

# Catalyst 8540/8510 MSRs和Lightstream 1010 ATM交换机的硬件故障排除：接口模块问题

---

## 接口模块问题

---

### 目录

- [解决硬件和软件版本问题](#)
- [相关信息](#)

---

[<<<Previous部分下Section>>>](#)

### 解决硬件和软件版本问题

您可以遇到的常见错误是必要的硬件模块和Cisco IOS软件版本的不兼容执行特定功能。请使用 [软件顾问\(仅限注册用户\)](#) 确认您使用支持在您的交换机路由器安装的多种硬件组件的IOS软件。

#### 正在验证的硬件和软件版本

显示硬件和软件版本保证他们最最近的。非常旧有硬件和软件版本(回到两个或三个的版本)能有在更多最新版本修复的警告。请使用以下EXEC命令显示版本信息：

命令	目的
show version	显示软件版本信息。
show hardware [detail]	显示详细的硬件信息包括修订级别和版本。
show functional-image slot slot	显示功能镜像信息。

要验证硬件和软件版本，请执行以下步骤：

---

**Step1**使用show version命令显示系统软件版本：

```
Switch# show version
Cisco Internetwork Operating System Software
IOS (tm) PNNI Software (cat8540m-WPK2-M), Version 12.1(10)E
Copyright (c) 1986-2002 by cisco Systems, Inc.
Compiled Sat 12-Jan-02 00:49 by
Image text-base: 0x60010958, data-base: 0x60F46000
```

```
ROM: System Bootstrap, Version 12.0(0.19)W5(5), RELEASE SOFTWARE
```

8540MSR uptime is 6 weeks, 5 days, 2 hours, 8 minutes  
System returned to ROM by reload  
System image file is "slot0:cat8540m-wpk2-mz.121-99.FALCON\_DEVTEST\_UBLDIT29"

cisco C8540MSR (R5000) processor with 262144K/256K bytes of memory.  
R5000 CPU at 200Mhz, Implementation 35, Rev 2.1, 512KB L2 Cache  
Last reset from power-on  
3 Ethernet/IEEE 802.3 interface(s)  
16 FastEthernet/IEEE 802.3 interface(s)  
15 ATM network interface(s)  
505K bytes of non-volatile configuration memory.

20480K bytes of Flash PCMCIA card at slot 0 (Sector size 128K).  
8192K bytes of Flash internal SIMM (Sector size 256K).  
Secondary is up  
Secondary has 262144K bytes of memory.

Configuration register is 0x0

Switch#

**步骤2请使用 show hardware命令显示硬件修订版级别：**

Switch# **show hardware**

C8540 named Router, Date: 13:59:13 UTC Mon Jan 3 2000

Slot	Ctrlr-Type	Part No.	Rev	Ser No	Mfg Date	RMA No.	Hw Vrs	Tst	EEP
0/*	K1 GIGETHERN	73-3324-03	A0	0336441Y	Oct 13 99	0	3.4		
1/*	CMPM Card	73-3944-03	09	03445724	Nov 09 99		3.0		
1/0	XPIF POS OC1	73-4462-01	09	034558YP	Nov 09 99		1.1		
2/*	CMPM Card	73-3944-03	A0	04087BW8	Mar 22 00	0	3.0		
2/0	XPIF POS OC1	73-4462-01	A0	04046NRQ	Mar 22 00	0	2.0		
2/1	XPIF GIGE PA	73-4167-05	A0	04097GRJ	Mar 22 00	0	1.0		
3/*	CMPM Card	73-3944-03	A0	04087B XK	Mar 15 00	0	3.0		
3/0	XPIF ATM OC3	73-3889-03	A0	040879AA	Mar 15 00	0	1.0		
3/1	XPIF GIGE PA	73-4167-05	A0	04097GQA	Mar 15 00	0	1.0		
4/*	Route Proc	73-3775-04	A0	03201VCZ	Oct 04 99	0	5.7		
5/*	Switch Card	73-3327-08	A0	032428ZR	Jun 15 99	0	8.0		
7/*	Switch Card	73-3327-08	A0	032428ZE	Jun 15 99	0	8.0		
10/*	ETHERNET PAM	73-3753-04	A0	03020FCA	Sep 22 99	0	4.1		
11/*	CMPM Card	73-3944-03	A0	04087BY5	Mar 13 00	0	3.0		
11/0	XPIF GIGE PA	73-4415-05	A0	04087AZE	Mar 13 00	0	1.0		
11/1	XPIF GIGE PA	73-4415-05	A0	04087AZL	Mar 13 00	0	1.0		
12/*	CMPM Card	73-3944-03	A0	04087BWS	Mar 14 00	0	3.0		
12/0	XPIF ATM OC1	73-3889-03	A0	040879AO	Mar 14 00	0	1.0		
12/1	XPIF GIGE PA	73-4167-05	A0	04107N8R	Mar 14 00	0	1.0		

DS1201 Backplane EEPROM:

Model	Ver.	Serial	MAC-Address	MAC-Size	RMA	RMA-Number	MFG-Date
-------	------	--------	-------------	----------	-----	------------	----------

C8540 2 12237014 00D0BA1D3200 1024 0 0 Jun 18 1999

cubi version : 11

Power Supply:

Slot	Part No.	Rev	Serial No.	RMA No.	Hw Vrs	Power Consumption
0	34-0829-02	A000	APQ02450080	00-00-00-00	1.0	2746 cA

**步骤3**验证硬件版本在Hw Vrs列列出。

**步骤4**请使用**show hardware detail**命令显示关于硬件的详细信息，包括功能镜像版本：

Switch# **show hardware detail**

<Information deleted>

slot: 3/0 Controller-Type : XPIF ATM OC3 PM - 1 Port SM\_IR

Part Number: 73-3889-03 Revision: A0  
Serial Number: CAB040879AA Mfg Date: Mar 15 00  
RMA Number: 0 H/W Version: 1.0  
FPGA Version: 1.14  
  
XPIF Version: 3001 CAM size: 64 KB  
Ucode Version: 1.0 CAM Type: Private TCAM

Port Phy Setup

Port 0: DONE

Optical Line Daughter Card Serial EEPROM:

Part Number: 73-3975-02 Revision: A0  
Serial Number: CAB0407768M Mfg Date: 2000/04/10  
RMA Number: 0 HW Rever: 1.0

TCAM Daughter Card Serial EEPROM:

Part Number: 73-3970-02 Revision: A0  
Serial Number: CAB04087BXX Mfg Date: 2000/03/04  
RMA Number: 0 HW Rever: 2.0

slot: 3/1 Controller-Type : XPIF GIGE PAM

Part Number: 73-4167-05 Revision: A0  
Serial Number: CAB04097GQA Mfg Date: Mar 15 00  
RMA Number: 0 H/W Version: 1.0  
FPGA Version: 20.72  
  
XPIF Version: 3001 CAM size: 64 KB  
Ucode Version: 1.0 CAM Type: Private TCAM

Port Phy Setup

Port 0: DONE

GBIC Vendor: No vendor info.

slot: 4/\* Controller-Type : Route Proc

Part Number: 73-3775-04 Revision: A0  
Serial Number: CAB03201VCZ Mfg Date: Oct 04 99  
RMA Number: 0 H/W Version: 5.7  
FPGA Version: 4.8

slot: 5/\* Controller-Type : Switch Card

Part Number: 73-3327-08 Revision: A0  
Serial Number: CAB032428ZR Mfg Date: Jun 15 99  
RMA Number: 0 H/W Version: 8.0  
FPGA Version: 1.2

slot: 7/\* Controller-Type : Switch Card

Part Number: 73-3327-08 Revision: A0  
Serial Number: CAB032428ZE Mfg Date: Jun 15 99  
RMA Number: 0 H/W Version: 8.0  
FPGA Version: 1.2

<Information deleted>

**步骤5**请使用 **show functional-image**命令显示关于功能镜像的详细信息交换机路由器的路由处理器、交换处理器和快速以太网/Gigabit的以太网接口模块(在本例中，Catalyst 8540 MSR)。以下示例显示如何显示路由处理器的功能镜像在插槽4：

```
Switch# show functional-image slot 4
```

Details for cpu Image on slot: 4

Functional Version of the FPGA Image: 4.8

#Jtag-Distribution-Format-B

#HardwareRequired: 100(3.0-19,4.0-19,5.0-19)

#FunctionalVersion: 4.8

#Sections: 1

#Section1Format: MOTOROLA\_EXORMAX

Copyright (c) 1996-00 by cisco Systems, Inc.

All rights reserved.

generated by: holliday  
on: Mon Mar 6 13:59:17 PST 2000  
using: /vob/cougar/bin/jtag\_script Version 1.13  
config file: cpu.jcf

Chain description:

Part type Bits Config file

```
10k50      10    ../cidrFpga2/max/cidr_fpga.ttf
xcs4062    3     ../cubiFpga2/xil/cubi.bit
xcs4062    3     ../cubiFpga2/xil/cubi.bit
generic    2
XC4005     3     /vob/cougar/custom/common/jtcfg/xil/jtcfg_r.bit
```

Number devices = 5

Number of instruction bits = 21

FPGA config file information:

```
Bitgen date/time  Sum  File
100/03/02 19:14:49 7068  ../cidrFpga2/max/cidr_fpga.ttf
1999/04/15 18:46:32 36965  ../cubiFpga2/xil/cubi.bit
1999/04/15 18:46:32 36965  ../cubiFpga2/xil/cubi.bit  98/06/11 16:56:44 49904
/vob/cougar/custom/common/jtcfg/xil/jtcfg_r.bit
```

#End-Of-Header

**步骤6**验证为FPGA和#HardwareRequired字段确定FPGA版本和硬件版本要求的FunctionalVersion。此与硬件版本比较使用在 [步骤2](#)和 [步骤](#)显示的 **show hardware**命令输出 [4](#)。如果FPGA版本不支持硬件版本，请下载新的FPGA镜像并且/或者升级硬件。

## 相关信息

- [安装ATM端口适配器和接口模块](#)
  - [ATM技术支持](#)
  - [技术支持和文档 - Cisco Systems](#)
-