Documents\Real-Status Marketing Collateral\Logos\real-status logo.jpg**

OpenNMS Administration

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Introduction

OpenNMS is the NMS (Network Management System) that we have chosen to integrate with for v1 of the HyperGlance server. OpenNMS documentation is good and is available here: <http://www.opennms.org/wiki/Main_Page>

We intend to use OpenNMS v1.8.5 (the current stable version at time of writing) in v1 of the HyperGlance server. This version has been tested in our office environment and on various alpha customer sites.

Our version-controlled configuration

As we do not require OpenNMS to operate as a full Network Management Solution for HyperGlance we have modified the configurations to optimise performance for our requirements. These updated configurations will be provided at install time and on request to: support@real-status.com

The OpenNMS configuration files can be found in:

***/opt/opennms/etc/***

Specifying IP Discovery Ranges

The main file that IP address ranges need to be specified in is ***discovery-configuration.xml.***

New IP addresses can be added in one of two ways.

1. As a specific IP:

<specific retries =”1” timeout=”2000”>1.1.1.1</specific>

1. Included in a range:

<include-range>

<begin xmlns=””>1.1.1.1</begin>

<end xmlns=””>255.255.255.255</begin>

</include-range>

Care should be taken with the include range as the bigger the range specified the longer it will take to do the discovery – especially if there are a number of unused address (2s timeout per unused address).

Specifying SNMP Community Strings

The main file where SNMP Community Strings is stored is ***snmp-config.xml***.

As with the IP address configuration, strings can be added either as individuals or as ranges.

<definition read-community="public" version="v2c">

<ns1:range xmlns:ns1="http://xmlns.opennms.org/xsd/types"

begin="172.20.0.1" end="172.21.40.255"/>

</definition>

<definition read-community="cisco" version="v2c">

<specific>10.253.3.1</specific>

</definition>

Linkd VLAN config

If the client is not connecting a node or cluster of nodes to the main network this may be due to OpenNMS not issuing the correct SNMP request for the VLAN the device is on. If the device’s OID does not appear in the Linkd VLAN configuration then OpenNMS will not know to properly format the request. The configuration file is ***linkd-configuration.xml***.

For instance the default Extreme Networks section looks like this:

<vendor vendor\_name="Extreme Networks" sysoidRootMask=".1.3.6.1.4.1.1916"

class-name="org.opennms.netmgt.linkd.snmp.ExtremeNetworkVlanTable">

<specific>2.11</specific>

<specific>2.14</specific>

<specific>2.28</specific>

<specific>2.58</specific>

<specific>2.63</specific>

</vendor>

If the there is an Extreme device in your network which has an OID different to these and it also has a VLAN running over it. It will be necessary to add the parts of the sys oid after the Extreme Enterprise Tag (1916) to the above table.

E.g. If the device had a sysoid of.1.3.6.1.4.1.1916.2.65 you would add:

<specific>2.65</specific>

Performance data (RRD)

If the server OpenNMS is installed on is suffering from IO wait and becoming unresponsive it may be necessary to reduce the rate at which OpenNMS collects performance data. The configuration file is ***datacollection-config.xml***.

Increase the rrd step size (row 4). E.g.

<rrd step=”10000”>

<END PAGE>

**About Real-Status**

Real-Status is a modelling and visualisation Software Company based in Cambridge, UK.  Utilising sophisticated computer games graphics techniques and knowhow, it creates real-time models of enterprise’s IT infrastructure in 3D and overlays performance and business metrics, so IT managers can take informed and business-led decisions in context.

Real-Status’ software is currently in final testing with multiple customers, and it will be on general release in Q2 2011.  Real-Status’s software models both physical and virtual devices and their relationships, and it aggregates and visualises performance metrics from multiple management tools.

For more information visit [www.real-status.com](http://www.real-status.com/)