Installation — MAC Addresses

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Chapter 1: New in this release

See the following sections for details about what's new in Avaya Ethernet Routing Switch 8300 Installation — MAC Addresses (NN46200-600) for Release 4.0:

- Features on page 5
- Other changes on page 5

Features

There are no new feature-related changes for this document release.

Other changes

This document is reformatted to comply with Avaya Customer Documentation Standards.

Chapter 2: Installation — MAC addresses

This document describes how to upgrade the media access control (MAC) addresses to a total of 4096 MAC addresses on the following Avaya Ethernet Routing Switch 8000 Series chassis:

- Ethernet Routing Switch 8010co
- Ethernet Routing Switch 8010
- Ethernet Routing Switch 8006

This new block of 4096 MAC addresses overwrites the 1024 MAC addresses currently on the Ethernet Routing Switch 8000 Series chassis. (This prevents overlapping MAC addresses.)

Your MAC address kit contains:

- an Additional MAC Addresses License
- two labels printed with the base MAC address of your new block of MAC Addresses
- documentation

Navigation

- Customer service on page 7
- Before you start on page 8
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Customer service

This section explains how to get help for Avaya products and services.

Getting technical support from the Avaya Web site

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Getting help from a distributor or reseller

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Getting technical support from the Avaya Web site

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Before you start

Reprogramming the chassis MAC address range requires a system reboot upon completion. Schedule chassis MAC reprogramming accordingly.

You need the following information to install the new block of MAC addresses to your 8000 chassis:

- License code
- Base MAC address of your new block of MAC addresses

You will find this information on the Additional MAC Addresses License.

Warning:

Each Additional MAC Addresses License allows you to upgrade one switch. If you enter the same license code on two switches, both switches will be configured with the same MAC address which will result in serious networking issues.

Installing MAC addresses using the CLI

You can use the Command Line Interface (CLI) to install the new block of MAC addresses. The required CLI command is in the boot monitor or run-time CLI.

The CLI command is a hidden command; it does not show in response to the `?` command.

1. At the prompt, enter:

   ```
   config bootconfig upgrade-mac-addr <base-mac-addr>
   <licensecode>
   ```

   The system displays the following information:

   ```
   Base MAC address: <base-mac-addr> License Code: <licensecode>
   Are you sure you want to upgrade the Mac addresses (y/n)?
   ```

2. Enter `y`.

   Caution:

   Risk of equipment damage

   You are about to reprogram your chassis EEPROM. Do NOT turn off power or press reset until the process is complete. Otherwise, the chassis may be permanently damaged.

   After the MAC address upgrade successfully completes, the system displays the following information:

   ```
   You have successfully completed reprogramming the Chassis with 4096 MAC
   addresses. Please write down the Chassis Serial number as displayed below
   in the upgrade kit sent to you for your records. Chassis serial number is:
   (ddddddddd) Please place the supplied MAC address barcode label on the
   right side of the chassis. Please place the second supplied MAC address
   label (number only) over the existing label on the front of the chassis.
   Need to reboot the switch for the upgraded MAC address kit to take effect.
   Do you want to reboot the switch now?
   (y/n)
   ```

3. Enter `y`.

   The system displays the following information:

   ```
   For Dual CPU, SLAVE CPU also needs to be re-booted.
   ```

This message appears even if the slave CPU is inactive or if you are working on a 3-slot chassis.

4. Reboot the switch.

Variable definitions

Variable	Value
base-mac-addr	Specifies the base MAC address shown on the Additional MAC Addresses License in the box labeled Base MAC Address. Enter this address in the format xx:xx:xx:xx:xx:xx
licensecode	Specifies the license code shown on the Additional MAC Addresses License in the box labeled License Code.

Installing MAC addresses using the ACLI

You can use the ACLI to install the new block of MAC addresses. The required ACLI command is in Global Configuration mode.

The ACLI command is a hidden command; it does not show in response to the `?` command.

1. At the prompt, enter:

   ```
   bootconfig upgrade-mac-addr <base-mac-addr> <licensecode>
   ```

   The system displays the following information:

   ```
   Base MAC address: <base-mac-addr>
   License Code: <licensecode>
   Are you sure you want to upgrade the Mac
   addresses (y/n)?
   ```

2. Enter `y`.

   Caution:
   Risk of equipment damage

   You are about to reprogram your chassis EEPROM. Do NOT turn off power or press reset until the process is complete. Otherwise, the chassis may be permanently damaged.

After the MAC address upgrade successfully completes, the system displays the following information:

```
You have successfully completed reprogramming the Chassis with 4096 MAC
addresses. Please write down the Chassis Serial number as displayed below
in the upgrade kit sent to you for your records. Chassis serial number is:
(ddddddddd) Please place the supplied MAC address barcode label on the
right side of the chassis. Please place the second supplied MAC address
label (number only) over the existing label on the front of the chassis.
Need to reboot the switch for the upgraded MAC address kit to take effect.
Do you want to reboot the switch now?
(y/n)
```

3. Enter `y`.

   The system displays the following information:

   ```
   For Dual CPU, SLAVE CPU also needs to be re-booted.
   ```

   This message appears even if the slave CPU is inactive or if you are working on a 3-slot chassis.

4. Reboot the switch.

Variable definitions

Variable	Value
base-mac-addr	Specifies the base MAC address shown on the Additional MAC Addresses License in the box labeled Base MAC Address. Enter this address in the format xx:xx:xx:xx:xx:xx
licensecode	Specifies the license code shown on the Additional MAC Addresses License in the box labeled License Code.

Using the CLI to display the base MAC address

Display the base MAC address to ensure that it is correct.

1. Enter:

   ```
   show sys info
   ```

2. The system displays the following information:

   ```
   Sys Info:
   General Info:
   ```

```
SysDescr     ERS-1 (3.5.00)
SysName      ERS-1
SysUpTime    11 day(s), 22:21:20
SysContact   John Doe x57533
SysLocation: Main Lab
Chassis Info:
Chassis       8010
Serial #      ssnm000016
HwRev         1
NumSlots      10
NumPorts      143
GlobalFilter  enable
VLANBySrcMac  disable
Ecn-Compatib :enable
BaseMacAddr   00:80:2d:39:d0:00
MacAddrCapacity: 4096
Temperature    32 C
MgmtMacAddr   00:80:2d:39:d3:f4
System MTU    1950
clock_sync_time: 60
```

You can also display the base MAC address using the CLI command `show tech`.

Using the ACLI to display the base MAC address

View the base MAC address to ensure that it is correct.

1. Access Global Configuration mode.
2. Enter:

   ```
   show sys-info
   ```

3. The system displays the following information:

   ```
   ERS-8310:5(config)#show sys-info

   msg-control : disable

   General Info:
   SysDescr     ERS-8310 (2.0.0.0)
   SysName      ERS-8310
   SysUpTime    16 day(s), 20:14:20
   SysContact   John Doe
   SysLocation: Main Lab
   Chassis Info:
   Chassis       8310
   Serial #      ssnm00000Q
   HwRev         A
   NumSlots      10
   NumPorts      143
   GlobalFilter  enable
   VLANBySrcMac  disable
   Ecn-Compatib :enable
   BaseMacAddr   00:80:2d:39:d0:00
   MacAddrCapacity: 4096
   Temperature    32 C
   ```

```
MgmtMacAddr   00:80:2d:39:d3:f4
clock_sync_time: 60
```

You can also display the base MAC address using the ACLI command `show tech`.

Using Device Manager to display the base MAC address

View the base MAC address to ensure that it is correct.

1. Launch Device Manager.
2. Select the chassis.
3. Choose **Edit**.

   The Chassis tab opens with the System Tab displayed.
4. Choose the **Chassis** tab.

   BaseMacAddr shows the base MAC address.



After upgrading to 4096 MAC addresses, MacAddrCapacity specifies 4096 (not 1024 as shown here).

Variable definitions

Variable	Value
BaseMacAddr	Displays the base MAC address information
MacAddrCapacity	Displays the total number of MAC addresses

Applying the labels

Apply the labels so that all personnel have easy access to MACaddress information.

1. Place the supplied MAC address barcode label on the right side of the chassis near the serial order number and order number labels.
2. Place the other label (number only) on the front of the chassis over the existing label for easy reference.

   Not all chassis have an existing label on the front of the chassis.

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