

Procedimento de atualização do Catalyst 6500 Series Switch ISSU com 6800IA (FEX) conectado

Contents

[Introduction](#)

[Prerequisites](#)

[Requirements](#)

[Componentes Utilizados](#)

[Procedimento de atualização](#)

[Configuração inicial](#)

[Etapas de atualização](#)

[Verificar](#)

Introduction

Este documento descreve um procedimento passo a passo de In-Service Software Upgrade (ISSU) em Cisco Catalyst 6500 Series Switches no modo Virtual Switching System (VSS) com o uso do Supervisor 2T com Cisco Catalyst 6800 Instant Access Switches (FEX) dual-homed conectado.

Prerequisites

Requirements

Não existem requisitos específicos para este documento.

Componentes Utilizados

As informações neste documento são baseadas nos Cisco Catalyst 6500 Series Switches no modo VSS que executam o Supervisor Engine 2T com um 6800IA dual-homed conectado em placas de linha WS-X6904-40G.

The information in this document was created from the devices in a specific lab environment. All of the devices used in this document started with a cleared (default) configuration. If your network is live, make sure that you understand the potential impact of any command.

Procedimento de atualização

Configuração inicial

O procedimento de atualização é executado para o Cisco IOS® Software Release 15.1(2)SY para a Versão 15.1(2)SY1.

Aqui estão as estatísticas antes do processo ISSU:

- O chassi do Catalyst 6500 com ID do Switch 1 está ativo e o Switch com ID 2 está em standby (quente).
- Ambos os chassis estão ativos no Cisco IOS Software Release 15.1(2)SY.
- Um único 6800IA que executa o software Cisco IOS versão 15.0(2)EX2 está conectado ao VSS em placas de linha WS-X6904-40G com uma conexão dual-home. O número do canal da porta FEX é 99 e o ID FEX é 110.

```
6K1#show mod sw all
```

```
Switch Number:      1    Role:    Virtual Switch Active
-----
Mod Ports Card Type                               Model                               Serial No.
-----
 2     5 Supervisor Engine 2T 10GE w/ CTS (Acti VS-SUP2T-10G          SAL1632K9P2
 3    20 DCEF2T 4 port 40GE / 16 port 10GE      WS-X6904-40G          SAL1741E4ZA

Mod MAC addresses                               Hw   Fw           Sw           Status
-----
 2 c471.fe7c.de96 to c471.fe7c.de9d  1.3  12.2(50r)SYS 15.1(2)SY  Ok
 3 e02f.6d6a.698c to e02f.6d6a.699f  1.0  12.2(50r)SYL 15.1(2)SY  Ok

Mod  Sub-Module                               Model                               Serial           Hw   Status
-----
 2  Policy Feature Card 4                      VS-F6K-PFC4          SAL1637MCQQ      1.2  Ok
 2  CPU Daughterboard                          VS-F6K-MSFC5         SAL1637MKX8      1.4  Ok
 3  Distributed Forwarding Card WS-F6K-DFC4-E        SAL1745FSD6        1.0  Ok

Mod  Online Diag Status
-----
 2  Pass
 3  Pass

Switch Number:      2    Role:    Virtual Switch Standby
-----
Mod Ports Card Type                               Model                               Serial No.
-----
 2     5 Supervisor Engine 2T 10GE w/ CTS (Hot) VS-SUP2T-10G          SAL1650UC8L
 3    20 DCEF2T 4 port 40GE / 16 port 10GE      WS-X6904-40G          SAL17173QD3

Mod MAC addresses                               Hw   Fw           Sw           Status
-----
 2 2c54.2dc4.2f3a to 2c54.2dc4.2f41  1.4  12.2(50r)SYS 15.1(2)SY  Ok
 3 70ca.9b8f.510c to 70ca.9b8f.511f  1.0  12.2(50r)SYL 15.1(2)SY  Ok

Mod  Sub-Module                               Model                               Serial           Hw   Status
-----
 2  Policy Feature Card 4                      VS-F6K-PFC4          SAL1651UG8P      1.2  Ok
 2  CPU Daughterboard                          VS-F6K-MSFC5         SAL1651UEBY      1.5  Ok
```

3 Distributed Forwarding Card WS-F6K-DFC4-E SAL17173QHY 1.2 Ok

Mod Online Diag Status

2 Pass

3 Pass

Switch Number: 110 Role: FEX

Mod Ports Card Type Model Serial No.

Mod	Ports	Card Type	Model	Serial No.
1	48	C6800IA 48GE	C6800IA-48TD	FOC1736W1A6

Mod MAC addresses Hw Fw Sw Status

Mod	MAC addresses	Hw	Fw	Sw	Status
1	c025.5cc2.2d00 to c025.5cc2.2d33	0.0	Unknown	15.0(2)EX2	Ok

Mod Online Diag Status

1 Pass

6K1#show switch virtual

Switch mode : Virtual Switch

Virtual switch domain number : 100

Local switch number : 1

Local switch operational role: Virtual Switch Active

Peer switch number : 2

Peer switch operational role : Virtual Switch Standby

Etapas de atualização

1. Verifique se a nova imagem do Cisco IOS (Cisco IOS Software Release 15.1(2)SY1) está presente no disco de inicialização e no disco de inicialização.

6K1#dir bootdisk: | in s2t54

```
5 -rw- 120035816 Jan 23 2014 22:35:12 +00:00
s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
8 -rw- 119792104 Feb 10 2014 19:42:12 +00:00
s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
```

6K1#dir slavebootdisk: | in s2t54

```
5 -rw- 120035816 Jan 23 2014 22:26:14 +00:00
s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
8 -rw- 119792104 Feb 10 2014 19:46:14 +00:00
s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
```

2. (Opcional) Use estes comandos para verificar se o VSS está pronto para executar o procedimento de atualização:

show issue state detailshow redundancyshow module switch all6K1#mostrar detalhes do estado do problema

O sistema está configurado para ser atualizado em modo de escalonamento.

Dois nós de supervisor estão online.

Resumo: o sistema será atualizado no modo em tandem.

Slot = 1/2
RP State = Active
ISSU State = Init
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
Operating Mode = sso
ISSU Sub-State = No Upgrade Operation in Progress
Starting Image = N/A
Target Image = N/A
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin

Slot = 2/2
RP State = Standby
ISSU State = Init
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
Operating Mode = sso
ISSU Sub-State = No Upgrade Operation in Progress
Starting Image = N/A
Target Image = N/A
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin

This system is Fex-capable

Fex-ID ISSU Status

110 FEX_INIT

6K1#

6K1#**show redundancy**

Redundant System Information :

Available system uptime = 36 minutes
Switchovers system experienced = 0
Standby failures = 0
Last switchover reason = none

Hardware Mode = Duplex
Configured Redundancy Mode = sso
Operating Redundancy Mode = sso
Maintenance Mode = Disabled
Communications = Up

Current Processor Information :

Active Location = slot 1/2
Current Software state = ACTIVE
Uptime in current state = 36 minutes
Image Version = Cisco IOS Software, s2t54 Software
(s2t54-ADVENTERPRISEK9-M),
Version 15.1(2)SY, RELEASE SOFTWARE (fc4)
Technical Support: <http://www.cisco.com/techsupport>
Copyright (c) 1986-2013 by Cisco Systems, Inc.
Compiled Wed 04-Sep-13 12:37 by prod_rel_team
BOOT = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
CONFIG_FILE =
BOOTLDR =
Configuration register = 0x2102

Peer Processor Information :

```

-----
Standby Location = slot 2/2
Current Software state = STANDBY HOT
Uptime in current state = 34 minutes
Image Version = Cisco IOS Software, s2t54 Software
(s2t54-ADVENTERPRISEK9-M),
Version 15.1(2)SY, RELEASE SOFTWARE (fc4)
Technical Support: http://www.cisco.com/techsupport
Copyright (c) 1986-2013 by Cisco Systems, Inc.
Compiled Wed 04-Sep-13 12:37 by prod_rel_team
BOOT = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
CONFIG_FILE =
BOOTLDR =
Configuration register = 0x2102

```

3. Use o comando de **problemas de loadoração** para iniciar o processo de atualização.

Nesta etapa, o chassi em standby do VSS é reinicializado, recarregado com a nova imagem e inicializa como o chassi em standby do VSS no modo de redundância SSO, executando a nova imagem. Esta etapa é concluída quando a configuração do chassi é sincronizada, como indicado pela mensagem de **sincronização em massa bem-sucedida**. Pode levar de alguns segundos a alguns minutos para que a nova imagem seja carregada e para que o chassi de espera do VSS faça a transição para o modo SSO.

```

6K1#issu loadversion 1/2 bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
2/2 slavebootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

```

```

System configuration has been modified. Save? [yes/no]: yes
Building configuration...
[OK]
%issu loadversion initiated successfully, upgrade sequence will begin shortly

```

```

6K1#
*Feb 11 05:24:40.091: %ISSU_PROCESS-SW1-3-LOADVERSION: Loadversion sequence
will begin in 60 seconds. Enter 'issu abortversion' to cancel.

*Feb 11 05:25:10.091: %ISSU_PROCESS-SW1-6-LOADVERSION_INFO: Resetting Standby shortly

```

<..output truncated..>

```

*Feb 11 05:29:46.075: %VS_GENERIC-SW1-6-VS_HA_HOT_STANDBY_NOTIFY: Standby switch
is in Hot Standby mode
*Feb 11 05:29:46.079: %HA_CONFIG_SYNC-SW1-6-BULK_CFGSYNC_SUCCEED: Bulk Sync succeeded
*Feb 11 05:29:46.079: %RF-SW1-5-RF_TERMINAL_STATE: Terminal state reached for (SSO)

*Feb 11 05:30:25.091: %ISSU_PROCESS-SW1-3-LOADVERSION: Loadversion has completed.
Please issue the 'issu runversion' command after all modules come online.

```

```

!
! Boot variable for standby should point to new Image in "show issu state detail" output.

```

```

6K1#show issu state det
The system is configured to be upgraded in staggered mode.
2 supervisor nodes are found to be online.
Summary: an in-tandem upgrade is in progress.

Slot = 1/2
RP State = Active
ISSU State = Load Version

```

```
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
Operating Mode = sso
ISSU Sub-State = Load Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
```

```
Slot = 2/2
RP State = Standby
ISSU State = Load Version
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12
Operating Mode = sso
ISSU Sub-State = Load Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
```

This system is Fex-capable

```
Fex-ID    ISSU Status
```

```
110      FEX_UPGRADE_INIT
```

```
6K1#show redundancy states
```

```
my state = 13 -ACTIVE
peer state = 8 -STANDBY HOT
Mode = Duplex
Unit = Secondary
Unit ID = 18
```

```
Redundancy Mode (Operational) = sso
Redundancy Mode (Configured) = sso
Redundancy State = sso
Maintenance Mode = Disabled
Manual Swact = enabled
Communications = Up
```

```
client count = 144
client_notification_TMR = 30000 milliseconds
keep_alive TMR = 9000 milliseconds
keep_alive count = 1
keep_alive threshold = 19
RF debug mask = 0x0
```

- Quando o chassi de standby do VSS executa com êxito a nova imagem no estado de redundância SSO e todas as placas de linha no chassi de standby do VSS estão ativadas e on-line, insira o comando **issue runversion** para forçar um switchover. O chassi em standby do VSS atualizado assume como o novo chassi ativo, executando a nova imagem. O chassi anteriormente ativo é recarregado e inicializado como o novo chassi em espera VSS no modo SSO, executando a imagem antiga (caso a atualização do software precise ser cancelada e a imagem antiga restaurada). Esta etapa é concluída quando a configuração do chassi é sincronizada, como indicado pela mensagem **de sincronização em massa bem-sucedida**.

6K1#runversion de problema

Este comando reiniciará a unidade ativa.

Proceed ? [confirm]

%issu runversion initiated successfully

*Feb 11 05:35:19.035: %RF-SW1-5-RF_RELOAD: Self reload. Reason: Admin ISSU
runversion CLI
<..output truncated..>

Feb 11 05:35:21.411: %SYS-SW1-5-SWITCHOVER: Switchover requested by Exec.
Reload Reason: Admin ISSU runversion CLI.
Resetting

!

!Standby chassis now becomes active. Below logs are from new active switch.

!

Initializing as Virtual Switch ACTIVE processor

.

.

*Feb 11 05:37:36.107: %PFREDUN-SW2-6-ACTIVE: Standby initializing for SSO mode

***Feb 11 05:39:56.563: %HA_CONFIG_SYNC-SW2-6-BULK_CFGSYNC_SUCCEED: Bulk Sync succeeded**

***Feb 11 05:39:56.563: %RF-SW2-5-RF_TERMINAL_STATE: Terminal state reached for (SSO)**

*Feb 11 05:39:56.555: %PFREDUN-SW1_STBY-6-STANDBY: Ready for SSO mode in Default Domain

! Wait till all the modules and Fex Port-channel 99 links come up

!

*Feb 11 05:41:28.467: %ISSU_PROCESS-SW2-6-RUNVERSION_INFO: Runversion has completed.

Please issue the 'issu acceptversion' command

Feb 11 05:43:13.034: %LINK-3-UPDOWN: Interface TenGigabitEthernet1/0/2, changed
state to up (FEX-110)

Feb 11 05:43:14.033: %LINEPROTO-5-UPDOWN: Line protocol on Interface
TenGigabitEthernet1/0/2, changed state to up (FEX-110)

*Feb 11 05:43:14.491: %SATMGR-SW2-5-FABRIC_PORT_UP: SDP up on interface Te1/3/5,
connected to FEX 110, uplink 52

***Feb 11 05:43:14.491: %SATMGR-SW2-5-DUAL_ACTIVE_DETECT_CAPABLE: channel group 99
is now dual-active detection capable**

6K1#show issu state

The system is configured to be upgraded in staggered mode.

2 supervisor nodes are found to be online.

Summary: an in-tandem upgrade is in progress.

Slot = 2/2

RP State = Active

ISSU State = Run Version

**Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12**

Slot = 1/2

RP State = Standby

ISSU State = Run Version

**Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12**

This system is Fex-capable

Fex-ID ISSU Status

110 FEX_UPGRADE_INIT

6K1#**show fex 110 detail**

```
FEX: 110          Description: FEX0110      state: online
FEX version: 15.0(2)EX2
Extender Model: C6800IA-48TD, Extender Serial: FOC1736W1A6
FCP ready: yes
Image Version Check: enforced
Fabric Portchannel Ports: 2
Fabric port for control traffic: Te2/3/5
Fabric interface state:
  Po99           - Interface Up.
  Te1/3/5        - Interface Up.          state: bound
  Te2/3/5        - Interface Up.          state: bound
```

5. Use o comando **issue accept** version para interromper o Timer de Rollback. Isso é necessário porque, se o temporizador expirar, o chassi atualizado será recarregado e reverterá para a versão de software anterior.

6K1#**issu acceptversion**

% Rollback timer stopped. Please issue the 'issu commitversion' command.

6. Use o comando **Issurunversion fex all** para iniciar o procedimento de download e atualização de imagem no FEX (6800IA). O FEX dispara o download da imagem do novo pacote de software do Supervisor2T (aqui, Cisco IOS Software Release 15.2(2)SY1). Se você usa pilhas FEX, o mestre é responsável por extrair a imagem para seus membros. Um servidor TFTP é executado em 192.1.1.1.

6K1#**issu runversion fex all**

% **Successfully initiated 'runversion fex' for Fex IDs: 110.**

Use 'show issu state' for more information.

6K1#**show issu state det**

```
The system is configured to be upgraded in staggered mode.
2 supervisor nodes are found to be online.
Summary: an in-tandem upgrade is in progress.

Slot = 2/2
RP State = Active
ISSU State = Run Version
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;bootdisk:
s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12
Operating Mode = sso
ISSU Sub-State = Run Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
```


Slot = 1/2
RP State = Standby
ISSU State = Run Version
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
Operating Mode = sso
ISSU Sub-State = Run Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin

This system is Fex-capable

Fex-ID ISSU Status

110 FEX_UPGRADE_IN_PROGRESS

Following are the logs on from FEX 6800IA console:

!

!192.1.1.1 is the tftp running on FEX controller i.e. VSS active and vlan 1012 is the control vlan associated with fex.

!

FEX-110#

Loading **c6800ia-universalk9-mz.150-2.EX4.bin** from **192.1.1.1**
(via **Vlan1012**): !!!
[OK - 15493122 bytes]

examining image...
extracting info (112 bytes)
extracting c6800ia-universalk9-mz.150-2.EX4/info (792 bytes)
extracting info (112 bytes)

Stacking Version Number: 1.55

System Type: 0x00000000
Ios Image File Size: 0x00EB5200
Total Image File Size: 0x00EC6A00
Minimum Dram required: 0x08000000
Image Suffix: universalk9-150-2.EX4
Image Directory: c6800ia-universalk9-mz.150-2.EX4
Image Name: c6800ia-universalk9-mz.150-2.EX4.bin
Image Feature: IP|LAYER_2|SSH|3DES|MIN_DRAM_MEG=128
FRU Module Version: No FRU Version Specified

Old image for switch 1: flash:/c6800ia-universalk9-mz.150-2.EX2
Old image will be left alone

Extracting images from archive into flash...

! The console will be waiting for about 5-10 minutes after the above line.

<output truncated>

New software image installed in flash:/c6800ia-universalk9-mz.150-2.EX4

Following are the logs from the 6500 Active supervisor:

```
*Feb 11 06:00:30.387: %SATMGR-SW2-5-ONLINE: FEX 110 online
*Feb 11 06:00:30.391: %SATMGR-SW2-5-FEX_MODULE_ONLINE: FEX 110, module 1 online
*Feb 11 06:00:30.395: %OIR-SW2-6-INSREM: Switch 110 Physical Slot 1 - Module
Type LINE_CARD inserted
*Feb 11 06:00:30.951: %SATMGR-SW2-5-FABRIC_PORT_UP: SDP up on interface Te2/3/5,
connected to FEX 110, uplink 51
*Feb 11 06:00:30.951: %SATMGR-SW2-5-DUAL_ACTIVE_DETECT_CAPABLE: channel group
99 is now dual-active detection capable
*Feb 11 06:01:00.983: %OIR-SW2-6-SP_INSCARD: Card inserted in Switch_number =
110, physical slot 1, interfaces are now online
```

```
FEX-110#show ver | in image
```

```
System image file is "flash:/c6800ia-universalk9-mz.150-2.EX4/
c6800ia-universalk9-mz.150-2.EX4.bin"
```

```
6K1#show issu state det
```

```
The system is configured to be upgraded in staggered mode.
2 supervisor nodes are found to be online.
Summary: an in-tandem upgrade is in progress.
```

```
Slot = 2/2
RP State = Active
ISSU State = Run Version
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12
Operating Mode = sso
ISSU Sub-State = Run Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
```

```
Slot = 1/2
RP State = Standby
ISSU State = Run Version
Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12;
Operating Mode = sso
ISSU Sub-State = Run Version Completed
Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin
Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin
```

```
This system is Fex-capable
```

```
Fex-ID    ISSU Status

110      FEX_UPGRADE_COMPLETE
```

- Para continuar, insira o comando **issue commversion** para atualizar o chassi VSS standby e concluir a sequência ISSU. O chassi em standby do VSS é reinicializado, recarregado com a nova imagem e inicializa como o chassi em standby do VSS no estado de redundância SSO, executando a nova imagem. Esta etapa é concluída quando a configuração do chassi é sincronizada, como indicado pela mensagem **de sincronização em massa bem-sucedida**, e todas as placas de linha no novo VSS-Standby estão ativadas e on-line.

6K1#**issu commitversion**

%issu commitversion initiated successfully, upgrade sequence will continue shortly

6K1#

*Feb 11 06:05:30.839: %ISSU_PROCESS-SW2-3-COMMITVERSION: **issu commitversion; Commitversion sequence will begin in 60 seconds. Enter 'issu abortversion' to cancel.**

*Feb 11 06:06:00.839: %ISSU_PROCESS-SW2-6-COMMITVERSION_INFO: Resetting Standby shortly

*Feb 11 06:08:48.571: %PFREDUN-SW2-6-ACTIVE: Standby initializing for SSO mode

*Feb 11 06:09:01.163: %ISSU_PROCESS-SW2-6-COMMITVERSION_INFO: Standby has come online, wait for terminal state

.
.

*Feb 11 06:10:41.267: %VS_GENERIC-SW2-6-VS_HA_HOT_STANDBY_NOTIFY: Standby switch is in Hot Standby mode

*Feb 11 06:10:41.271: %HA_CONFIG_SYNC-SW2-6-BULK_CFGSYNC_SUCCEED: **Bulk Sync succeeded**

*Feb 11 06:10:41.271: %RF-SW2-5-RF_TERMINAL_STATE: Terminal state reached for (SSO)

*Feb 11 06:10:46.403: %ISSU_PROCESS-SW2-6-COMMITVERSION_INFO: Upgrade has completed, updating boot configuration

!

!Boot variable now displays both new and old image in ?show issu state detail? output.

!

6K1#**show issu state detail**

The system is configured to be upgraded in staggered mode.
2 supervisor nodes are found to be online.
Summary: an in-tandem upgrade is in progress.

Slot = 2/2

RP State = Active

ISSU State = Commit Version

Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;

bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12

Operating Mode = sso

ISSU Sub-State = Commit Version completed, waiting for system to settle

Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

Slot = 1/2

RP State = Standby

ISSU State = Commit Version

Boot Variable = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;

bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12

Operating Mode = sso

ISSU Sub-State = Commit Version completed, waiting for system to settle

Starting Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

Target Image = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

Current Version = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin

This system is Fex-capable

Fex-ID ISSU Status

110 FEX_UPGRADE_COMPLETE

6K1#**show redundancy**

Redundant System Information :

Available system uptime = 1 hour, 28 minutes
Switchovers system experienced = 1
Standby failures = 1
Last switchover reason = user forced

Hardware Mode = Duplex
Configured Redundancy Mode = sso
Operating Redundancy Mode = sso
Maintenance Mode = Disabled
Communications = Up

Current Processor Information :

Active Location = slot 2/2
Current Software state = ACTIVE
Uptime in current state = 36 minutes
Image Version = Cisco IOS Software, s2t54 Software
(s2t54-ADVENTERPRISEK9-M), Version 15.1(2)SY1, RELEASE SOFTWARE (fc4)
Technical Support: <http://www.cisco.com/techsupport>
Copyright (c) 1986-2013 by Cisco Systems, Inc.
Compiled Thu 28-Nov-13 12:58 by prod_rel_team
BOOT = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12
CONFIG_FILE =
BOOTLDR =
Configuration register = 0x2102

Peer Processor Information :

Standby Location = slot 1/2
Current Software state = STANDBY HOT
Uptime in current state = 1 minute
Image Version = Cisco IOS Software, s2t54 Software (s2t54-ADVENTERPRISEK9-M),
Version 15.1(2)SY1, RELEASE SOFTWARE (fc4)
Technical Support: <http://www.cisco.com/techsupport>
Copyright (c) 1986-2013 by Cisco Systems, Inc.
Compiled Thu 28-Nov-13 12:58 by prod_rel_team
BOOT = bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY1.bin,12;
bootdisk:s2t54-adventerprisek9-mz.SPA.151-2.SY.bin,12
CONFIG_FILE =
BOOTLDR =
Configuration register = 0x2102

Verificar

Para verificar se a atualização foi bem-sucedida, use estes comandos:

- **show issue state detail**
- **show redundancy**
- **show module switch all**

Este é o estado atual após o processo ISSU:

- O chassi 6500 com ID do Switch 2 está ativo e o Switch com ID 1 está em espera (quente). Eles agora estão no Cisco IOS Software versão 15.1(2)SY1.
- O cliente do Instant Access (6800IA) agora executa o Cisco IOS Software Release 15.0(2)EX4.

6K1#show mod swi all

Switch Number: 1 Role: Virtual Switch Standby

Mod	Ports	Card Type	Model	Serial No.
2	5	Supervisor Engine 2T 10GE w/ CTS (Hot)	VS-SUP2T-10G	SAL1632K9P2
3	20	DCEF2T 4 port 40GE / 16 port 10GE	WS-X6904-40G	SAL1741E4ZA

Mod	MAC addresses	Hw	Fw	Sw	Status
2	c471.fe7c.de96 to c471.fe7c.de9d	1.3	12.2(50r)SYS	15.1(2)SY1	Ok
3	e02f.6d6a.698c to e02f.6d6a.699f	1.0	12.2(50r)SYL	15.1(2)SY1	Ok

Mod	Sub-Module	Model	Serial	Hw	Status
2	Policy Feature Card 4	VS-F6K-PFC4	SAL1637MCQQ	1.2	Ok
2	CPU Daughterboard	VS-F6K-MSFC5	SAL1637MKX8	1.4	Ok
3	Distributed Forwarding Card	WS-F6K-DFC4-E	SAL1745FSD6	1.0	Ok

Mod Online Diag Status

2 Pass
3 Pass

Switch Number: 2 Role: Virtual Switch Active

Mod	Ports	Card Type	Model	Serial No.
2	5	Supervisor Engine 2T 10GE w/ CTS (Acti	VS-SUP2T-10G	SAL1650UC8L
3	20	DCEF2T 4 port 40GE / 16 port 10GE	WS-X6904-40G	SAL17173QD3

Mod	MAC addresses	Hw	Fw	Sw	Status
2	2c54.2dc4.2f3a to 2c54.2dc4.2f41	1.4	12.2(50r)SYS	15.1(2)SY1	Ok
3	70ca.9b8f.510c to 70ca.9b8f.511f	1.0	12.2(50r)SYL	15.1(2)SY1	Ok

Mod	Sub-Module	Model	Serial	Hw	Status
2	Policy Feature Card 4	VS-F6K-PFC4	SAL1651UG8P	1.2	Ok
2	CPU Daughterboard	VS-F6K-MSFC5	SAL1651UEBY	1.5	Ok
3	Distributed Forwarding Card	WS-F6K-DFC4-E	SAL17173QHY	1.2	Ok

Mod Online Diag Status

2 Pass
3 Pass

Switch Number: 110 Role: FEX

Mod	Ports	Card Type	Model	Serial No.
1	48	C6800IA 48GE	C6800IA-48TD	FOC1736W1A6

Mod	MAC addresses	Hw	Fw	Sw	Status
-----	---------------	----	----	----	--------

1 c025.5cc2.2d00 to c025.5cc2.2d33 0.0 Unknown **15.0(2)EX4** Ok

Mod Online Diag Status

1 Pass

6K1#

6K1#**show switch virtual**

Switch mode : Virtual Switch
Virtual switch domain number : 100
Local switch number : 2
Local switch operational role: Virtual Switch Active
Peer switch number : 1
Peer switch operational role : Virtual Switch Standby