

WARNING!

This service literature is designed for experienced repair technicians only and is not designed for use by the general public. It does not contain warnings or cautions to advise non-technical individuals of potential dangers in attempting to service a product. Products powered by electricity should be serviced or repaired only by experienced professional technicians. Any attempt service or repair the product or products dealt with in this service literature by anyone else could result in serious injury or death.

TI No HDVC-025
Date: Jan-25-2016

Technical Information

Model No : KX-VC1300/1600

Subject : Mobile Connectivity Improvement

Effective from : October 2015 (Combination with Ver.4.20 Codec and Ver.3.10 Mobile application onward)

Countries/Areas : All

Type : Mandatory Preventive Optional Information only Parts Change Notice

Recommend : At Setup At Occurrence Next Visit Next PM

This is information of Mobile Connectivity Improvement.

Symptom:

No communication with HDVC mobiles depends on network environmental, such as mobile carrier, type of mobile router and public Wi-Fi environmental.

Cause:

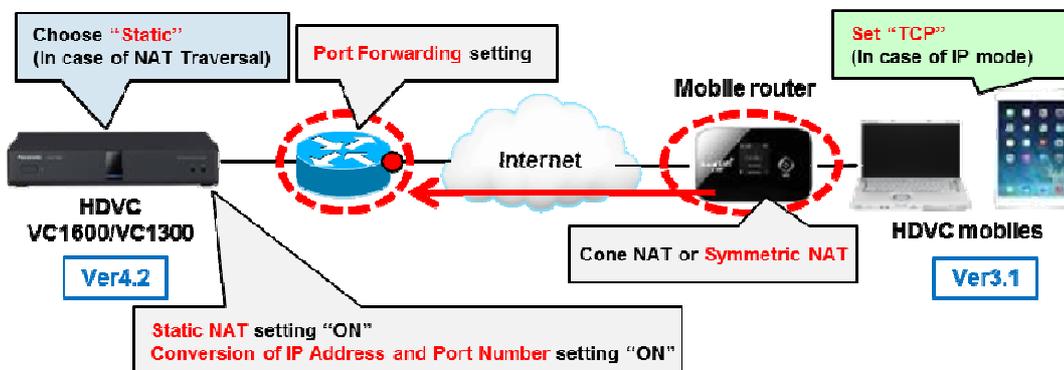
There is possibility that the NAT characteristic of the network is "Symmetric NAT". In Symmetric NAT environmental, HDVC mobile won't be communicated. It supports "Cone NAT" characteristic.

Countermeasure / Solution:

Conduct Static NAT settings on the HDVC site. By conducting this setting change, it can be supported both Cone NAT and Symmetric NAT characteristics. As a result, connectivity between HDVC mobiles and HDVC will be expanded even if NAT characteristic of the mobile side is Symmetric type. And it supports also both NAT Traversal Service mode and IP mode connection

Requirement: All conditions should be required

IP mode	NAT Traversal mode
1. Firmware should be Codec Ver.4.20 and Mobile Application Ver.3.10 onward.	
2. Set "Static NAT" and "Conversion of IP Address and Port Number" setting to "ON" on the Codec.	
3. Conduct Static NAT settings (Port Forwarding) on the router.	
4. Set "TCP" in SIP settings menus of the mobile device.	4. Choose "Static" in NAT settings menu of the HDVC.



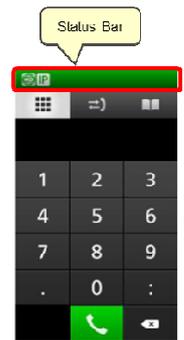
Related Documents:

The followings document can be downloaded from BIG-WEB web site.

1. Seminar Document: [V4.25 Mobiles](#)
2. Technical Documents: [Symmetric NAT connection guide for HDVC mobile for v4.20](#)

New Test Site Information for Mobile Connection Test:

- New test site has been established especially for mobile connection test to clarify difference of the connection status depends on type of NAT and Network environmental.
- This test site support both Symmetric NAT and CONE NAT characteristics to expand mobile connectivity.
- This is common things for Android, iOS and Windows.
- You can utilize it depends on the connection mode and color of the status bar on the top of HDVC mobile software/application.
- It is strongly recommend that your mobile device have to be installed Ver. 3.10 onward.



Color Bar				
Connection Mode	IP mode	NAT Traversal Service Mode	NAT Traversal Service Mode	Common (IP and NAT Traversal Service Mode)
Status	Ready in use in IP mode	The NAT characteristic may be Symmetric. Possible to connect to Symmetric NAT supported site.	Ready for use in NAT Traversal Service mode	Network Failure
Available Test Site	IP: 122.1.63.91 IP: 153.150.17.132 IP: 153.150.17.131	 Terminal ID: 114-1600	Terminal ID: 112-0088 Terminal ID: 111-6116 Terminal ID: 114-1600	----
Remarks	It is depends on network condition whether can communicate. Depends on connection result, use "Call Through NAT" Function as necessary	It is depends on network condition whether can communicate. If the connection was succeeded with New Test Site. Static NAT setting is required at your host site.	It is depends on network condition whether can communicate.	Check Network

Note 1: If you cannot connect above test site, there is a possibility of a network issue such as Firewall, requirement of necessary Port Open and SIP ALG settings, etc. Please confirm at your end.

Note 2: Please refer to the attached for the Static NAT Settings on the HDVC site.