

A photograph of four business professionals (two men and two women) in an office setting, smiling and posing for a group photo. They are standing behind a desk. The background shows large windows with horizontal blinds. A green semi-transparent banner is overlaid across the bottom half of the image.

Yealink Technical Training

Agenda

- **Auto Provisioning**
- **How to Do Technical Support**

What is Auto Provisioning?

Auto Provisioning is a feature used to update phone settings and firmware automatically.

This allows the phone to be plugged into an Ethernet Network and be automatically configured with the settings needed for the phone to operate.

In most cases no user intervention is required.

What is Auto Provisioning?

For a phone to be successfully Provisioned, the Phone Must:

- ❑ Obtain a server address where the configuration files are stored.
- ❑ Download the configuration files from the configured server.
- ❑ Resolve and apply the configuration settings to the phones from the configuration file.
- ❑ Do other updates, for example firmware updating.

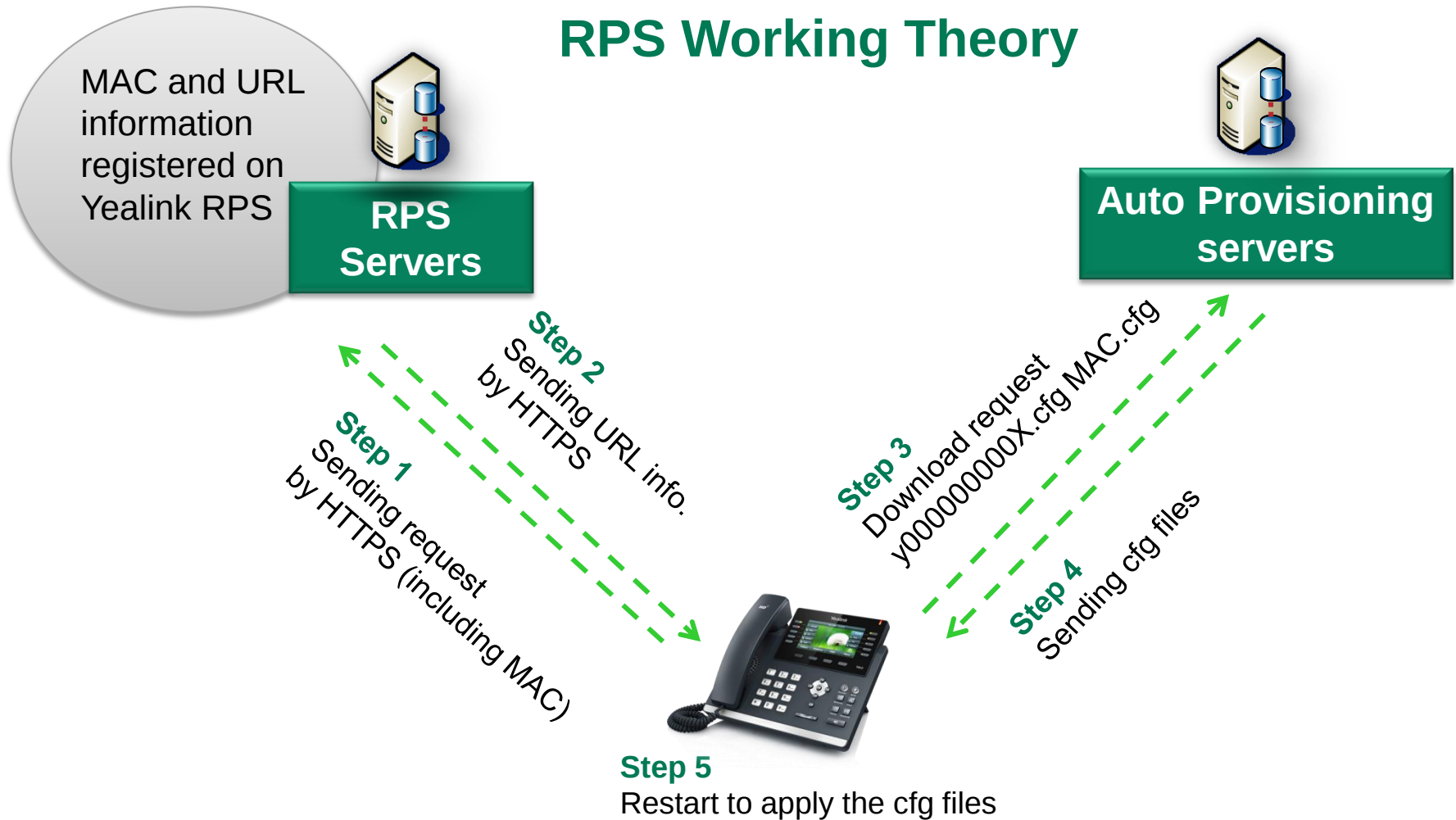
Provisioning Order

When a Yealink phone boots it will try and obtain a provisioning server address in the following order.

If RPS is enabled, then:

- Yealink RPS
- Zero -Touch
- PnP Server
- DHCP custom option
- DHCP option 66
- DHCP option 43
- Phone Flash (TFTP/FTP/HTTP/HTTPS)

RPS Working Theory



Yealink RPS - Benefits



- Eliminates the need for Manual Configuration
- Allows direct shipment to customer without the need for the Reseller to configure the phone
- Plug and Play installation for the customer

Zero -Touch

The image displays two UI components for Zero Touch configuration. The top component is a dialog box with a title bar labeled "Zero Touch". The main content area of the dialog box contains the text "Update now? 5s". At the bottom of the dialog box are three buttons: "Cancel", "Status", and "OK". The bottom component is a settings panel with a light gray background. It contains two rows of settings. The first row is labeled "Zero Active" and has a dropdown menu set to "Enabled", followed by a green circular help icon with a question mark. The second row is labeled "Wait Time (0~100s)" and has a text input field containing the value "5", followed by another green circular help icon with a question mark.

- ❑ Zero Touch allows you to configure the network parameters and provisioning server address via the phone's user interface during startup
- ❑ When Zero Touch is enabled, a configuration wizard will be displayed after the phone has booted

Zero -Touch

Network

IP Mode: IPv4 & IPv6 <>

IPv4 WAN Type: DHCP <>

IPv6 WAN Type: DHCP <>

VLAN Status: Disable <>

Back

Switch

Next

Network Configuration Options

Auto Provision

URL:

User Name:

Password:

Back

2aB

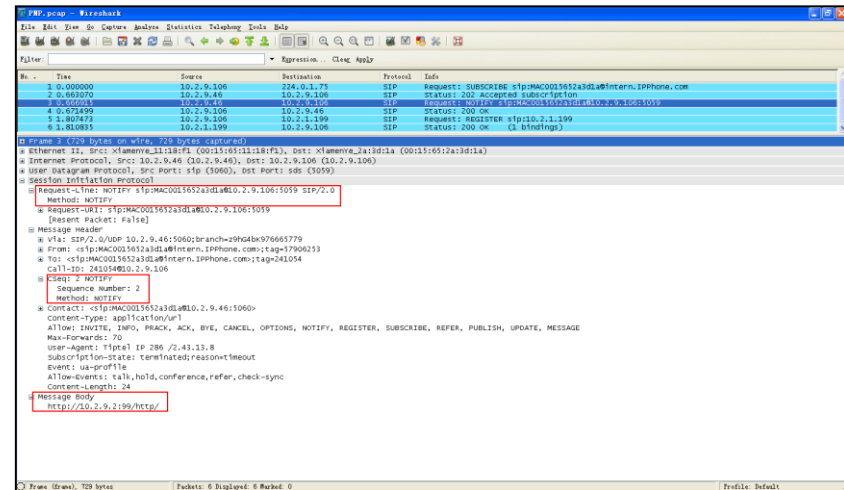
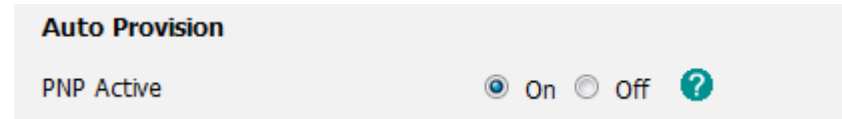
Delete

OK

Provisioning Server Address, Authentication
user name (optional) and password (optional)
Configuration Options

Plug and Play (PnP) Server

- ❑ Yealink Phones Support PnP
- ❑ Phone sends a SUBSCRIBE message to obtain provisioning server address details during startup.
- ❑ PnP server responds with a SIP NOTIFY message, and an address of the provisioning server.



DHCP Options

- ❑ Yealink Phones support DHCP custom options or via Option 66 and 43.
- ❑ Custom option, DHCP option 66 then DHCP option 43
- ❑ The Option 66 is used to identify the TFTP server.
- ❑ Option 43 can be used to encapsulate vendor specific options
- ❑ DHCP Custom Option must be supported by DHCP Server

DHCP Active ☒ On ☐ Off ?

Custom Option(128~254) ?

DHCP Option Value ?

option128.pcap [Wireshark 1.6.12 (SVN Rev 46251 from /trunk-1.6)]

File Edit View Go Capture Analyze Statistics Telephony Tools Internals Help

Filter: Expression... Clear Apply

No.	Time	Source	Destination	Protocol	Info
1	0.000000	0.0.0.0	255.255.255.255	DHCP	DHCP Discover - Transaction ID 0x4c4c7706
2	0.000895	10.3.5.162	10.3.5.117	DHCP	DHCP Offer - Transaction ID 0x4c4c7706
3	0.119569	0.0.0.0	255.255.255.255	DHCP	DHCP Request - Transaction ID 0x4c4c7706
4	0.120392	10.3.5.162	10.3.5.117	DHCP	DHCP ACK - Transaction ID 0x4c4c7706
5	3.141401	10.3.5.117	10.3.5.162	HTTP	GET /dhcpctest128/y0000000000010.cfg HTTP/1.1
6	3.144660	10.3.5.162	10.3.5.117	HTTP	Continuation or non-HTTP traffic
7	3.620680	10.3.5.117	10.3.5.162	HTTP	GET /dhcpctest128/00156539bf6e.cfg HTTP/1.1
8	3.622216	10.3.5.162	10.3.5.117	HTTP	Continuation or non-HTTP traffic
9	3.645530	10.3.5.117	10.3.5.162	HTTP	GET /dhcpctest128/00156539bf6e.cfg HTTP/1.1
10	3.646984	10.3.5.162	10.3.5.117	HTTP	Continuation or non-HTTP traffic
11	5.675009	10.3.5.117	10.3.5.162	HTTP	GET /dhcpctest128/00156539bf6e.cfg HTTP/1.1
12	5.676517	10.3.5.162	10.3.5.117	HTTP	Continuation or non-HTTP traffic

Option: (t=1,i=4) Subnet Mask = 255.255.255.0
Option: (t=51,l=4) IP Address Lease Time = 6 hours
Option: (t=59,l=4) Rebinding Time Value = 5 hours, 15 minutes
Option: (t=58,l=4) Renewal Time Value = 3 hours
Option: (t=43,l=34) Vendor-Specific Information
Option: (t=128,l=35) DOCSIS full security server IP [TOD0]
Option: (t=66,l=34) TFTP Server Name = http://10.3.5.162:8080/dhcpctest66/
Option: (66) TFTP Server Name
Length: 34
Value: 687474703a2f31302e332e352e3136323a383038302f64...
Option: (t=54,l=4) DHCP Server Identifier = 10.3.5.162
End option

Phone Interface

- ❑ Yealink Phones allow manual entry of the Provisioning Server.
- ❑ This is done via the web interface of the phone.
- ❑ Enter the Server URL and Username and Password if required.

Server URL	http://10.2.4.38:8080/T4X/	
User Name	Tony	
Password		
Common AES Key		
MAC-Oriented AES Key		

How To Do Technical Support

- Y Find an Answer
- Y Feedback to Yealink

Find an Answer



Find an Answer

- **Website**
- **Homologation**
- **Forum**
- **FAQ**



Download From Yealink Website

- **Firmware**
- **DataSheet**
- **Features manual**

...

Download:

<http://www.yealink.com/SupportDownloadfiles.aspx?CateId=147&parentcateid=142>

Download From Yealink Website

Q1: Could you send me the latest firmware?



Home > Support > IP Phone > IP Phone SIP-T28P

Documents and Downloads
Yealink University
Yealink Community
Yealink Local Support

IP Phone SIP-T28P

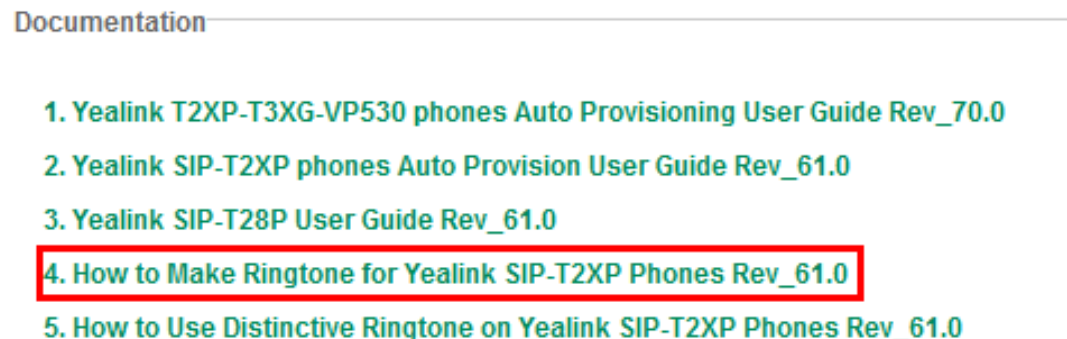
Downloads Map

Datasheet

Firmware and Release Notes

- 1. 2.61.0.80
- 2. 2.61.0.148 (Authorized by 3CX)

Q2: How can I upload my custom ringtone?



Documentation

- 1. Yealink T2XP-T3XG-VP530 phones Auto Provisioning User Guide Rev_70.0
- 2. Yealink SIP-T2XP phones Auto Provision User Guide Rev_61.0
- 3. Yealink SIP-T28P User Guide Rev_61.0
- 4. How to Make Ringtone for Yealink SIP-T2XP Phones Rev_61.0
- 5. How to Use Distinctive Ringtone on Yealink SIP-T2XP Phones Rev_61.0

Homologation

- All tested platform-**Yealink Interop List**
- Configuration guide
- Certification

Download:

<ftp://yealinkftp:yealinkftp@ftp.yealink.com/Training/Homologation>

Homologation

Carrier Solution	IP-PBX for SMB	Hard Phone and Soft phone
Broadsoft	2N	Aastra
Cisco	3CX	AudioCodec
Ericsson	Asterisk	Avaya
Huawei	Brekeke	Cisco
Alcatel-Lucent	Critical Edge Box	Counterpath
Nokia-Siemens	Datus	Dlink
Nortel	Digium SwitchVox	Doro
ZTE	Elastix	Firefly
Metaswitch	Epygi	Grandstream
VoipSwitch	Freeconet	LG
	IP Brick	Linksys
Enterprise Solution	IPCortex	Nortel
Altigen	PBXnSIP	Planet
Avaya	PolySpeak	Polycom
Dasan	Sangoma	Radvision
eOn	Siptel	Samsung
Fujitsu	Starface	Siemens
ITS	TalkSwitch	SJ phone
NEC-Phillips	Teleware	Snom
Nortel SCS	Trixbox	Thomson
Panasonic Communications	Xorcom	Vocal
Tadiran	Yeastar	VoIPBuster
Teltronics	Zultys MX250	Voip Switch

Homologation

Q1: How to configure BLF feature of BroadWorks?

A1: Please refer to the guide

“Using Integrated Features on BroadWorks-V1.0.pdf”

Q2: Do you have configuration guide for Cisco Call Manager?

A2: Sorry we don't have such guide, but you can test first, any question please let us know, we will try our best to solve the problem ASAP.

Yealink Forum

Q: I have some technical issues, how can I report these issues?

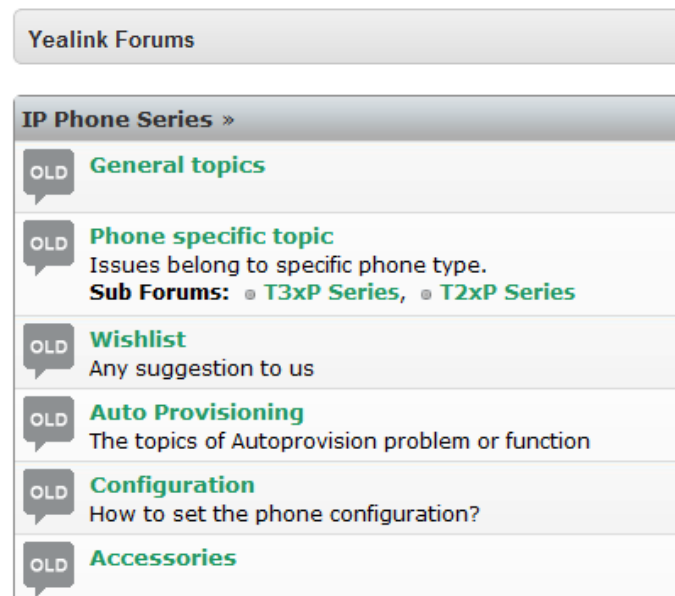
A:

1. Report your issue to Yealink Forum

http://forum.yealink.com/forum/?Cate_Id=271&CateId=271&NewsCateId=271&ProductsCateID=271

Support@yealink.com

2. Contact us directly



- **Common questions and answers**

Download:

<http://www.yealink.com/Upload/document/FAQT2X/FAQ-00064769246.pdf>

Q: How many expansion modules can be connected to T28\T26?

A: You can connect at most six extension modules to T28\T26. Please note that, when you connect the third expansion module to the phone, you need to connect one more adapter.

Feedback to Yealink-Ticket System



Yealink Ticket System

Please feedback technical issues to Yealink by Yealink Ticket System

Ticket UserGuide

Ticket Presentation

Ticket Recording

ftp://yealinkftp:yealinkftp@ftp.yealink.com/Training/ticket/Yealink_Ticket_introduction_PPT_recording_UserGuide.rar

<https://ticket.yealink.com/>

Feedback to Yealink

- **Bug**
- **New Feature Request**



Bug

- Model
- Latest firmware
- Reset to factory default and try
- Try other models(Yealink/Other model)
- PCAP trace, syslog(level 6), config.bin
- Test accounts

Export the files

- PCAP Trace
- Syslog
- Config.bin



PCAP Trace

- Export from webpage → Settings → Configuration



- Captured by Wireshark

Hub/switch mirror

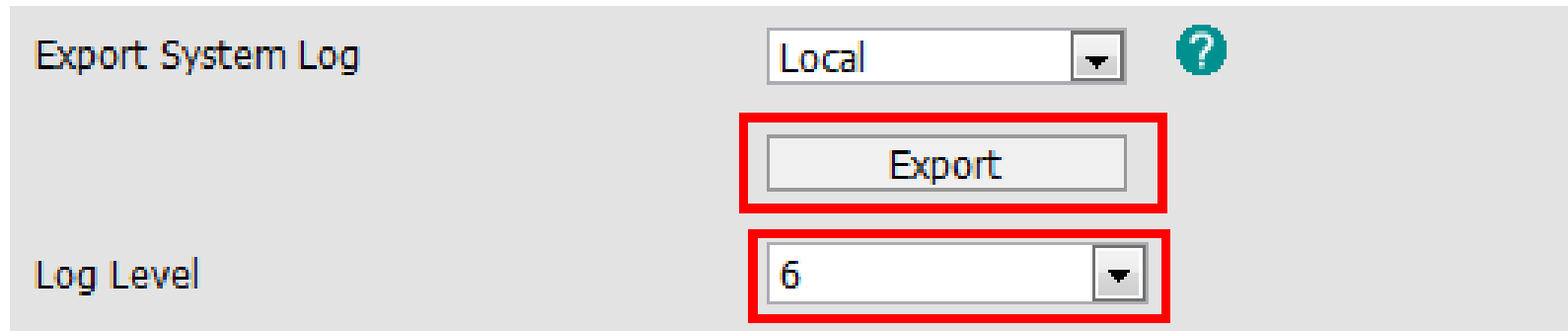
Wireshark.exe

How to use wireshark :

[ftp://yealinkftp:yealinkftp@ftp.yealink.com/Training/Feedback%20to%20Yealink/Wireshark/How to use Wireshark.pdf](ftp://yealinkftp:yealinkftp@ftp.yealink.com/Training/Feedback%20to%20Yealink/Wireshark/How%20to%20use%20Wireshark.pdf)

Syslog-Local

- Set Log Level to 6
- Reboot
- Reproduce



The screenshot shows a configuration interface for 'Export System Log'. It includes a dropdown menu set to 'Local' with a help icon (question mark) to its right. Below this is a button labeled 'Export'. Further down is a 'Log Level' section with a dropdown menu set to '6'. Red rectangular boxes are drawn around the 'Export' button and the 'Log Level' dropdown menu.

Export System Log

Local

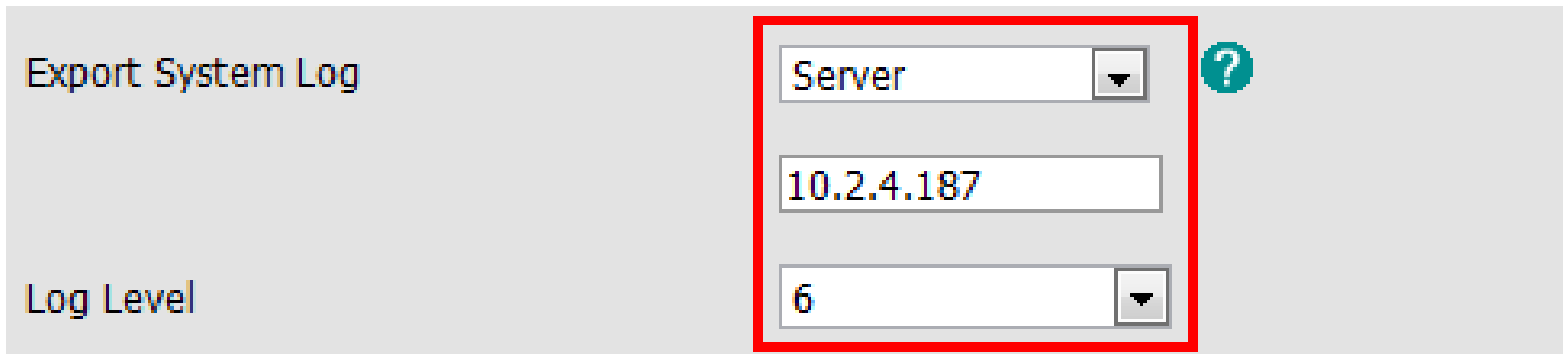
Export

Log Level

6

Syslog-Server

- Set Log Level to 6
- Fill in server IP address
- Reboot
- Reproduce



Export System Log

Server

10.2.4.187

Log Level

6

How to export the syslog to the server

<ftp://yealinkftp:yealinkftp@ftp.yealink.com/Training/Feedback%20to%20Yealink/Syslog/>

Config.bin

Import / Export Config

Browse...



Import

Export

Template

Please access to webpage → Settings → Configuration

1. Set Log Level to 6

2. Reboot the phone

3. Click Start

4. Reproduce the issue

5. Click Stop, and export the PCAP trace, syslog, config.bin file

Import / Export Config

Import Export

Export System Log

Local

Export

Log Level

6

Make Trace

Start Stop Export

Confirm Cancel

New Feature Request

- Application scenarios
- Other solutions
- Project progress
- Time demand
- Other brand phone support

How to Judge Priority

What's the status of the project?

Pre-sale:

Bidding

First round testing

Last round testing

Deploying

After-sale:

Can't use the phone

Many customers complain

...

Yealink Technical Support

- More than 200 R&D engineers to ensure good technical support
- More than 30 technical engineers to focus on technical support
- Fixed contact window, fastest respond, special version release to significant projects



Thanks!