

# **EX5600-T0/EX5601-T0/ EX5600-T1/EX5601-T1 Generic**

Firmware Release Note

V5.70(ACDZ.0.1)C0

Date: Nov 7, 2022

Author: Frank Chang

Reviewer:

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## Revision History

Date	Release	Author	Description
2022/04/06	1.0	Frank Chang	FW release for V5.70(ACDZ.0)b1
2022/05/23	2.0	Frank Chang	FW release for V5.70(ACDZ.0)b2
2022/06/22	3.0	Winnie Wen	FW release for V5.70(ACDZ.0)b3
2022/07/18	4.0	Frank Chang	FW release for V5.70(ACDZ.0)b4
2022/08/08	5.0	Frank Chang	FW release for V5.70(ACDZ.0)b5
2022/08/29	6.0	Frank Chang	FW release for V5.70(ACDZ.0)b6
2022/09/05	7.0	Frank Chang	FW release for V5.70(ACDZ.0)b7
2022/09/08	8.0	Frank Chang	FW release for V5.70(ACDZ.0)C0
2022/11/07	9.0	Frank Chang	FW release for V5.70(ACDZ.0.1)b1
2022/11/07	10.0	Frank Chang	FW release for V5.70(ACDZ.0.1)C0

**EX5600-T0/EX5601-T0/EX5600-T1/EX5601-T1**  
**Generic**  
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**Supported Platforms:**

Zyxel EX5600-T0/EX5601-T0/EX5600-T1/EX5601-T1 Generic

**Versions:**

Bootbase version : V2.3 | 08/03/2022 16:53:32

Firmware version : V5.70(ACDZ.0.1)C0

Kernel version: 5.4.171

WLAN code version: 7.6.2.4

3G WWAN package version: 1.24

VoIP version: HERMAN4 GW 2.4 Release 4.3

**Notes:**

## Public Domain Software Announcements

Open Source Used In Product	Version	From (Source)	License Terms	Modified / Used
attr	2.4.48	<a href="http://savannah.nongnu.org/projects/attr">http://savannah.nongnu.org/projects/attr</a>	GPLv2	Used
atftp	0.7.4	<a href="https://sourceforge.net/projects/atftp/">https://sourceforge.net/projects/atftp/</a>	GPLv2	Modified
bridge-Utils	1.7	<a href="https://git.kernel.org/pub/scm/linux/kernel/git/shemminger/bridge-utils.git/">https://git.kernel.org/pub/scm/linux/kernel/git/shemminger/bridge-utils.git/</a>	GPLv2	Modified
busybox	1.31.1	<a href="https://busybox.net/">https://busybox.net/</a>	GPLv2	Modified
clinkc	2.4	<a href="https://sourceforge.net/projects/clinkc/">https://sourceforge.net/projects/clinkc/</a>	BSD	Modified
conntrack-tools	1.4.6	<a href="https://git.netfilter.org/conntrack-tools/">https://git.netfilter.org/conntrack-tools/</a>	GPLv2	Used
dnsmasq	2.85	<a href="http://www.thekelleys.org.uk/dnsmasq/doc.html">http://www.thekelleys.org.uk/dnsmasq/doc.html</a>	GPLv2/GPLv3	Modified
dropbear	2020.81	<a href="https://github.com/mkj/dropbear">https://github.com/mkj/dropbear</a>	MIT	Modified
ebtables	2018-06-27-48cff25d	<a href="https://git.netfilter.org/ebtables/">https://git.netfilter.org/ebtables/</a>	GPLv2	Modified
eventlog	0.2.10	<a href="https://github.com/balabit/eventlog">https://github.com/balabit/eventlog</a>	BSD	Used
expat	2.2.10	<a href="https://github.com/libexpat/libexpat">https://github.com/libexpat/libexpat</a>	MIT	Used
ez-ipupdate	3.0.11b8	<a href="http://ez-ipupdate.com/">http://ez-ipupdate.com/</a>	GPLv2	Modified
gettext	0.19.8.1	<a href="http://www.gnu.org/software/gettext/">http://www.gnu.org/software/gettext/</a>	GPLv3	Used
glib	2.68.4	<a href="http://www.gtk.org/">http://www.gtk.org/</a>	LGPLv2.1	Used
iproute2	5.11.0	<a href="https://github.com/shemminger/iproute2">https://github.com/shemminger/iproute2</a>	GPLv2	Modified
iptables	1.8.7	<a href="https://git.netfilter.org/iptables/">https://git.netfilter.org/iptables/</a>	GPLv2	Modified
json-c	0.15	<a href="https://github.com/json-c/json-c/downloads">https://github.com/json-c/json-c/downloads</a>	MIT	Modified
libedit	20210419-3.1	<a href="http://pkgs.fedoraproject.org/repo/pkgs/libedit/libedit-20080712-2.11.tar.gz/">http://pkgs.fedoraproject.org/repo/pkgs/libedit/libedit-20080712-2.11.tar.gz/</a>	BSD	Modified
libffi	3.3	<a href="http://pkgs.fedoraproject.org/repo/pkgs/libffi/libffi-3.0.11.tar.gz/">http://pkgs.fedoraproject.org/repo/pkgs/libffi/libffi-3.0.11.tar.gz/</a>	MIT	Used
libiconv	1.16	<a href="http://www.gnu.org/software/libiconv/">http://www.gnu.org/software/libiconv/</a>	LGPLv2	Modified
libnetfilter_conntrack	1.0.8	<a href="https://git.netfilter.org/libnetfilter_conntrack/">https://git.netfilter.org/libnetfilter_conntrack/</a>	GPLv2	Used
libnetfilter_queue	1.0.5	<a href="https://git.netfilter.org/libnetfilter_queue/">https://git.netfilter.org/libnetfilter_queue/</a>	GPLv2	Used

libnfnetwork	1.0.1	<a href="https://git.netfilter.org/libnfnetwork/">https://git.netfilter.org/libnfnetwork/</a>	GPLv2	Used
libnl-tiny	2020-08-05-c2 91088f	<a href="https://github.com/openwrt/openwrt/tree/master/package/libs/libnl-tiny">https://github.com/openwrt/openwrt/tree/master/ package/libs/libnl-tiny</a>	GPLv2/LGPLv2.1	Used
libpcap	1.9.1	<a href="http://www.tcpdump.org">www.tcpdump.org</a>	BSD	Used
libtool	2.4.6	<a href="http://www.gnu.org/software/libtool/">http://www.gnu.org/software/libtool/</a>	GPLv2	Used
libusb	1.0.24	<a href="https://sourceforge.net/projects/libusb/">https://sourceforge.net/projects/libusb/</a>	LGPL 2.1	Used
Linux/Arm Kernel	5.4.171		GPLv2	Modified
logrotate	3.17.0	<a href="https://launchpad.net/ubuntu/hardy/i386/logrotate/">https://launchpad.net/ubuntu/hardy/i386/logrotate/ e/</a>	GPLv2	Modified
mailsend	1.19	<a href="https://github.com/muquit/mailsend/">https://github.com/muquit/mailsend/</a>	BSD	Modified
ncurses	6.2	<a href="http://ftp.gnu.org/pub/gnu/ncurses/">http://ftp.gnu.org/pub/gnu/ncurses/</a>	MIT	Modified
net-snmp	5.8	<a href="http://www.net-snmp.org/">http://www.net-snmp.org/</a>	ISC/BSD	Modified
ntfs-3g	2021.8.22-3	<a href="http://ntfs-3g.org">http://ntfs-3g.org</a>	GPLv2/LGPLv2	Used
ntpclient	2015_365	<a href="http://doolittle.icarus.com/ntpclient/">http://doolittle.icarus.com/ntpclient/</a>	GPLv2	Modified
openssl	1.1.1h	<a href="http://www.openssl.org">http://www.openssl.org</a>	OpenSSL	Modified
popt	1.16	<a href="http://rpm5.org/files/popt/">http://rpm5.org/files/popt/</a>	MIT	Modified
ppp	2.4.3	<a href="http://www.roaringpenguin.com/pppoe">http://www.roaringpenguin.com/pppoe</a>	GPLv2/BSD	Modified
pure-ftpd	1.0.30	<a href="http://pureftpd.org">http://pureftpd.org</a>	ISC/BSD	Modified
radvd	1.8	<a href="http://www.litech.org/radvd/">http://www.litech.org/radvd/</a>	BSD	Used
readline	8.1	<a href="http://cnswww.cns.cwru.edu/php/chet/readline/rlt&lt;br/&gt;op.html">http://cnswww.cns.cwru.edu/php/chet/readline/rlt op.html</a>	GPLv2	Used
sqlite	3330000	<a href="http://www.sqlite.org/">http://www.sqlite.org/</a>	Public Domain License	Used
syslog-ng	2.0.10	<a href="https://github.com/balabit/syslog-ng">https://github.com/balabit/syslog-ng</a>	GPLv2	Used
tcpdump	4.9.3	<a href="http://www.tcpdump.org/">http://www.tcpdump.org/</a>	BSD	Used
udhcp	0.9.8	<a href="http://udhcp.busybox.net/">http://udhcp.busybox.net/</a>	GPLv2	Modified
usb-modeswitch	2.1.0	<a href="http://www.draisberghof.de/usb_modeswitch/">http://www.draisberghof.de/usb_modeswitch/</a>	GPLv2	Used
util-linux	2.36.1	<a href="https://github.com/karelzak/util-linux/">https://github.com/karelzak/util-linux/</a>	GPLv2	Used
wide-dhcpv6	20080615	<a href="https://sourceforge.net/projects/wide-dhcpv6/">https://sourceforge.net/projects/wide-dhcpv6/</a>	BSD	Modified
zlib	1.2.11	<a href="https://github.com/madler/zlib">https://github.com/madler/zlib</a>	zlib	Used

## Known issues

Modules	Issue	Risk Impact Information

## Modifications in 5.70(ACDZ.0.1)C0

Based on V5.70(ACDZ.0.1)b1 to release V5.70(ACDZ.0.1)C0

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List

## Modifications in 5.70(ACDZ.0.1)b1

### ● Feature Enhancement

Modified Modules	Features Enhancement List
System	[#175946] Zyxel-SI-1433 [Vulnerability] Buffer overflow vulnerabilities and command injection vulnerability for EX5601-T0 Generic

### ● Bug Fixed

Modified Modules	Bug Fixed List

## Modifications in 5.70(ACDZ.0)C0

Based on V5.70(ACDZ.0)b7 to release V5.70(ACDZ.0)C0

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List

## Modifications in 5.70(ACDZ.0)b7

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
WiFi	[#173013] [MPro Mesh][Time:1hr][Occur: 2 time] EX5601 occurs resource temporarily unavailable of the 1905Daemon, it will lead mesh topology disappear during Mesh stress testing period.

## Modifications in 5.70(ACDZ.0)b6

### ● Feature Enhancement

Modified Modules	Features Enhancement List
WiFi	MTK release new FW bin for DFS certification
WiFi	Country UK support U-NII3 band

### ● Bug Fixed

Modified Modules	Bug Fixed List
WiFi	Detect radar then wifi reload couldn't select channel

## Modifications in 5.70(ACDZ.0)b5

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
Throughput	[165099] [Throughput] 5G wireless throughput does not pass PQA criterion
System	[170788] [System] Enable Zyxel Exec Env will fail, let ZyEE function cannot work.
Document	[170834] [Document] CPE does not match Default Setting.
NAT	[170779] [NAT] CPE happen call trace when create port trigger and LAN PC run heavy traffic.
SIP	[170773] [RD Internal][VoIP] After CPE establishes a SIP call, the ACS server does GPV ['Device.Services.VoiceService.1.VoiceProfile.1.Line.1.Stats.']. will lead to VoIP cannot work anymore.
TR-143	[167918] [TR-143] Throughput for upload diagnostic does not pass PQA criterion.

MESH	[MPro mesh] AP roaming test found that the record will stay at "IN_STEERING" will not be updated
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## Modifications in 5.70(ACDZ.0)b4

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
Stress	[#165089] [Stress] CPE happen call trace (one time) then 24G/5G can not connect to CPE after run 學禮樓 [#167596] [Stress] CPE run Reboot+change pppoe account stress via TR069 will happen coredump. [#169616] [Stress] CPE happen call trace after run NBL stress then stop NBL stress. (stress time > 3 minutes)
Throughput	[#168324] [Throughput] SFP (PMG3000) download throughput only 384M (packet size:1518)
LED	[#168323] [LED] SFP LED display off when CPE connect to OLT2406.
WAN	[#167923] [WAN] When SFP WAN is up, LAN client using "ping" will happen packets lost and playing IPTV will not be smooth
TR-143	[#167918] [TR-143] Throughput for upload diagnostic does not pass PQA criterion.

## Modifications in 5.70(ACDZ.0)b3

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
MGMT	[#165081] [ACTS/MGMT] Restore configuration via ACS, After reboot config not change
IGMP	[#164806] [IGMP] Can't play IPv6 MLD stream
WAN	[#168180] [WAN] CPE not support 2.5G WAN for PMG3000. [#167385] [WAN] In IPoE with VLAN, WLAN client access internet very long time (more than 10 minutes) and ftp upload/download very slow.
LED	[#167912] [LED] CPE internet LED display red when plug in the 3G dongle and get WAN ip. [#167689] [LED] In PPPoE mode, Internet LED display red.
GUI	[#167848] [GUI] Go VoIP > Call History, GUI will keep loading.
Document	[#167610] [Document] CPE's VoIP setting does not match Default Setting. [#165263] [document] PS document not match CPE.
WLAN	[#167373] [WLAN] 24G&5G get IPv4/v6 address, it can not access https web.

## Modifications in 5.70(ACDZ.0)b2

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
WAN	[#165314] [WAN] PMG3000 (V250ABVJ1b1) connect to CPE but it will work fail. [#164920] [WAN] LAN PC can't ping outside after 3G back wan up [#164858] [WAN] VLAN Autohunt function cannot work [#164381] [WAN] In IPoE with VLAN, LAN PC access internet very long

	time. (more than 15 minutes)
Stress	<p>[#165254] [ACTS/Stress] CPE does not connect to ACS server after run Reboot + change PPP username/password stress via TR069.</p> <p>[#165152] [Stress] CPE happen 45 times call trace after LAN &amp; WLAN overnight Stress testing and doing Firmware Upgrade via TR069</p> <p>[#165080] [Stress] 2.4G and 5G do not send beacon anymore after full loading stress over the weekend and do TR-069 firmware upgrade. (CPE is calibration board)</p> <p>[#165010] [Stress] CPE cannot connect to ACS Server after doing TR0-69 firmware upgrade stress overnight.</p> <p>[#165000] [Stress]CPE happen 3 times call trace when it run USB stress + FW upgrade (from TR069)</p> <p>[#164998] [Stress] CPE WAN cannot get IP after overnight stress</p> <p>[#164888] [Stress] During NBL 72 hrs stress, CPE console keeps printing messages and then reboot.</p>
USB	[#165120] [USB] LAN / WLAN clients download/upload file through samba server will happen call trace.
GUI	[#165045] [GUI] The wireless client icon and informationg will display in Wire page
TR143	[#164817] [ACTS/TR143] Set TR143 Parameters cause the DUT hang
NAT	[#164782] [NAT] Follow DST, CPE should support PCP page.
Document	[#164769] [Document] CPE does not match Default Setting.
IGMP	<p>[#164757] [IGMP] GUI multicast Status will keep loading can't access</p> <p>[#164746] [IGMP] GUI IGMP/MLD page some setting not work</p>
Maintenance	[#164747] [Maintenance] CPE not support SP Domain.
WLAN	<p>[#164710] [WLAN] WLAN Station Status page cannot display any information when wireless client is connected.</p> <p>[#164544] [WLAN] WPS LED isn't amber blinking when WPS process is in progress.</p>
Security	<p>[#164552] [Security] Some MAC Filter CLI can not work.</p> <p>[#164485] [Security] Parental Control work fail.</p>
Routing	[#164480] [Routing] RIP function cannot work. (CPE cannot send RIP packets)
DLNA	[#164422] [DLNA] DLNA work fail.
VoIP	[#168271] [VoIP] CPE has support G.726-24 and G.726-32 codec.

## Modifications in 5.70(ACDZ.0)b1

### ● Feature Enhancement

Modified Modules	Features Enhancement List

### ● Bug Fixed

Modified Modules	Bug Fixed List
System	[#164359] [System] CPE upgrade FW via expressboot but GUI/Console display V5.70(ACDZ.0)b0