

# JNU 1.2R2 Release Notes

Release 1.2R2  
March 2013  
Revision 1

These release notes accompany JNU Release 1.2R2. They describe new features and known issues with the software.

## Contents

New Features .....	2
Support for JNU Satellites .....	2
Support for Junos OS .....	2
Support for Multichassis Link Aggregation Group (MC-LAG) .....	2
Support for Multicast .....	2
Support for JNU Management Plane Configuration Groups .....	3
Changes to Aggregated Ethernet Interfaces in the JNU Management Plane .....	3
Changes in Default Behavior and Syntax .....	4
Support for the Interface Range Feature on Satellites .....	4
Keyword Change in action Option .....	4
Upgrading Junos OS on Satellite Devices .....	4
Known Issues .....	5
Configuration When Virtual Chassis is Used on the Controller .....	5
JNU Documentation and Release Notes .....	6
Requesting Technical Support .....	6
Self-Help Online Tools and Resources .....	6
Opening a Case with JTAC .....	7
Revision History .....	7

## New Features

The following features were added to JNU Release 1.2.

### Support for JNU Satellites

JNU now provides support for the following devices as satellites:

- ACX1000 and ACX 2000 Universal Access Routers
- EX4500, EX4550, and EX6200 Ethernet Switches

### Support for Junos OS

Table 1 on page 2 shows the support for Junos OS releases in JNU 1.2R2.

Table 1: Junos OS Support in JNU 1.2R2

Platform	Junos OS Release
ACX1000 and ACX2000 Universal Access Routers	12.2R2.4
EX4200, EX4500, EX4550, EX3200, EX3300, and EX6200 Ethernet Switches	11.4R6, 12.1R3.5, 12.2R2.4
MX Series routers	11.4R6, 12.1R3.5, 12.2R2.4
QFX3500 device	11.4R6, 12.1R3.5 12.1X49-D1.2 (no MC-LAG support) 12.2X50-D20.4 (MC-LAG support)

### Support for Multichassis Link Aggregation Group (MC-LAG)

JNU now provides a configuration template that allows you to configure MC-LAG on QFX3500 devices. The name of the template is **config-mcae**.

In addition, JNU provides a configuration template that allows you to configure Inter-Control Center Communications Protocol (ICCP) for MC-LAG. The name of the template is **config-iccp**.

### Support for Multicast

JNU now provides the following templates that allow you to configure multicast on satellite devices:

- **config-igmp**
- **config-mvpn**
- **config-pim**
- **config-pim-interface**

- `config-pim-rp`
- `config-dvmrp`

## Support for JNU Management Plane Configuration Groups

When you initialize the controller and satellites for JNU, the management plane configurations that are created are placed in the following configuration groups, which makes it easier to view or remove the management plane configuration:

- `jnu-controller-mgmt`—Configuration group created on the controller
- `jnu-satellite-mgmt`—Configuration group created on the satellite

## Changes to Aggregated Ethernet Interfaces in the JNU Management Plane

If you configure only one Ethernet interface between the controller and a satellite, you have the option of not placing the Ethernet interface in an aggregated Ethernet bundle during the JNU initialization process. If you add a satellite using the `jnu-add-delete-satellites` command, you can use the `ieee-802.3ad` option to disable aggregated Ethernet on the interface between the controller and the satellite. If your satellite does not support aggregated Ethernet, you would choose not to configure aggregated Ethernet.

In previous releases, by default, the JNU assigned the last aggregated Ethernet interface for the JNU management network. This behavior has changed, and the JNU now assigns the first available aggregated Ethernet interface by default. If you do not want to use the default interface, you can now specify the aggregated Ethernet ID during JNU initialization or by using the `jnu-add-delete-satellites` command with the `ae-id` option.

If needed, you can view the aggregated Ethernet device count configured on the satellite and change the device count to accommodate the aggregated Ethernet interface created for JNU.

```
user@controller> show chassis
aggregated-devices {
  ethernet {
    device-count 150;
  }
}
```

To view this information from the controller:

```
user@controller> op jnu-show-configuration device satellite-name display commit-script
source committed
```

## Changes in Default Behavior and Syntax

- [Support for the Interface Range Feature on Satellites](#)
- [Keyword Change in action Option](#)

### Support for the Interface Range Feature on Satellites

The **config-interface** template now allows you to configure the interface range feature that is defined under the **[edit interfaces interface-range name]** hierarchy in the Junos OS. Also, the **interface-name** keyword in the **config-interface** template is changed to **interface**.

### Keyword Change in action Option

The **action** option in the JNU configuration templates, in the **config-free-form** command, and in the **jnu-add-delete-satellites** command is changed. The **action** option now supports the **set** keyword in place of the **create** keyword.

For backward compatibility, the **add** and **create** keywords are accepted, but we recommend that you use the **set** keyword.

## Upgrading Junos OS on Satellite Devices

You need to upgrade the Junos OS directly on the satellite device. The procedure is as follows:

1. Deactivate the JNU configuration.

If you are using JNU Release 1.1 or earlier, deactivate the **jnu-module** apply-group and group:

```
[edit]
user@jnu-satellite1# deactivate apply-groups jnu-module
user@jnu-satellite1# deactivate groups jnu-module
```

If you are using JNU Release 1.2, deactivate the **jnu-satellite-mgmt** group:

```
[edit]
user@jnu-satellite1# deactivate apply-groups jnu-satellite-mgmt
user@jnu-satellite1# deactivate groups jnu-satellite-mgmt
```

2. Commit the changes.

```
[edit]
user@jnu-satellite1# commit
```

3. Perform the Junos OS upgrade as you normally would.

4. Reinstall JNU.

```
user@jnu-satellite1> request system software add jnu-1.2R1.2-signed.tgz
```

```
Installing package '/var/tmp/jnu-1.2R1.2-signed.tgz' ...
Verified jnu-1.2R1.2.tgz signed by PackageProduction_11_4_0 Adding jnu...
Available space: 556676 require: 3220
NOTICE: uncommitted changes have been saved in
/var/db/config/juniper.conf.pre-install
Mounted jnu package on /dev/md10...
```

```
Restarting bslockd ...
mgd: commit complete
Saving package file in /var/sw/pkg/jnu-1.2R1.2-signed.tgz ...
Saving state for rollback ...
```

5. Reactivate the JNU configuration.

If you are using JNU Release 1.1 or earlier, reactivate the `jnu-module` apply-group and group:

```
[edit]
user@jnu-satellite1# activate apply-groups jnu-module
user@jnu-satellite1# activate groups jnu-module
```

If you are using JNU Release 1.2, activate the `jnu-satellite-mgmt` apply-group and group:

```
[edit]
user@jnu-satellite1# activate apply-groups jnu-satellite-mgmt
user@jnu-satellite1# activate groups jnu-satellite-mgmt
```

6. Commit the changes.

```
[edit]
user@host# commit
```

## Known Issues

---

This section describes known issues.

### Configuration When Virtual Chassis is Used on the Controller

The controller initialization process creates a Network Address Translation (NAT) configuration that translates the source address of the satellite devices to the source address of the controller for network management traffic. However, the virtual chassis feature does not support services inline NAT. If you are using the virtual chassis feature on the controller, the controller initialization process creates the following configuration in place of the NAT configuration:

```
system {
  syslog {
    host syslog-server {
      source-address controller-ip-address;
    }
  }
}
snmp {
  trap-options {
    source-address controller-ip-address;
  }
}
interfaces {
  lo0 {
    unit 0 {
      family inet {
        address controller-ip-address;
      }
    }
  }
}
```

```
}  
  }  
} }
```

## JNU Documentation and Release Notes

---

For a list of related JNU documentation, see [http://www.juniper.net/techpubs/en\\_US/release-independent/jnu/jnu-index.html](http://www.juniper.net/techpubs/en_US/release-independent/jnu/jnu-index.html).

If the information in the latest release notes differs from the information in the documentation, follow the *JNU Release Notes*.

To obtain the most current version of all Juniper Networks technical documentation, see the product documentation page on the Juniper Networks website at <http://www.juniper.net/techpubs/>.

## Requesting Technical Support

---

Technical product support is available through the Juniper Networks Technical Assistance Center (JTAC). If you are a customer with an active J-Care or JNASC support contract, or are covered under warranty, and need post-sales technical support, you can access our tools and resources online or open a case with JTAC.

- JTAC policies—For a complete understanding of our JTAC procedures and policies, review the *JTAC User Guide* located at <http://www.juniper.net/us/en/local/pdf/resource-guides/7100059-en.pdf> .
- Product warranties—For product warranty information, visit <http://www.juniper.net/support/warranty/> .
- JTAC hours of operation—The JTAC centers have resources available 24 hours a day, 7 days a week, 365 days a year.

## Self-Help Online Tools and Resources

For quick and easy problem resolution, Juniper Networks has designed an online self-service portal called the Customer Support Center (CSC) that provides you with the following features:

- Find CSC offerings: <http://www.juniper.net/customers/support/>
- Search for known bugs: <http://www2.juniper.net/kb/>
- Find product documentation: <http://www.juniper.net/techpubs/>
- Find solutions and answer questions using our Knowledge Base: <http://kb.juniper.net/>
- Download the latest versions of software and review release notes: <http://www.juniper.net/customers/csc/software/>
- Search technical bulletins for relevant hardware and software notifications: <https://www.juniper.net/alerts/>

- Join and participate in the Juniper Networks Community Forum:  
<http://www.juniper.net/company/communities/>
- Open a case online in the CSC Case Management tool: <http://www.juniper.net/cm/>

To verify service entitlement by product serial number, use our Serial Number Entitlement (SNE) Tool: <https://tools.juniper.net/SerialNumberEntitlementSearch/>

## Opening a Case with JTAC

You can open a case with JTAC on the Web or by telephone.

- Use the Case Management tool in the CSC at <http://www.juniper.net/cm/> .
- Call 1-888-314-JTAC (1-888-314-5822 toll-free in the USA, Canada, and Mexico).

For international or direct-dial options in countries without toll-free numbers, see <http://www.juniper.net/support/requesting-support.html> .

## Revision History

---

March 2013—Revisions, JNU Release 1.2R2

Copyright © 2013, Juniper Networks, Inc. All rights reserved.

Juniper Networks, Junos, Steel-Belted Radius, NetScreen, and ScreenOS are registered trademarks of Juniper Networks, Inc. in the United States and other countries. The Juniper Networks Logo, the Junos logo, and JunosE are trademarks of Juniper Networks, Inc. All other trademarks, service marks, registered trademarks, or registered service marks are the property of their respective owners.

Juniper Networks assumes no responsibility for any inaccuracies in this document. Juniper Networks reserves the right to change, modify, transfer, or otherwise revise this publication without notice.

Products made or sold by Juniper Networks or components thereof might be covered by one or more of the following patents that are owned by or licensed to Juniper Networks: U.S. Patent Nos. 5,473,599, 5,905,725, 5,909,440, 6,192,051, 6,333,650, 6,359,479, 6,406,312, 6,429,706, 6,459,579, 6,493,347, 6,538,518, 6,538,899, 6,552,918, 6,567,902, 6,578,186, and 6,590,785.