

Configure SSH Algorithms

OPERATING INSTRUCTIONS

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1 Description

This instruction describes how to configure a system-wide Secure Shell (SSH) algorithm setting.

2 Procedure

2.1 Configure SSH Algorithms

Prerequisites

- No documents are required.
- No tools are required.
- The following conditions must apply:
 - The user has the System Security Administrator role.
 - The list of wanted set of algorithms is known.
 - The user has basic knowledge of cryptography.
 - An Ericsson Command-Line Interface (ECLI) session in Exec mode is in progress.

Steps

1. Navigate to *Ssh* Managed Object (MO), for example:

```
>dn ManagedElement=NODE06ST, SystemFunctions=1, SecM=1, Ssh=1
```

2. Enter Config mode:

```
(Ssh=1) >configure
```

3. Is it required to change `selectedCiphers`?

Yes: Continue with next step.

No: Proceed with Step 5.



Note: The strongest SSH ciphers are selected by default.

4. Set attribute `selectedCiphers` to configure ciphers, for example:

```
(config-Ssh=1) >selectedCiphers=[aes256-ctr,aes192-ctr,aes128-ctr]
```

The string list must follow the constraints stated in datatype `SshAlgorithm` under `Ssh`.

5. Is it required to change `selectedKeyExchanges`?

Yes: Continue with next step.

No: Proceed with Step 7.

Note: The strongest key exchanges are selected by default.

6. Set attributes `selectedKeyExchanges` to configure key exchanges, for example:

```
(config-Ssh=1) >selectedKeyExchanges=[diffie-hellman-group-exchange-sha1,diffie-hellman-group14-sha1]
```

The string list must follow the constraints stated in datatype `SshAlgorithm` under `Ssh`.

7. Is it required to change `selectedMacs`?

Yes: Continue with next step.

No: Proceed with Step 9.

Note: The strongest message authentication codes are selected by default.

8. Set attributes `selectedMacs` to configure message authentication codes, for example:

```
(config-Ssh=1) >selectedMacs=[hmac-ripemd160@openssh.com,hmac-ripemd160,hmac-sha1-96]
```

The string list must follow the constraints stated in datatype `SshAlgorithm` under `Ssh`.

9. Commit the settings:

```
(config-Ssh=1) >commit
```

10. Verify the settings:

```
(Ssh=1) >show -v
```

The following is an example output:



```
selectedCiphers
  "aes256-ctr"
  "aes192-ctr"
  "aes128-ctr"
selectedKeyExchanges
  "diffie-hellman-group-exchange-sha1"
  "diffie-hellman-group14-sha1"
selectedMacs
  "hmac-ripemd160@openssh.com"
  "hmac-ripemd160"
  "hmac-sha1-96"
[...]
```