



Aastra Cordless Telephones

» Making cordless work for you

The one thing the entire business world will agree on is that time is always of the essence. This makes constant accessibility crucial to operations. At the same time, each enterprise is unique in what it requires of cordless communications.

Each telephone, along with its accessories, has been designed and constructed to efficiently satisfy individual needs.

That is why our cordless solutions have the reputation of enabling people to be in full control of both their time and their environments, and of connecting enterprises into efficient networks, ready and able to serve clients and handle situations as they arise, effectively and speedily. Anytime and anywhere.

Cordless Phones

Equipped with Full Business-Class Functionality for High Efficiency

"I work better because cordless works better. I like being in control of my time and in fulfilling my duties to my clients and colleagues."

Our range of phones is as wide as the range of your needs. All our phones are equipped with business-class features such as convenient menu interfaces, easy-to-read displays, quick-access volume keys, extensive phonebooks, calling line identity and message waiting indication. You can be sure that there is a phone designed and constructed as the optimal solution for your unique needs – whether within the walls of a high-tech office or at a remote oil refinery.

DT190 Cordless Phones

Entry Level Office Phone

Aastra's DT190 is the perfect choice for the busy user who needs a phone that provides mobility in a small or midsized office. Aastra's DT190 provides basic features and full indoor mobility at an attractive price.

Convenience

- Phonebook that can contain up to 20 numbers
- Redial of last five incoming/ outgoing calls
- Missed call list for last five missed calls
- Key lock for preventing accidental calling
- Personalized settings, such as click sounds, ring tones, volume
- CLIP – Calling Line Identification Presentation



Languages

Nine languages are supported by the handsets: English, Dutch, German, French, Swedish, Finnish, Spanish, Italian and Norwegian.

Desk Charger

Each phone is supplied with a handset, desk stand charger, power adapter, battery and battery cover.

There are three versions available for ordering:

DT190 cordless phone with charger set for EU (230V)

DT190 cordless phone with charger set for EU (110V)

DT190 cordless phone with charger set for UK (230V)

Technical Requirements

The DT190 is designed for office use, and should not be used in harsh environments or where intrinsically safe devices are required.

The DT190 is DECT-GAP compliant and supports Aastra's PBX systems—Business Phone and MD Evolution. The DT190 cannot be used in older A/B protocol systems or GAP/CAP systems such as MD110 and MX-ONE™.

The DT190 has not been tested with other vendor systems and operation with such systems cannot be guaranteed.

DT292 Cordless Phones

Basic Features, Maximum Mobility

Maximum productivity requires having staff members at the right place, at the right time. Accessibility no matter where they are is the key to successful and efficient operations. The DT292 combines outstanding design with supreme sound quality, and at an attractive price. The user-friendly menu makes access to the wide range of features simple and straightforward.

Sophisticated Cordless Phone

- Handsfree speaking
- Vibration alert
- Alarm clock
- Personal phonebook that can contain up to 100 names and numbers
- Call lists—last 20 dialed, answered and/or missed calls
- Missed call alerts
- Mute button for turning off the microphone during calls
- Message key for accessing voice messages
- Personalized settings for key click sounds, melody selection, etc.
- Up to eight DECT subscriptions
- CLIP – Calling Line Identification Presentation



Easy-to-Use

- Backlit alphanumeric display, with two character lines of 12 characters each, and one line of icons with indicators for signal strength, off-hook, battery level, ringer off, key lock, call information and message waiting indication.
- Multiple language support (Czech, Danish, Dutch, English, Finnish, French, German, Greek, Hungarian, Italian, Norwegian, Brazilian Portuguese, Polish, Slovakian, Spanish, Swedish and Turkish)
- Keypad with large buttons, five navigation keys and special function keys for handsfree speaking and access to voicemail.

Accessories

The following accessories can be used with the DT292:

Desk stand charger

Carrying case

Security clip

Rack charger

Interface cable for PC

Desk Stand Charger

Because the DT292 Cordless phone set does not include a charger, you will need to select one of the charger sets described below.

The charger set for the DT292 includes a power adapter, desk stand and an assembly card. The power adapter is available in four different country versions.

Charger set EU for DT292

Charger set UK for DT292

Charger set AU for DT292

Charger set 110V for DT292

Color: MagicGrey

Carrying Case for DT292

A stylish carrying case in genuine leather protects the DT292. The clip rotates 180° to adapt to various wearing positions.

Color: Black

Security Clip

The security clip is designed for belt attachment. The phone slides into the clip and is secured with a latching mechanism, preventing it from falling to the floor. It is released by pressing two buttons on either side of the clip.

Color: Black

Rack Charger

The rack charger is used for charging multiple handsets. The wall mounted charging rack and power adapter are part of a modular system that enables a variety of installation configurations. The rack charger requires a separate power adapter.

Interface Cable for PC

This special interface cable is required to connect the 9-pin RS232 connector on a PC to the 2-pin programming connector on the DT292 cordless phone.

The CPM (Cordless Phone Manager) software can be downloaded from <http://www.aastra.com>

The program supports the following functions:

- Update of firmware in the DT292
- Upload and download of user phonebooks (maximum 100 entries)

Technical Requirements

The DT292 is not designed for use outdoors or in harsh environments. The DT292 should not be used where intrinsically safe devices are required.

The DT292 is DECT-GAP and DECT-CAP compliant. The handset cannot be used with older A/B protocol systems.

The DT292 can be used with all Aastra DECT GAP/CAP compliant business cordless telephone systems.

The DT292 has not been tested with other vendors' systems and operation with such systems cannot be guaranteed.

DT590 Cordless Phones

Enhances Mobility

The DT590 cordless phone is attractive and easy to use.

It allows communications from any location within an enterprise, therefore significantly increasing the overall efficiency of the organization. The ergonomic design is tailored for comfort during long calls and use in a wide range of environments. The large LCD screen is easy to read under all conditions, and operation is simple and straightforward.

Advanced, State-of-the-Art Technology and Full Business Functionality

- Modern design with large graphical display
- Company phonebook for 1,000 downloadable and 100 user entries
- Hands-free speaking function
- Sending and receiving of SMS text messages
- Easy access to PBX features such as divert, absence, transfer, etc.
- Calculator

- Alarm clock
- Standard headset/accessory connector
- Long battery life with lithium-ion battery
- Vibration alert
- Personal phonebook that can contain up to 100 names and numbers
- Call lists, last 20 dialed, answered and/or missed calls
- Missed call alerts
- Mute button for turning off the microphone during calls
- Message key for accessing voice messages
- Support for Bluetooth headsets (requires Bluetooth module)
- Personalized settings for key click sounds, melody selection, etc.
- Up to eight DECT subscriptions
- CLIP – Calling Line Identification Presentation



Accessories

The following accessories can be used with the DT590:

Desk stand charger

Carrying case

Bluetooth module

Security clip

Interface cable for PC

Rack charger

Headset microphone on boom

Headset microphone on cable

Connectors

Connector for battery charging

2.5-mm jack for connecting headsets or PC interface cables (using RS232 port)

Headset performance can be achieved by using one of the Aastra's optional headsets with a 2.5-mm plug. Other microphones must comply with the following specifications:

- Microphone levels ranging from -43 dB/Pa to -36 dB/Pa
- Microphone bias voltage of 1.5 V with 2.2 kohm series feed resistor. DC resistance in this configuration should be from 1.5 to 5 kohm.
- Speaker impedances >30 ohm
- Headsets using a hook-toggle switch must short circuit the microphone when the button is pressed.

Messaging (SMS)

Message length: System-dependent, maximum 160 characters

Storage capacity: 10 messages (first in, first out)

Additional Settings

Languages: Danish, Dutch, English, Finnish, French, German, Italian, Norwegian, Portuguese, Spanish, and Swedish

Network: Eight subscriptions with automatic or manual selection. A subscription can be protected to avoid unintentional deletion.

Cordless Phone Manager

The Cordless Phone Manager (CPM) consists of an interface cable from the 9-pin RS232 connector on a PC to the 2.5-mm headset connector (also used as the interface to the PC) on the DT590. The CPM software can be downloaded from <http://www.aastra.com>

The program supports the following functions:

- Download of company phonebooks (max. 1000 entries)
- Upload and download of user phonebooks (max. 100 entries)
- Download of ring melodies in RTTTL format (max. 10)
- Download of startup screens in BMP format (101x81 pixels)
- Download of PBX-related settings
- Download of new cordless phone software
- Download of additional languages
- Generation of service forms

1. Specifications are subject to change without prior notice

Technical Requirements

The DT590 is DECT-GAP and DECT-CAP compliant. The handset cannot be used with older A/B protocol systems. The DT590 supports reception and sending of SMS text messages. All messaging functions require support by the messaging application for the PBX

The DT590 can be used with all Aastra DECT GAP/CAP compliant business cordless telephone systems.

The DT590 has not been tested with other vendors' systems and operation with systems from other vendors cannot be guaranteed.

DT4X2 Cordless Phones

These phones have all the functions you could want in a cordless phone.



DT412

DT422

DT432

They are slim and robust, and designed to comply with specific needs. They ensure reliable access to vital information anywhere, anytime. They are ideal for use in factories, hospitals or hotels, where people are constantly on the move.

DT412

The DT412 is an excellent performer at any workplace and is designed to withstand dirt, water and even falls on hard surfaces.

DT422

The DT422 is designed for workplaces where a high level of security is required. Its special features include a built-in personal alarm and man-down/no-movement alarm.

DT432 ATEX

The DT432 ATEX is an intrinsically safe handset for use in potentially hazardous environments and supports integrated personal alarms and man-down/no-movement alarms. It is robust with large sturdy keys and a clear display. It is the ultimate choice for demanding applications. DT432 ATEX complies with the directives 94/9/EC and ATEX 100 A

DT412, DT422, DT432 Features

- Personal alarm button (DT422, DT432)*
- Man-down and no-movement alarms (DT422, DT432)*
- Alarm with data (DT422, DT432)*
- Robust, dustproof, waterproof, IP64
- Large, scratchproof, mechanically protected display
- Illuminated display and keypad
- SIM card for identity and personal settings
- Up to 10 modes with personalized settings
- Three programmable soft keys for each mode
- 10 programmable hot keys
- Manual or automatic keypad lock
- Time and date indication
- Ring signal easily silenced
- Vibration alert
- Separate loudspeaker for ring signal and loudspeaker functions
- Sending/receiving of text messages (SMS)*
- Two different text sizes
- Headset connector IP64 classified
- Microphone on/off during call
- Handsfree speaking function
- Personal phonebook that can contain up to 100 names and numbers
- Call list, last 20 dialed, answered and/or missed calls
- Missed call alerts
- Personalized settings, such as key click sounds, melody selection, etc.
- Up to four DECT subscriptions
- ATEX is approved for gas and dust environments (ATEX classification II 2G EEx ib IIC T4 for gas,
- ATEX classification II 3D Ex ibD 22 IP64 T50°C for dust)
- Handsfree speaking function
- CLIP – Calling Line Identification Presentation
- Central phonebook *

* System-dependent feature

Accessories DT412 and DT422

The following accessories can be used with the DT412 and DT422:

- | | |
|-----------------------------|---------------------------------------|
| Desk stand charger | Carrying case |
| Security clip | Rack charger |
| Battery pack | Battery pack adapter for rack charger |
| Headset microphone on boom | |
| Headset microphone on cable | |
| Peltor headset adapter | SIM card programmer |

Accessories for DT432 ATEX

Desk top charger II (DPY 901 624/1)

Security clip

Battery pack for ATEX (DPY 901 639/1)

Rack charger II (DPY 901 642/1)

Battery pack adapter for rack charger

Battery cover key

Headset adapter for Peltor ATEX (DPY 901 643/1)

SIM card programmer

Always Online

These robust handsets combine versatile telephony and messaging, ensuring reliable access to vital information from building automation systems, production lines, the Internet and intranets, as well as communications with other users. They are the optimum choice for people working in factories, hotels and hospitals or any workplace where people are constantly on the move and need to communicate with just the touch of a button.

Multipurpose Handset

The DT4X2 is extremely durable, water-resistant, easy to use, and with a large backlit display, loudspeaker for hands-free operation, headset connector and a built-in vibration mode for silent notification as standard.

Languages

Twelve languages are supported: Danish, Dutch, English, Finnish, French, German, Italian, Norwegian, Portuguese, Spanish, Swedish and Polish

Technical Requirements

The DT412, DT422 and DT432 are DECT-GAP and DECTCAP compliant, but cannot be used with older A/B protocol systems.

The DT412, DT422 and DT432 support reception and sending of SMS text messages. All messaging functions require the support of the messaging application for the PBX.

The DT412 and DT422 have been approved for all EC/ EFTA countries and Australia.

The DT432 has been approved for all EC/EFTA countries

The DT412, DT422 and DT432 can be used with all Aastra DECT GAP/CAP compliant business cordless telephone systems. The DT412, however, has not been tested with other vendors' systems. Operation with other vendor systems cannot be guaranteed.

Short Message Service for DECT

Short Message Service, SMS, is a service based on DECT. Text messages can be sent from a receptionist, supervisor, secretary or anyone within the organization to an individual DECT terminal or to a group of DECT terminals.

An example of effective utilization of this feature would be in organizations with emergency teams or special task forces that require rapid communications. A nurse call application in a hospital is another typical example.

Making the Most of Your Cordless System

As advanced IT and telecommunications come of age, smart and truly practical applications are beginning to appear. A prime example is Short Message Service.

Aastra has harnessed sophisticated messaging technology in maintaining security for your staff, buildings and equipment.

Every Switch Sends a Message

With Short Message Service you can integrate switches such as those in doorbells, patient alarms, sensor relays in factory equipment, as well as door, smoke and fire alarms, into your cordless telephone system. When one of these switches is activated, pre-programmed text messages are sent to specific cordless phones so that the right people get the right information and can act immediately.

Short Message Service offers the capability to connect your cordless messaging system to your existing paging infrastructure.

Different priority levels are available so that only the most urgent messages receive immediate attention. To help staff distinguish between different messages, handsets can be configured to sound a different tone for each type of message.

Adapting to Your Needs

Short Message Service can be used with a wide range of portable telephones and accessories. The system has a modular architecture so that it can be expanded by incorporating various input and output devices as your business grows.

System set-up and programming are controlled by an easy-to-use web interface. Short Message Service complies with open standards so it can be connected to any messaging application with the appropriate interface, including, for example, data network supervision over HP OpenView. And because the system is based on DECT standards, it will keep pace as cordless technology evolves.

Smart Messaging at Work for You

- One of your patients needs assistance. Just by pressing a button at bedside, a health-care worker knows which patient needs attention.
- One of your patients needs assistance. Just by pressing a button at bedside, a health-care worker knows which patient needs attention.
- When your production line stalls, a sensor in the belt drive automatically alerts a technician. He knows immediately where the stoppage has occurred and which tools to bring.

Getting the Message Through, Even When the Line is Busy

Standard with Aastra Cordless Phones

Trying to contact people with busy meeting schedules and phones that are always busy can be frustrating. Especially when you need to reach them quickly. Aastra has a simple way of getting urgent messages through, even to people who are hard to reach.

Real Benefits for Busy People

- Availability no matter where people are or what they are doing
- Messages can be sent by both staff and customers, onsite or from a remote location.
- No disruption of important business
- Message storage means an end to going through written telephone messages after meetings.
- Better time management
- Messages only visible to cordless phone users

The DECT standard is an open standard defined by ETSI, the European Telecommunications Standards Institute, and is supported by all major PBX suppliers. This, and the excellent quality DECT offers, is your guarantee that the technology is designed to suit your requirements, both today and tomorrow. It is absolutely future-proof.

Integrated Message Server

The Integrated Message Server offers simple and affordable messaging on DECT cordless phones. The Integrated Message Server is based on a solid-state platform connected to a LAN. An additional PC server is not required to support DECT messaging applications. The program supports the following functions:

Features and functions:

- SMS from cordless phone to cordless phone
- Integrated central telephone number directory (500 entries)
- DECT phonebook service. Link to phonebook database on PC, e.g., D.N.A. 5.x
- Absence handling
- DECT group handling (30x15 + 1x50 phones)
- Web-based tool for sending messages to cordless phones
- Web-based tool for basic management of alarms from cordless phones and system units
- Supported message and alarm functions:
 - Basic one-way messaging
 - Deletion of sent messages
 - Mobile data from handsets
 - Personal alarm with location information from handsets

Supported cordless phones

The following cordless phones can be used for messaging:

Integrated Message Server Supported phones	DT412	DT422	DT432	DT590
Messaging	x	x	x	x
Central phonebook	x	x	x	x
Absence handling	x	x	x	
Basic alarm handling		x	x	

SMS Messaging from Cordless Phone to Cordless Phone

SMS text messaging enables messages to be sent from one cordless phone to another, or to a group of cordless phones.

Integrated Central Telephone Number Directory (500 entries)

An integrated central telephone number directory makes it possible to retrieve directory information stored locally in an Integrated Message Server. Up to 500 entries can be locally stored.

DECT Phonebook Service

The DECT phonebook service allows users to access centralized phonebooks from DECT cordless phones. A telephone directory, with no limitation to the number of entries, may be located in a site database (i.e. in the message server) or in a database that can be accessed via ODBC (Open DataBase Connectivity, a standard for accessing data sources). In this way, links can be established to a D.N.A. 5.x database residing on a PC.

Absence Handling

The Integrated Message Server keeps track of cordless phones that have registered absence status.

When a message is sent to an absent cordless phone, the sending module can receive information from the Integrated Message Server that the cordless phone is absent. A list is also kept up to date with the absent cordless phones and the absence reasons "manually absent" or "in storage rack".

DECT Group Handler

The DECT group handler is used when a message should be sent to several cordless phones. The group handler has 30 groups with 15 cordless phone addresses, and one group with 50 cordless phone addresses.

Web-Based Tool for Sending Messages to Cordless Phones

With the Integrated Message Server messaging tool, messages can be sent to cordless phones via a web browser.

Web-Based Tool for Basic Management of Alarms

The Basic Alarm Manager application is included in the Integrated Message Server. This application enables messages to be sent to phones in a cordless telephone system or activate outputs in a system as a reaction to input from alarms or data from cordless phones linked to a system. All settings are made through a web interface.

The following can trigger an action:

- Two inputs available on the Integrated Message server
- Alarms from cordless phones
- Data from cordless phones

The following actions can be programmed:

- Two outputs available on Integrated Message Server
- Messages to cordless phones or groups of cordless phones
- Data from cordless phones

The maximum number of triggers/events and corresponding actions is 250.

Expansion Modules

Optional expansion modules can be connected to digital input and output functions, as well as to standardized ESPA 4.4.4 serial interfaces. Up to 15 optional modules can be connected to the Integrated Message Server via an RS485 connection.

The ROANB 220 04/1 T942C central unit is not required. This functionality is integrated into the Integrated Message Server.

Technical Requirements

- Microsoft Internet Explorer 5.5™ or later (needed only for installation, administration and Integrated Message Server Messaging Tool)
- Ethernet cable TSR 902 0240/7000 for connection to the MD110/Telephony Switch.

For DECT Phonebook Service

Windows 2000 Professional, Windows XP Professional.

Any database with ODBC connection (eg. D.N.A. 5.x) or WinBK Site Database (as used in DECT message server packages) is also required.

Standards

EMC: EN 55022 (class B), EN 610005

Low voltage

directive: EN 60950-1

Technical specifications	DT190	DT292	DT590	DT412/ DT422	DT432	INTERGRATED MESSAGE SERVER
Compliance with regulations and standards, CE regulations:	73/23/EEC, 89/336 EEC, 1999/5/EC	72/23/EEC, 89/336/EEC, 1999/5/EC	72/23/EEC, 89/336/EEC, 1999/5/EC	89/336/EEC (EMC),1999/5/EC (R&TTE)	89/336/EEC (EMC), 1999/5/EC (R&TTE), ATEX Directive 94/9/EC	N/A
DECT standards:	EN 301 406, TBR10, TBR22	EN 301 406, TBR10, TBR22	EN 301 406, TBR10, TBR22 Bluetooth : Radio EN300328	EN 301406, TBR10, EN 300444 (TBR22)	EN 301406, TBR10, TBR22	N/A
Safety standards:	EN 60950-1	EN 60950-1	EN 60950-1	EN 60950-1	N/A	N/A
EMC standard:	EN 301 486-6 EN 55022 class B	EN 301 486-6 EN 55022 class B	EN 301 489- 6 Bluetooth: EN301 489-1, EN 301 489-17 EN 301 489-6	EN 301489-1, EN 301489-6	EN 301489-1, EN 301489-6	EN 55022 (class B), EN 610005
SAR:	N/A	EN 50360 0.009 mW/g	EN 50360 (Europe), ACA 2003 (Australia) SAR10g (specific absorption rate) = 0.06 mW/g	EN 50360 (Europe), ACA RS 2001 (Australia) 0.025 W/g	EN 50360 (Europe), ACA RS 2001 (Australia) 0.025 W/g	N/A
Free-fall test:	IEC 68-2 -32	N/A	IEC 68-2-32	IEC 60079-0:1999, EN 50014:1997	IEC 60079-0:1999, EN 50014:1997	N/A
Low voltage directive:	EN 60950-1	EN 60950-1	EN 60950-1	EN 60950-1	N/A	
Environmental						
Operating temperature:	+5 TO +45°C	0°C to +40°C	0°C to +40°C	0°C to +40°C	0°C to +40°C	0°C to +40°C
Storage temperature:	-20 to +70°C	-20 to +70°C	-20 to +55°C	-20 to +70°C	-20 to +70°C	-20 to +70°C
Operating humidity:	15 to 90 % non -condensing	15 to 90 % non -condensing	15 to 90 % non -condensing	N/A	N/A	30 to 85 % non -condensing
Storage humidity:	5 to 95%, non-condensing	5 to 95%, non-condensing	10 to 95%, non-condensing	N/A	N/A	N/A
Enclosure protection:	IP 30, EN 60529, not waterproof	IP30, EN 60529, not waterproof	IP40, IEC 60529, not waterproof	IP64, IEC 60529	IP64, EN 60529	IP130
General Specifications						
Color:	Grey and silver	MagicGrey	MagicGrey and silver	Dark grey and black/blue	Dark grey and yellow	Light grey
Size (l x w x h):	154 x 59 x 30 mm	143 x 54 x 25 mm (excl. clip)	143 x 53 x 26 mm	134 x 60 x 27 mm	134 x 60 x 27 mm	275 x 130 x 60 mm
Weight, material:	127g (incl. battery)	139 g (incl. battery pack and clip)	131 g	130 g (incl. battery)	130 g (incl. battery)	620 g
Material:						
Clip:	N/A	POM	POM	POM	POM	N/A
Key pad:	Silicon rubber	Silicon rubber	Silicon rubber	Backlit	Backlit	N/A
Case:	PC/ABS	PC/ABS	N/A	PC/ABS and TPE (silicone-free)	PC/ABS and TPE (silicone-free)	PC/ABS
Display (w x h):	1 line alphanumeric, 13 segments, backlit	2x12 characters + icon line, backlit	101 x 80 pixel LCD with white backlit	128 x 64 pixel LCD, Backlit	128 x 64 pixel LCD, Backlit	N/A
Frequency band:	Standard (1880-1900 MHz)	Standard (1880-1900 MHz) Latin America (1910-1930 MHz) US (1920 - 1930 MHz)	Standard (1880-1900 MHz) China (1900-1920 MHz) Latin America (1910-1930 MHz) US (1920 - 1930 MHz)	1880 to 1900 MHz	1880 to 1900 MHz	N/A
Phonebook						
Name length entry:	12 characters max	12 characters max.	12 characters max.	16 characters max.	16 characters max.	N/A
Number length entry:	22 digits max	24 digits max.	24 digits max.	22 digits max.	22 digits max.	N/A
Entries:	20 manual via keypad	100 manual via keypad or programmable via PC	Personal: 100 entries Company: 1000 entries	Personal: 100 entries	Personal: 100 entries	500 internal or more using DECT phonebook services
Battery						
Type:	550 mAh, 2,4V NiMH 2 AAA	700 mAh, 2,6 V NiMH (nickel metal hydride)	850 mAh, Lithium-ion	750 mAh Li-Ion	750 mAh Li-Ion	N/A
Talk time:	10 hours typical	17 hours typical	20 hours typical, 14 hours using Bluetooth	12 hours typical	12 hours typical	N/A
Standby time:	170 hours typical	140 hours typical	140 hours typical, 120 hours using Bluetooth	120 hours typical	120 hours typical	N/A
Charge time:	5.5 hours maximum	4 hours maximum	4 hours	2 hours, 4 hours using rack charger	2 hours, 4 hours using rack charger	N/A

Sound						
Ring signal:	Adjustable in 5 steps	Adjustable in 7 steps + silent (via menu)	Adjustable in 9 steps 14 ring signals incl. 10 downloadable melodies	Adjustable in 5 steps	Adjustable in 5 steps	N/A
Earpiece:	Adjustable in 3 steps	Adjustable in 9 steps (pushbutton)	Adjustable in 10 steps	Adjustable in 6 steps With headset: Adjustable In 6 steps	Adjustable in 6 steps With headset: Adjustable In 6 steps	N/A
Vibrating alert:	N/A	Integrated	Integrated	Integrated	Integrated	N/A
Connectors						
Headset:	N/A	N/A	2.5-mm jack for headset	Splashproof headset connector	Splashproof headset connector	N/A
Battery compartment:	N/A	2-pin programming connector	Connector for Bluetooth module	N/A	N/A	N/A
Bluetooth module	N/A	N/A	Headset Profile Supporting BT 1.2 standard Requires minimum DT590 SW 11.12 HW revision R2x	N/A	N/A	N/A