

MGCP Gateway

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Last updated: November 13, 2017

Information below is relevant to your digital T1 gateways (HQ Site & Site B)

- Line coding/framing b8zfs/esf
- ISDN switch type Primary- NI
- Configure your gateways to take clock (layer1) from network. For PRI circuits configure your gateway as Layer 2 User side.
- Refer to the individual gateway sub-sections for digit sending and receiving details.
- Calling names should always be sent to the PSTN
- Use full span on T1 PRI unless specified otherwise.

Tasks

- Configure and register R1 as IOS T1 PRI MGCP gateway to the HQ CUCM cluster.
- All MGCP traffic should use R1 local voice VLAN interface.
- Implement CUCM redundancy such that if the primary call agent CUCM subscriber goes down the back up call agent CUCM publisher should be active.

```
R1#show ccm-manager hosts
MGCP Domain Name: R1.ine.com
Priority      Status      Host
-----
Primary      Registered  11.100.64.12
First Backup  Backup Ready 11.100.64.11
Second Backup None
```

Configuration: [Click to collapse](#)

HQ – R1

```

ip domain-name ine.com
!
card type t1 0 1
 isdn switch-type primary-ni
 network-clock-participate wic 1
 network-clock-select 1 T1 0/1/0
!
controller T1 0/1/0
 linecode b8zs _default_
 framing esf _default_
 pri-group timeslots 1-24 service mgcp
 no shutdown
!
mgcp call-agent 11.100.64.12
mgcp bind control source-interface GigabitEthernet0/0.102 mgcp bind media source-interface GigabitEthernet0/0.102
ccm-manager switchback immediate
ccm-manager redundant-host 11.100.64.11
ccm-manager mgcp
mgcp
!
interface Serial 0/1/0:23
 isdn bind-l3 ccm-manager

```

HQ – Publisher

Device > Gateway > Add New

Click Next

Show ccm-manager on R1 to see domain-name

Gateway Configuration

Save Delete Reset Apply Config Add New

Status
 Status: Ready

Gateway Details

Product	Cisco 2911
Gateway	R1.ine.com
Protocol	MGCP
⚠ Device is not trusted	
Domain Name*	R1.ine.com
Description	R1.ine.com
Cisco Unified Communications Manager Group*	Default

Configured Slots, VICs and Endpoints

Module in Slot 0: NM-4VWIC-MBRD

Subunit 0: < None >

Subunit 1: VWIC3-1MFT-T1E1-T1 0/1/0

Click 0/1/0

Select Digital Access PRI & Click Next

Find and List Gateway

Next

Select Protocol for this Gateway

Device Protocol*

Next

Gateway Configuration

Save

Status

Status: Ready

Device Information

Product: Cisco MGCP T1 Port
 Gateway: R1.ine.com
 Device Protocol: Digital Access PRI
 ⚠ Device is not trusted
 End-Point Name *: S0/SU1/DS1-0@R1.ine.com
 Description:
 Device Pool*:

Find and List Gateway

2 records found

Gateways (1 - 2 of 2) Rows per Page: 50

Find Gateways where Name begins with Show endpoints Find Clear Filter

Device Name	Description	Device Pool	Calling Search Space	Device Type	Status	IP Address
R1.ine.com	R1.ine.com			Cisco 2911	See Endpoints	Unknown
S0/SU1/DS1-0@R1.ine.com	S0/SU1/DS1-0@R1.ine.com	Default		Cisco MGCP T1 Port	Registered with 11.100.64.11	11.100.64.254

Note:

The MGCP bind IP is incorrect in the above screen. To register with the correct IP do the following on R1 MGCP router

```
no mgcp
mgcp bind control source-interface GigabitEthernet0/0.102
mgcp bind media source-interface GigabitEthernet0/0.102
mgcp
```

Find and List Gateway

2 records found

Gateways (1 - 2 of 2) Rows per Page: 50

Find Gateways where Name begins with Show endpoints Find Clear Filter

Device Name	Description	Device Pool	Calling Search Space	Device Type	Status	IP Address
R1.ine.com	R1.ine.com			Cisco 2911	See Endpoints	Unknown
S0/SU1/DS1-0@R1.ine.com	S0/SU1/DS1-0@R1.ine.com	Default		Cisco MGCP T1 Port	Registered with 11.100.64.12	11.102.64.254

Verification

R1

```
R1#show ccm-manager hosts
MGCP Domain Name: R1.ine.com
Priority      Status      Host
=====
Primary      Registered  11.100.64.12
First Backup  Backup Ready 11.100.64.11
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```

You can test redundancy of callmanager for MGCP gateway by issuing the following command from privilege mode

```
ccm-manager switchover-to-backup
```

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