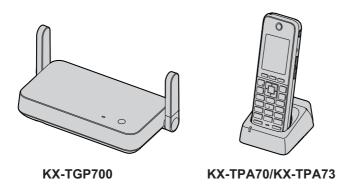
# **Panasonic**

# **Operating Instructions**

Base Unit for SIP Cordless Phone Model No. **KX-TGP700** 

SIP Cordless Handset Model No. KX-TPA70/KX-TPA73



Thank you for purchasing this Panasonic product. Please read this manual carefully before using this product and save this manual for future use.

Please use the batteries provided and charge the batteries for about 6 hours before using the handset for the first time.

#### Note

- In this manual, the suffix of each model number is omitted unless necessary.
- The illustrations such as some keys may differ from the appearance of the actual product.
- Certain products and features described in this document may not be available in your country or area. Contact your phone system dealer/service provider.
- The contents and design of the software are subject to change without notice.

Document Version: 2020-01

## Introduction

#### **Outline**

This manual describes information about the installation and operation of KX-TGP700, KX-TPA70 and KX-TPA73.

#### **Related Documentation**

#### Quick Start Guide

Describes basic information about the installation and safety precautions to prevent personal injury and/or damage to property.

#### Administrator Guide

Describes detailed information about the configuration and management of this unit. This guide describes information about the KX-TGP700 only.

Manuals and supporting information are provided on the Panasonic Web site at: https://panasonic.net/cns/pcc/support/sipphone/

#### Font Information

The font information for KX-TPA70 and KX-TPA73 is available on the Panasonic Web site at:

https://panasonic.net/cns/pcc/support/sipphone/

#### For Future Reference

Record the information in the space below for future reference.

#### Note

- The serial number of this product may be found on the labels affixed to the following places:
  - -Base unit (KX-TGP700): the back of the unit
  - -Handset (KX-TPA70/KX-TPA73): the inside of the battery compartment on the back of the handset
  - -Charger (KX-TPA70/KX-TPA73): the bottom of the charger You should note the serial numbers of these units in the space provided and retain this manual as a permanent record of your purchase to aid in identification in the event of theft
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MODEL NO.	
SERIAL NO.	
DATE OF PURCHASE	
NAME OF DEALER	
DEALER'S ADDRESS	
DEALER'S TEL. NO.	

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# Section 1

# Important Information

# 1.1 Important Information

# 1.1.1 Data Security

- This telephone communicates using digital signals that are difficult to intercept.
   However, it is possible that the signals could be intercepted by a third party.
- To avoid unauthorized access to this product:
  - -Keep the password (e.g., PIN for registration) secret.
  - -Change the default password.
  - -Set a password that is random and cannot be easily guessed.
  - -Change the password regularly.
- This product can store your private/confidential information. To protect your privacy/ confidentiality, we recommend that you erase the information such as the phonebook or call log from the memory before you dispose of, transfer or return the product, or have the product repaired.
- Set the password when you register the handset/desk phone to the base unit.
- It is recommended that you lock the phonebook or call log to prevent stored information from being leaked when you carry the handset or if the handset is lost.

# 1.2 For Users in European Countries

# The following declaration is applicable to KX-TGP700CE/KX-TGP700UK/KX-TPA70CE/KX-TPA70UK/KX-TPA73CE/KX-TPA73UK only

The DECT is abbreviation of the Digital Enhanced Cordless Telecommunications. This device is a DECT operating in the frequency band of 1880 MHz to 1900 MHz. The usage of this device is generally allowed in all EU countries.

Hereby, Panasonic Corporation declares that the radio equipment described in this manual is in compliance with Directive 2014/53/EU.

The full text of the EU declaration of conformity is available at the following internet address:

#### https://www.ptc.panasonic.eu/compliance-documents

Contact to Authorized Representative: Panasonic Testing Center Panasonic Marketing Europe GmbH Winsbergring 15, 22525 Hamburg, Germany

#### **Ecodesign information**

Ecodesign information under EU Regulation (EC) No.1275/2008 amended by (EU) Regulation No.801/2013.

The text of the ErP Free Web Product Information is available at the following internet address:

https://www.ptc.panasonic.eu/compliance-documents

Power consumption in networked standby and guidance are mentioned in the web site above.

# 1.3 For Users in the United Kingdom

- This unit is designed to be installed under controlled conditions of ambient temperature and a relative humidity.
- Avoid installing the unit in damp or humid environments, such as bathrooms or swimming pools.
- 999 and 112 can be dialed on the product after accessing the outside line for the purpose of making outgoing calls to the BT emergency (999) and (112) services.
   The method for accessing an outside line differs depending on the SIP server. For details, confirm the features of the SIP server.

# 1.4 For Users in Australia and the United Kingdom

This unit is capable of being used in conjunction with hearing aids fitted
with inductive coil pick-ups. The handset should be held as for normal
conversation. For operation, the hearing aid should be set to its "T"
position or as directed in the operating instructions for the hearing aid.



 This unit is designed to aid the visually handicapped to locate dial keys and buttons.

#### 1.5 For Users in New Zealand

 This equipment shall not be set to make automatic calls to the Telecom '111' Emergency Service.

#### **PTC General Warning**

• The grant of a Telepermit for any item of terminal equipment indicates only that Telecom has accepted that the item complies with minimum conditions for connection to its network. It indicates no endorsement of the product by Telecom, nor does it provide any sort of warranty. Above all, it provides no assurance that any item will work correctly in all respects with another item of Telepermitted equipment of a different make or model, nor does it imply that any product is compatible with all of Telecom's network services.

#### The Use of IP Networks through the PSTN

Internet Protocol (IP) by its nature introduces delay into speech signals as each data
packet is formulated and addressed. Telecom Access Standards recommends that
suppliers, designers and installers using this technology for calls to or from the PSTN
refer to ITU E Model requirements in the design of their networks. The overall aim is to
minimize delay, distortion and other transmission impairments, particularly for those
calls involving cellular and international networks, which already suffer extensive delay.

#### Echo cancellation

Echo cancelers are not normally required in the Telecom PSTN because geographic
delays are acceptable where CPE return loss is maintained within Telepermit limits.
However, those private networks making use of Voice over IP technology are required
to provide echo cancellation for all voice calls. The combined effect of audio/VoIP
conversion delay and IP routing delay can cause the echo cancellation time of ≥ 64 ms
to be required.

#### **Important Notice**

- Under power failure conditions this appliance may not operate. Please ensure that a separate telephone, not dependent on local power, is available for emergency use.
- No "111" or other calls can be made from this device during a mains power failure.

#### 1.6 For Users in the United States

#### **FCC Note**

- This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:
  - -Reorient or relocate the receiving antenna.
  - -Increase the separation between the equipment and receiver.
  - -Connect the equipment to an outlet on a circuit different from that to which the receiver is connected.
  - -Consult the dealer or an experienced radio/TV technician for help.

#### **FCC CAUTION**

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this product.

#### **FCC RF Exposure Warning:**

- This product complies with FCC radiation exposure limits set forth for an uncontrolled environment
- To comply with FCC RF exposure requirements, KX-TGP700 must be installed and operated 20 cm (8 inches) or more between the product and persons' bodies.
- This product may not be collocated or operated in conjunction with any other antenna or transmitter.
- The handset may be carried and operated with only the specific provided belt-clip.
   Other non-tested belt-clips or similar conbody-worn accessories may not comply and must be avoided.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

(1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

FCC ID can be found inside the battery compartment (KX-TPA70/KX-TPA73) or on the bottom of the units (KX-TGP700).

Privacy of communications may not be ensured when using this phone.

#### **Hearing Aid Compatibility**

This telephone provides magnetic coupling for hearing aids as defined by the FCC in 47 CFR Section 68.316. Use only handsets or other acoustic devices with this equipment that are compliant with the hearing aid compatibility requirements of FCC Part 68. When you hold the phone to your ear, noise might be heard in your Hearing Aid. Some Hearing Aids are not adequately shielded from external RF (radio frequency) energy. If noise occurs, use an optional headset accessory or the speakerphone option (if applicable) when using this phone. Consult your audiologist or Hearing Aid manufacturer about the availability of Hearing Aids which provide adequate shielding to RF energy commonly emitted by digital devices.

#### Compliance with TIA-1083 standard:



Telephone handsets identified with this logo have reduced noise and interference when used with T-Coil equipped hearing aids and cochlear implants.

# WHEN PROGRAMMING EMERGENCY NUMBERS AND/OR MAKING TEST CALLS TO EMERGENCY NUMBERS:

- Remain on the line and briefly explain to the dispatcher the reason for the call before hanging up.
- 2. Perform such activities during off-peak hours, such as early morning or late evening.

#### For Product Service

- Call 1 (800) 528-6747 Option 1 for the location of your nearest authorized service center.
- Panasonic's e-mail address for customer inquiries: SIPSupport@us.panasonic.com
   For customers in the USA and Puerto Rico ONLY.

- This cordless telephone is designed for use in the United States of America.
   Sale or use of this product in other countries may violate local laws.
- Ce téléphone sans fil est conçu pour être utilisé aux États-Unis d'Amérique.
   La vente ou l'emploi de cet appareil dans certains autres pays peut constituer une infraction à la législation locale.
- Este teléphono sin cordón fue elaborado para su uso en los Estados Unidos de América. La venta o el empleo de este producto en ciertos países puede constituir una violación de la legislación local.
- このコードレス電話機は、日本国外での使用を目的として設計されており、日本国内での使用は法律違反となります。従って、当社では日本国内においては原則として修理などのサービスは致しかねます。

#### 1.7 For Users in Canada

# Innovation, Science and Economic Development Canada Notices and Other Information

This product meets the applicable Innovation, Science and Economic Development Canada technical specifications.

#### Note

- This device complies with Innovation, Science and Economic Development Canada licence-exempt RSS standard(s). Operation is subject to the following two conditions:
   (1) this device may not cause interference, and (2) this device must accept any interference, including interference that may cause undesired operation of the device.
- Privacy of communications may not be ensured when using this phone.
- Some wireless telephones operate at frequencies that may cause interference to nearby TVs and VCRs. To minimize or prevent such interference, the wireless telephone should not be placed near, or on top of, a TV or VCR. If interference is experienced, move the wireless telephone farther away from the TV or VCR. This will often reduce, or eliminate, interference.
- This transmitter must not be co-located or operated in conjunction with any other antenna or transmitter.
- This Class B digital apparatus complies with Canadian ICES-003.

#### CAUTION

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this product.

#### RF Exposure Warning:

- This product complies with ISED radiation exposure limits set forth for an uncontrolled environment.
- To comply with ISED RF exposure requirements, KX-TGP700 must be installed and operated 20 cm (8 inches) or more between the product and persons' bodies.
- This product may not be collocated or operated in conjunction with any other antenna or transmitter.
- The handset may be carried and operated with only the specific provided belt-clip.
   Other non-tested belt-clips or similar body-worn accessories may not comply and must be avoided.

#### Compliance with TIA-1083 standard:



Telephone handsets identified with this logo have reduced noise and interference when used with T-Coil equipped hearing aids and cochlear implants.

#### 1.8 For Best Performance

## Operating Range

- The range of operation depends on the topography of your office, weather, or usage conditions, because signals are transmitted between the base unit and the handset/ desk phone by radio waves.
- Normally, you get greater range outdoors than indoors. If there are obstacles such as walls, noise may interfere with your telephone calls. In particular, high metal shelves or reinforced concrete walls will restrict your operating range.
- A handset/desk phone may not work when it is too far from the base unit depending on the structure of the building.
- We strongly suggest you hold the bottom half of the handset to ensure better call quality. Because, the antenna is located in the upper half of the handset.

#### Noise

Occasional noise or interference may occur due to electromagnetic radiation from objects such as refrigerators, microwave ovens, faxes, TVs, radios, or personal computers. If noise disturbs your telephone calls, keep the handset/desk phone away from these electrical appliances.

#### **Environment**

- Keep the product away from heating appliances and devices that generate electrical noise, such as fluorescent lamps and motors. These noise sources can interfere with performance of the product.
- Do not use the product in rooms where the temperature is less than 0 °C (32 °F) or greater than 40 °C (104 °F).
- To avoid damage, charge the battery only in temperatures ranging from 5 °C (41 °F) to 40 °C (104 °F).
- Allow 10 cm (3–15/16 in) clearance around the product for proper ventilation.
- Avoid environments with excessive smoke, dust, moisture, mechanical vibration, shock, or direct sunlight.
- The apparatus is designed to be installed and operated under controlled conditions of ambient temperature and a relative humidity.

#### **Routine Care**

- Unplug the AC adaptor from the AC outlet and disconnect the Ethernet cable before cleaning.
- · Wipe the product with a soft cloth.
- Do not clean the product with abrasive powder or with chemical agents such as benzine or thinner.
- Do not use liquid cleaners or aerosol cleaners.
- Clean the terminal of the charger periodically.

#### **Placement**

- Do not place heavy objects on top of the product.
- Care should be taken so that objects do not fall onto, and liquids are not spilled into, the product.
- Place the charger on a flat surface.

# 1.9 Battery Information (KX-TPA70/KX-TPA73)

After batteries are fully charged (at 25 °C [77 °F]):

Operation	Operating Time	
Ореганоп	KX-TPA70	KX-TPA73
While Talking (Backlight off, Narrowband Mode)	Up to about 11 h	Up to about 18 h
While Talking (Backlight on, Wideband Mode)	Up to about 8 h	Up to about 7 h
While not in use (Standby)	Up to about 200 h	Up to about 200 h

- Operating time may be shorter than listed above depending on usage conditions and ambient temperature.
- The batteries will drain slowly even while the handset is turned off.
- The handset can receive calls while charging.
- Battery consumption increases when the handset is out of range (if """ flashes, turn the handset off).

#### **Important**

 Clean the handset and the charger contacts with a soft, dry cloth once a month. Clean more often if the unit is subject to grease, dust or high humidity.
 Otherwise the batteries may not charge properly.

#### **Low Battery Warning**

The batteries need to be charged in the following situations:

- The battery level indicator displays as empty (" and the alarm sounds."
- "Charge Battery" is displayed. In this situation, the handset cannot be operated.
- 1 If the low battery warning occurs during a conversation, after 1 minute, the conversation will be disconnected, and after 1 more minute, the handset will turn off.

# Replacing the Batteries (KX-TPA70 only)

If the battery level indicator displays as empty ("") after using the phone for a short time, even when the batteries have been fully charged, the batteries should be replaced. Before replacing the batteries, make sure the low battery warning is displayed, then turn off the power to prevent memory loss. Replace the batteries and charge the new batteries for about 6 hours.

If you replace the batteries before the low battery warning appears, the battery strength icon may display an incorrect reading. In this case, use the handset as normal with the new batteries installed.

When the low battery warning is displayed, charge the batteries for about 6 hours. The battery strength icon will then display the correct reading.

#### Note

• There is a danger of explosion if the batteries are incorrectly replaced.



(For the United States and Canada only)
Nickel metal hydride batteries that are recyclable power the
product you have purchased. Please call 1-800-8-BATTERY for
information on how to recycle these batteries.

#### Important Notice Concerning the Correct Use and Charging of Ni-MH Batteries

Batteries, due to their construction, undergo some wear and tear. The lifetime of batteries also depends on correct maintenance. Charging and discharging are the most important factors. You should take notice of the following to maintain the life of the batteries as long as possible.

Ni-MH batteries have a kind of memory, the "memory effect". If fully charged batteries are used several times only for 15 minutes in the handset and then recharged, the capacity of the batteries will be reduced to 15 minutes due to the memory effect. Therefore you should discharge the batteries completely, i.e. use them in the handset until the battery level indicator displays as empty (" ). Then recharge them as described in the manual. After the memory effect has occurred, it is possible to achieve almost complete capacity of the Ni-MH batteries by charging and discharging several times one after another.

Ni-MH batteries can also self-discharge. This self-discharge depends on the ambient temperature. At temperatures under 0  $^{\circ}$ C (32  $^{\circ}$ F), the self-discharge will be the lowest. High humidity and high temperatures support the self-discharge. Also long-term storage will lead to self-discharge.

#### Replacing the Batteries (KX-TPA73 only)

If the battery level indicator displays as empty (" after using the phone for a short time, even when the battery has been fully charged, the battery should be replaced. Before replacing the battery, make sure the low battery warning is displayed, then turn off the power to prevent memory loss. Replace the battery and charge the new battery for about 3 hours.

If you replace the battery before the low battery warning appears, the battery strength icon may display an incorrect reading. In this case, use the handset as normal with the new battery installed.

When the low battery warning is displayed, charge the battery for about 3 hours. The battery strength icon will then display the correct reading.

• Please use only Panasonic batteries. For details, consult your administrator or dealer.

• There is a danger of explosion if the batteries are incorrectly replaced.



(For the United States and Canada only)
A lithium ion/polymer battery that is recyclable powers the product you have purchased. Please call 1-800-8-BATTERY for information on how to recycle this battery.

#### **CAUTION**

RISK OF EXPLOSION IF BATTERIES ARE REPLACED BY AN INCORRECT TYPE. DISPOSE OF USED BATTERIES ACCORDING TO THE INSTRUCTIONS.

# Section 2

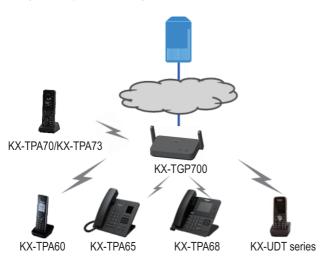
# **Before Operating the Telephones**

# 2.1 Before Operating the Telephones

## 2.1.1 System Overview

#### <When the base unit is a KX-TGP700>

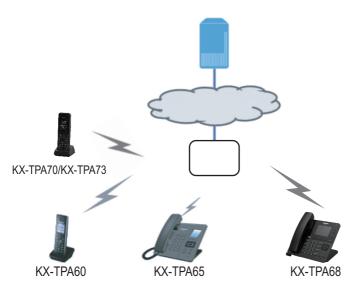
- Expandable to cordless handsets/desk phones [KX-TPA60, KX-TPA65, KX-TPA68, KX-TPA70, KX-TPA73, KX-UDT series (except for KX-UDT111)].
   Up to 16 phones in total.
- Up to 16 simultaneous calls (Narrowband mode), or up to 8 simultaneous calls (Wideband mode)
- High quality sound using noise reduction and error correction technology



: Internet

#### <When the base unit is not a KX-TGP700>

The KX-TPA60, KX-TPA65, KX-TPA68, KX-TPA70 and KX-TPA73 support the CAT-iq (Cordless Advanced Technology-internet and quality) 2.0 standard and can be connected and used with any base unit that supports this standard. This manual describes how to connect to a base unit other than the KX-TGP700, but the availability of certain features, and the specifications of certain settings and operations will depend on the base unit being used.



: Internet

: Base unit other than KX-TGP700

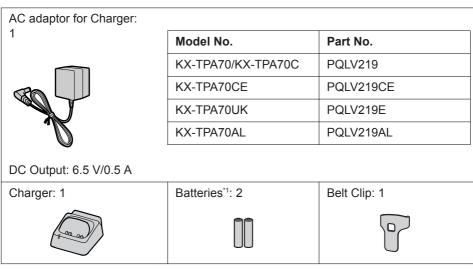
# 2.2 Accessory Information

#### 2.2.1 Included Accessories

#### KX-TGP700/KX-TGP700CE/KX-TGP700UK/KX-TGP700AL

AC adaptor for Base unit:		
1	Model No.	Part No.
	KX-TGP700	PNLV236
	KX-TGP700CE	PNLV236CE
	KX-TGP700UK	PNLV236E
***	KX-TGP700AL	PNLV236AL
DC Output: 5.5 V/1.0 A		
Ethernet Cable: 1	Screws: 2 Washers: 2	
	© ©	

#### KX-TPA70



Screws: 2 Washers: 2	
() 0 () 0	

<sup>1</sup> Rechargeable AAA Ni-MH 1.2 V, 630 mAh batteries

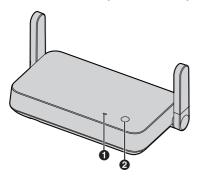
#### **KX-TPA73**

AC adaptor for Charger:	Model No.	Part No.
	KX-TPA73/KX-TPA73C	PQLV219
	KX-TPA73CE	PQLV219CE
	KX-TPA73UK	PQLV219E
	KX-TPA73AL	PQLV219AL
DC Output: 6.5 V/0.5 A		
Charger: 1	Battery*1: 1	Belt Clip: 1
(an an)		
Screws: 2 Washers: 2		
()		

<sup>\*1</sup> Rechargeable Li-ion 3.7 V, 800 mAh battery

# 2.3 Location of Controls

# 2.3.1 Base Unit (KX-TGP700)



# 1 Status Indicator

Status		
Color	Light pattern	Meaning
Green	On	The base unit is connected to the Internet. The startup process is complete and you may now make and receive internet calls.
	Slow	The base unit is being used for a call.
Flashing	Flashing	The base unit is downloading data. Do not disconnect the Ethernet cable or AC adaptor from the base unit until the STATUS indicator stops flashing and lights in steady green.
	Quick Flashing	The handset/desk phone is busy.
Red	On	When the base unit is turned on, the STATUS indicator lights in red for about 40 seconds.
	Slow Flashing	The base unit is registering a handset/desk phone.
	Quick Flashing	The base unit is paging handsets/desk phones (by using the handset locator button).

Status		
Color	Light pattern	Meaning
Amber	On	The base unit's IP address may conflict with the IP addresses of other devices on your local network. Contact your administrator for further information.
	Slow Flashing	The base unit is obtaining an IP address or is obtaining configurations. Please wait.
		The base unit is registering with your phone system. Please wait
		If the STATUS indicator continues flashing, check the following:
		<ul> <li>Network settings may not be correct. Contact your administrator.</li> </ul>
		-Many installation issues can be resolved by resetting all the equipment. First, shut down your modem, router, hub, base unit, and computer. Then turn the devices back on one at a time in this order: modem, router, hub, base unit, computer.
		<ul> <li>If you cannot access Internet Web pages using your computer, check to see if your phone system is having connection issues in your area.</li> </ul>
		<ul><li>For more troubleshooting help, contact your administrator.</li></ul>
	Quick Flashing	Unplug the base unit's AC adaptor to reset the unit, then reconnect the AC adaptor. If the STATUS indicator is still flashing rapidly, there may be a problem with the base unit hardware. Contact your phone system dealer/service provider.
Slow switching (Red→Green-	g →Amber→Off)	The base unit is in maintenance mode. Turn the base unit off and then back on again.
Quick switchir (Red→Green-	ng →Amber→Off)	The base unit is restarting. Wait a moment.

Status		
Color	Light pattern	Meaning
Off	_	The base unit power is off.
		The Ethernet cable is not connected properly.  Connect it.
		Your network devices (hub, router, etc.) are turned off. Check the LEDs for the link status of the devices.

#### Note

- The indicator flashing patterns are as follows:
  - -Slow Flashing: 60 times per minute
  - -Quick Flashing: 240 times per minute

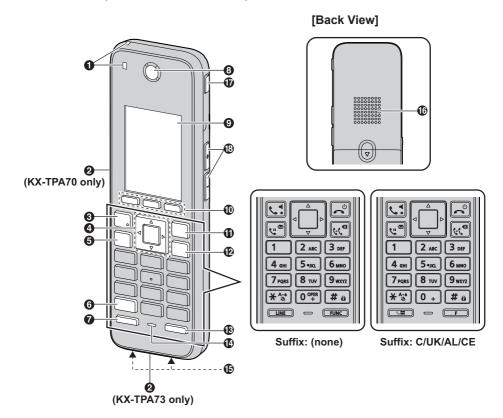
#### 2 Handset locator button

You can locate a misplaced handset/desk phone by paging it.

If you press the button again, or after 60 seconds have passed, the page to the handset/desk phone will be stopped.

You can also register the handset/desk phone to the base unit by pressing and holding the button for about 3 seconds.

# 2.3.2 Handset (KX-TPA70/KX-TPA73)



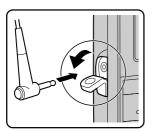
# 1 Ringer/Charge/Message Indicator

Status		Meaning
Color	Light pattern	Wearing
Red	On	Charging
	Slow Flashing	There is a new missed call or voice mail.
	Quick Flashing	Charging failure
Green	On	Fully charged
Green/Red	Quick Flashing	Receiving a call *LED color can be changed by setting.

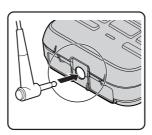
Status		- Meaning	
Color	Light pattern	- Wearing	
Off	_	The handset is not connected to the charger.	

#### 2 Headset Jack

#### For KX-TPA70:



For KX-TPA73:



The headsets can be used with this unit. (Not all operations with the headsets can be guaranteed.)

For up-to-date information about headsets that have been tested with this unit, refer to the following web sites:

https://panasonic.net/cns/pcc/support/sipphone/

### 3 TALK/Speakerphone Key

Used to make or answer calls, or toggle between Receiver mode and Hands-free mode during a conversation. During a conversation using a headset, Hands-free mode does not work.

### 4 Navigator Key

The Navigator Key includes four arrow keys and a center key. The arrow keys are used to adjust the ringer/receiver volume or move the cursor to select an item. The center key is used to confirm a selection. If in standby mode, pressing the keys perform the following functions:

LEFT (◀)	Short press	Used to display the Incoming call log.*1
	Long press	Used to access the auto answer setting.
UP (A) Short press Long press	Short press	Used to access the user customized feature.
	Long press	Used to access the forward setting.
RIGHT (►)	Short press	Used to open the contacts.*1
	Long press	Used to lock/unlock contact.

DOWN (▼)	Short press	Used to access the call log on the screen.
BOWN (♥)	Long press	Used to display the line status.

In this manual, when a procedure instructs you to "press ", you can also press the **[CENTER]** key to confirm the selection.

When the BroadCloud (Presence) feature is enabled, the phone will operate as follows. Contact your administrator for further information.

LEFT: Used to display Presence.

RIGHT: Used to display Favorites.

#### 5 HOLD/Message Key

During talking, used to place a call on Hold. In standby mode, used to retrieve a call on hold if there is one, or used to access your voice mailbox if no call is on hold.

#### 6 Silent Mode Key

Used to turn Silent Mode on or off when pressed for more than 2 seconds in standby mode

### 7 [LINE] Key

Used to confirm the line status or seize a line.

- 8 Receiver
- 9 Display
- Soft Keys

A/B/C (located from left to right) are used to select the item displayed on the bottom line of the display.

# 1 POWER/CANCEL Key

Used to end calls, exit the phonebook or Function mode. Press and hold this key to turn the handset on or off.

# 12 TRANSFER/Clear Key

Used to transfer a call to another party, or to clear digits or characters.

### (B) [FUNC] Key

Pressing this key followed by a keypad number (0–9) and "\*, "#" allows you to perform various common functions quickly.

- Microphone
- 15 Charge Contacts
- 16 Speaker
- To Short cut key
- 13 Volume key

# 2.4 The Display and Icons

# 2.4.1 Display

## [Example: In standby mode]



# 1 Pictograph

Y	Signal Strength Indicator - Strong		Battery Indicator - Full
Yı	Signal Strength Indicator - Medium		Battery Indicator - Medium
$\P$	Signal Strength Indicator - Weak		Battery Indicator - Low
Ψ	Signal Strength Indicator - Very weak		Battery Indicator - Very low
$\Psi$	Signal Strength Indicator - Out of range		Battery Indicator - Needs to be charged.
C	Off-hook Status	Ľ	Incoming Call Log
1/	Intercom Indicator*1	C	Outgoing Call Log
*	Bluetooth Indicator - On	*	Bluetooth Indicator - Off

Not displayed when connecting to a base unit other than the KX-TGP700.

- 3 Time Display
- 4 Date Display

<sup>2</sup> Handset Status Information

**6** Handset/Desk phone number and Name (when connecting to a KX-TGP700 only)

Talk time (when the line is on a call) and incoming call display (when a call is received or recalled)

Full-Charge Display

When a handset is placed in the charger while it is powered on, "Fully Charged" will be displayed when it is fully charged.

If a handset that is fully charged is placed in the charger while it is powered on, "Fully Charged" is displayed.

- 6 Call Log or New Message Display
- Soft Keys

#### Note

• Example images of the display in this manual are samples only, and the actual screen on your phone may vary in color and/or appearance.

# Section 3 Making Calls

# 3.1 Making Calls

• You can confirm that the number was dialed correctly before calling (Predialing) by entering the number, then

Press .

# Section 4 Receiving Calls

# 4.1 Answering Calls

## To answer an incoming call



## Note

• When receiving an intercom call, the Handset Name is displayed on the LCD.

# Section 5 Installation and Setup

# 5.1 Installation and Setup

#### Note

 Panasonic assumes no responsibility for injuries or property damage resulting from failures arising out of improper installation or operation inconsistent with this documentation.

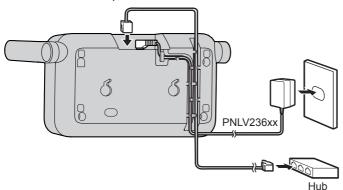
#### WARNING

- To reduce the risk of fire or electric shock, do not overload AC outlets and extension cords.
- Completely insert the AC adaptor/power plug into the AC outlet. Failure to do so may cause electric shock and/or excessive heat resulting in a fire.
- Regularly remove any dust, etc. from the AC adaptor/power plug by pulling it from the power outlet, then wiping with a dry cloth. Accumulated dust may cause an insulation defect from moisture, etc. resulting in a fire.

#### 5.2 Connections

#### **KX-TGP700** (Base unit)

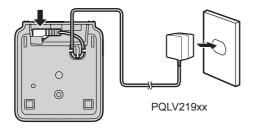
Connect the AC adaptor and the Ethernet cable to the base unit.



- If PoE is available, an AC adaptor is not needed.
- If you are using a PoE hub, the number of devices that you can connect simultaneously is limited by the amount of power supplied by the hub.
- The initial setting for the KX-TGP700 IP address is "DHCP—Auto". For information about your network environment, contact your administrator.

#### Charger for KX-TPA70/KX-TPA73

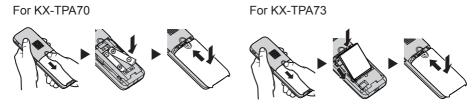
Connect the AC adaptor to the charger.



- The AC adaptor should be connected to a vertically oriented or floor-mounted AC outlet. Do not connect the AC adaptor to a ceiling-mounted AC outlet, as the weight of the adaptor may cause it to become disconnected.
- Fasten the AC adaptor cord to the cord holder.
- Use only the included Panasonic AC adaptor.

#### 5.2.1 Battery Installation

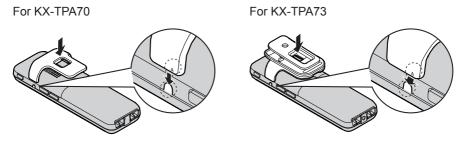
Open the battery cover, insert the batteries, and close the cover as indicated below.



# 5.2.2 Attaching the Belt Clip

You can attach the handset to your belt by following the steps below.

- 1. Push the clip onto the back of the handset.
- 2. Insert the clip into the designated notches in the handset.



## 5.2.3 Charging the Batteries

At the time of shipment, the batteries are not charged. Please charge the batteries for about 6 hours before using the handset for the first time.



- The charge indicator on the handset will turn on green when the batteries are fully charged.
- When a handset is placed in the charger while it is powered on, "Fully Charged" will be displayed when it is fully charged.
   If a handset that is fully charged is placed in the charger while it is powered on, "Fully Charged" is displayed.
- If the batteries are already fully charged and the handset is placed in the charger while the power is off, the charge indicator will turn on green.
- Battery charging will begin about 3 seconds after placing the handset in the charger when the power is off.
   For more information about charging batteries, see 1.9 Battery Information (KX-TPA70/KX-TPA73), page 16.
- It is normal for the handset and charger to feel warm while the batteries are charging.
- Keep devices sensitive to magnetic fields away from the charger.
- Use only the included charger.
- The included charger connects to a power source, the LED on the charger will turn on green.

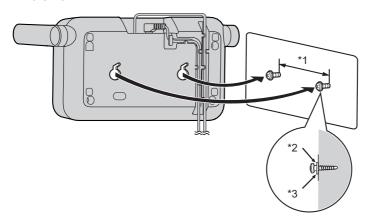
# 5.2.4 Wall Mounting

#### Note

• Make sure that the wall and the fixing method are strong enough to support the weight of the unit.

#### KX-TGP700 (Base unit)

 Drive the screws into the wall either 85 mm (3 7/20 in) apart, and mount the unit on the wall.



- \*1 85 mm (3 7/20 in)
- \*2 Washer
- <sup>+3</sup> Drive the screw to this point.

# Section 6 Appendix

# 6.1 Appendix

# 6.1.1 Specifications

# KX-TGP700 (Suffix: all)

Item	Specifications	
Power Supply	AC adaptor/PoE (IEEE 802.3af) Class 2	
Maximum Power Consumption	5.0 W/4.8 W (AC adaptor/PoE)	
Operating Environment	0 °C (32 °F) to 40 °C (104 °F)	
Ethernet Port (LAN)	1 (RJ45)	
Ethernet Interface	10Base-T/100Base-TX (Auto/100MB-FULL/100MB-HALF/10MB-FULL/10MB- HALF)	
CAT-iq	2.0	
Wideband Codec	G.722/Opus	
Narrowband Codec	G.711a-law/G.711µ-law/G.729a	
Multiple Line	16	
Multiple Handset/Desk Phone	16	
Simultaneous Voice Calls (Narrowband Mode)	Talk 16 (include 2 Conference calls)	
Simultaneous Voice Calls (Wideband Mode)	Talk 8 (include 2 Conference calls) (All wideband codec : Talk 8)	
Dimensions (Width × Depth × Height)	223 mm × 110 mm × 44 mm (8.78 in × 4.33 in × 1.73 in)	
Weight	300 g (0.66 lb)	

#### KX-TPA70/KX-TPA73

Item	KX-TPA70	KX-TPA73
Power Supply	_	_
Maximum Power Consumption	1.6 W	3.1 W
Operating Environment	0 °C (32 °F) to 40 °C (104 °F)	0 °C (32 °F) to 40 °C (104 °F)

Item	KX-TPA70	KX-TPA73
CAT-iq	2.0	2.0
Key Backlight	Yes (White)	Yes (White)
Strap Hole	No	No
Belt Clip	Yes (Fixed type)	Yes (Swibel type)
Display	2.2-inch TFT Backlight LCD, 65,000 colors	2.2-inch TFT Backlight LCD, 65,000 colors
Headset Jack	1 (ø 3.5 mm [7/50 in])	1 (ø 3.5 mm [7/50 in])
Batteries	Ni-MH AAA × 2 (1.2 V, 630 mAh)	Li-ion (3.7 V, 800 mAh)
Battery Performance	Talk: up to 11 hours Standby: up to 200 hours	Talk: up to 17 hours Standby: up to 200 hours
Charging Time	6 hours	3 hours
Quick Charge	No	Yes 10 minutes charge for 2-hour talk time
Vibration	No	Yes
Bluetooth	No	Yes (1) Version: Ver.2.1 (2) Class: Class 1 (3) Profile: Hadsfree profile 1.6 (4) eSCO: Yes
Dimensions (Width × Depth × Height)	52.0 mm × 22.8 mm × 162.3 mm (2.05 in × 0.90 in × 6.39 in)	52.0 mm × 22.8 mm × 162.3 mm (2.05 in × 0.90 in × 6.39 in)
Weight	140 g (0.31 lb)	140 g (0.31 lb)

# 6.1.2 RF Specifications

## KX-TGP700/KX-TPA70/KX-TPA73

Item	USA, Canada	Latin America	Other countries/ areas
Wireless Interface	DECT 6.0	DECT	DECT

# 6.1.2 RF Specifications

Item	USA, Canada	Latin America	Other countries/ areas
Frequency Band	1920 MHz to 1930 MHz	1910 MHz to 1920 MHz	1880 MHz to 1900 MHz
Number of Carriers	5	5	10
Transmission Output	Peak 0.11 W	Peak 0.25 W	Peak 0.25 W

#### **KX-TPA73**

Item	All the areas	
Wireless Interface	Bluetooth	
Frequency Band	2.402 GHz to 2.480 GHz	
Transmission Output	Peak 10 mW	

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