Using the LAN2 Port

The LAN2 port is a 10/100/1000Base-T Ethernet connector on the front panel of Infoblox-250-A, -550-A, -1050-A, -1550-A, -1552-A, -1852-A, and -2000-A, and -4010 appliances. The LAN2 port is not enabled by default. By default, an appliance uses the LAN1 port (and HA port when deployed in an HA pair). To enable and configure the LAN2 port, you must have read/write permission to the Multi-Grid Master or member on which you want to enable the port.

When you enable the LAN2 port and SNMP, the appliance sends traps from this port for LAN2 related events. You can enable the NIC redundancy feature, which groups the LAN1 and LAN2 ports into one logical interface. The LAN1/LAN2 grouping can be activated for IPv4 only. Alternatively, you can configure the LAN2 port on a different IP network than LAN1, and enable the LAN2 port to provide other services. For information about these features, see the following sections:

- For information about the LAN2 failover feature, see About NIC Redundancy.
- For information about configuring the LAN2 port, see Configuring the LAN2 Port.

Note that you cannot use the LAN2 port to access the GUI and the API, or to connect to the Multi-Grid Master. This can impact the ability of other appliances to communicate with the Multi-Grid Master.

About NIC Redundancy

You can configure the LAN2 port to provide redundancy and additional fault tolerance in your network. NIC (Network Interface Controller) redundancy is transparently supported for IPv4. When you enable NIC redundancy, the LAN1 and LAN2 ports are grouped into one logical interface. They share one IP address and appear as one interface to the network. Then, if a link to one of the ports fails or is disabled, the appliance fails over to the other port, avoiding a service disruption.

You can connect the LAN1 and LAN2 ports to the same switch or to different switches, but they must be on the same VLAN. One port is active and the other port is idle at all times. The other port becomes active only when the previously active port fails. The LAN1 and LAN2 ports share the IP address of the LAN1 port; the port that is currently active owns the IP address. When you enable services on the appliance, clients send their service requests to the LAN1 port IP address and receive replies from it as well. The port supports the services and features supported on the LAN1 port as listed in Table 8.2 and Table 8.3.

As shown in Figure 8.5, the member is connected to the Multi-Grid Master through its MGMT port, and the LAN1 and LAN2 ports are connected to the same switch. The LAN1 and LAN2 port share the IP address of the LAN1 port, which is 1.1.1.5. In the illustration, LAN1 is the active port. You can enable NIC redundancy on a single appliance. You cannot enable this feature on an HA pair.

Figure 8.5 Using the LAN2 Failover Feature
To enable the LAN2 port failover feature:

1. From the **Master Grid** tab, select the **Members** tab -> **master_grid_member** checkbox, and then click the Edit icon.

2. In the **Network** -> **Basic** tab of the **Master Grid Member Properties** editor, click the **Add** icon of the Additional Ports and Addresses table and select **LAN2 (Failover)**.
   Multi-Grid Manager adds the LAN2 (Failover) entry to the table with the address information filled in. You cannot enter a separate IP address for the LAN2 port because the LAN1 and LAN2 ports share the IP address of the LAN1 port.

3. Save the configuration.
   The **Detailed Status** panel displays the status of both the LAN1 and LAN2 ports.

**Configuring the LAN2 Port**

You can configure both IPv4 and IPv6 addresses for the LAN2 port of an IPv4 and a dual mode (IPv4 and IPv6) Grid member. To configure the LAN2 port:

1. From the **Master Grid** tab, select the **Members** tab -> **master_grid_member** checkbox, and then click the Edit icon.
2. In the **Network -> Basic** tab of the *Master Grid Member Properties* editor, click the *Add* icon of the *Additional Ports and Addresses* table and select **LAN2 (IPv4)** or **LAN2 (IPv6)** from the drop-down list. Enter the following:
   - **Interface**: Displays the name of the interface. You cannot modify this.
   - **Address**: Type the IP address for the LAN2 port, which must be in a different subnet from that of the LAN1 and HA ports.
   - **Subnet Mask (IPv4) or Prefix Length (IPv6)**: Specify an appropriate subnet mask for IPv4 address or prefix length for IPv6 address. The prefix length ranges from 2 to 127.
   - **Gateway**: Type the default gateway for the LAN2 port.
   - **Port Settings**: Choose the connection speed that you want the port to use. You can also choose the duplex setting. Choose **Full** for concurrent bidirectional data transmission or **Half** for data transmission in one direction at a time. Select **Automatic** to instruct the appliance to negotiate the optimum port connection type (full or half duplex) and speed with the connecting switch automatically. This is the default setting. You cannot configure port settings for vNIOS appliances.
   - **LAN2 Virtual Router ID (if HA)**: If the appliance is in an HA pair, enter a VRID number.
3. Save the configuration.