

## **Quick Start Guide**

**Product name:** Pixavi Phone  
Pixavi Thermal  
Pixavi Cam

**Type:** 17-S13\*-1\*\*\*/\*\*\*\*\*

## Introduction

Congratulations on your Pixavi intrinsically safe device.

All you need to get started with **Pixavi Phone**, **Pixavi Cam** and **Pixavi Thermal** can be found in this quick guide. If you need further assistance, try the Android™ help function, or visit:

[bartec.com/service-support/enterprise-mobility-support-portal](https://bartec.com/service-support/enterprise-mobility-support-portal)

### **Pixavi Phone** <sup>(1)</sup>

Intrinsically safe smartphone

### **Pixavi Thermal** <sup>(2)</sup>

Intrinsically safe smartphone with FLIR™ thermal camera

### **Pixavi Cam** <sup>(3)</sup>

Intrinsically safe camera

(1-3) Used to identify the product variants in this quick guide

## Warnings

Warnings are used in this quick guide to warn of risks of damage to property and personal injuries. Always read and follow these warnings



#### **DANGER:**

designates a hazardous situation that can lead to death or serious, permanent injuries if safety measures are disregarded.



#### **ATTENTION:**

designates a hazardous situation that can lead to material damage if safety measures are disregarded.

## Handling the Device

The Device, which is described in this Quick Start Guide, underwent quality and functional tests before leaving the factory to ensure it functions properly and safely. To maintain these conditions and ensure the correct and safe operation of the Device, it may only be transported, stored, and operated in the manner described by the manufacturer.

## Intended Use

The Device is a handheld piece of electrical equipment. It serves the purpose of the mobile recording, processing and/or radio transmission of data within hazardous areas. It can be used exclusively in combination with devices that comply with the requirements in the overvoltage category I. The admissible operating data of the device must be considered.

Any other use is unintended and may lead to damage and accidents. The manufacturer shall not be liable for any use extending beyond the Intended Use.

## Duties of the operator

The operator undertakes to only permit persons to work with the Device who are acquainted with the basic regulations on safety and accident prevention, and who have been inducted in the use of the Device, have read and understood the documentation, the safety chapter and the warnings. The operator checks that the safety and accident prevention regulations applicable to the respective case of use have been observed.

## Changes in the document

BARTEC reserves the right to change the content of this document without notice. In the case of legal disputes, our General Terms and Conditions for Deliveries and Services apply ([bartec.com/general-terms-and-conditions-for-deliveries-and-services](https://www.bartec.com/general-terms-and-conditions-for-deliveries-and-services)). The current versions of the datasheets, certificates, and declarations of conformity can be downloaded from [bartec.com](https://www.bartec.com).

## Safety information

- Do not dry wipe or clean the Device in hazardous areas
- Do not open the Device in hazardous areas
- Do not replace or charge battery in hazardous areas
- General statutory provisions or guidelines on occupational health and safety, accident prevention provision, and environmental protection laws must be heeded, e.g. Operational Safety Ordinance (BetrSichV) and nationally applicable ordinances
- Use suitable clothing and shoes with respect to the danger of hazardous electrostatic charges
- Avoid heat influences outside the specified temperature range
- Protect the Device from external influences! Do not expose the Device to caustic/aggressive liquids, vapours or spray
- In the case of malfunction or damaged enclosure and/or display, remove the Device immediately from the hazardous area and bring it to a safe place

## Maintenance

The pertinent installation and operating provisions for electrical systems must be observed! (e.g. Directive 2014/34/EU, BetrSichV, nationally applicable ordinances EN/IEC 60079-14 and the series DIN VDE 0100)!

Observe the national waste disposal regulations when disposing of the Device.

## Servicing

Regular servicing of the Device is not necessary if operated correctly under consideration of the assembly instructions and environmental conditions.

## Inspection

According to EN/IEC 60079-17 and EN/IEC 60079-19 the operator of electrical systems in hazardous areas is obliged to have these inspected by an electrician to ensure correct condition.

## Repairs

Repairs to explosion-protected devices may only be performed by authorised personnel with original spare parts and according to the state of the art. Therefore, all repairs to the Device have to be conducted by BARTEC.

Contact information and instructions for repair requests and processing can be found at

[bartec.com/service-support/returns-repair](https://bartec.com/service-support/returns-repair) under “Automation and Enterprise Mobility”.

## Commissioning

It must be checked that all components and documents are available before commissioning.

## Warranty

### **DANGER:**

No changes or retrofits may be made without the written consent of the manufacturer. If non-specified components are used, the explosion protection will no longer be guaranteed. In the case of externally procured parts, it is not guaranteed that these have been designed and manufactured in accordance with their load and requisite safety.

- Contact the manufacturer before any changes or retrofits to receive a release. Only use original spare and wearing parts.

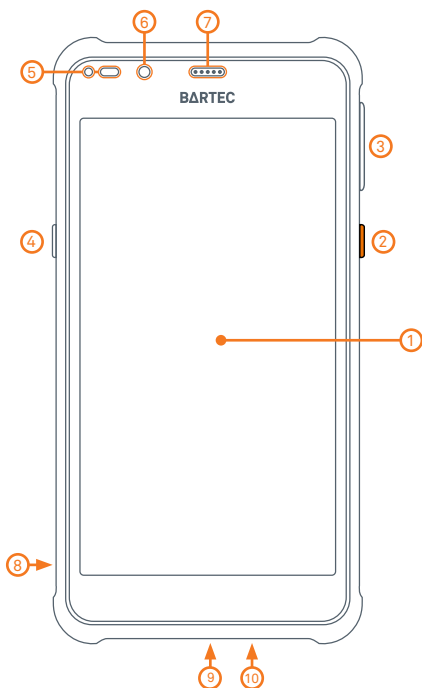
BARTEC shall assume the complete warranty exclusively for spare parts ordered from BARTEC.

BARTEC's General Terms and Conditions for Deliveries and Services ([bartec.com/general-terms-and-conditions-for-deliveries-and-services](https://bartec.com/general-terms-and-conditions-for-deliveries-and-services)) shall apply in principle. The duration of the manufacturer warranty is one (1) year for the Device and six (6) months for the battery and accessories starting from the date of transfer of risk, as defined in BARTEC's General Terms and Conditions.

The manufacturer warranty covers all parts of the delivery and shall be restricted to the free replacement or repair of the defective parts in our repair centers. For this purpose, any packaging supplied must be kept where possible. In the case of warranty, the goods must be returned to BARTEC after written agreement using the return merchandise authorization (RMA) form.

This Quick Start Guide contains all important information on the subject of explosion protection.

## Your device



1: 5.5" OLED

2: Power button

3: Volume button (-/+)

4: Programmable button

5: Proximity/Ambient light sensor and status LED

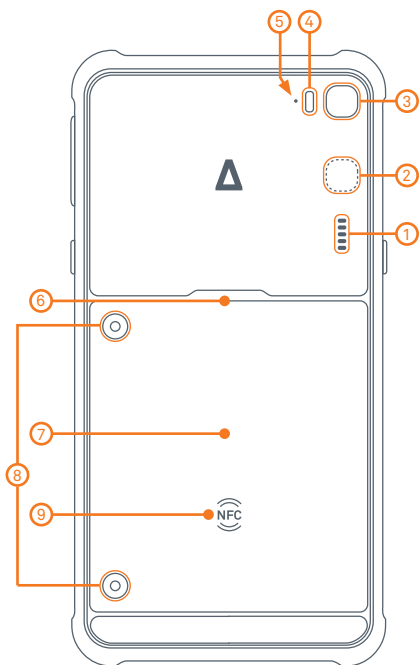
6: Front Camera

7: Earpiece speaker

8: Lanyard mounting slot (remove battery pack for easy installation)

9: Magnetic USB connector

10: Microphone



1: Loudspeaker

2: Thermal camera <sup>(2)</sup>

3: Main camera

4: Flash

5: Microphone

6: Dual SIM/SD tray <sup>(1,2)</sup> or SD tray <sup>(3)</sup> (accessible behind battery pack)

7: Battery pack

8: Battery pack torx T10 fasteners

9: NFC

<sup>(1)</sup> Pixavi Phone

<sup>(2)</sup> Pixavi Thermal

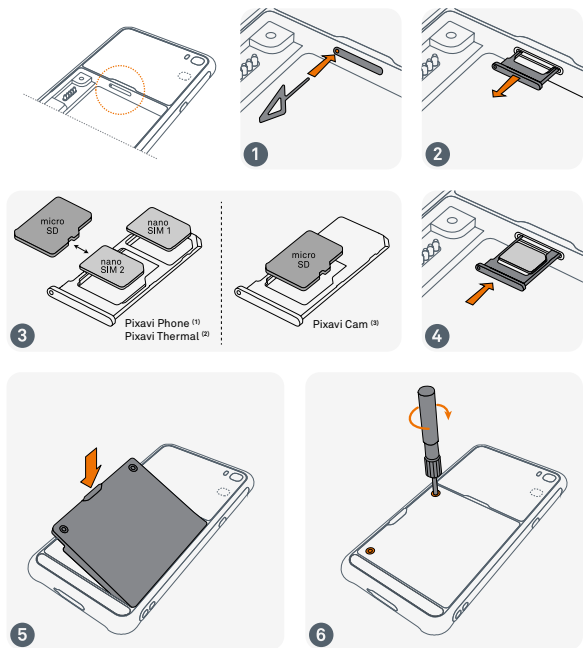
<sup>(3)</sup> Pixavi Cam



## Getting started

Insert the **SIM card** and/or **SD card** and **Battery pack** according to the instructions below.

The ejection tool can be found attached to the SIM/SD-card instructions sheet (separate sheet)



**1** Ensure that the ejection pin is perpendicular to the hole. Otherwise, the device may be damaged.

**3** Use only nano-SIM cards and/or Micro SD card. Pixavi Phone and Pixavi Thermal supports 2x nano-SIM or 1x nano-SIM and 1x micro SD. Pixavi Cam supports 1x micro SD.

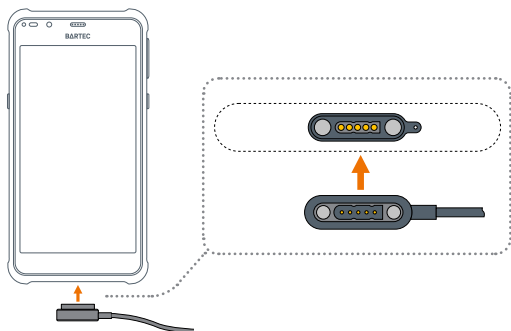
**4** If the card is not fixed firmly into the tray, the SIM/SD card may fall out of the tray.

Only insert or remove the battery outside the potentially explosive atmosphere

Only use batteries that have been certified by BARTEC,  
Type: 17-S1Z0-0001/\*\*\*\*

## Charging

Insert the magnetic charger cable in the USB/Charging port at the bottom of the device. Make sure the orientation of the cable is as illustrated below.

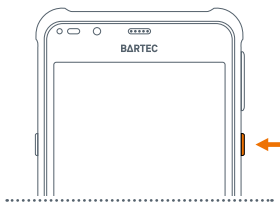


**!** Do not use any force when inserting the magnetic charging/USB cable.  
The cable can only be inserted in the orientation illustrated above

**!** The USB port shall only be used for charging the equipment when in the non-hazardous area  
For charging the device, use only Bartec approved chargers and cables

## Power on your device

Press and hold the Power button to power on the device



## Programmable button

The programmable button can be configured to launch an applications or action on *single tap*, *double tap* and *long press*.

It comes preconfigured but can be changed based on your preferences. Go to **Settings** -> **Programmable Button**.



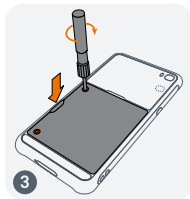
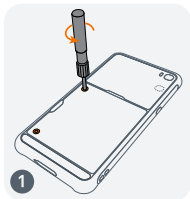
### Other options:

**Push-to-talk (PTT):** Press and hold to talk.

Single tap, double tap and press and hold will be disabled when PTT is activated.

**SOS:** Tap the button fast 5 times to send a SOS message to one or multiple contacts.

## Replacing battery pack



Make sure the device is turned off before replacing the battery pack. ❶ Loosen the two fasteners with the supplied Torx T10 screwdriver (the fasteners are captive screws and not suppose to be fully removed). ❷ Remove the battery pack. ❸ Replace the battery pack and tighten the fasteners.

! Only insert or remove the battery outside the potentially explosive atmosphere

Only use batteries that have been certified by BARTEC,  
Type: 17-S1Z0-0001/\*\*\*\*

## Troubleshooting and Support

If the device becomes unresponsive or does not boot successfully, try performing a soft reset. This is done by pressing and holding the power button for 10 seconds.

FAQs and technical support can be found here:  
[bartec.com/service-support/enterprise-mobility-support-portal](http://bartec.com/service-support/enterprise-mobility-support-portal)

## Storage

### Battery storage information:

The batteries of BARTEC (type 17-S1Z0-0001/\*\*\*\*) are developed and manufactured in accordance with the highest industrial standards. The operating time or storage period of a battery is restricted, however. The actual life of a battery is influenced by different factors, e.g. hot, cold, rough operating environment and physical damage.

Batteries kept for a duration of six months or longer should be charged, discharged and charged again at least every three months. If electrolyte has escaped, do not touch the areas affected and dispose of the batteries properly. Replace the battery if the operating time has shortened considerably. The standard warranty period for all BARTEC batteries is six months, whereby it is irrelevant whether the battery was acquired separately or was contained in the scope of the delivery of the device.

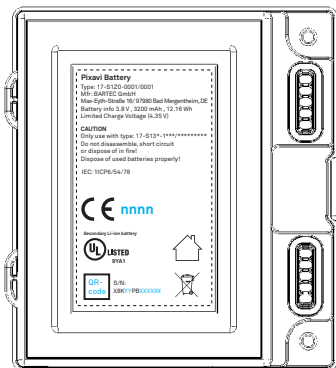
- ! Make sure the battery pack is charged minimum every three months
- Protect the device from constant moisture

## Cleaning


Do not use any chemical cleaning agents to clean the device. Use a damp cloth.

- ! Cleaning: only clean with a damp cloth

# Product marking



## Explosion protection

ATEX Zone 1 / 21	
Type	17-S13*-1***/*
Marking	 II 2G Ex ib IIC T4 Gb II 2D Ex ib IIIC T135°C Db -20°C ≤ Ta ≤ +60°C
Test certificate	CSANe 20ATEX4223X
Standards	see Declaration of Conformity
IECEX Zone 1 / 21	
Type	17-S13*-1***/*
Marking	Ex ib IIC T4 Gb Ex ib IIIC T135°C Db -20°C ≤ Ta ≤ +60°C
Test certificate	IECEX SIR 20.0036X
NEC 500/505	
Type	17-S13*-1***/*
Marking	Class I; Division 1; Groups A, B, C and D; T4 Ex ia IIC T4 Ga Class I, Zone 0, AEx ia IIC T4 Ga
Test certificate	CSA 22CA80042090X

## Temperature range

ATEX/IECEX (EN IEC 60079-0)	-20 °C ≤ Ta ≤ +60 °C (-4 °F ≤ Ta ≤ 140 °F)
Discharge (EN IEC 62368-1)	-20 °C ≤ Ta ≤ +50 °C (-4 °F ≤ Ta ≤ 122 °F)
Charging (EN IEC 62368-1)	0 °C ≤ Ta ≤ +45 °C (32 °F ≤ Ta ≤ 113 °F)
Long term storage	0 °C ≤ Ta ≤ +35 °C (32 °F ≤ Ta ≤ 95 °F)

## EX port parameters

IEC Parameters	USA Parameters	USB (magnetic connector)	SIM (1&2) card	SD card	Unit
U <sub>o</sub>	V <sub>oc</sub>	5.45	5.45	5.45	V
I <sub>o</sub>	I <sub>sc</sub>	2.81	1.20	7.04	A
P <sub>o</sub>	P <sub>out</sub>	0.84	0.41	2.59	W
C <sub>o</sub>	C <sub>a</sub>	N/A	27.40	39.30	μF
L <sub>o</sub>	L <sub>a</sub>	N/A	24.97	0.72	μH

USB U<sub>i</sub> and device U<sub>m</sub> (non-hazardous area connection only) = 12V.

## Specific conditions for use

**!** The USB port shall only be used for charging the equipment when in the non-hazardous area.

Um (Charging / USB contacts) = 12V, this is ensured by using a charger type G7-S0Z0-0001 - G7-S0Z0-0004 or other accessories specified by Bartec GmbH. The ambient temperature during charging shall be in the range 0°C to 45°C.

The USB port is also used for data download. The port has been assessed with a Um of 12 V and shall be installed in accordance with IEC 60079-14/EN 60079-14.

Care should be taken to avoid the risk of drop and impact during storage, transportation and use as aluminium is present in the structure of the enclosure.

The apparatus shall not be subjected to a prolific charge generating mechanism (such as might occur in pneumatic transfer of powders or charge spraying in a powder coating process).

Do not remove the battery pack in the hazardous location.

The battery pack surfaces shall at regular intervals be checked for wear and tear by the user. Replace with type: 17-S1Z0-0001/\*\*\*\* if damaged.

## General safety requirements

**!** Only use accessories that are approved by BARTEC

In the case of malfunction or damaged enclosure, remove the device immediately from the potentially explosive atmosphere.

## Specific Absorption Rate Data

The Pixavi Phone, Pixavi Thermal and Pixavi Cam is a radio transmitter and receiver. It is designed and manufactured not to exceed the emission limits for exposure to radio frequency (RF) energy set by the Federal Communications Commission (FCC) of the U.S. Government, Industry Canada of the Canadian Government (IC), and recommended by the Council of the European Union. The exposure standard for wireless devices employs a unit of measurement known as the Specific Absorption Rate, or SAR.

The SAR limit set by the FCC/IC is 1.6W/kg averaged over 1 gram of actual tissue.

The SAR limit recommended by The Council of the European Union is 2.0W/kg averaged over 10 g of actual tissue.

The SAR value measured for the Pixavi Phone, Pixavi Thermal and Pixavi Cam:

FCC/ID	Pixavi Phone/Thermal	Head	0.626 W/kg
FCC/ID	Pixavi Phone/Thermal	Body	1.202 W/kg
FCC/ID	Pixavi Cam	Head	0.571 W/kg
FCC/ID	Pixavi Cam	Body	0.148 W/kg
CE	Pixavi Phone/Thermal	Head	0.164 W/kg
CE	Pixavi Phone/Thermal	Body	0.633 W/kg

## FCC/ISED

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.

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

Le présent produit est conforme aux spécifications techniques applicables d'Innovation, Sciences et Développement économique Canada.



## Legal

Android is a trademark of Google LLC.

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