

USER MANUAL

MP RANGER

CUSTOM[®]

CUSTOM S.p.A.
Via Berettine 2/B
43010 Fontevivo (PARMA) - Italy
Tel. : +39 0521-680111
Fax : +39 0521-610701
http: www.custom.biz

Customer Service Department:
www.custom4u.it

© 2023 CUSTOM S.p.A. – Italy.

All rights reserved. Total or partial reproduction of this manual in whatever form, whether by printed or electronic means, is forbidden. While guaranteeing that the information contained in it has been carefully checked, CUSTOM S.p.A. and other entities utilized in the realization of this manual bear no responsibility for how the manual is used. Information regarding any errors found in it or suggestions on how it could be improved are appreciated. Since products are subject to continuous check and improvement, CUSTOM S.p.A. reserves the right to make changes in information contained in this manual without prior notification.

The pre-installed multimedia contents are protected from Copyright CUSTOM S.p.A. Other company and product names mentioned herein may be trademarks of their respective companies. Mention of third-party products is for informational purposes only and constitutes neither an endorsement nor a recommendation. CUSTOM S.p.A. assumes no responsibility with regard to the performance or use of these products.

THE IMAGES USED IN THIS MANUAL ARE USED AS AN ILLUSTRATIVE EXAMPLES. THEY COULDN'T REPRODUCE THE DESCRIBED MODEL FAITHFULLY.

UNLESS OTHERWISE SPECIFIED, THE INFORMATION GIVEN IN THIS MANUAL ARE REFERRED TO ALL MODELS IN PRODUCTION AT THE ISSUE DATE OF THIS DOCUMENT.

GENERAL INSTRUCTIONS

CUSTOM S.p.A. declines all responsibility for accidents or damage to persons or property occurring as a result of tampering, structural or functional modifications, unsuitable or incorrect installations, environments not in keeping with the equipment's protection degree or with the required temperature and humidity conditions, failure to carry out maintenance and periodical inspections and poor repair work.

GENERAL SAFETY INFORMATION

Your attention is drawn to the following actions that could compromise the characteristics of the product:

- Read and retain the instructions which follow.
- Follow all indications and instructions given on the device.
- Make sure that the surface on which the device rests is stable. If it is not, the device could fall, seriously damaging it.
- Make sure that the device rests on a hard (non-padded) surface and that there is sufficient ventilation.
- Do not fix indissolubly the device or its accessories such as power supplies unless specifically provided in this manual.
- When positioning the device, make sure cables do not get damaged.
- [Only OEM equipment] The equipment must be installed in a kiosk or system that provides mechanical, electrical and fire protection.
- The mains power supply must comply with the rules in force in the Country where you intend to install the equipment.
- Make sure that there is an easily-accessible outlet with a capacity of no less than 10A closely to where the device is to be installed.
- Make sure the power cable provided with the appliance, or that you intend to use is suitable with the wall socket available in the system.
- Make sure the electrical system that supplies power to the device is equipped with a ground wire and is protected by a differential switch.
- Before any type of work is done on the machine, disconnect the power supply.
- Use the type of electrical power supply indicated on the device label.
- These devices are intended to be powered by a separately certified power module having an SELV, non-energy hazardous output. (IEC60950-1 second edition).
- [Only POS equipment] The energy to the equipment must be provided by power supply approved by CUSTOM S.p.A.
- Take care the operating temperature range of equipment and its ancillary components.
- Do not block the ventilation openings.
- Do not insert objects inside the device as this could cause short-circuiting or damage components that could jeopardize printer functioning.
- Do not carry out repairs on the device yourself, except for the normal maintenance operations given in the user manual.
- The equipment must be accessible on these components only to trained, authorized personnel.
- Periodically perform scheduled maintenance on the device to avoid dirt build-up that could compromise the correct, safe operation of the unit.
- Do not touch the head heating line with bare hands or metal objects. Do not perform any operation inside the printer immediately after printing because the head and motor tend to become very hot.
- Use consumables approved by CUSTOM S.p.A.



THE CE MARK AFFIXED TO THE PRODUCT CERTIFY THAT THE PRODUCT SATISFIES THE BASIC SAFETY REQUIREMENTS.

The device is in conformity with the essential Electromagnetic Compatibility and Electric Safety requirements laid down in Directives 2014/30/EU and 2014/35/EU inasmuch as it was designed in conformity with the provisions laid down in the following Standards:

- EN 55032 (*Electromagnetic compatibility of multimedia equipment - Emission Requirements*)
- EN 55024/EN 55035 (*Electromagnetic compatibility of multimedia equipment - Immunity requirements*)
- EN IEC/EN 62368-1 (*Audio/video, information and communication technology equipment*)

The device is in conformity with the essential requirements laid down in Directives 2014/53/EU about devices equipped with intentional radiators. The Declaration of Conformity and other available certifications can be downloaded from the site www.custom4u.it.



GUIDELINES FOR THE DISPOSAL OF THE PRODUCT

The crossed-out rubbish bin logo means that used electrical and electronic products shall NOT be mixed with unsorted municipal waste. For more detailed information about recycling of this product, refer to the instructions of your country for the disposal of these products.

- Do not dispose of this equipment as miscellaneous solid municipal waste, but arrange to have it collected separately.
- The re-use or correct recycling of the electronic and electrical equipment (EEE) is important in order to protect the environment and the wellbeing of humans.
- In accordance with European Directive WEEE 2012/19/EU, special collection points are available to which to deliver waste electrical and electronic equipment and the equipment can also be handed over to a distributor at the moment of purchasing a new equivalent type.
- The public administration and producers of electrical and electronic equipment are involved in facilitating the processes of the re-use and recovery of waste electrical and electronic equipment through the organisation of collection activities and the use of appropriate planning arrangements.
- Unauthorised disposal of waste electrical and electronic equipment is punishable by law with the appropriate penalties.
- For the waste sorting of the packaging materials, please check the local waste disposal laws.



The format used for this manual improves use of natural resources reducing the quantity of necessary paper to print this copy.



FCC STATEMENT
(FEDERAL COMMUNICATIONS
COMMISSIONS).

This note is valid only for device bringing FCC trademark.

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

The devices may not cause harmful interference. The devices must accept any interference received, including interference that may cause undesired operation.

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 and 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 into 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.

Modifications to this product not authorized by CUSTOM S.p.A. could void the FCC & Industry Canada regulations and negate your authority to operate the product.

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

This equipment complies with FCC and Industry Canada radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20 cm between the radiator and your body. This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

Cet équipement est conforme aux limites d'exposition aux radiations fixées par la FCC et Industrie Canada pour un environnement non contrôlé. Cet équipement doit être installé et utilisé avec une distance minimale de 20 cm entre le radiateur et votre corps. Cet émetteur ne doit pas être installé ou utilisé en conjonction avec une autre antenne ou un autre émetteur.

ISED

RSS-Gen statement:

This device complies with Industry 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.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence.

L'exploitation est autorisée aux deux conditions suivantes : (1) l'appareil ne doit pas produire de brouillage, et (2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

ISED

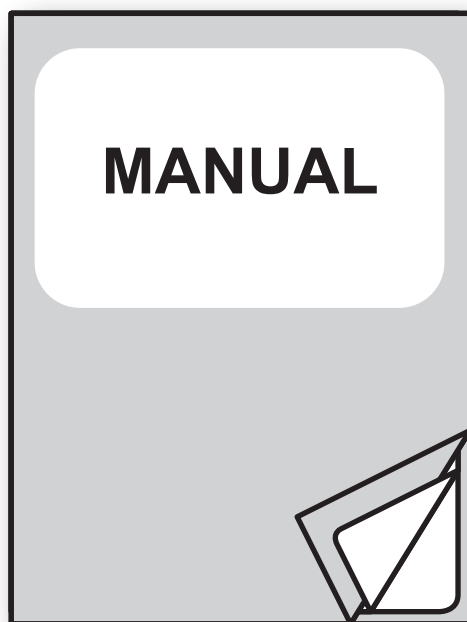
RSS-102 Statement:

This equipment complies with Industry Canada radiation exposure limits set forth for an uncontrolled environment.

Cet équipement est conforme à l'exposition aux rayonnements Industrie Canada limites établies pour un environnement non contrôlé.

NOTES FOR BATTERY PACK

- Do not throw batteries into open flame!
- Do not attempt to disassemble the battery pack, do not make cuts or holes.
- Never use battery re-chargers and/or batteries that are damaged or worn.
- Autonomy of battery varies considerably based on various factors, for example, on print intensity, the text to be printed and environmental temperature.
- Use only battery packs original CUSTOM S.p.A..
- Preferably use battery chargers original CUSTOM S.p.A.W.
- When the battery re-charger is not in use, unplug it from the electrical mains.
- If not used, even a completely-charged battery will automatically discharge over time.
- Extreme temperatures can affect battery charge levels leave them to cool or warm as required.
- We recommend to recharge the battery at a temperature between +15°C and +30°C.
- Dispose of the battery packs correctly using the appropriate collection centers provided by the Local Authority.



For details on the commands,
refer to the manual with code **0577200M000068**

For further information about the use of “PrinterSet” tool
refer to the manual with code **78200000001800**

TABLE OF CONTENTS

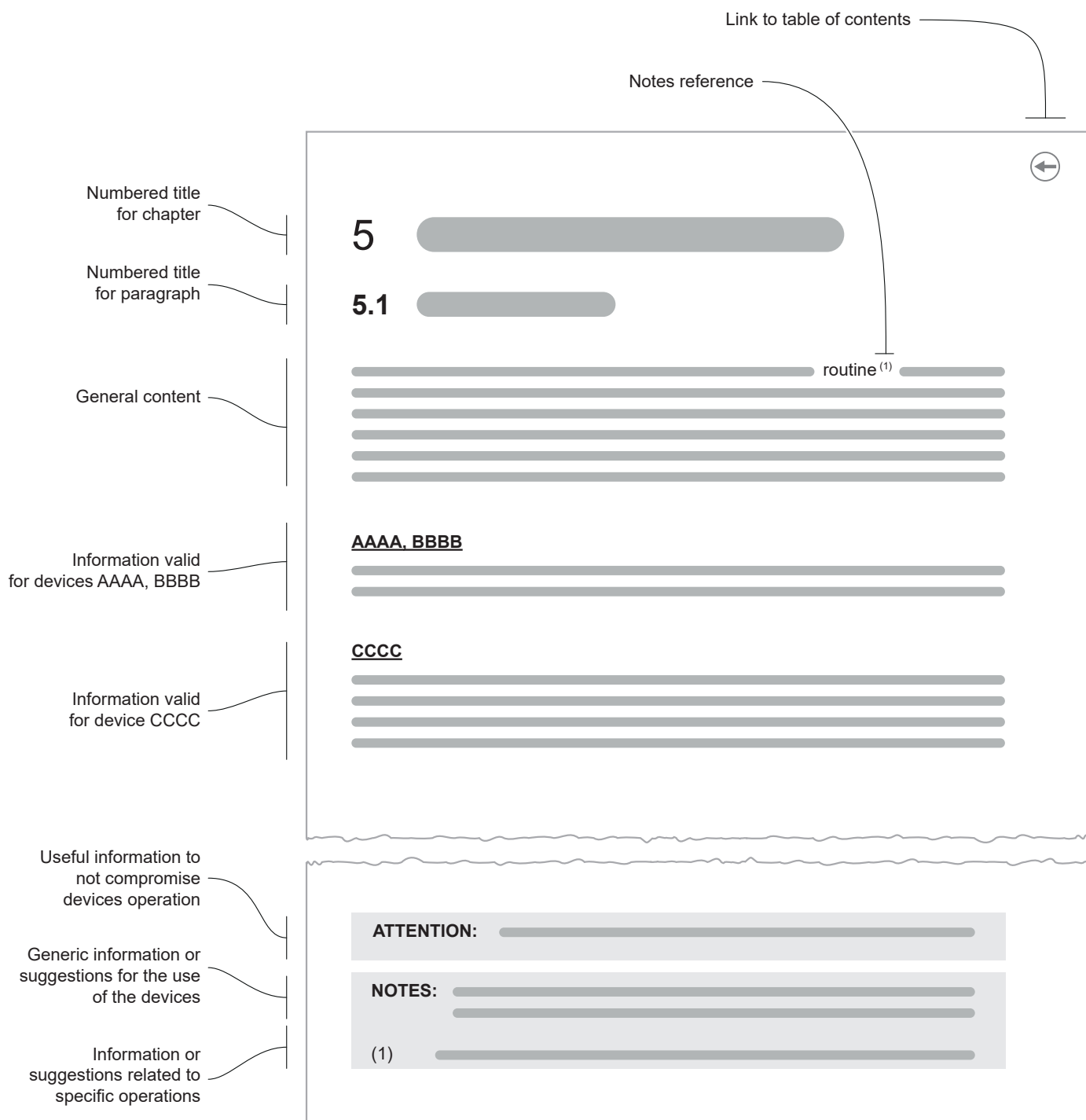
1	INTRODUCTION	9
2	DESCRIPTION	11
2.1	Box contents	11
2.2	Device components: external views	12
2.3	Device components: internal view	13
2.4	Product label	14
2.5	Key functions: power up	15
2.6	Key functions: standby	17
2.7	Status messages	18
3	INSTALLATION	21
3.1	Belt clip assembly	21
3.2	Connections	22
3.3	Pinout	23
3.4	Driver and SDK	24
4	OPERATION	25
4.1	Opening cover	25
4.2	Opening connectors compartment	26
4.3	Switch the device ON/OFF	27
4.4	Recharge with charger cradle	28
4.5	Adjusting paper width	29
4.6	Loading the paper roll	30
4.7	Low power mode	31
5	CONFIGURATION	33
5.1	Configuration by keys	33
5.2	Configuration by software	35
5.3	Printhead status	37
5.4	Device status	38
5.5	Communication parameters	39
5.6	Operating parameters	41
5.7	Alignment parameters	43
5.8	Hexadecimal dump	44

6	WIRELESS COMMUNICATION	45
6.1	Bluetooth pairing with Windows devices	45
6.2	Bluetooth pairing with macOS devices	47
6.3	Bluetooth pairing with mobile devices	48
6.4	Wi-Fi pairing with mobile devices	50
6.5	Pairing with mobile devices equipped with NFC technology	51
7	ALIGNMENT	53
7.1	Enable alignment	54
7.2	Labels gap detection sensor autoset procedure	56
7.3	Alignment parameters	60
7.4	Printing area	61
8	MAINTENANCE	63
8.1	Paper jam	63
8.2	Replacing the battery	65
8.3	Planning of cleaning operations	66
8.4	Cleaning	67
8.5	Firmware upgrade	70
9	SPECIFICATION	73
9.1	Hardware specifications	73
9.2	Character specifications	76
9.3	Device dimensions	77
9.4	Device dimensions with single slot charging cradle	78
9.5	Power supply dimensions	79
9.6	Paper specification	81
9.7	Character sets in CUSTOM/POS emulation	82
10	ACCESSORIES	85
11	TROUBLESHOOTING GUIDE	87
12	TECHNICAL SERVICE	89



1 INTRODUCTION

This document is divided into sections and chapters. Each chapter can be reached by the index at the beginning of this document. The index can be reached by the button on each page as shown in the diagram below.





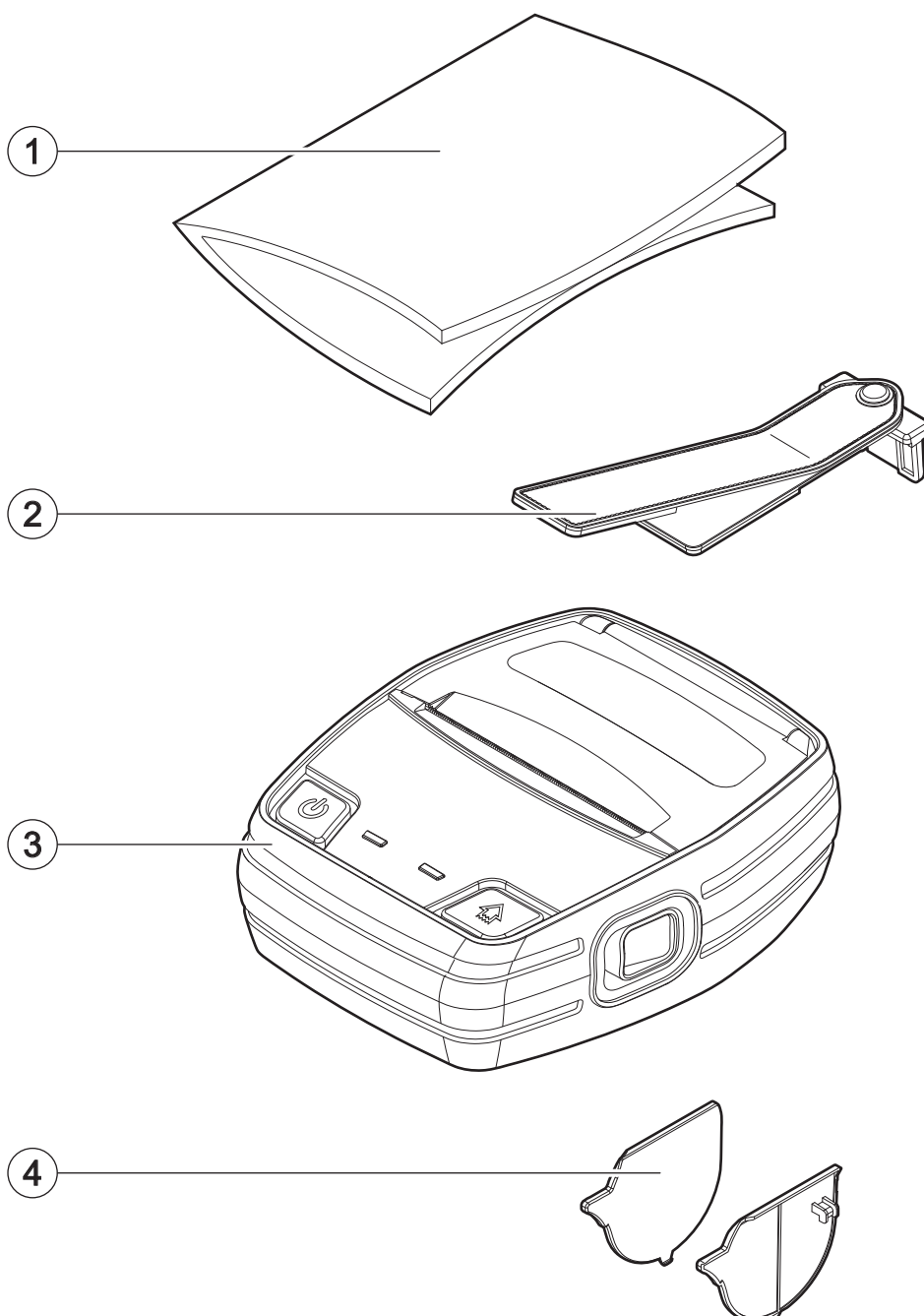
2 DESCRIPTION

2.1 Box contents

Remove the device from its carton being careful not to damage the packing material so that it may be re-used if the device is to be transported in the future.

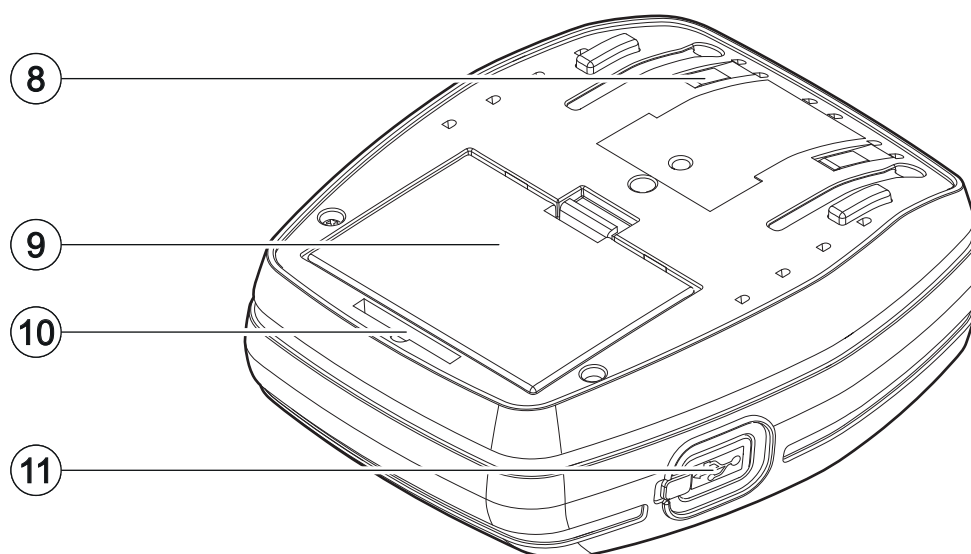
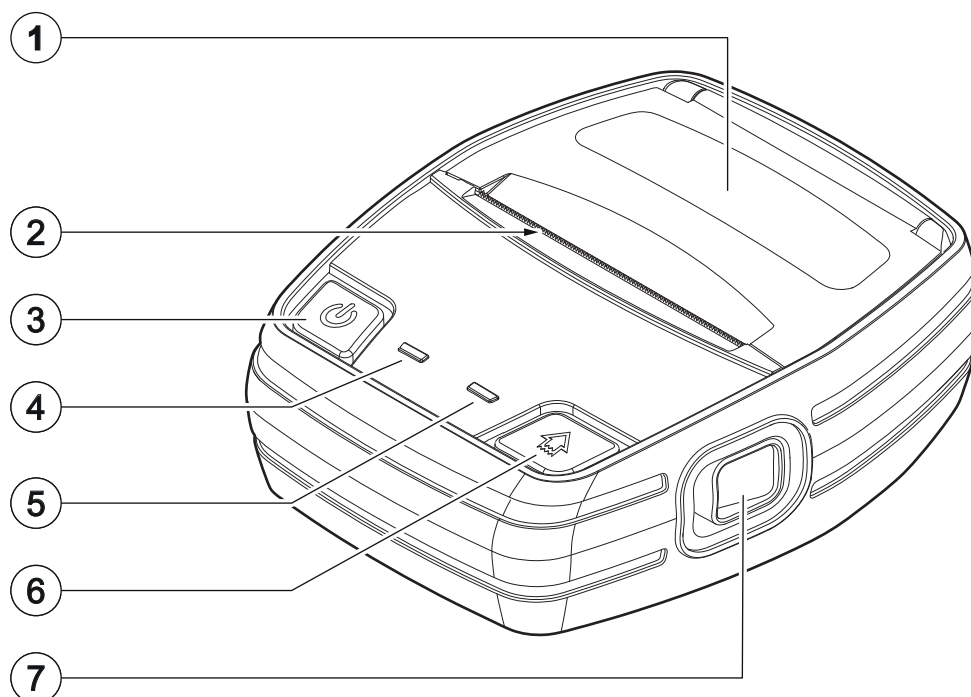
Make sure that all the components illustrated below are present and that there are no signs of damage. If there are, contact customer service.

1. Documentation(short guide)
2. Belt clip
3. Device
4. Paper adjustment guides



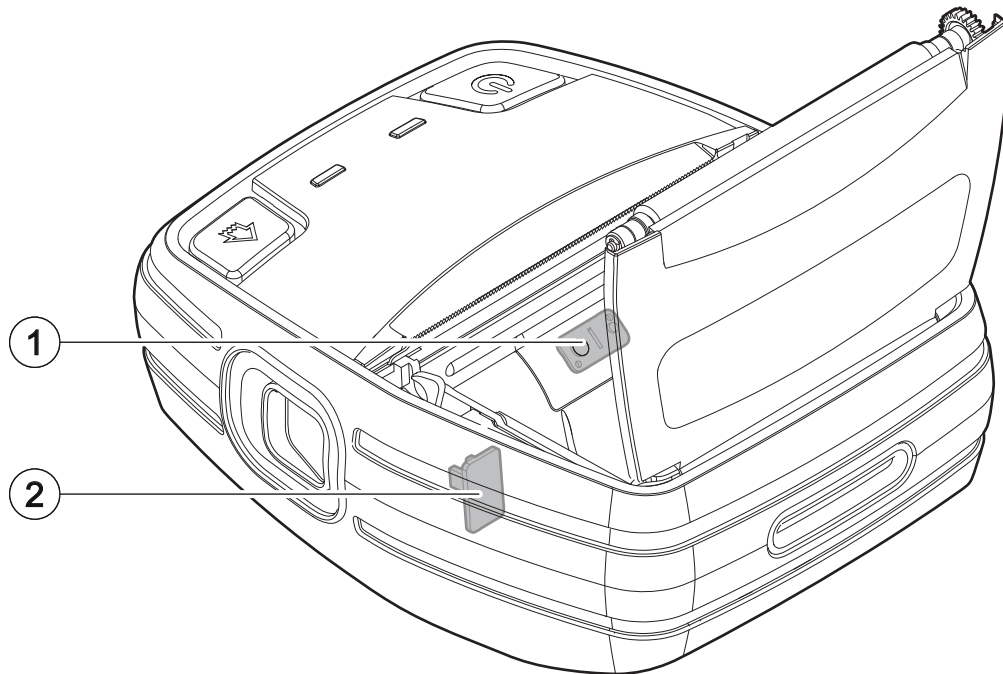
2.2 Device components: external views

- | | |
|-------------------------------------|-------------------------------------|
| 1. Paper compartment cover | 7. Opening key of paper compartment |
| 2. Paper output with serrated blade | 8. Contacts for charging station |
| 3. ON/OFF key | 9. Battery compartment |
| 4. Status LED | 10. Belt clip attachment |
| 5. Battery LED | 11. Connectors compartment |
| 6. FEED key | |



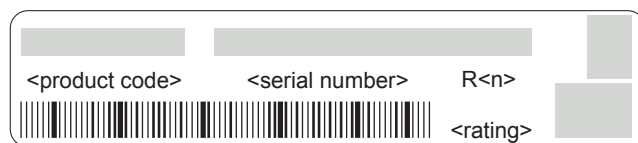
2.3 Device components: internal view

1. Paper presence and alignment sensor
2. Cover open sensor

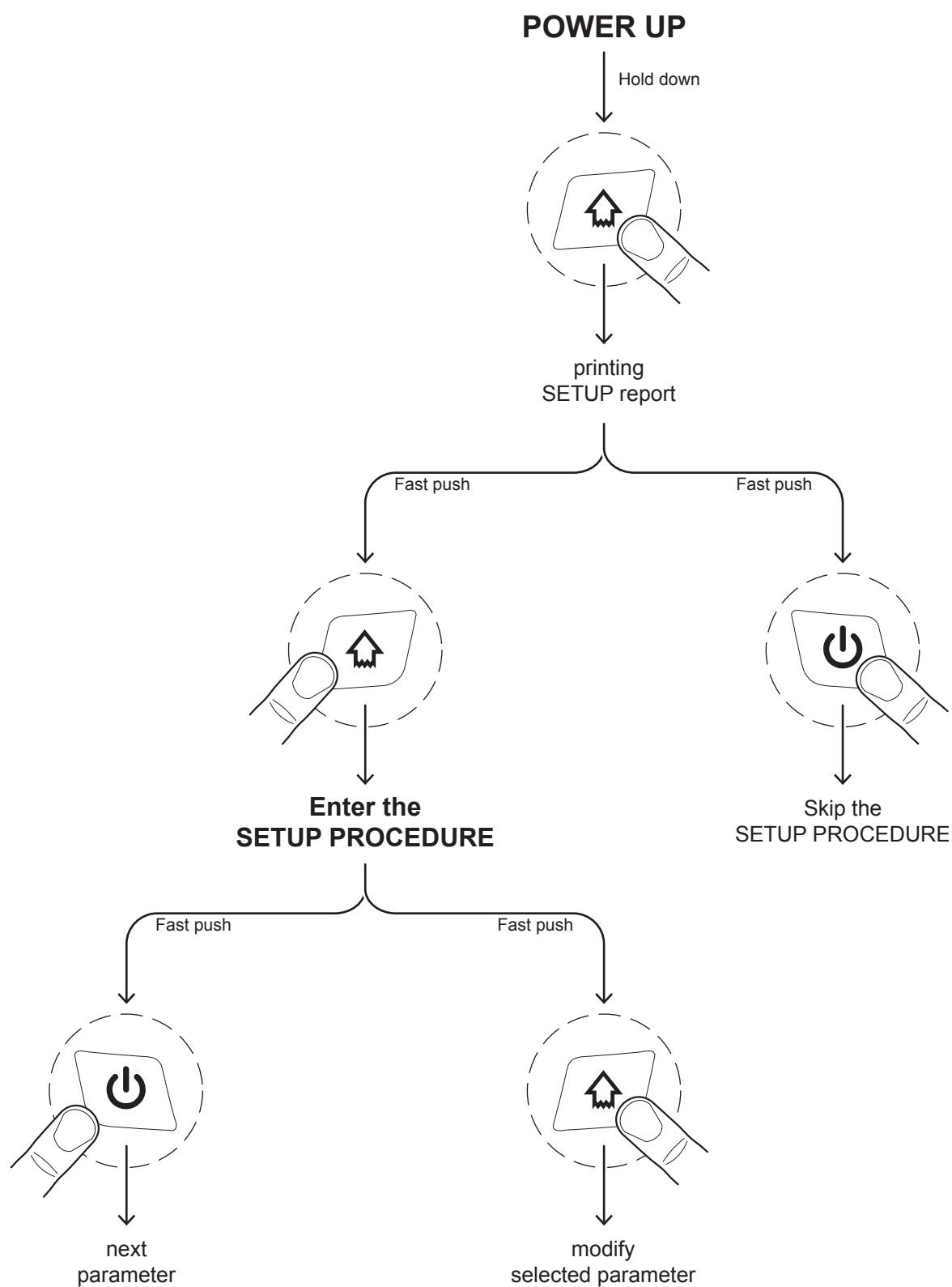


2.4 Product label

The main data used to identify the machine are shown on the label attached to the bottom of the device. In particular, it shows the electrical data for the connection to a power source. It also shows the product code, the serial number and the hardware revision (R).



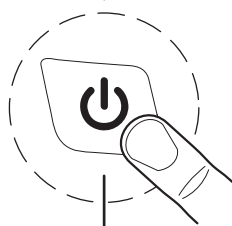
2.5 Key functions: power up





POWER UP

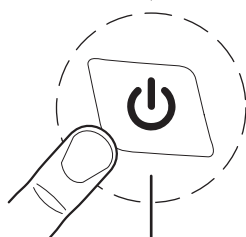
Hold down



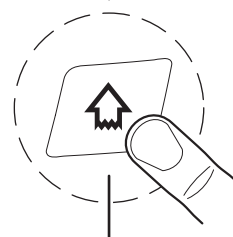
Enter in TEST procedure

Fast push

Fast push



perform
TEST

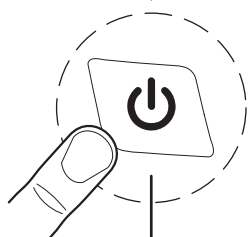


TEST type
selection

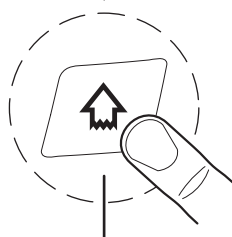
- Logo Test
- Embedded Font Test
- Scalable Font Test
- Chinese Font Test
- Korean Font Test

Fast push

Fast push

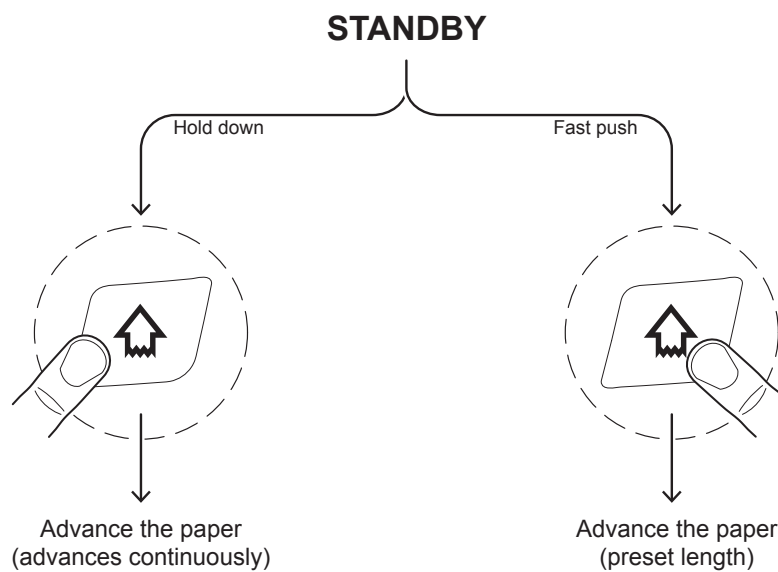


skip the
TEST procedure



TEST type
selection

2.6 Key functions: standby





2.7 Status messages

The two status LED indicate hardware status of device. Given in the table below are the various LED signals and the corresponding device status.

Status LED flashes

STATUS LED		DESCRIPTION
-	OFF	DEVICE OFF
GREEN	ON	DEVICE ON: NO ERROR
GREEN RECOVERABLE ERROR	x 2	RECEPTION ERRORS (PARITY, FRAME ERROR, OVERRUN ERROR)
	x 3	COMMAND NOT RECOGNIZED
	x 4	COMMAND RECEPTION TIME OUT
YELLOW RECOVERABLE ERROR	x 2	PRINthead OVERHEATED
	x 3	PAPER END
	x 4	PAPER JAM
	x 6	COVER OPEN
RED UNRECOVERABLE ERROR	x 1	BLUETOOTH / Wi-Fi ERROR
	x 3	RAM ERROR
	x 4	EEPROM ERROR
BLUE BLUETOOTH STATUS	x 1	BLUETOOTH PAIRING
WHITE	ON	BLUETOOTH / Wi-Fi CONNECTION ACTIVE



Battery LED flashes during normal operation

CHARGING LED		DESCRIPTION
-	OFF	DEVICE OFF
GREEN	ON	100% CHARGE
YELLOW	ON	66% CHARGE
RED	ON	33% CHARGE
	x 3	NOT ORIGINAL BATTERY

Battery LED flashes during device charging

CHARGING LED		DESCRIPTION
GREEN	ON	CHARGING COMPLETE
		CHARGING IN PROGRESS (LESS THAN 50% CHARGE)
		CHARGING IN PROGRESS (OVER THAN 50% CHARGE)
RED	x 1	CHARGER / BATTERY ERROR
	x 2	CHARGE SUSPENDED DUE TO TEMPERATURE



3 INSTALLATION

3.1 Belt clip assembly

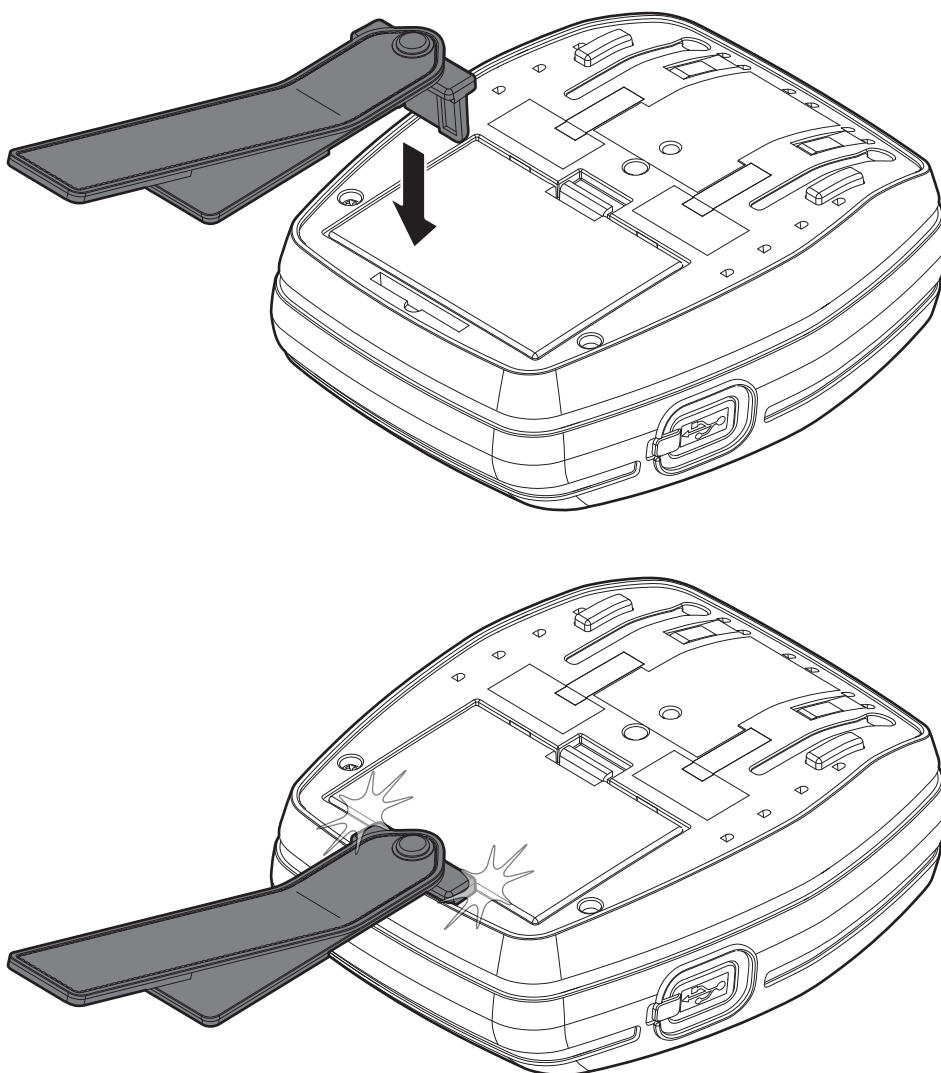
To assembly the supplied belt clip, proceed as follows.

1

→ **OFF**

Turn off the device (see [paragraph 4.3](#)).

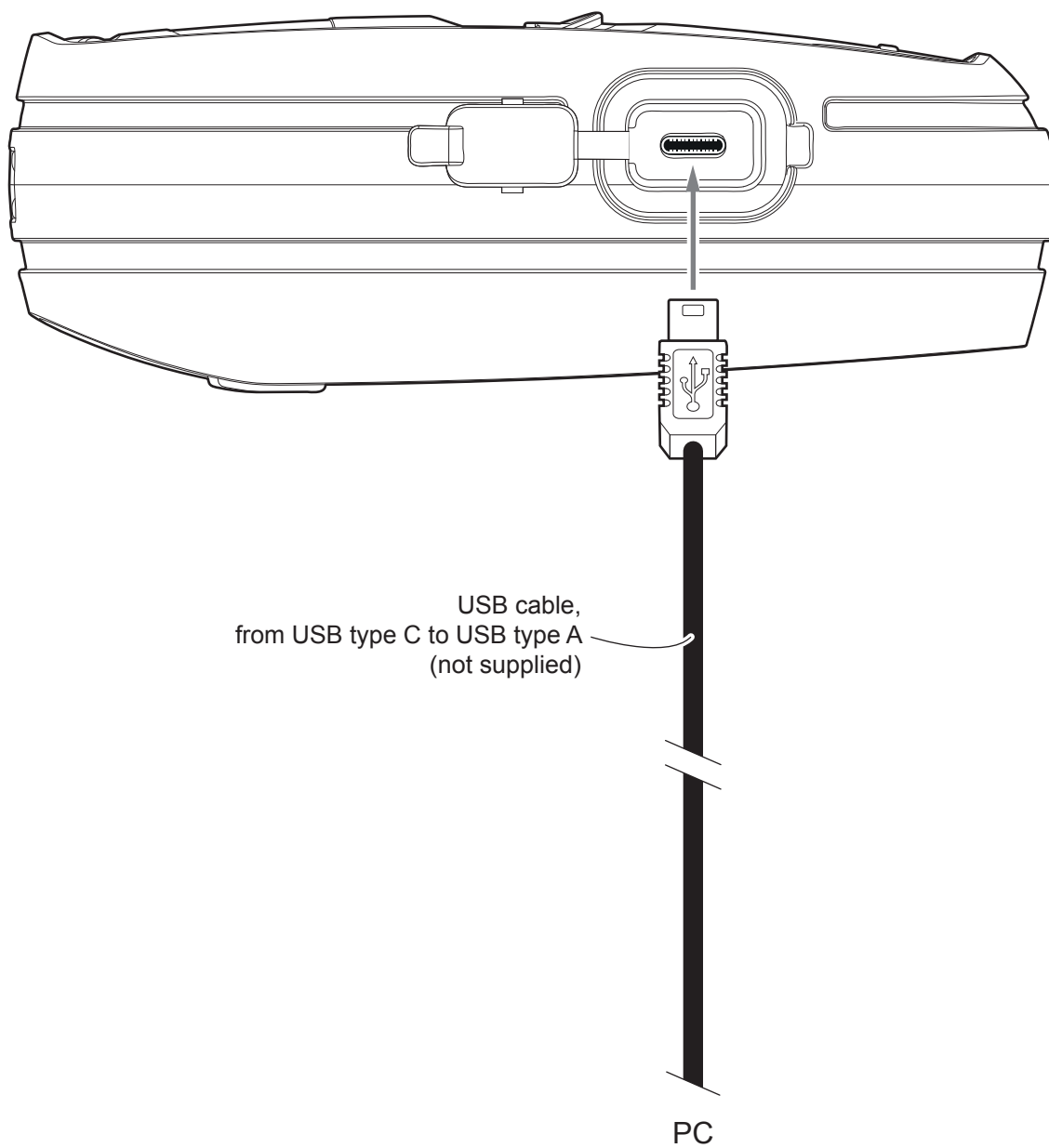
2



Insert the belt clip into the attachment on the bottom of the device and press down to snap it into the latched position.

3.2 Connections

The following figure shows the possible connections for the device.



3.3 Pinout



J8	A1	GND
	A2	n.c.
	A3	n.c.
	A4	VBUS
	A5	CC1
	A6	D1+
	A7	D1-
	A8	n.c.
	A9	VBUS
	A10	n.c.
	A11	n.c.
	A12	GND
	B1	GND
	B2	n.c.
	B3	n.c.
	B4	VBUS
	B5	CC2
	B6	D2+
	B7	D2-
	B8	n.c.
	B9	VBUS
	B10	n.c.
	B11	n.c.
	B12	GND
	SH1	SHIELD
	SH2	SHIELD
	SH3	SHIELD
	SH4	SHIELD
	SH5	SHIELD
	SH6	SHIELD



3.4 Driver and SDK

In the website www.custom4u.it are available the drivers for the following operating system:

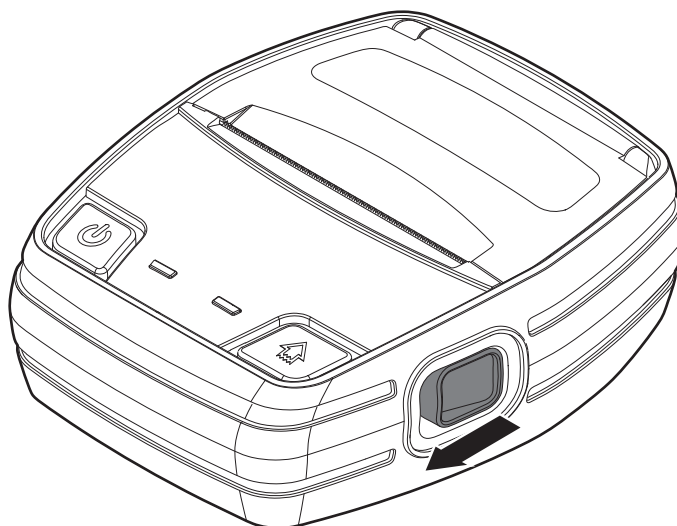
OPERATING SYSTEM	DESCRIPTION	INSTALLATION PROCEDURE
Windows	Driver for Windows 7 (32/64 bit)	From the START menu, press Run and type-in the path where the SW was saved on your PC, then click OK. Follow the instructions that appear on the screen to install the driver.
	Driver for Windows 8 (32/64 bit)	
	Driver for Windows 8.1 (32/64 bit)	
	Driver for Windows10 (32/64 bit)	
Android	SDK for CustomAndroidAPI	Extract the zipped folder to the destination path desired. Follow the instructions present in the software package that you downloaded on how to install and use the library.

4 OPERATION

4.1 Opening cover

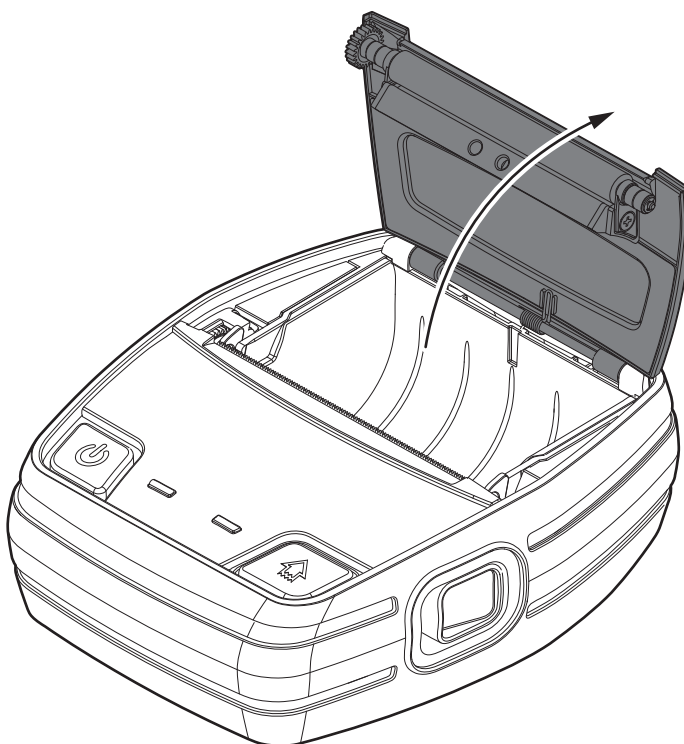
To open the device cover proceed as follows.

1



Press the paper compartment cover opening key.

2

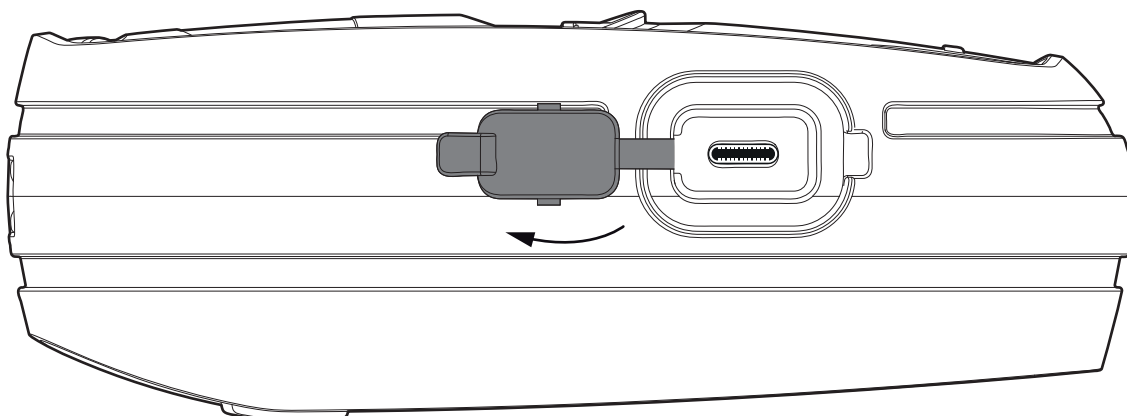


Open the paper compartment cover.

4.2 Opening connectors compartment

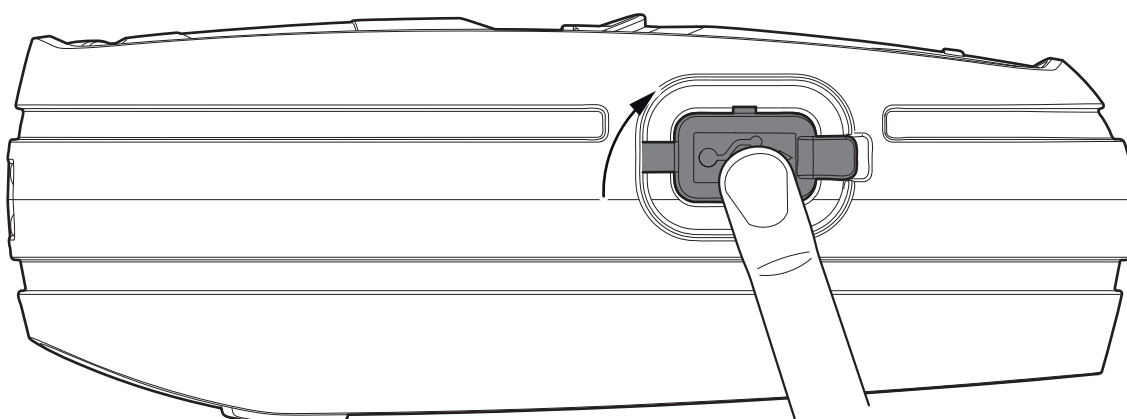
To access to the connectors compartment of the device proceed as follows.

1



Access the connectors compartment by opening the rubber plug.

2

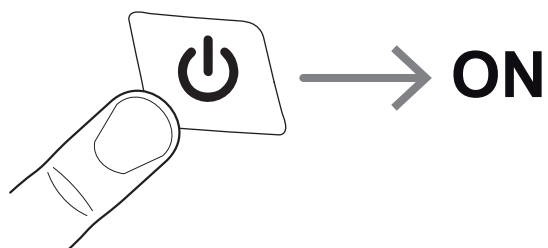


If the connectors are not used, protect the connectors compartment by closing the rubber plug with a light pressure.

4.3 Switch the device ON/OFF

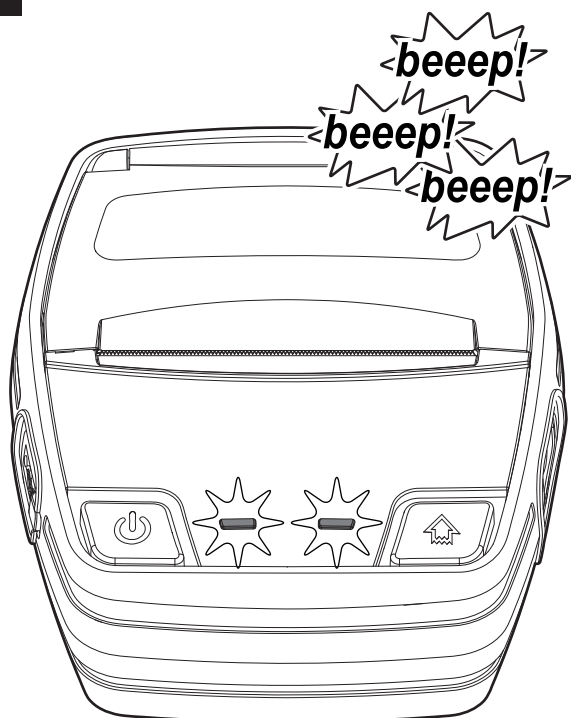
To switch the device ON/OFF proceed as follows.

1



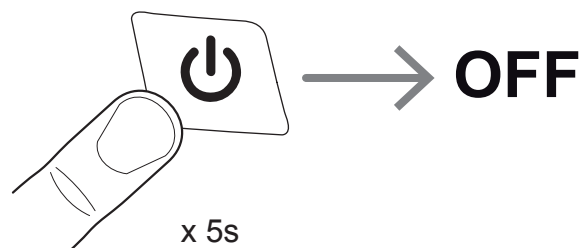
Accendere il dispositivo facendo una breve pressione sul tasto ON/OFF.

2



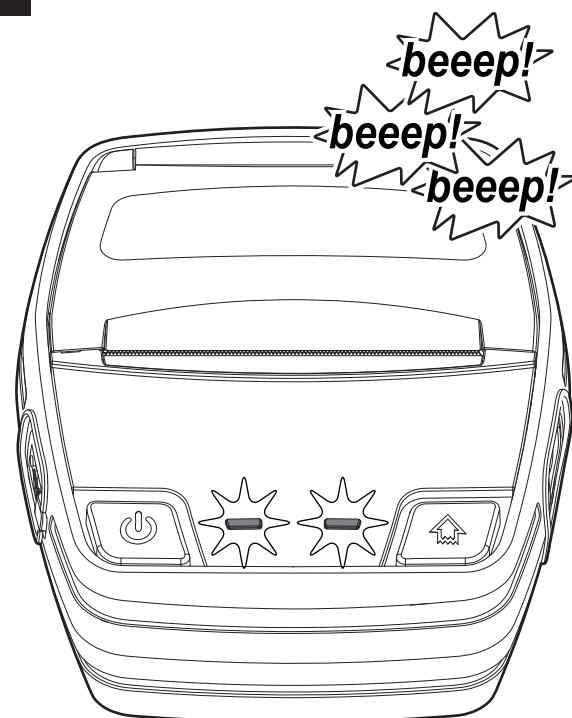
I LED di stato si accendono di colore verde e il dispositivo è pronto.

3



Spegnere il dispositivo mantenendo premuto per circa 5 secondi il tasto ON/OFF.

4



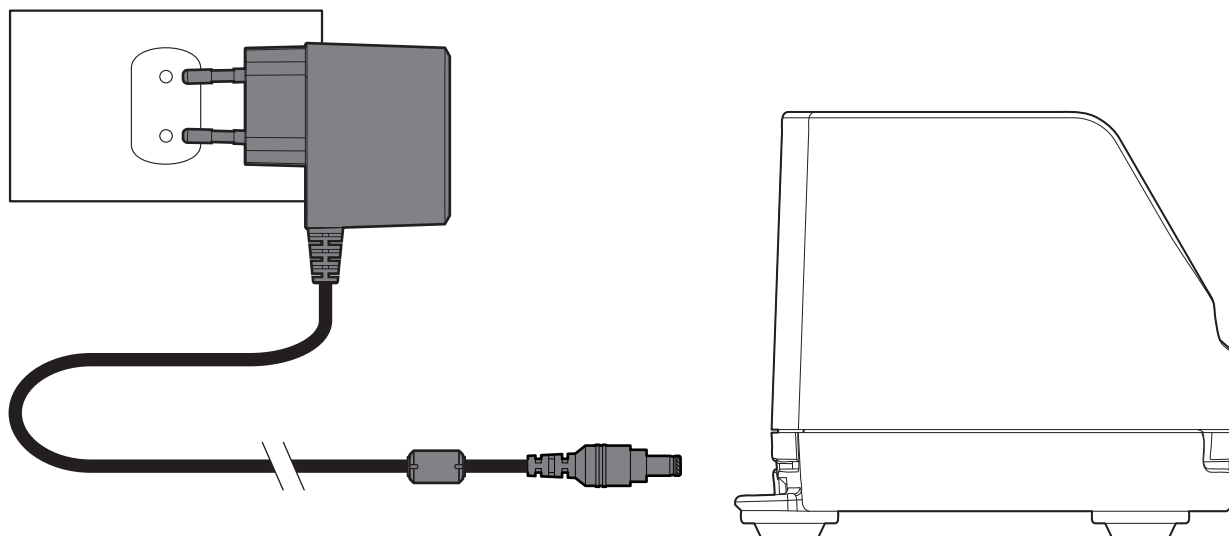
I LED di stato si accendono di colore rosso e indicano che il dispositivo si sta spegnendo.

4.4 Recharge with charger cradle

If you are using the optional shoulder bag (see [chapter 10](#)), remove the device from the shoulder bag before inserting the device in the charger cradle housing.

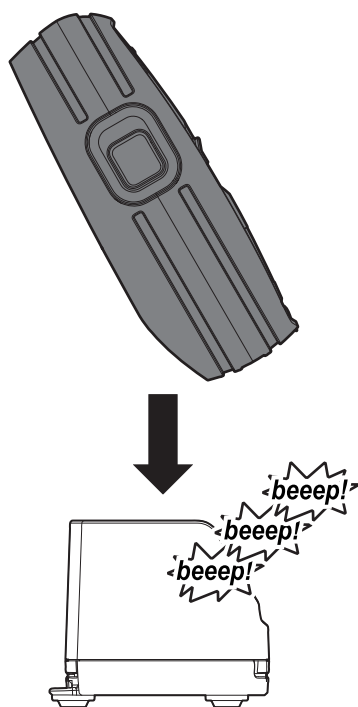
To recharge the device with the optional charger cradle (see [chapter 10](#)), proceed as follows.

1



Connect the charging station power supply cable to the charging station and to the mains outlet.
Use the type of electrical power supply indicated on the charger cradle label.

2

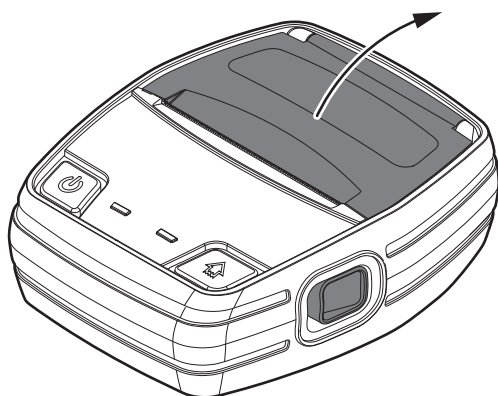


Insert the device in the charger cradle housing.
The battery LED lights on yellow and the device is charging.

4.5 Adjusting paper width

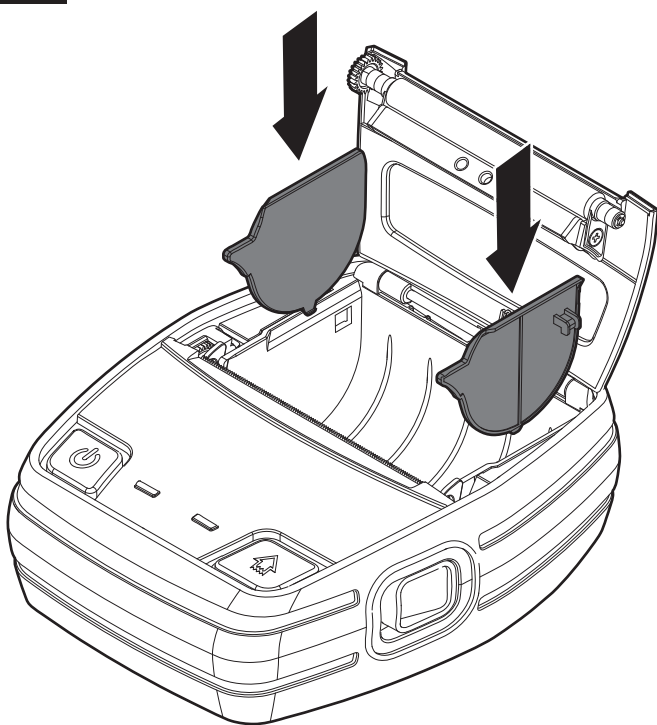
In standard configuration, the device manages paper rolls with a width of 80 mm.
To use paper rolls with a width of 76.2 mm, proceed as follows.

1



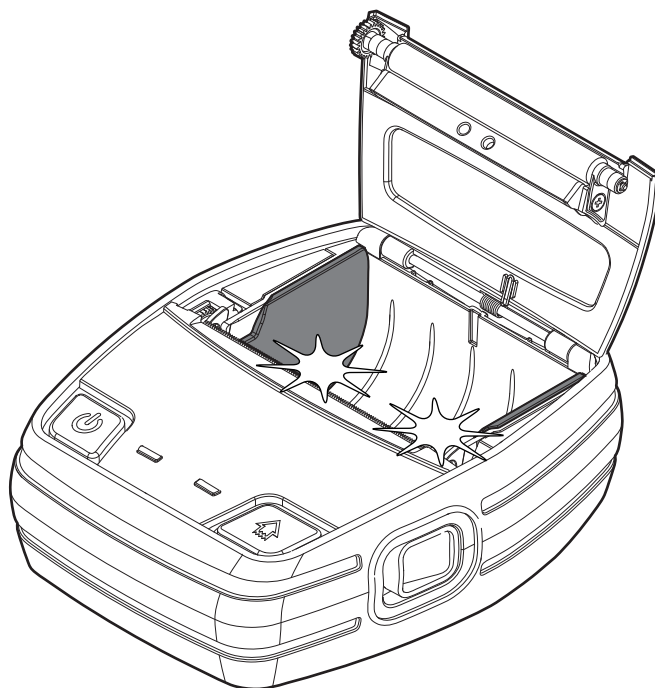
Open the device cover
(see [paragraph 4.1](#)).

2



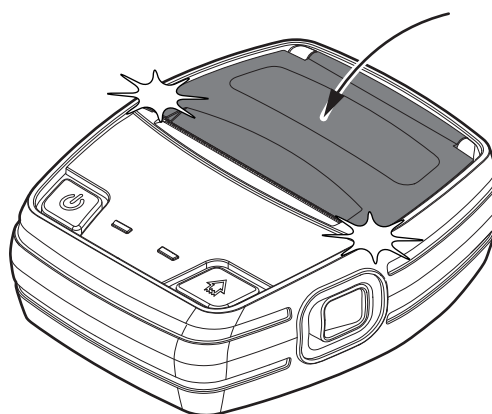
Inserire le due paratie di regolazione carta.

3



Bloccare le paratie nei rispettivi punti di incastro.

4

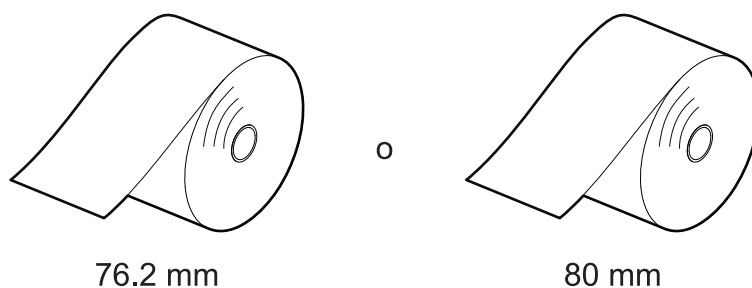


Chiudere il coperchio del dispositivo.

4.6 Loading the paper roll

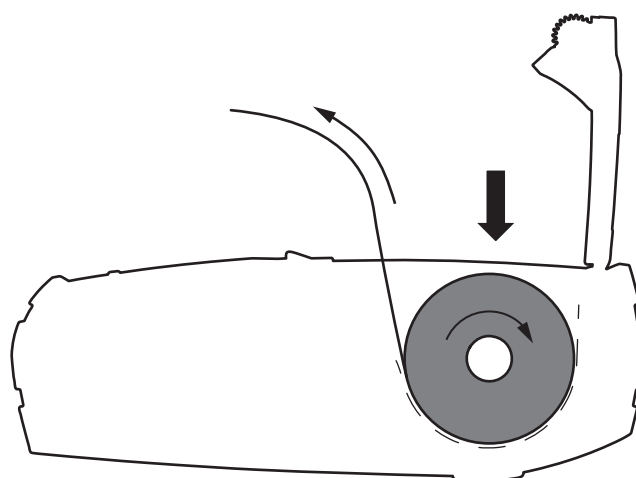
To change the paper proceed as follows. At every change of paper, check inside the device to locate and remove any scraps of paper.

1



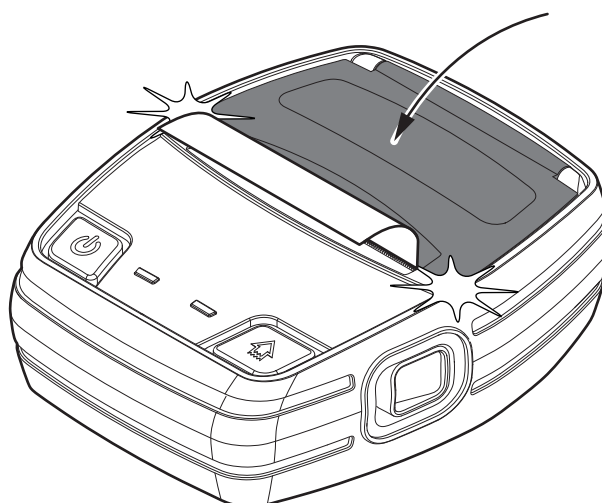
Adjust paper width (see [paragraph 4.5](#)).

2



Open the device cover (see [paragraph 4.1](#)).
Place the roll in the paper compartment respecting the correct direction of rotation shown in figure and pull out the paper for a few centimetres.

3

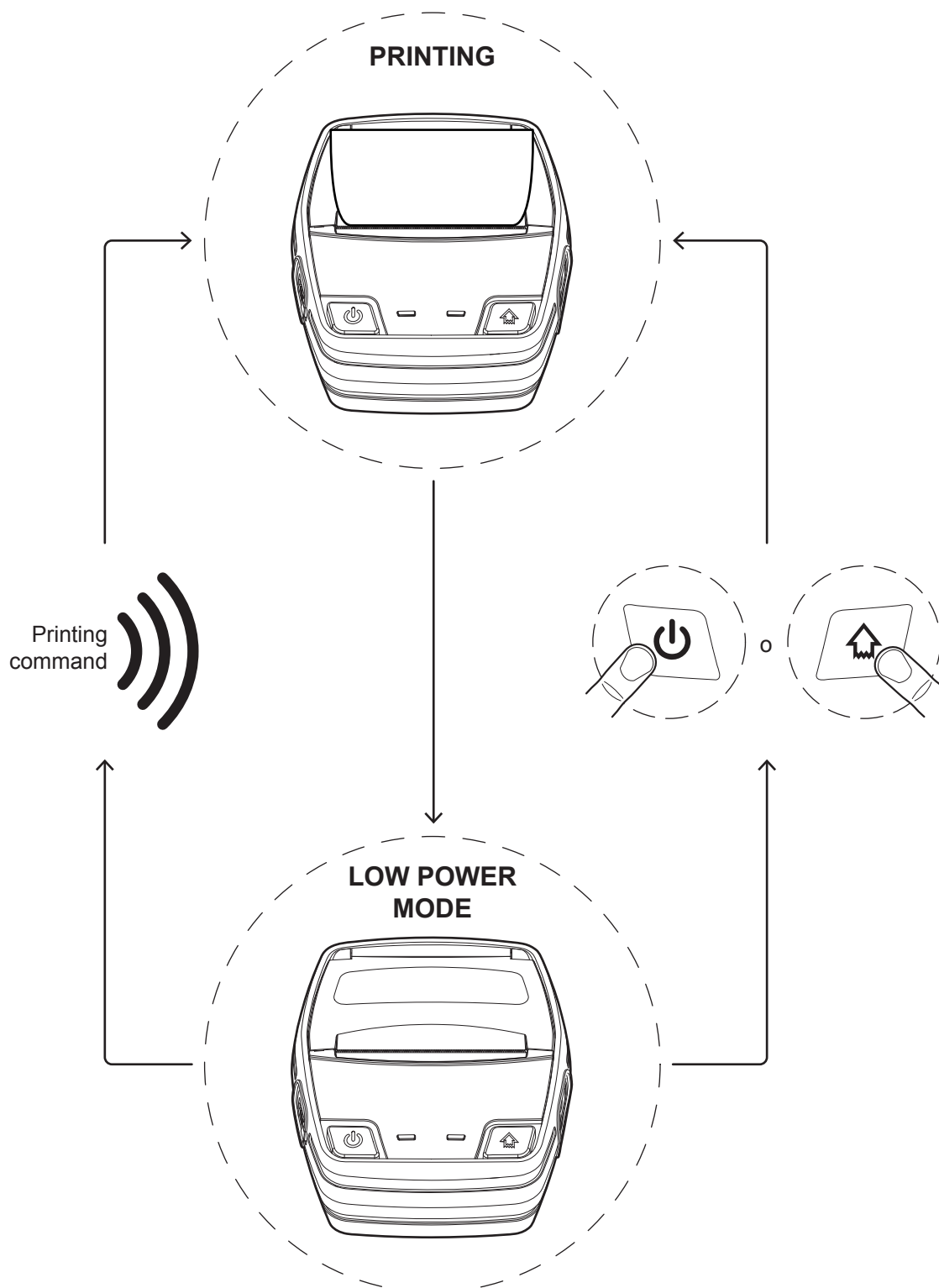


Chiudere il coperchio del dispositivo.

4.7 Low power mode

The low power mode allows the device to save energy and increase the battery life when operating in Bluetooth or Wi-Fi. The low power mode is automatically enabled after printing a receipt.

To terminate the low power mode and return to operative mode press the FEED key or the ON / OFF key.





5 CONFIGURATION

5.1 Configuration by keys

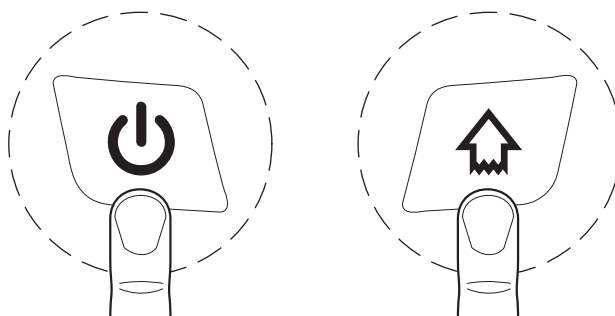
To enter the configuration mode and print a setup report with the operating parameters of the device, proceed as follows.

1

TASTO
ON/OFF

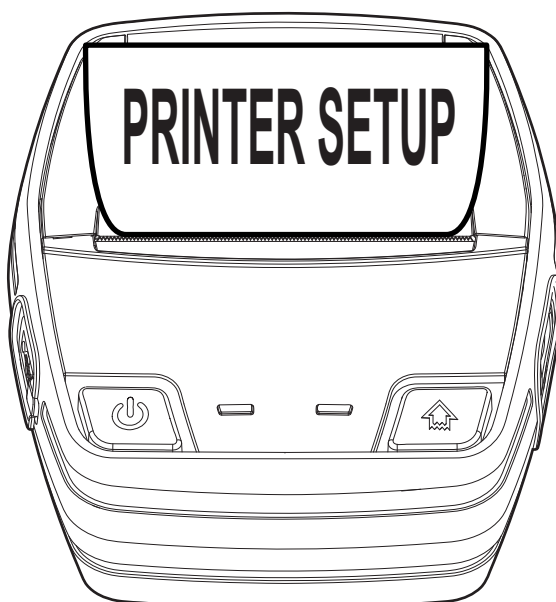
+

TASTO
FEED



Mantenendo premuto il tasto FEED,
accendere il dispositivo premendo il tasto ON/OFF.

2



Il dispositivo stampa la lista dei parametri di configurazione.
Seguire le istruzioni stampate su carta per procedere con la configurazione.



The following figure show the setup reports of the device. The shown values for parameters are sample values; for the list and the description of device parameters see the following paragraphs.

DEVICE NAME AND
FIRMWARE MODULES
RELEASE

<device name>
SCODE: <code> - rel <number>
FCODE: <code> - rel <number>
DCODE: <code> - rel <number>
SCODE: <code> - rel <number>

S/N: <serial number>

PRINTER SETTINGS

1 576

PRINthead WORKING GOOD!

PRINthead
STATUS

DEVICE
STATUS

PRINTING HEAD TYPE <head model>
INTERFACE USB
PROGRAM MEMORY TEST..... OK
DYNAMIC RAM TEST..... OK
HEAD VOLTAGE [V] = 24.17
HEAD TEMPERATURE [°C] = 24
POWER ON COUNTER = 10
PAPER PRINTED [cm] = 160
BATTERY S/N = 0000000000000000

NETWORK
PARAMETERS

[Network configuration]
DHCP Client Enabled
IP Address 192.168.0.1
Subnet Mask 255.255.240.0
Default Gateway..... 192.168.0.5
TCP Printer Port 9100
[Wi-Fi]
Security Type..... WPA
SSID Custom
MAC Address Wi-Fi 00-00-00-00-00-00
[Bluetooth]
BD Address 00-00-00-00-00-00
[Interface]
Wireless..... Bluetooth

PARAMETERS
FOR DEVICE
CONFIGURATION

Printer Emulation CUSTOM POS
Print Mode Normal
Busy Condition RxFull
Autofeed CR Disabled
Chars / Inch A=15 B=20 cpi
Font Type..... International
Code Table [num] 0
Speed / Quality..... Normal
Paper Threshold 40%
Black Mark Position Transparent
PaperEnd Buffer Clear Disabled
PrintHead Test PowerOn Disabled
USB Address Number 0
USB Class Printer
Print Density 40%

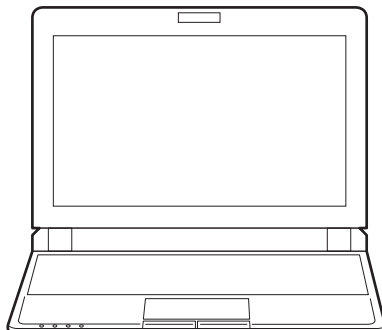
KEYS FUNCTIONS

[LF] enter Printer Setup
[PWR] skip Setup

5.2 Configuration by software

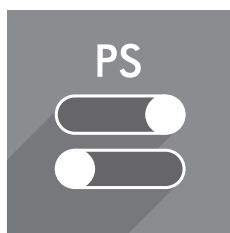
The setup parameters can be set by using the “PrinterSet” software tool available on www.custom4u.it. For a detailed description of the device operating parameters see the following paragraphs. To configure the device by software, proceed as follows.

1



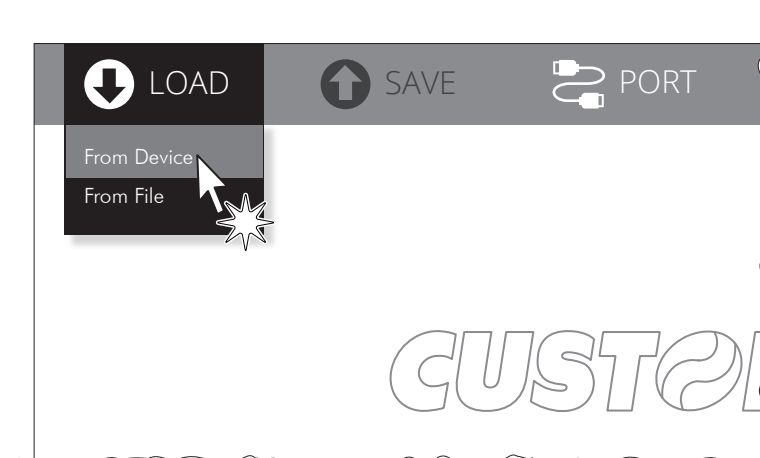
Connect the device to a PC directly (see [paragraph 3.2](#)), without using HUB devices.

2



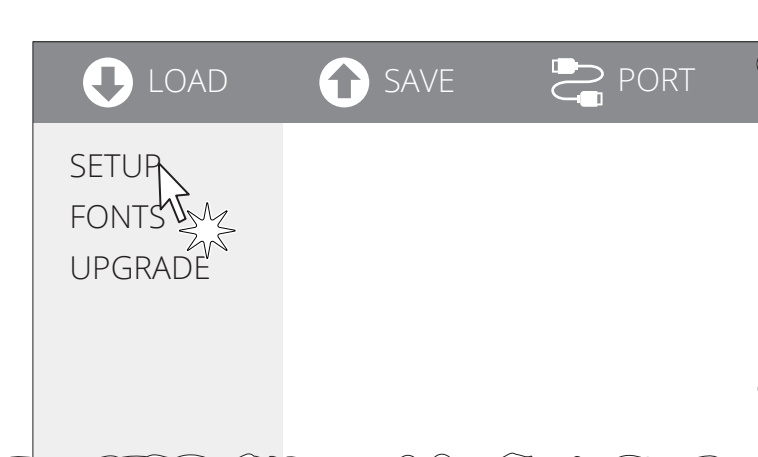
Start “PrinterSet” software tool.

3



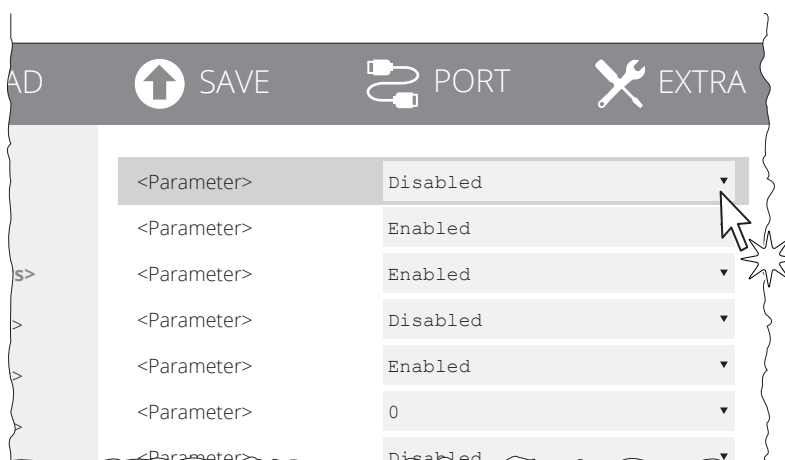
Click on LOAD > FROM DEVICE and select the device connected to the PC.

4



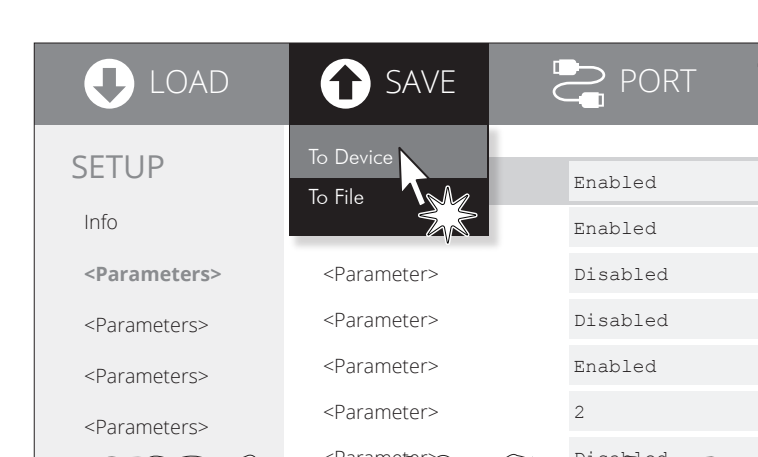
Click on SETUP to access the operating parameters of the device to be configured.

5



Make the desired changes to the device operating parameters.

6



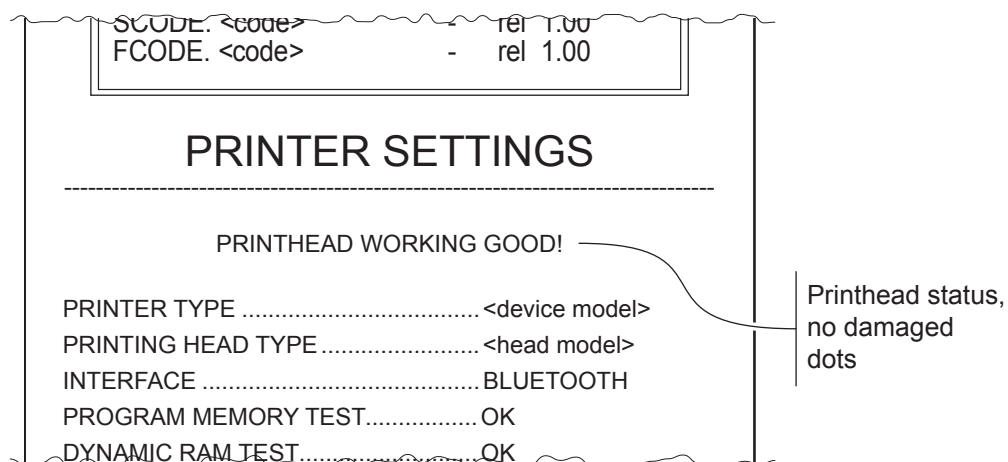
Click on SAVE > TO DEVICE
to make the changes made effective.

ATTENTION:

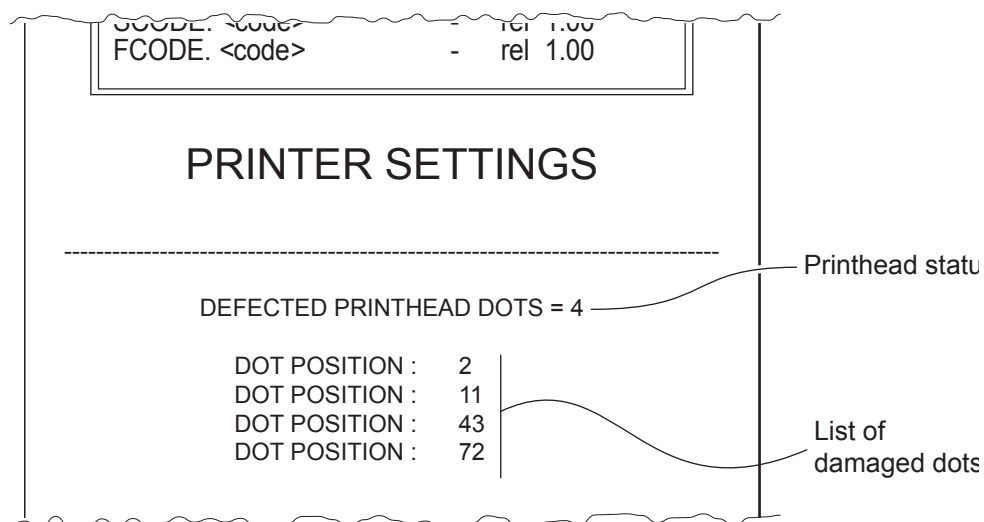
During saving, it is strongly discouraged to disconnect the communication cable or to remove the power supply of the PC or the device.

5.3 Printhead status

The device performs the printhead operating status when printing the setup report. The total number of dots is reported. Are indicated the total dots number of the printhead and their status (see figure below).



In case of damaged dots, these are listed in the print out in according to their position on the heating line (see figure below).





5.4 Device status

The device operating status is indicated in the configuration print-out in which, next to the name of the components displayed, the following information is given:

PRINTING HEAD TYPE	print head model
INTERFACE	interface present
PROGRAM MEMORY TEST	OK appears if functioning and NOT OK if faulty
DYNAMIC RAM TEST	OK appears if functioning and NOT OK if faulty
HEAD VOLTAGE	voltage of the head
HEAD TEMPERATURE	temperature of the head
POWER ON COUNTER	number of power-ups made
PAPER PRINTED	centimetres of paper printed
BATTERY S/N	battery serial number



5.5 Communication parameters

This device allows the configuration of the parameters listed in the following table.

The parameters marked with the symbol [ⓓ] are the default values.

Settings remain active even after the device has been turned off and they are stored in non-volatile memory.

BUSY CONDITION	Activation mode for the Busy signal: OffLine/ RxFull = Busy signal is activated when the device is both in OffLine status and the buffer is full RxFull [ⓓ] = Busy signal is activated when the buffer is full
USB CLASS	USB communication class definition: Printer [ⓓ] = setting the printer function Virtual COM = setting the USB port as a serial port
USB ADDRESS NUMBER	Numerical address code for the univocal identification of the USB device (in case of more than a USB device connected with the same PC): 0 [ⓓ] 2 4 6 8 1 3 5 7 9
WIRELESS	Activation of the wireless communication: Off Wi-Fi Bluetooth [ⓓ]
WIFI PRINTER NAME	Wi-Fi connection printer name identifier.
DHCP CLIENT	Setting of the DHCP protocol: Disabled [ⓓ] = protocol disabled Enabled = protocol enabled
IP ADDRESS	IP address of the device.
SUBNET MASK	This parameter identifies the local network address.
DEFAULT GATEWAY	This parameter identifies the gateway IP address used to send applications to the external network.
TCP PRINTER PORT	This parameter sets the TCP port number. This parameter is not printed on setup report and it is modifiable only during setup procedure by software (see paragraph 5.2).
MAC ADDRESS WIFI	This is the number, provided by the constructor, that identifies the device; this number is univocal. This parameter is not modifiable by setup.



SECURITY TYPE	Security Protocol:
	None ^D = protocol disabled
	WPA = WPA protocol enabled
	WPA2 = WAP2 protocol enabled
	This parameter is not modifiable by setup.
SSID	IP address of Wi-Fi; this parameter is assigned by the network administrator.
	This parameter is not modifiable by setup.
PASSWORD	Printer network password.
	This parameter is not modifiable by setup.
TCP TIMEOUT	Setting the data transmission timeout of the TCP protocol.
BT PRINTER NAME	Bluetooth connection printer name identifier.
BD ADDRESS	This is the number, provided by the constructor, that identifies the device bluetooth; this number is univocal.
	This parameter is not modifiable by setup.



5.6 Operating parameters

This device allows the configuration of the parameters listed in the following table.

The parameters marked with the symbol ^D are the default values.

Settings remain active even after the device has been turned off and they are stored in non-volatile memory.

PRINTER EMULATION	Available emulations for the device: CUSTOM/POS ^D		
PRINT MODE	Printing mode: Normal ^D = enables printing in normal direction Reverse = enables printing rotated 180 degrees		
AUTOFEED	Setting of the Carriage Return character: CR disabled ^D = Carriage Return disabled CR enabled = Carriage Return enabled		
CHARS / INCH	Font selection: A = 11 cpi, B = 15 cpi A = 15 cpi, B = 20 cpi ^D A = 20 cpi, B = 25 cpi CPI = Characters Per Inch		
FONT TYPE	Setting of the font type: International ^D = enables the use of the 256 characters font tables Chinese GB18030 = enables the use of the chinese extended font GB18030 Korean CP949 = enables the use of the korean font CP949		
CODE TABLE	Identifier number of the character code table to use. See paragraph 9.7 to learn about the character tables corresponding to the identification numbers set with this parameter.		
SPEED / QUALITY	Setting of printing speed and printing quality: High Quality Normal ^D High Speed		
PAPER THRESHOLD	Threshold value (in percent) for the recognition of paper presence by the paper presence sensor: 30% 60% 90% 40% ^D 70% 50% 80%		



PAPEREND BUFFER CLEAR Cleaning mode of the data in receive buffer, if the printing is stopped due to lack of paper:

Disabled ^D = the data remain in the receive buffer. When the paper runs out, the device keeps the remaining data in the receive buffer and prints the remaining portion of the ticket after that the new paper is loaded.
Enabled = when the paper runs out, all data in the receive buffer are deleted.

**PRINthead TEST
POWERON**

Setting of the performing of the printhead test:

Disabled ^D = the test is performed only during the printing of the setup report
Enabled = the test is performed at each power on

PRINT DENSITY

Adjusting the printing density:

-25%	0% ^D	+25%
-12%	+12%	

The print quality is strongly influenced by the type of chemical treatment and the type of storage to which the thermal paper has been subjected, as well as by the weight of the same. It may therefore necessary to act on this parameter to obtain the desired print quality.

POWER OFF TIME

Setting the inactivity period after which the device turns off automatically:

None	4 hours
30 min ^D	6 hours
1 hour	8 hours
2 hours	

5.7 Alignment parameters

The device allows the configuration of the parameters listed in the following table.

The parameters marked with the symbol ^D are the default values.

Settings remain active even after the device has been turned off and they are stored in non-volatile memory.

BLACK MARK POSITION	Alignment management (see chapter 7):	
	Disabled ^D	= the alignment is not performed
	Transparent	= the alignment is performed
PAPER THRESHOLD	Threshold value (in percent) for the recognition of the presence of paper by the paper presence sensor:	
	30% 70% ^D	
	40% 80%	
	50% 90%	
	60%	
	If the “Black mark position” parameter is set to “Disabled”, this parameter has no effect on the device configuration and is not printed on the setup report.	
BLACK MARK DISTANCE [1/10 mm]	“Black mark distance” is the minimum distance (in millimetres) between the the end of the label and the alignment sensor (see chapter 7).	
	From -999 to 0 ^D	
	The numeric value of the distance is made up with the following four parameters for the setting of three digits (two for the integer part of the number, one for the decimal part and of the sign):	



5.8 Hexadecimal dump

This function is used for the diagnosis of the characters received from the communications port. Characters are printed as hexadecimal code and the corresponding ASCII code (see below). Each line is preceded by a counter in hexadecimal that indicates the number of bytes received.

During the startup, if you hold down the FEED key, the printer enters the self-test routine and print the setup report. The printer remains in standby until a key is pressed or characters are received through the communication port (Hexadecimal Dump mode). For each character sent, the receipt contain an indication of the hexadecimal and ASCII values (if the characters are underlined, the receive buffer is full). Shown below is an example of a Hexadecimal Dump:

HEXADECIMAL DUMP											
31	32	33	34	35	...	12345	...				
39	30	31	32	33	...	90123	...				
37	38	39	75	69	...	789ui	...				
68	6B	6A	73	64	...	hkjsd	...				
73	64	66	6B	6A	...	sdfkj	...				
66	73	64	66	6B	...	fsdfk	...				
65	69	6F	79	75	...	eioyu	...				
6F	72	69	75	77	...	oriuw	...				
6F	75	77	65	72	...	ouwer	...				
77	65	72	69	6F	...	werio	...				
72	69	6F	75	77	...	riouw	...				
6B	6C	73	64	66	...	kl sdf	...				
64	66	6B	73	64	...	dfksd	...				
73	64	66	6B	6A	...	sdfkj	...				
66	6B	F2	6A	73	...	fk>j	...				
6A	6B	6C	68			jklh					

6 WIRELESS COMMUNICATION

The Bluetooth connectivity of the printer allows the wireless printing from a PC (e.g. using a text editor or third-part software) or from a mobile device.

To perform the wireless printing with a printer equipped with Bluetooth connectivity is needed to pair with device.

NOTES: The windows used in this paragraph may be different from the screens that appear on the device used for printing and may vary depending on the version of the operating system.

Once that has occurred the association (pairing) between the host and printer, this remains active even in the event of switching off, interruption of communication, etc.

6.1 Bluetooth pairing with Windows devices

1



Turn on the printer (see [paragraph 4.3](#)).

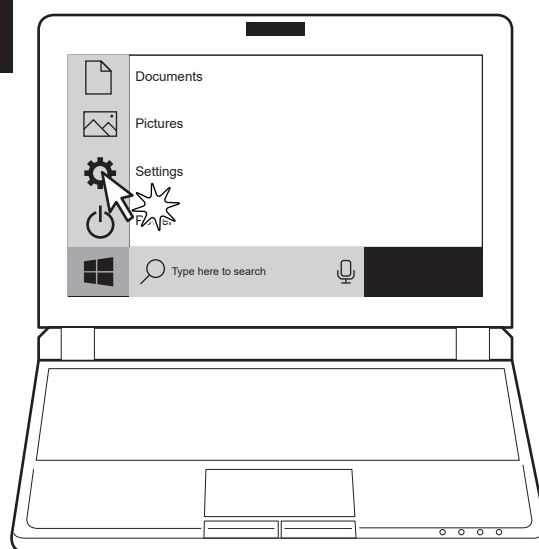
2

Wireless.....: **Bluetooth**

BD Address: **<BD Address>**

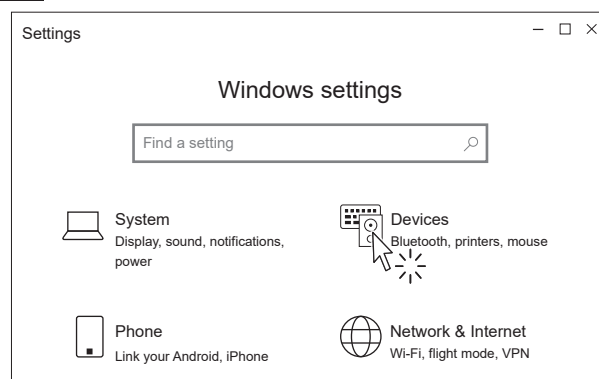
Check that the “Wireless” parameter is set on “Bluetooth” and take note of the “BD Address” parameter (see [chapter 5](#)).

3



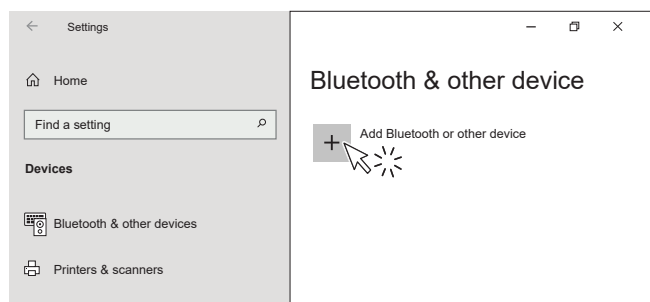
On PC taskbar click on Start > Settings.

4



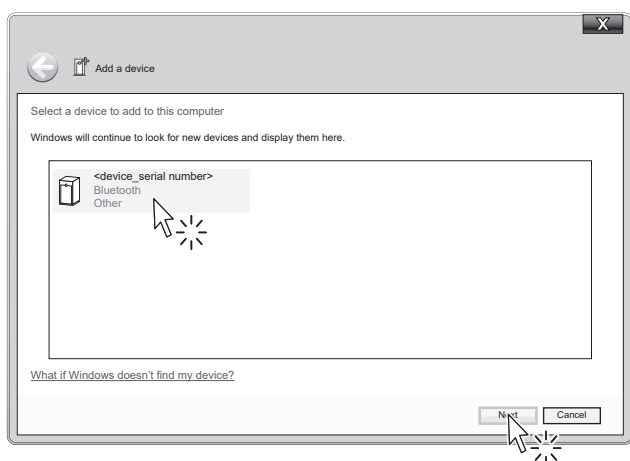
In the window that opens, click on DEVICES.

5



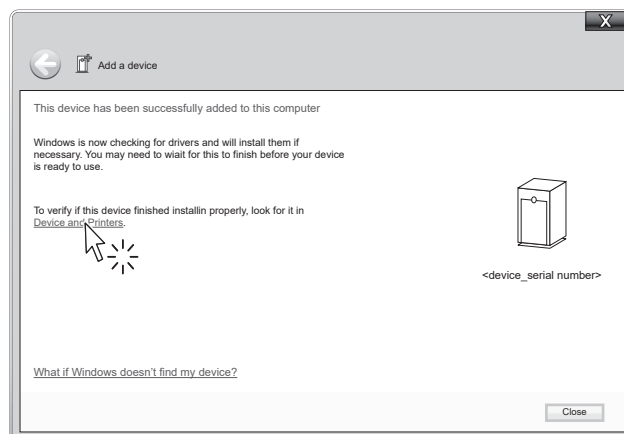
Check that bluetooth is active on PC and click on “ADD BLUETOOTH OR OTHER DEVICE”.

6



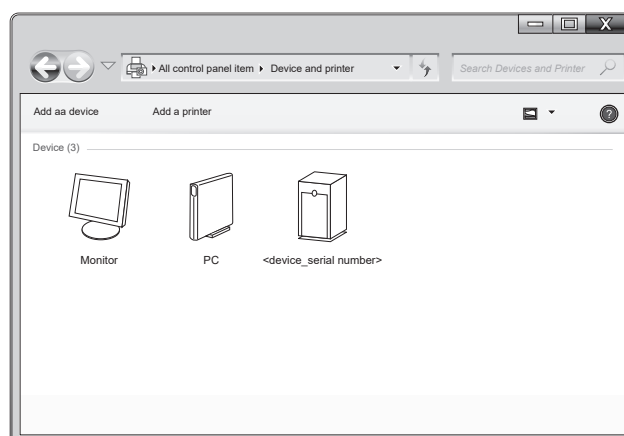
Locate your Bluetooth printer in the list of proposed devices (<device_serial number>) and select it with a click.

7



In the confirmation message that appears, click DEVICE AND PRINTERS.

8



Check that your device appears in the list of paired devices.

6.2 Bluetooth pairing with macOS devices

1



Turn on the printer (see [paragraph 4.3](#)).

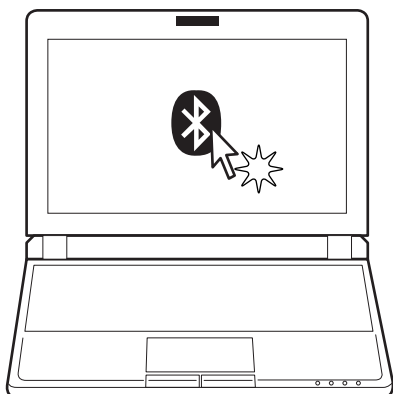
2

Wireless.....: **Bluetooth**

BD Address: **<BD Address>**

Check that the “Wireless” parameter is set on “Bluetooth” and take note of the “BD Address” parameter (see [chapter 5](#)).

3



Sulla barra di stato del PC cliccare sull'icona Bluetooth.

4

Bluetooth: On
Diattiva Bluetooth

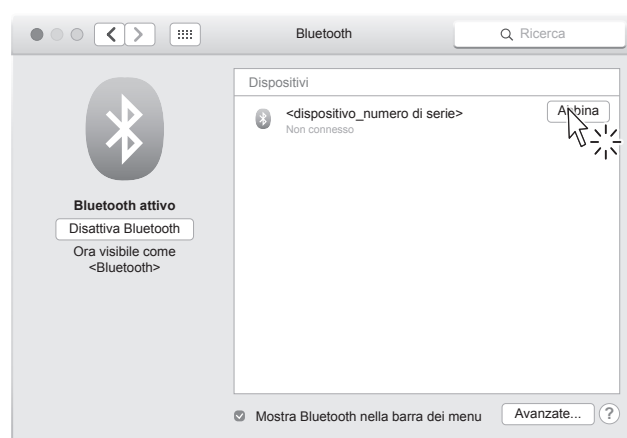
Invia file a dispositivo...
Sforgia file sul dispositivo...

Apri preferenze Bluetooth...



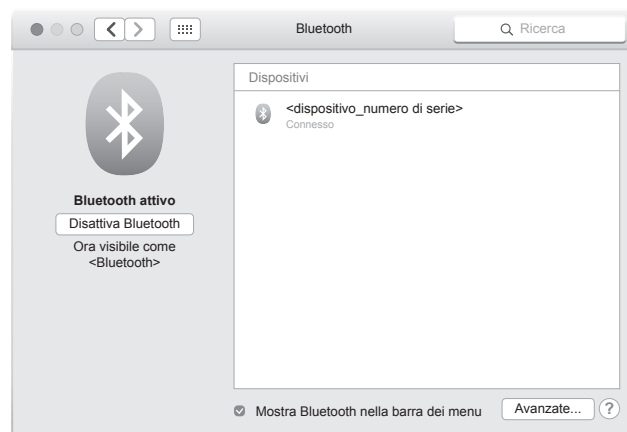
Nel menù a tendina cliccare
APRI PREFERENZE BLUETOOTH.

5



Individuare nell'elenco dei dispositivi proposti il proprio dispositivo (<dispositivo_numero di serie>) e cliccare il tasto ABBINA per eseguire l'associazione automatica.

6



Verificare che il vostro dispositivo figuri nell'elenco dei dispositivi abbinati.

6.3 Bluetooth pairing with mobile devices

1



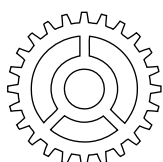
Turn on the printer (see [paragraph 4.3](#)).

2

Wireless.....: **Bluetooth**

Check that the “Wireless” parameter is set on “Bluetooth” (see [chapter 5](#)).

3



Press the **SETTINGS** icon on your mobile device.

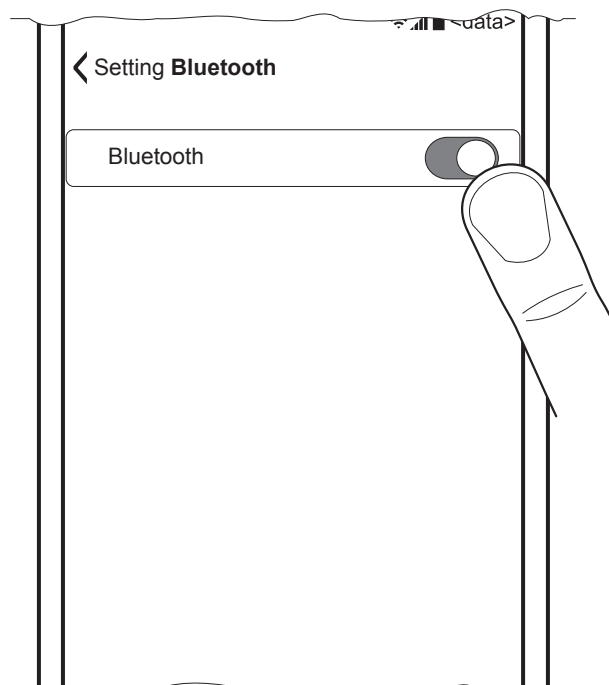
4



Bluetooth

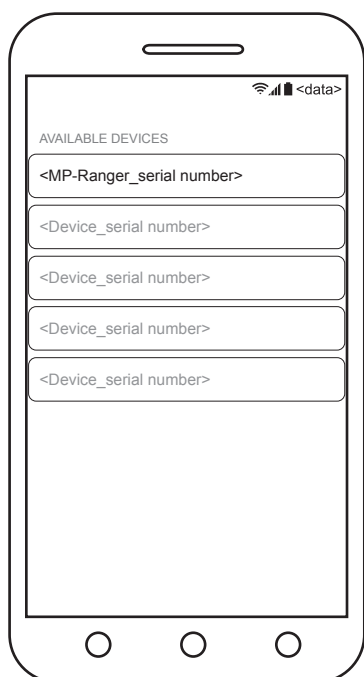
Press the Bluetooth icon.

5



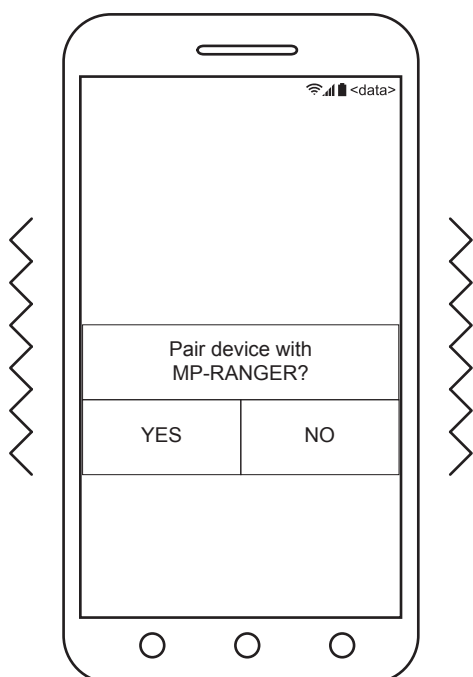
Move the switch to ON to enable the Bluetooth communication and start searching for available devices.

6



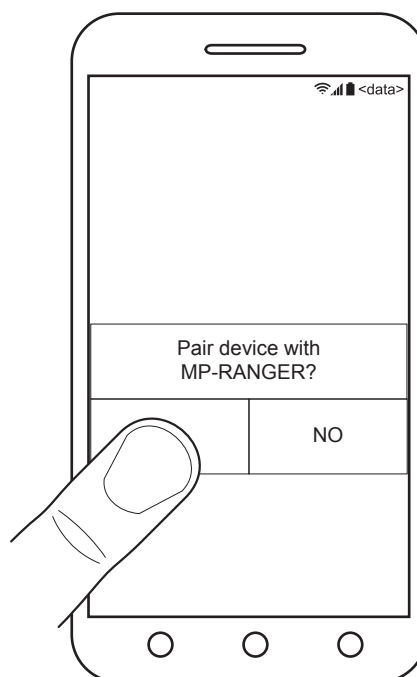
In the list of available devices,
locate your device
(<MP-Ranger_serial number>) and select it.

7



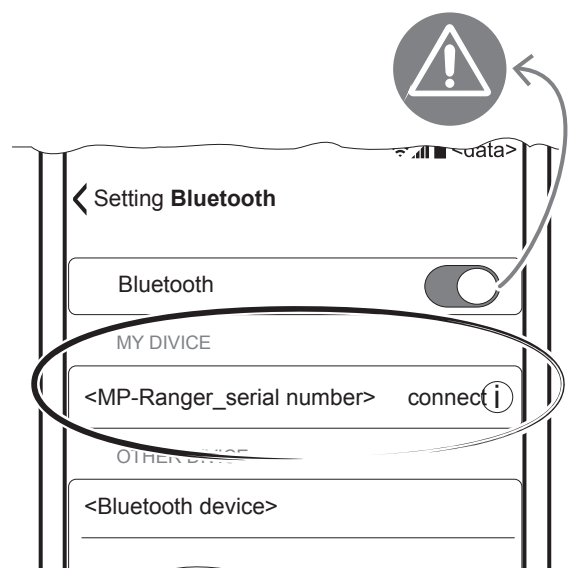
Once the printer is recognized,
the mobile device will vibrate and ask
association with the printer.

8



Confirm the association by pressing the YES key.

9



Once pairing is completed, do not turn
off Bluetooth communication. Otherwise,
communication will be interrupted.

6.4 Wi-Fi pairing with mobile devices

1



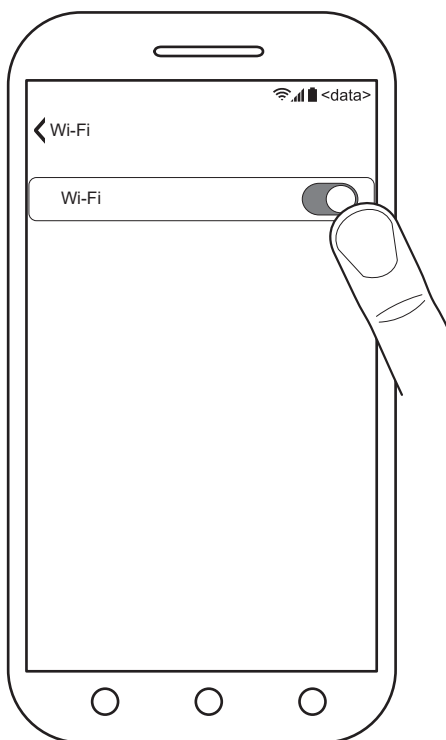
Turn on the printer (see [paragraph 4.3](#)).

2

Wireless.....: **Wi-Fi**
 SSID: **<name>**
 Password.....: **<password>**

Check that the “Wireless” parameter is set on “Wi-Fi” and set “SSID” and “Password” parameters (see [chapter 5](#)) to the values of the network you want to associate with.

3



Check that the same wireless parameters set on the printer are set on your mobile device or that the devices are connected to the same network.

6.5 Pairing with mobile devices equipped with NFC technology

1



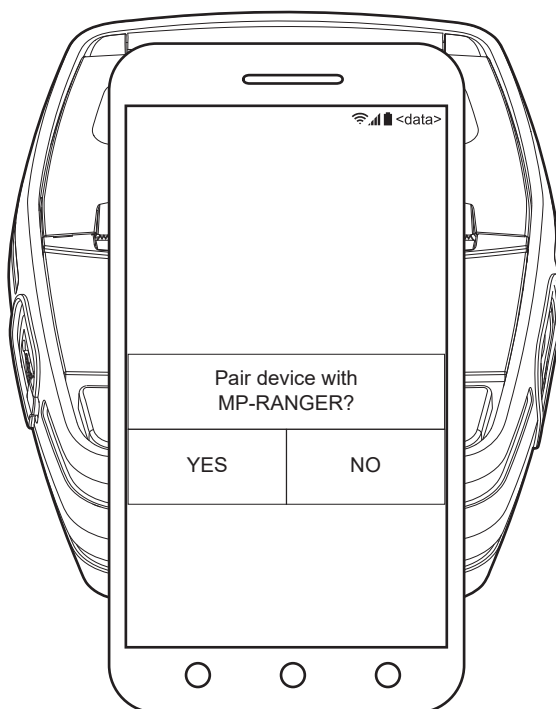
Turn on the printer (see [paragraph 4.3](#)).

2



Check that NFC is enabled on your mobile device.

3



Place your device on the printer and follow the procedure on the screen.





7 ALIGNMENT

The device is provided with a sensor for the alignment management in order to handle rolls of labels with a fixed length (see [paragraph 9.6](#)).

The alignment sensor assembled on the device is “reflection” sensor: this kind of sensor emits a band of light and detects the quantity of light reflected to it.

The presence of the gap between labels is detected evaluating the amount of light that arrives to the opposite sensor, considering that the white paper doesn't allow the beam of light to reach the receiver, whereas the translucent paper underlying (liner) lets the light to reach the receiver.

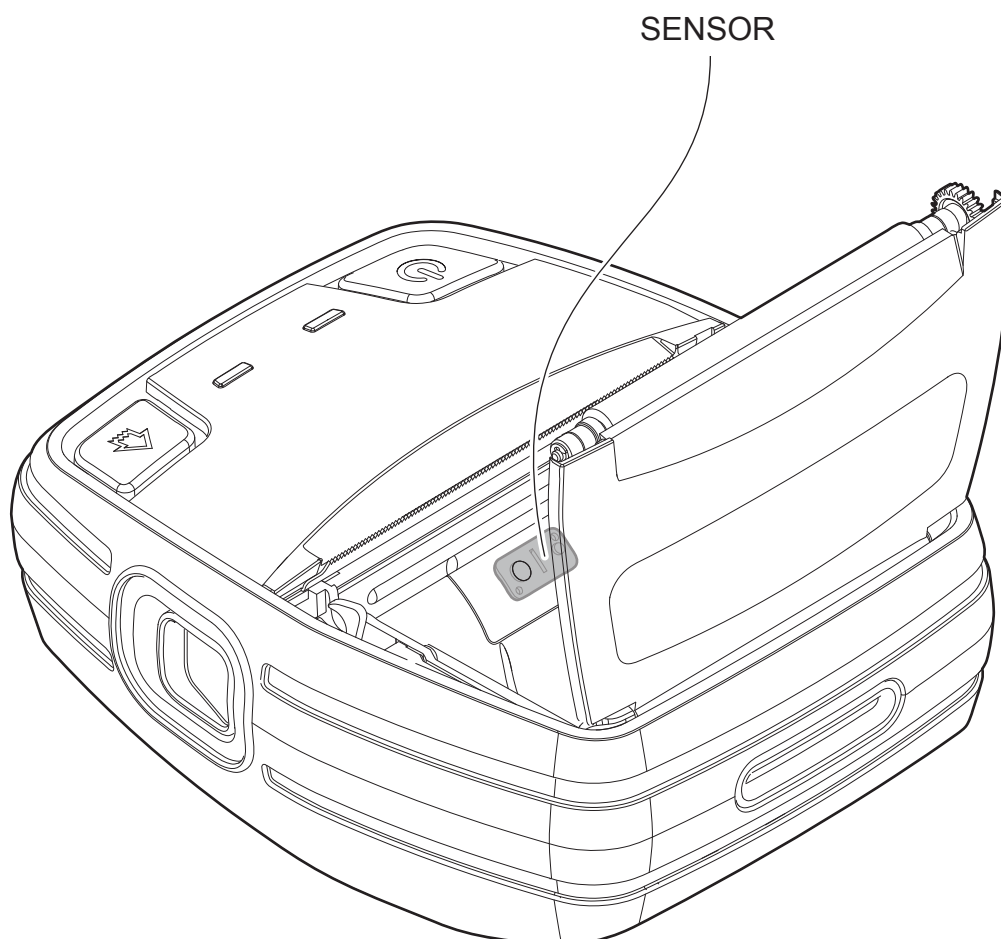
The following paragraphs show how to correctly set the configuration parameters of device in order to assure the alignment.

7.1 Enable alignment

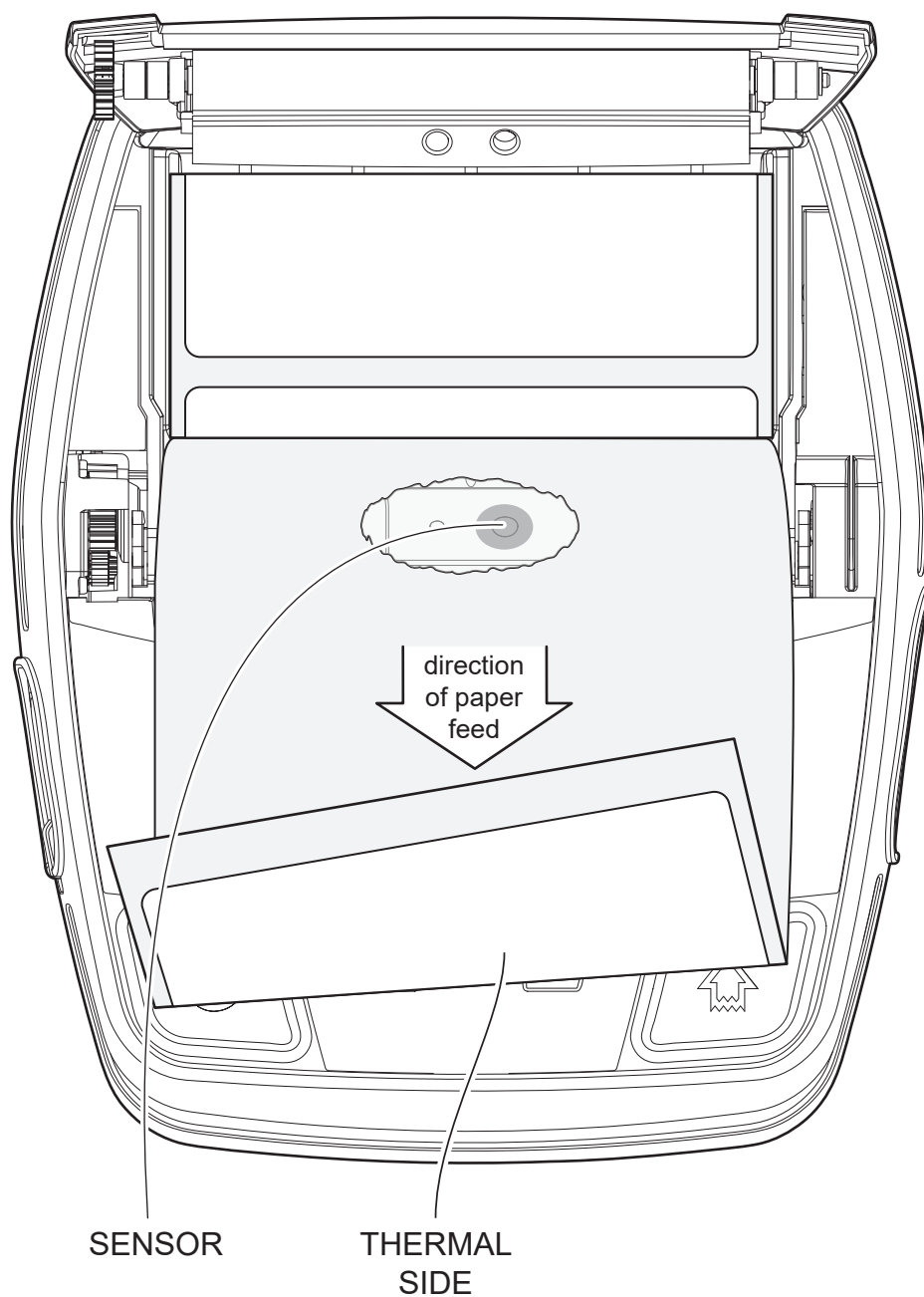
Device is provided with one fixed sensor for alignment, placed on the upper flat of device.

To guarantee proper alignment is necessary to enable the Black Mark Position parameter during the setup procedure (see [chapter 5](#)).

If the alignment does not work properly, perform the labels gap detection sensor autoset procedure (see [paragraph 7.2](#)).

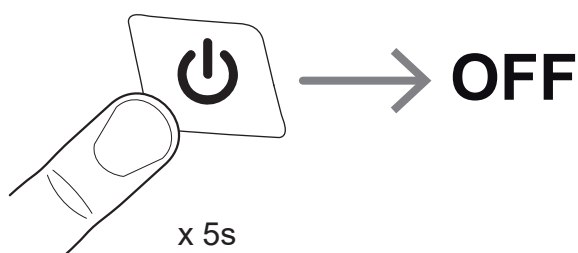


The following image shows the size of paper used and the sensor used for the alignment.



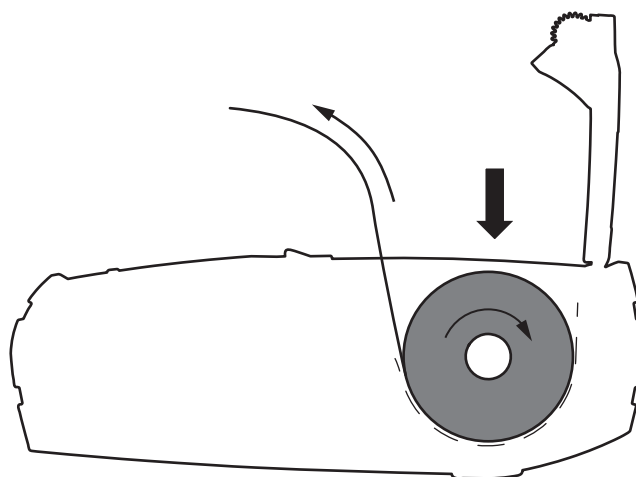
7.2 Labels gap detection sensor autoset procedure

1



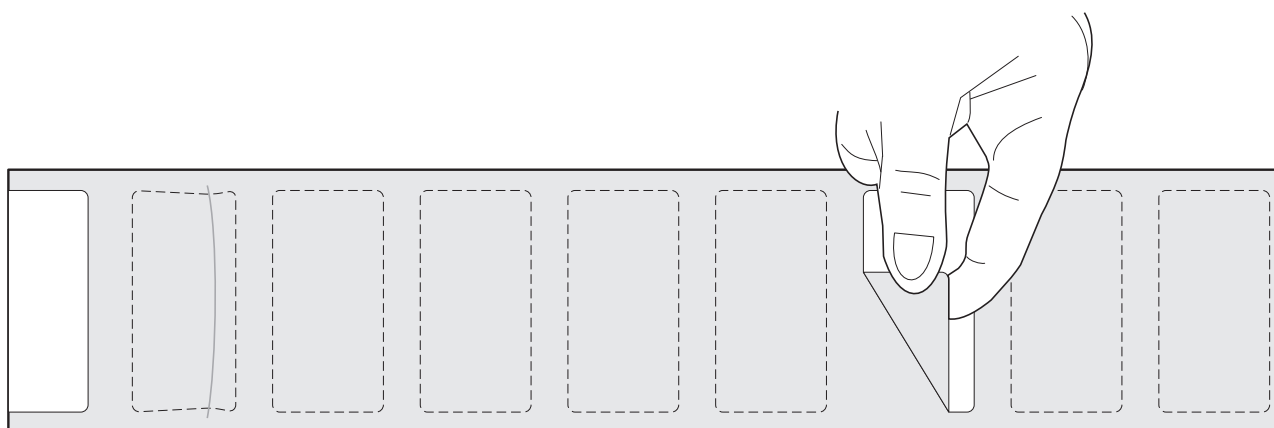
Turn off the device by holding down the ON/OFF key for about 5 seconds.

2



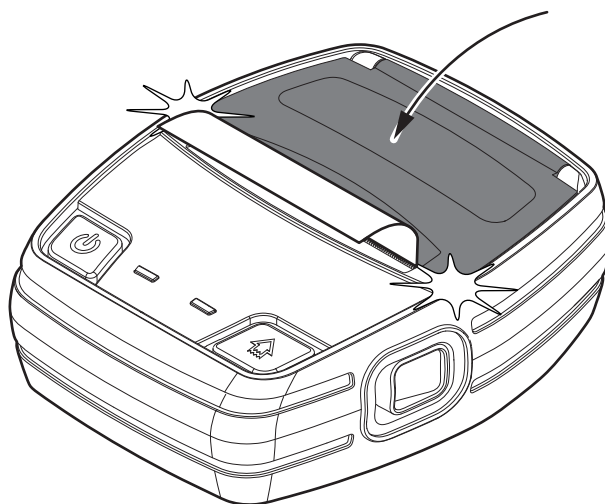
Open the device cover (see [paragraph 4.1](#)).
Place the roll in the paper compartment respecting the correct direction of rotation shown in figure and pull out the paper for a few centimetres.

3



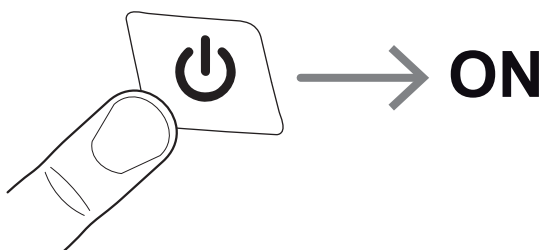
Remove all labels on the support near the paper compartment.
There should be no labels under the paper compartment cover for at least 30 centimeters.

4



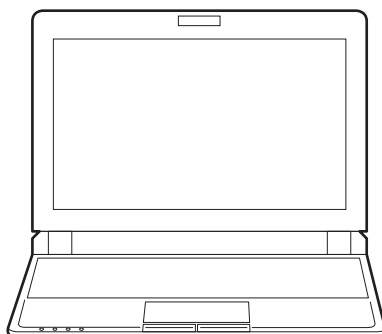
Close the device cover.

5



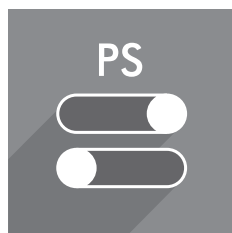
Turn on the device pressing the ON/OFF key.

6



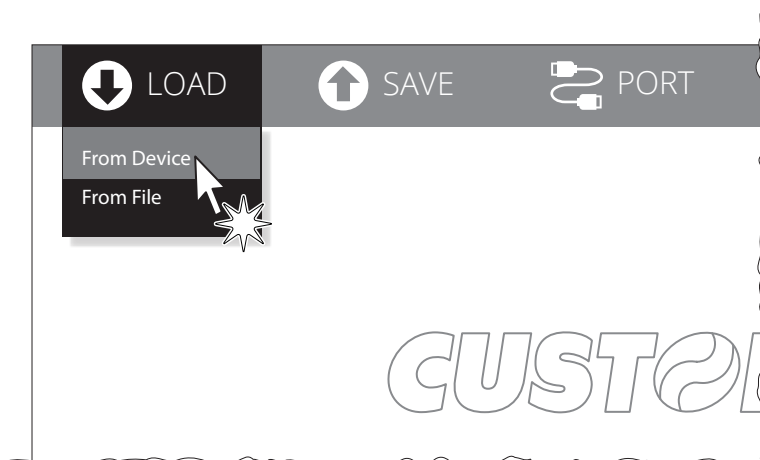
Connect the device to a PC directly (see [paragraph 3.2](#)), without using HUB devices.

7



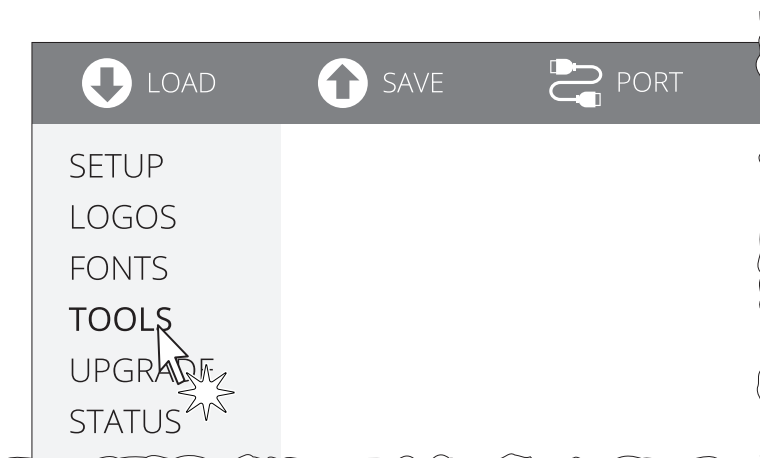
Start the “PrinterSet” software tool.

8



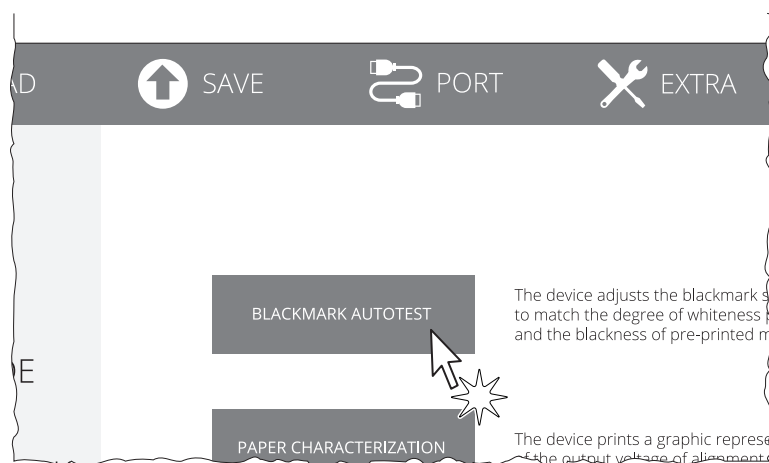
Click on LOAD > FROM DEVICE and select the device connected to the PC.

9



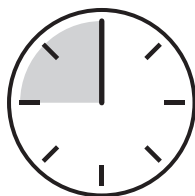
Click on TOOLS.

10



Click on BLACKMARK AUTOTEST.

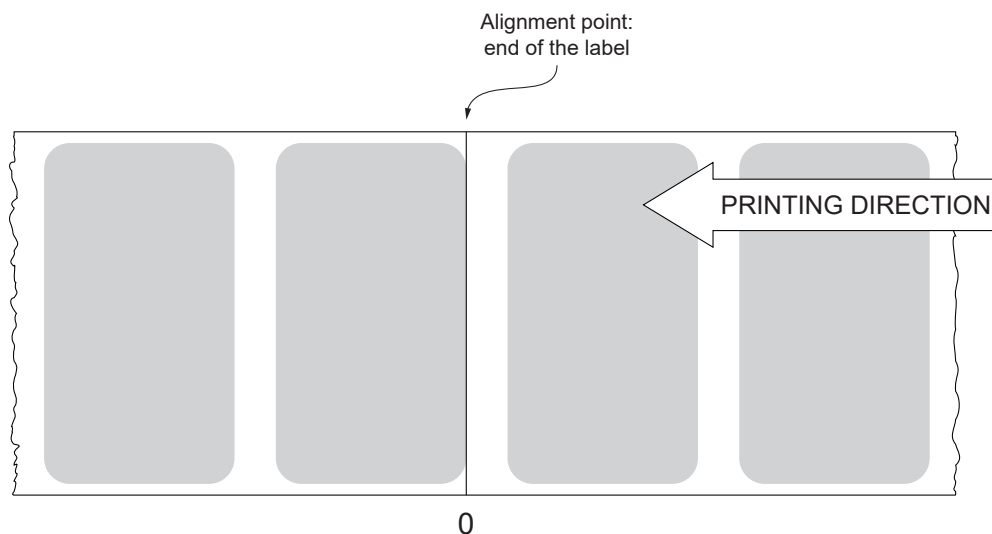
11



Attendere il completamento della procedura di autoset da parte del dispositivo.

7.3 Alignment parameters

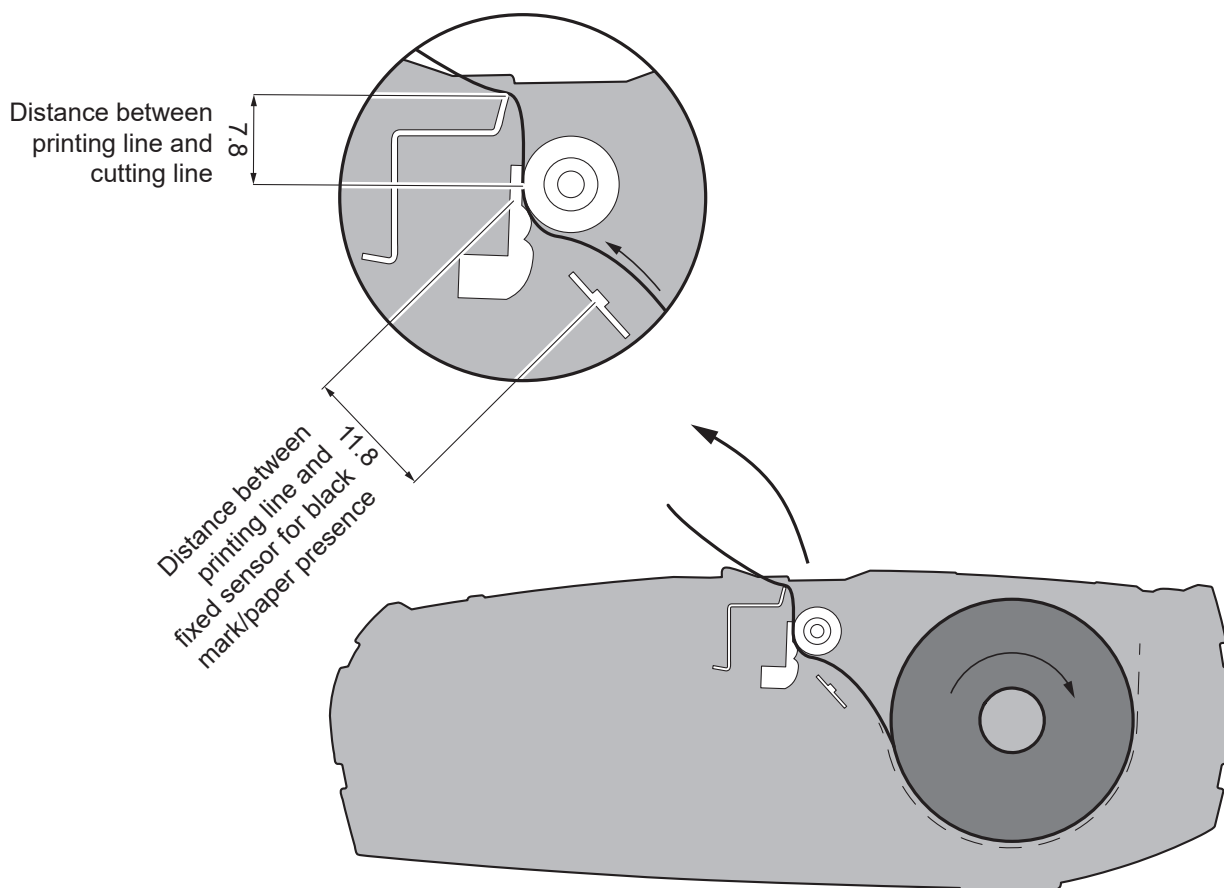
When you use paper with label, the “alignment point” is always meant as the label edge and match with the lower front of the gap between two labels. The gap width is automatically detected and measured by the sensor of the device.



To guarantee proper alignment is necessary to enable the Black Mark Position parameter during the setup procedure (see [chapter 5](#)).

The following figure shows a simplified section of the device with the paper path and the distances (in mm) between the alignment sensor, the print head, serrated blade (cutting line).

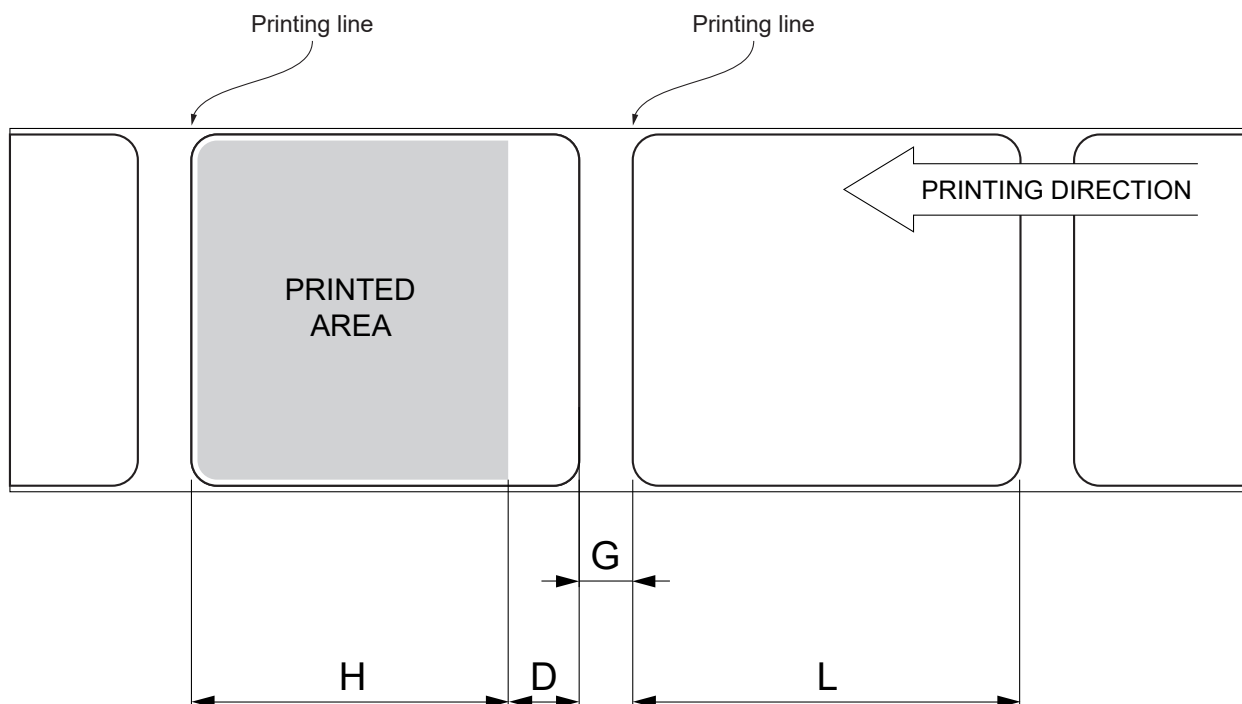
All the dimensions shown in following figure are in millimetres.



7.4 Printing area

In order to issue labels correctly printed and to not overlay printing to the next label (that will make it useless for the next alignment), it is important to well calibrate the length of the printing area according to the label length.

The following figure shows an example of printed labels:



H Distance between the first and the last print line, called “Height of the printing area”.

L “Label length”.

G Distance between two consecutive labels, called “Gap length”.

D Automatic feed for alignment at the next label edge.

To use all the labels on paper, you must comply with the following equation:

$$H \leq L$$

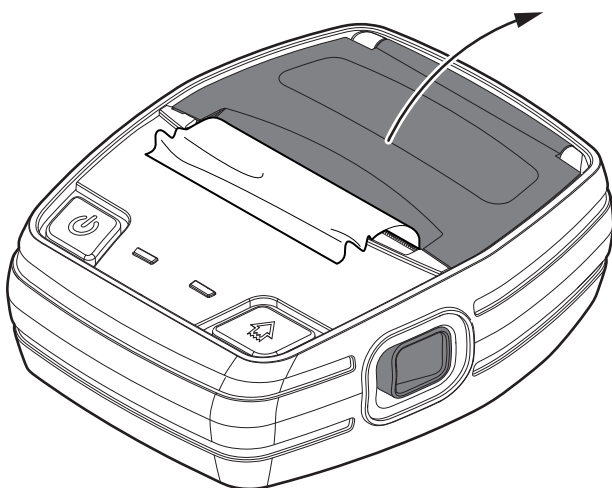
The height of the printing area (H) can be increased to make the progress on alignment (D) equal to the gap length but no further.



8 MAINTENANCE

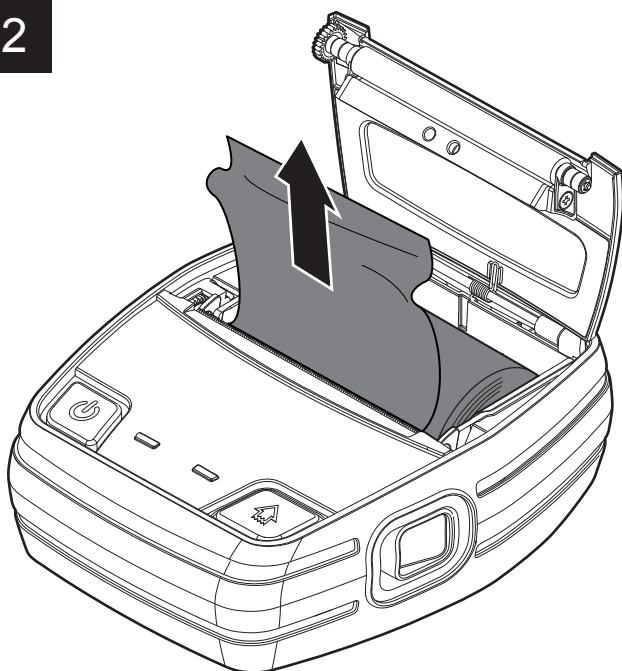
8.1 Paper jam

1



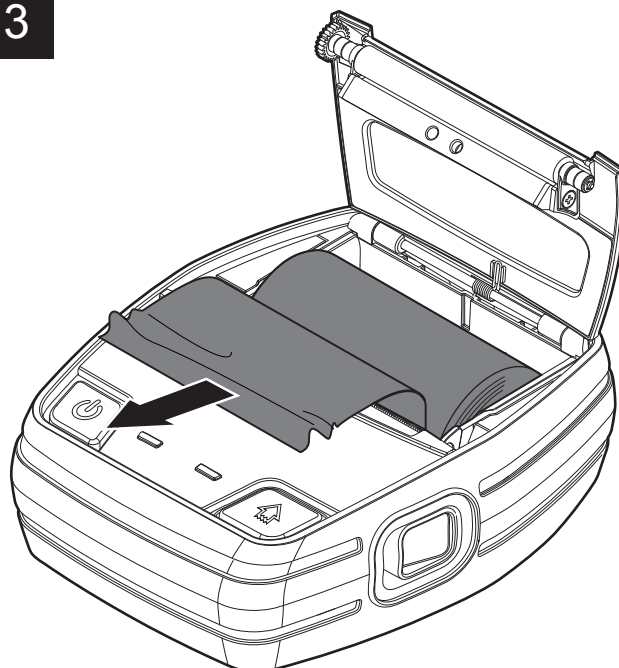
Open the cover of the device
(see [paragraph 4.1](#)).

2



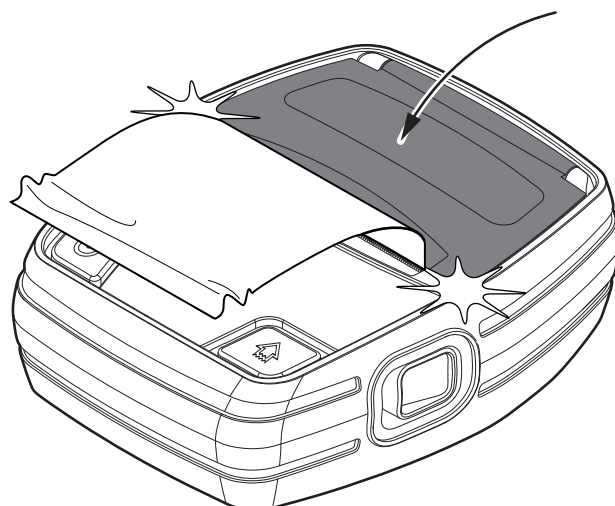
Lift the damaged paper, check and
remove any residual paper.

3



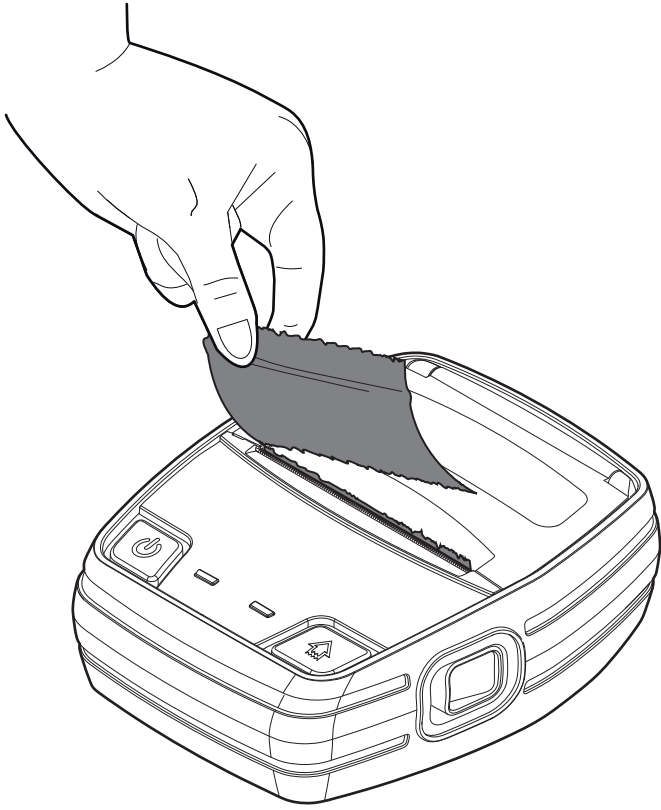
Pull the paper in order to have the damaged part
outside the device.

4



Close the cover of the device.

5

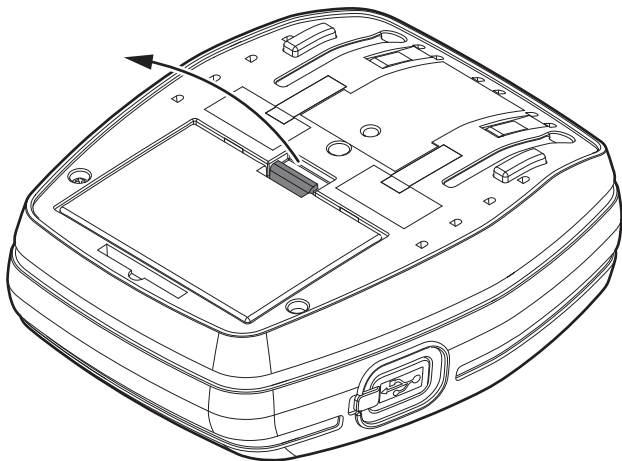


Tear off the excess paper.

8.2 Replacing the battery

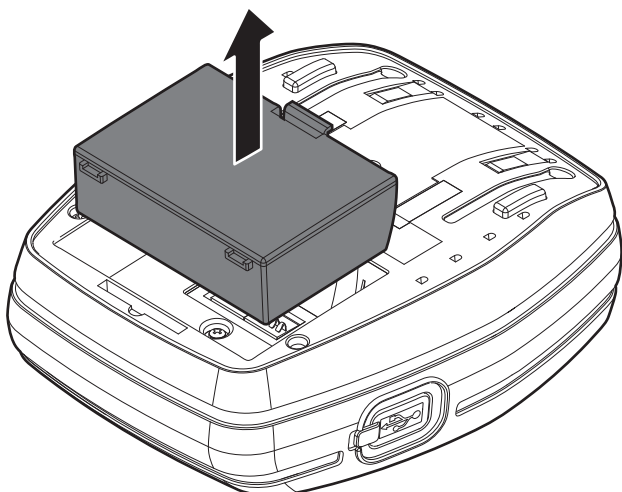
To replace the battery of the device proceed as follows:

1



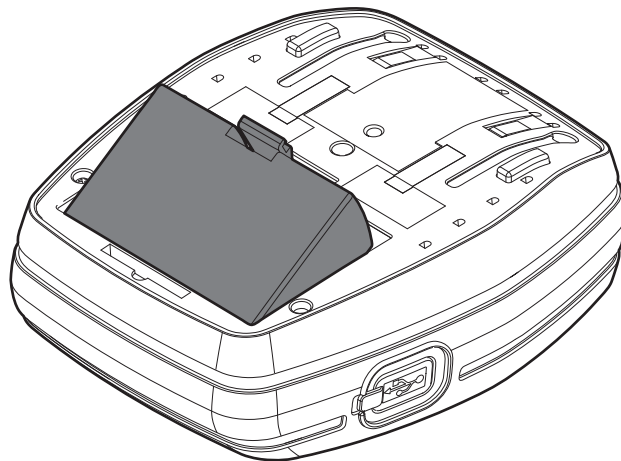
Lift up the battery hook
being careful not to damage it.

2



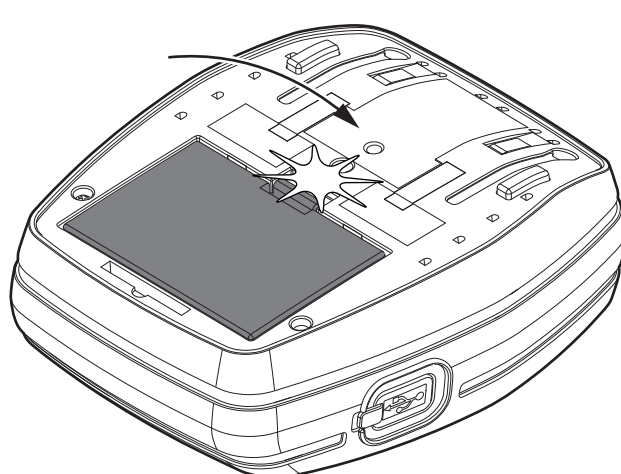
Remove the battery.

3



Place the new battery
in its seat.

4



Rotate the new battery
until it is blocked.



8.3 Planning of cleaning operations

The regular cleaning of the device keeps the print quality and extends its life.
The following table shows the recommended planning for the cleaning operations. If you use the device in dusty environments, you must reduce intervals between cleaning operations.

For specific procedures, see the following pages.

EVERY PAPER CHANGE	
Printhead	Use isopropyl alcohol
Platen roller	Use isopropyl alcohol
EVERY 5 PAPER CHANGES	
Paper path	Use compressed air or tweezers
Sensors	Use compressed air
EVERY 6 MONTHS OR AS NEEDED	
Case	Use compressed air or a soft cloth

8.4 Cleaning

To periodic cleaning of the device, see the instructions below

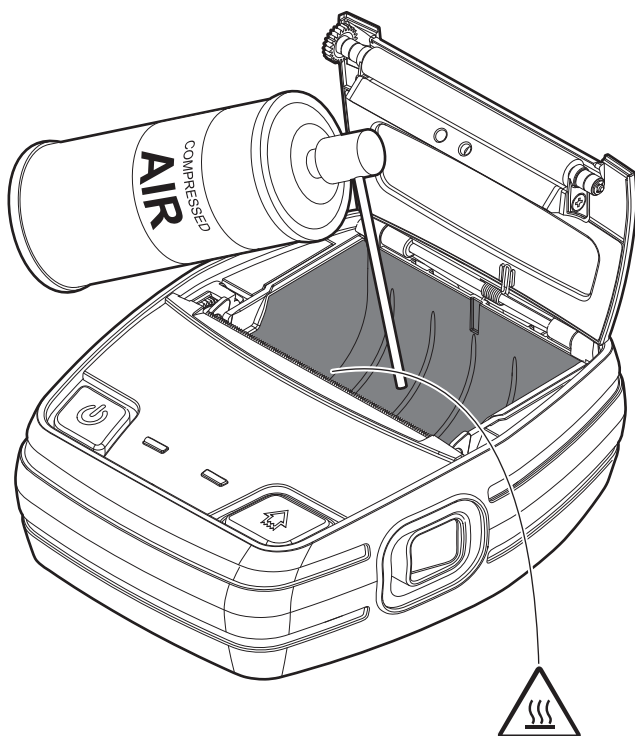
Paper path

1

→ OFF

Turn off the device (see [paragraph 4.3](#)) and open the cover (see [paragraph 4.1](#)).

2



ATTENTION:

Do not use alcohol, solvents, or hard brushes.
Do not let water or other liquids get inside the device.



Clean the area involved in the passage of paper by using compressed air.

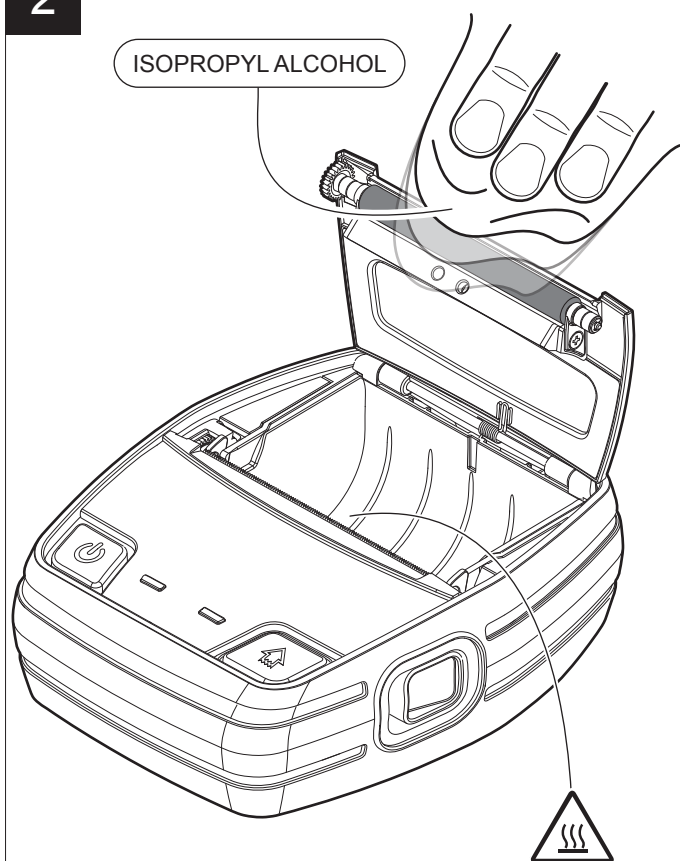
Printing roller

1

→ OFF

Turn off the device (see [paragraph 4.3](#)) and open the cover (see [paragraph 4.1](#)).

2



ATTENTION:

Do not use solvents, or hard brushes.
Do not let water or other liquids get inside the machine.



Clean the platen roller by using a non-abrasive cloth moistened with isopropyl.

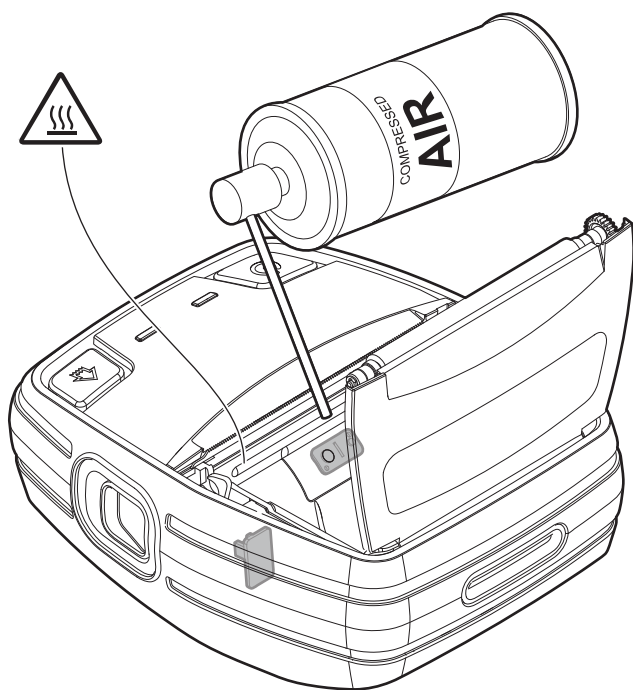
Sensor

1

→ OFF

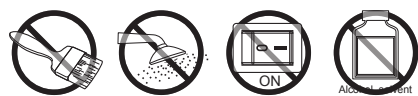
Turn off the device (see [paragraph 4.3](#)) and open the cover (see [paragraph 4.1](#)).

2



ATTENTION:

Do not use alcohol, solvents, or hard brushes.
Do not let water or other liquids get inside the device.



Clean the device sensors
by using compressed air.

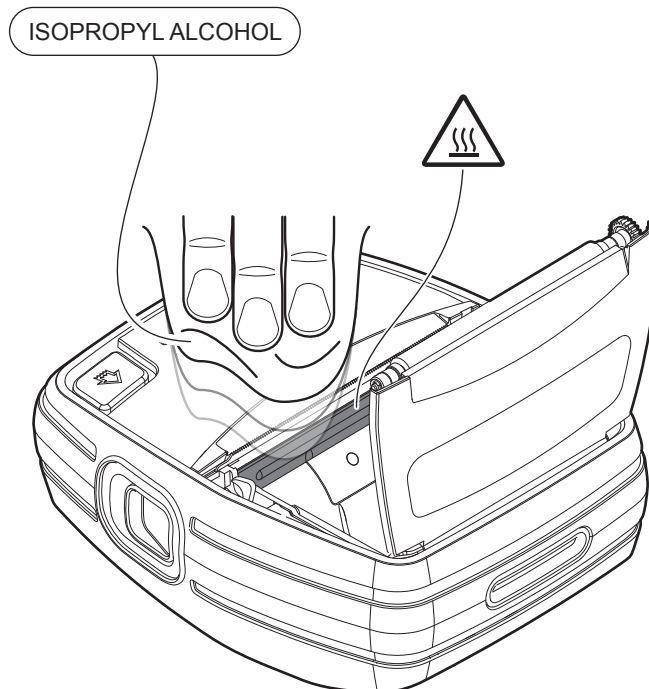
Printhead

1

→ OFF

Turn off the device (see [paragraph 4.3](#)) and open the cover (see [paragraph 4.1](#)).

2



ATTENTION:

Do not use solvents, or hard brushes.
Do not let water or other liquids get inside the machine.



Clean the printhead by using
a non-abrasive cloth moistened with isopropyl.

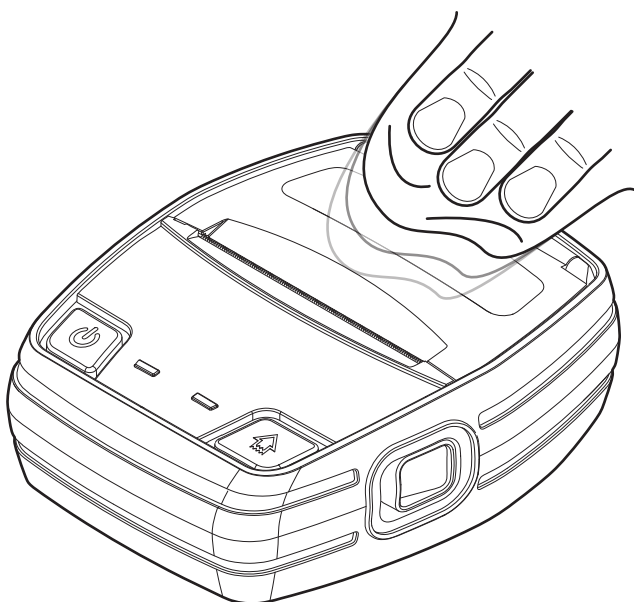
Case

1

→ **OFF**

Turn off the device (see [paragraph 4.3](#)).

2



ATTENTION:

Do not use alcohol, solvents, or hard brushes.
Do not let water or other liquids get inside the device.



To clean the device,
use compressed air or a soft cloth.

8.5 Firmware upgrade

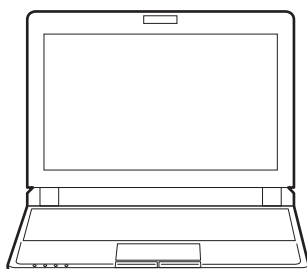
Firmware upgrade can be performed by using the “PrinterSet” software tool available on www.custom4u.it. To upgrade firmware, proceed as follows:

1



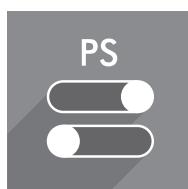
Login to the website www.custom4u.it, type in the product code of the device and download the latest firmware release available.

2



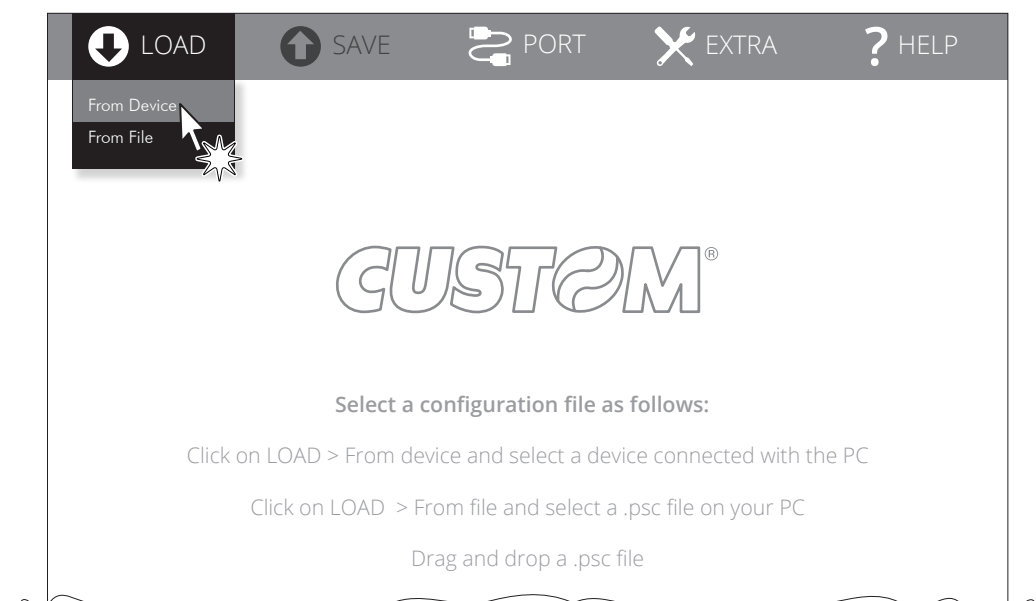
Connect the device to a PC directly (see [paragraph 3.2](#)), without using HUB devices.

3



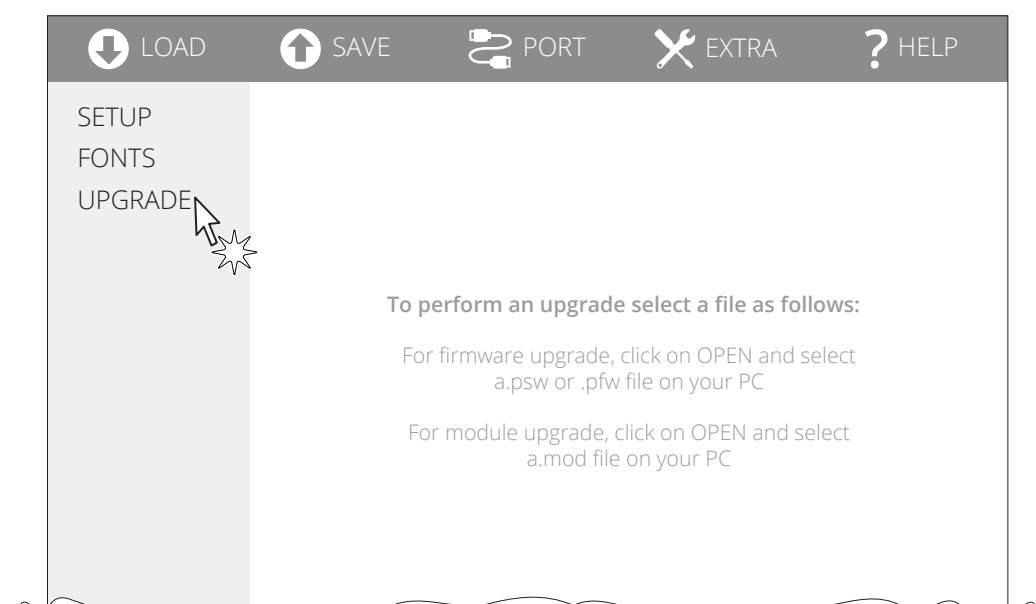
Start the “PrinterSet” software tool.

4



Click on LOAD > FROM DEVICE and select the device connected to the PC.

5



Click on UPGRADE and follow the instructions shown on the screen.

ATTENTION:

During saving, it is strongly discouraged to disconnect the communication cable or to remove the power supply of the PC or the device.





9 SPECIFICATION

9.1 Hardware specifications

GENERALS	
Sensors	Paper presence, alignment black mark presence, head temperature, cover open, NFC
Emulations	CUSTOM/POS
Printing driver	Windows 7 (32/64bit) Windows 8 (32/64bit) Windows 8.1 (32/64bit) Windows 10 (32/64bit)
Protection code	IP54
INTERFACES	
USB connector	USB type C 2.0 Full Speed
Bluetooth	Bluetooth 4.2
Wi-Fi	Wi-Fi 802.11 b/g/n
MEMORIES	
Receive buffer	16 kB
Flash memory	2 MB + 8 MB flash SPI
RAM memory	640 kB + 8 MB SDRAM
Graphic memory	3 MB for logos (max. width 576 dots) + 5 MB for fonts
DEVICE	
Resolution	203 dpi (8 dot/mm)
Printing width	72 mm
Printing method	Thermal fixed head
Printing speed ^{(2) (3) (4)}	High quality = 60 mm/s Normal = 80 mm/s High speed = 110 mm/s
Head life ⁽³⁾	
Abrasion resistance ⁽⁵⁾	50 km (with recommended paper, 12.5% duty cycle)
Pulse durability	100 M (referred to each dot)



Printing mode	Normal, 90°, 180°, 270°
Printing format	Height/Width from 1 to 8, bold, reverse, underlined, italic
Character fonts	54 character code tables (see paragraph 9.7), extended chinese GB18030-2000, korean PC949
Printable barcode	Codabar, Code 32, Code 39, Code 93, Code 128, EAN-8, EAN-13, GS1 DataBar Stacked, GS1 DataBar Stacked Omnidirectional, GS1 DataBar Expanded Stacked, ITF, UPC-A, UPC-E, Aztec, Aztec Rune, Data Matrix, PDF417, QRCode, Micro QRCode

PAPER

Type of paper	Thermal rolls, heat-sensitive side on outside of roll Labels on roll, thermal paper white (heat-sensitive side on outside of roll)
Paper width	76.2 mm or 80 mm
Paper weight	from 55 g/m ² to 100 g/m ²
Paper thickness	from 61 µm to 100 µm
Recommended types of paper	MITSUBISHI T8034
Paper end	Not attached to roll core
Roll outer diameter	max. 40 mm
Internal roll core diameter	25 mm ± 1
Paper end	Not attached to roll core
Core type	Cardboard or plastic

CONNECTABLE DEVICES

PC

Bluetooth device

DEVICE ELECTRICAL SPECIFICATIONS

Power supply from USB ⁽⁶⁾

Standard USB PC port	5 V, 0.5 A (Slow charge)
USB port with type-C adapter	5 V, 3 A
USB port with DCP adapter	5 V, 1.5 A



BATTERIES SPECIFICATIONS code 28D30000000014

Battery pack	Li-ion 7.2 V 2.6 Ah 18.72 Wh
--------------	------------------------------

Battery cycle	750
---------------	-----

Print autonomy	720 minutes x 300 tickets
----------------	---------------------------

POWER SUPPLY ELECTRICAL SPECIFICATIONS code 963GE020000120 and 963GE020000122 (optional)

Power supply voltage	from 100 Vac to 240 Vac 0.8 A (under minimum AC input and full load)
----------------------	---

Frequency	from 47 Hz to 63 Hz
-----------	---------------------

Output	5 V, 3 A
--------	----------

ENVIRONMENTAL CONDITIONS

Operating temperature ⁽⁷⁾	from -10 °C to +50 °C
--------------------------------------	-----------------------

Relative humidity (RH)	from 15% to 95% (w/o condensation)
------------------------	------------------------------------

Storage temperature	from -20 °C to +70 °C
---------------------	-----------------------

Storage relative humidity (RH)	from 10% to 90% (w/o condensation)
--------------------------------	------------------------------------

NOTES:

(1) : Control board.

(2) : It depends by the battery status, the printing typology and the environmental temperature.

(3) : Respecting the regular schedule of cleaning for the device components.

(4) : Standard CUSTOM receipt (L = 10 cm, Density = 12.5% dots on).

(5) : Damages caused by scratches, ESD and electromigration are excluded.

(6) : Use only certified USB-C power supplies for charging.

(7) : In charge from 0 °C to +25 °C.



9.2 Character specifications

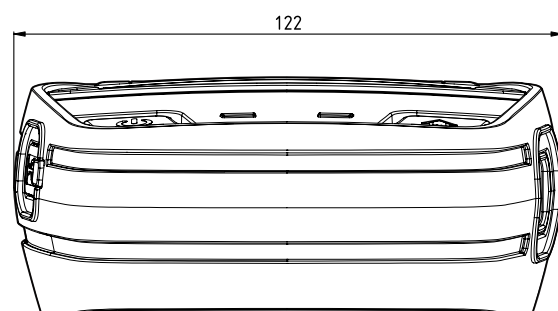
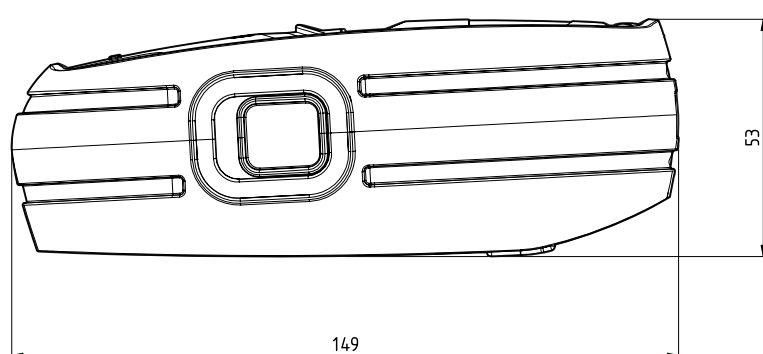
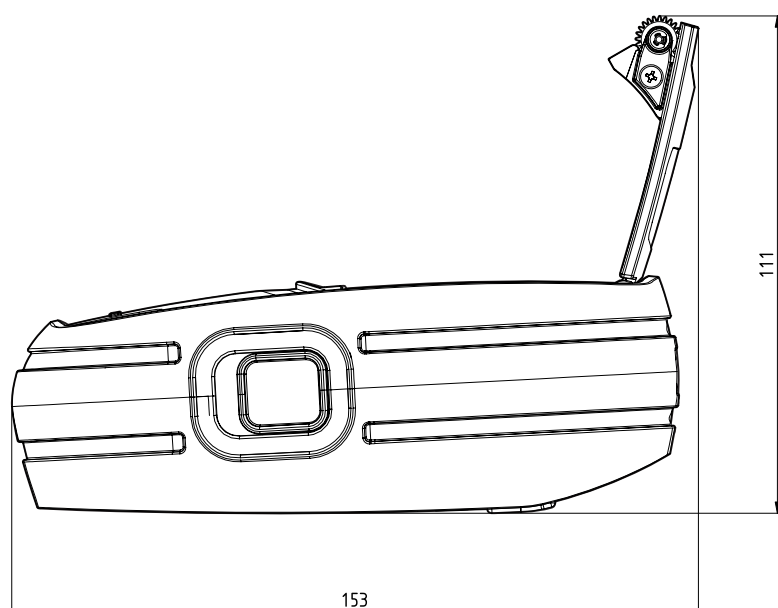
Character set	3		
Character density	11 cpi	15 cpi	20 cpi
Number of columns	32	42	64
Chars / s	1173	1540	2346
Lines / s	36	36	36
Characters (L x H mm)-Normal	2.25 x 3	1.625 x 3	1.25 x 3

NOTE: Theoretical values.

9.3 Device dimensions

Length	with cover closed 149 mm with cover opened 153 mm
Height	with cover closed 53 mm with cover opened 111 mm
Width	122 mm
Weight	475.2 g

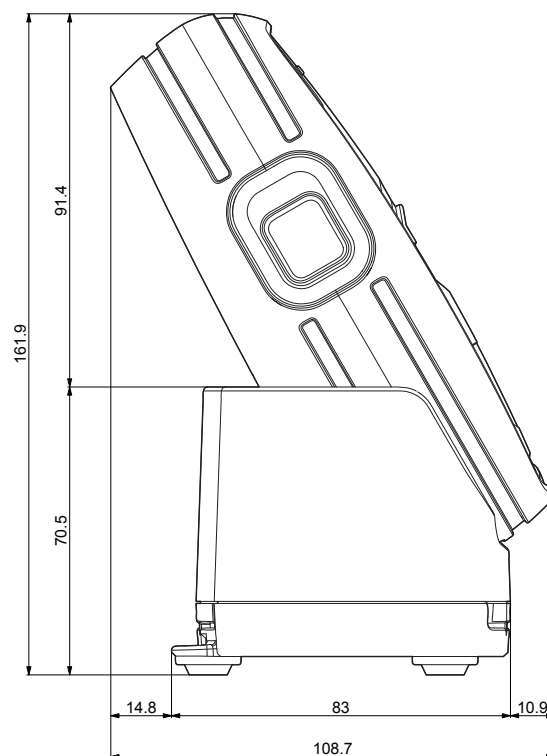
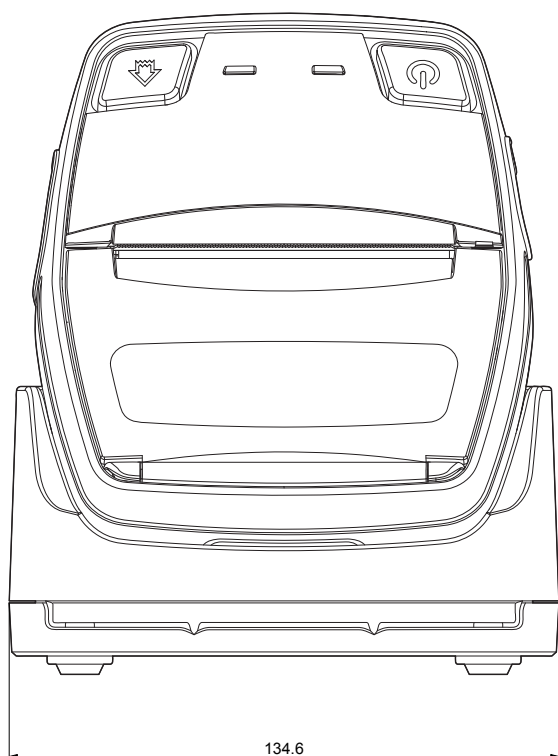
All the dimensions shown in following figures are in millimetres and referred to device without paper roll.



9.4 Device dimensions with single slot charging cradle code 977MM010000001 (optional)

Length	108.7 mm
Height	161.9 mm
Width	134.6 mm

All the dimensions shown in following figures are in millimetres.



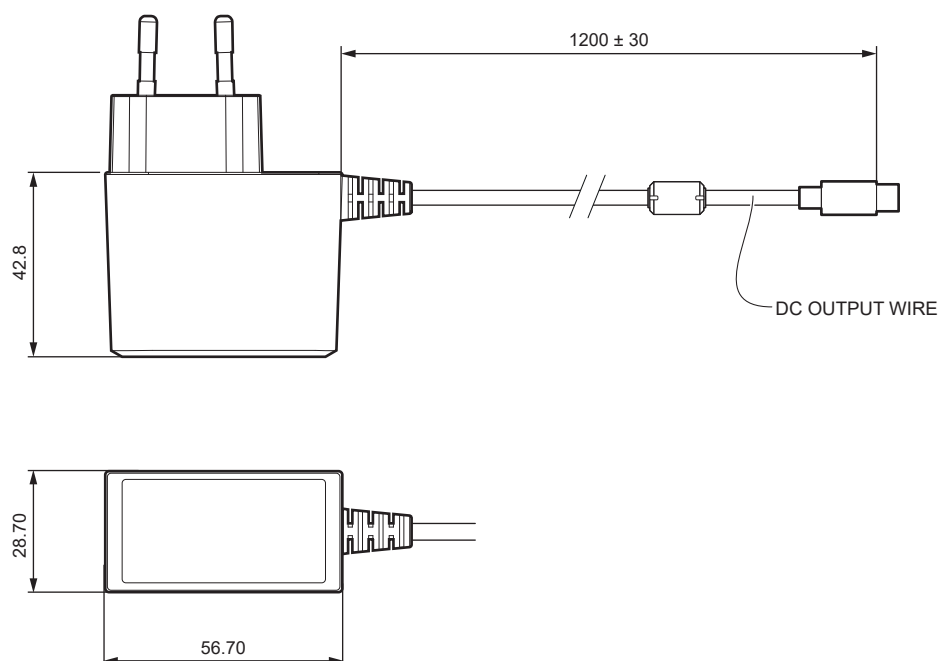
9.5 Power supply dimensions (optionals)

The following table shows the dimensions of the power supply optionals for the device:

POWER SUPPLY code 963GE020000120 and code 963GE020000122	
Length	56.7 mm
Height	42.8 mm
Width	28.7 mm

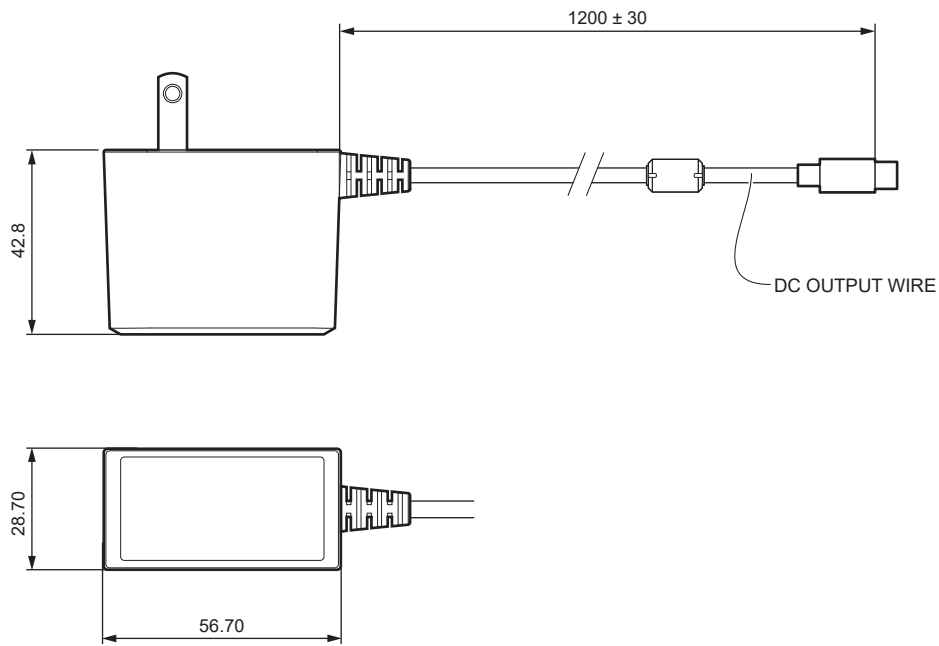
All the dimensions shown in following figures are in millimetres.

POWER SUPPLY code 963GE020000122





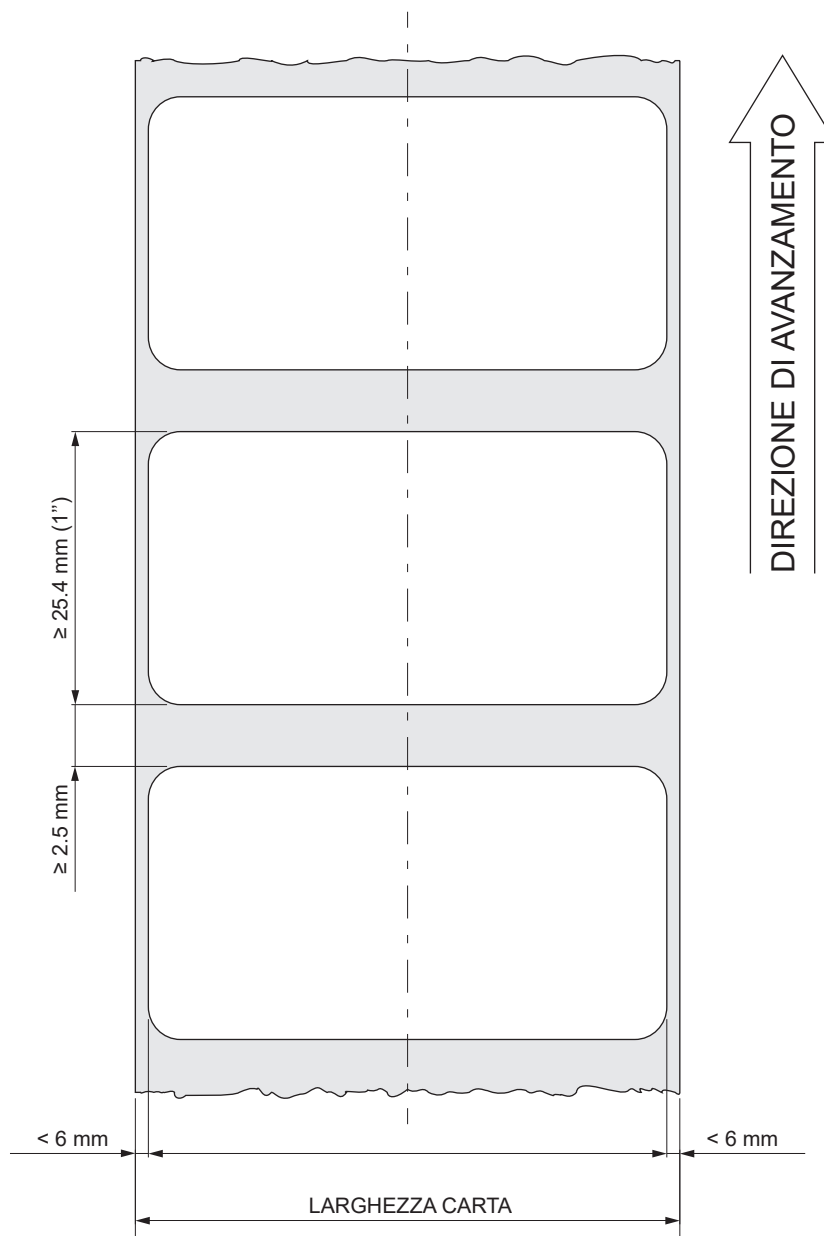
US PLUG POWER SUPPLY code 963GE020000120



9.6 Paper specification

To properly use the alignment commands, you need to use paper with labels that comply with the dimensions shown in the following figure that apply to all paper widths handled by the devices.

All the dimensions shown in following figures are in millimetres.





9.7 Character sets in CUSTOM/POS emulation

The device has 3 fonts of varying width (11, 15 and 20 cpi) which may be related one of the coding tables provided on the device.

To know the coding tables actually present on the device, you need to print the font test (see [paragraph 2.5](#)).

You can set font and coding table by using the “Code Table” and the “Chars/Inch” parameters during the setup procedure (see [paragraph 5.6](#)).

The following is the full list of coding tables that can be installed on the device.

<CodeTable>	Coding table	
0	PC437 - U.S.A., Standard Europe	
1	Katakana	
2	PC850 - Multilingual	
3	PC860 - Portuguese	
4	PC863 - Canadian/French	
5	PC865 - Nordic	
6	VISCII - Vietnamese Standard Code	
11	PC851 - Greek	on request
12	PC853 - Turkish	on request
13	PC857 - Turkish	
14	PC737 - Greek	
15	ISO8859-7 - Greek	on request
16	WPC1252 - Scandinavian	
17	PC866 - Cyrillic 2	
18	PC852 - Latin 2	
19	PC858 per simbolo Euro in posizione 0xD5	
20	KU42 - Thai	
21	TIS11 - Thai	on request
26	TIS18 - Thai	on request
30	TCVN_3 - Vietnamese	on request
31	TCVN_3 - Vietnamese	on request
32	PC720 - Arabic	on request
33	WPC775 - Baltic Rim	on request



<CodeTable>		Coding table
34	PC855 - Cyrillic	
35	PC861 - Icelandic	on request
36	PC862 - Hebrew	
37	PC864 - Arabic	
38	PC869 - Greek	on request
39	ISO8859-2 - Latin 2	on request
40	ISO8859-15 - Latin 9	on request
41	PC1098 - Farsi	
42	PC1118 - Lithuanian	on request
43	PC1119 - Lithuanian	on request
44	PC1125 - Ukrainian	
45	WPC1250 - Latin 2	
46	WPC1251 - Cyrillic	
47	WPC1253 - Greek	
48	WPC1254 - Turkish	
49	WPC1255 - Hebrew	
50	WPC1256 - Arabic	
51	WPC1257 - Baltic Rim	
52	WPC1258 - Vietnamese	
53	KZ1048 - Kazakh	
255	Space page	

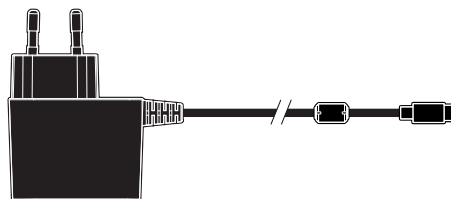


10 ACCESSORIES

The following table shows the list of available accessories for device:

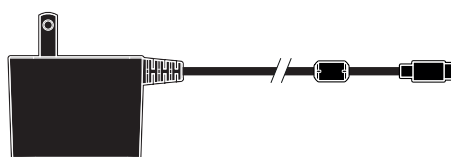
963GE020000122

POWER SUPPLY
(for technical specifications, see [paragraph 9.1](#))



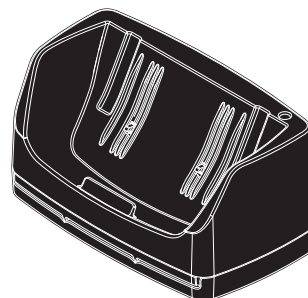
963GE020000120

US PLUG POWER SUPPLY
(for technical specifications, see [paragraph 9.1](#))



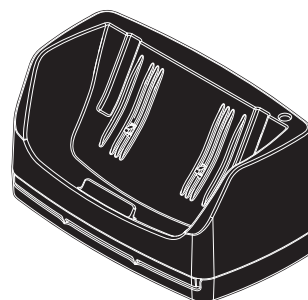
977MM010000001

SINGLE SLOT CHARGING CRADLE



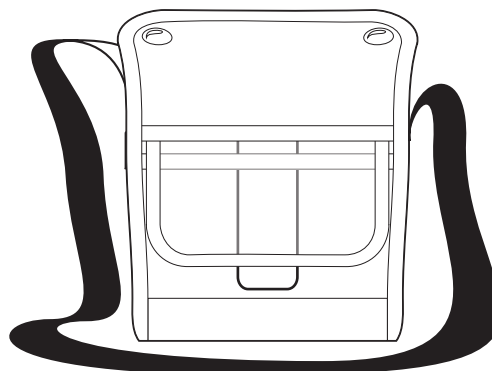
977MM010000005

US PLUG SINGLE SLOT CHARGING CRADLE



970MM010000001

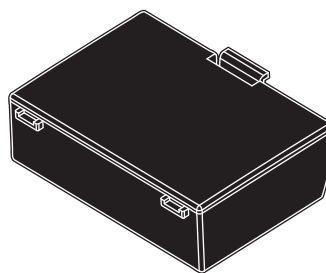
PROTECTIVE CASE WITH SHOULDER STRAP





28D30000000014

2600 mAh Li-ion RECHARGABLE BATTERY





11 TROUBLESHOOTING GUIDE

TROUBLE	PAGE
DEVICE DOES NOT TURNS ON	
Press the ON / OFF. The status LED flashes green.	27
Connect the battery pack correctly	65
Recharge the battery and retry	28
Replace the battery	65
PAPER DOES NOT FEED	
Check that the paper roll follows the rotation direction indicated and be sure the paper compartment cover is correctly closed	30
Clean the platen roller	67
Recharge the battery and retry	28
WRONG SIGNAL OF PAPER END	
Check that the paper roll follows the rotation direction indicated.	30
If the parameter Black Mark Position is enabled, but using paper without black mark, the printer is unable to recognize the end of the paper. Disable the parameter.	43
If the parameter Black Mark Position is disabled, but using paper with black mark, the device may recognize the black mark as the end of the paper. Enable parameter.	43
BAD PRINT	
Check the paper specifications	73
Set the parameter Print Density on a higher value	41
Set the parameter Speed/Quality on the Normal value	41
Clean the printhead	67
Recharge the battery and retry to print	28
Replace the battery	65



TROUBLE	PAGE
PARTIAL OR ABSENT PRINT	
Be sure the paper roll is correctly inserted	30
Be sure the paper compartment cover is correctly closed	30
Clean the printhead	67
Recharge the battery and retry to print	28
Replace the battery	65
REDUCED BATTERY LIFE	
Connect the battery pack correctly	65
Recharge the battery	28
Replace the battery pack	65
COMMUNICATION ERROR	
If you use the USB port, verify that the connection is correct	22
If you are using Bluetooth connection, verify the Bluetooth settings on the device	39
If you are using Wi-Fi connection, verify the Wi-Fi settings on the device	39
Restart the device	27
Recharge the battery and retry to print	28
Enter the Hexadecimal dump mode and send a command	44



12 TECHNICAL SERVICE

In case of failure, contact the technical service accessing the website www.custom4u.it and using the support tools on the homepage. It is advisable to keep the identification data of the product at hand.

The product code, the serial number and the hardware release number can be found on the product label (see [paragraph 2.4](#)). The firmware release number (SCODE) can be found:

- on the setup report (see [paragraph 5.1](#))
- connecting the device to a PC and starting the “PrinterSet” tool (see [paragraph 5.2](#))





CUSTOM S.p.A.

World Headquarters

Via Berettine, 2/B - 43010 Fontevivo, Parma ITALY

Tel. +39 0521 680111 - Fax +39 0521 610701

info@custom.biz - www.custom.biz

All rights reserved

www.custom.biz