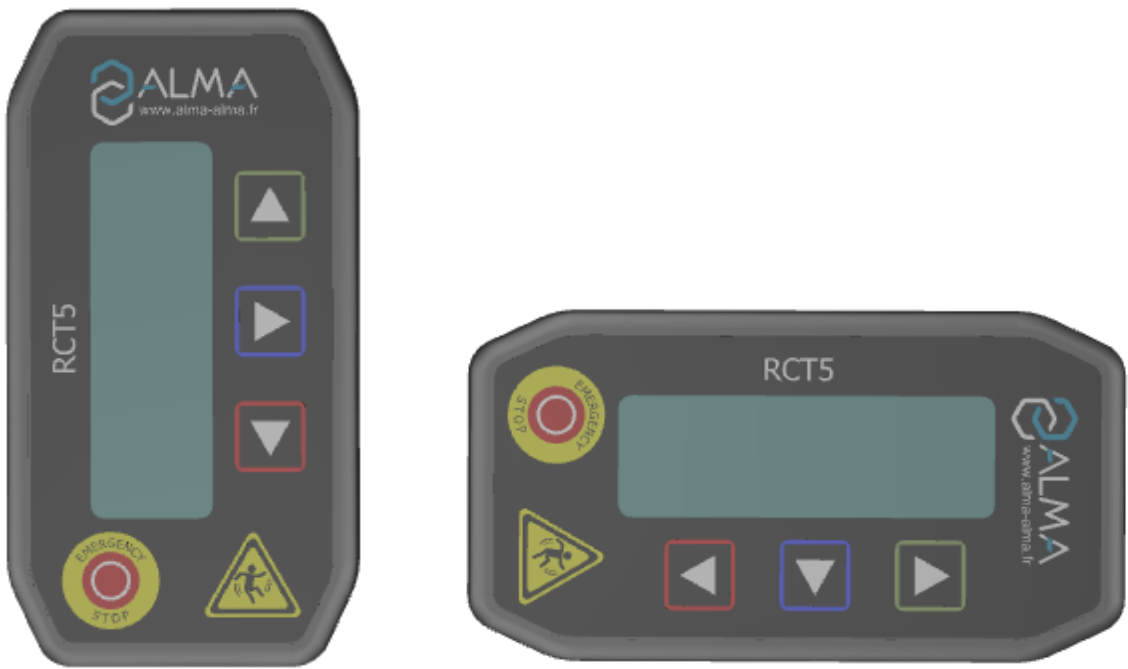


INSTALLATION GUIDE

DI 028 EN A

Remote control RCT5




A	2023/07/21	Creation of the document	TABTI-BENHARI	NC
Issue	Date	Nature of modifications	Written by	Approved by

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1. GENERAL RECOMMENDATIONS

IN ORDER TO AVOID ANY PROBLEMS CONCERNING THE INSTALLATION, THE USE AND THE MAINTENANCE OF THE EQUIPMENT, WHICH COULD CREATE UNTIMELY DYSFUNCTIONS,

PLEASE OBSERVE THE FOLLOWING RECOMMENDATIONS.


BEFORE ANY INTERVENTION, MAKE SURE THAT THE EQUIPMENT IS DE-ENERGIZED.

1.1. MECHANICAL RECOMMENDATIONS

- ⇒ Respect the recommendations of the instruction manual specifying the conditions of installation, use and maintenance of ATEX equipment (instruction manual delivered with the equipment).
- ⇒ Be sure to place the equipment in such a way as to facilitate its installation, use and maintenance by the workers (work ergonomics)
- ⇒ Be sure to orientate equipment with a display correctly. The display must be readable by the operator without difficulty.
- ⇒ Apply tightening torque appropriate to the size and material of the fastener unless otherwise specified on the layout drawings or in the installation records.
- ⇒ Mechanically protect the cables with corrugated sheathing if the cables are not ADR (corrugated sheathing adapted to "transport of dangerous goods by road" vehicles - hydrocarbons, LPG ... - and in compliance with the French standard NF R 13-903 or refer to the regulations in force).
- ⇒ Make sure that the cable glands and the cables are mechanically tight and that there is a good seal between the cable glands and the corrugated sleeves.
- ⇒ Respect the bending radii of the cables and sheaths.
- ⇒ Leave enough freedom to the conductors, to avoid all risks of tearing.
- ⇒ Allow the evacuation of water in the low loop (siphon) of the ringed ducts (no retention of water inside the ducts).

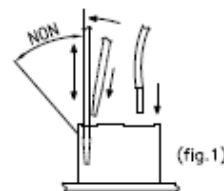



See § ADRIANE TURBINE MOUNTING AND SEALING ADVICE.

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1.2. ELECTRICAL RECOMMENDATIONS

- ⇒ With regard to the ATEX or the standards applicable in the country of destination, the degree of protection of the equipment must be adapted to the zone in which it is installed (explosive atmospheres).
- ⇒ Respect the recommendations of the instruction manual specifying the conditions of installation, use and maintenance of ATEX equipment (instruction manual delivered with the equipment).
- ⇒ Connect downstream of the circuit breaker, on the supply reserved for the measured distribution, the equipment supplies.
- ⇒ Install a 5A time-delayed protection upstream of the 24VDC power supply to protect the equipment in case of polarity inversion or overcurrent.
- ⇒ Use specific ADR cable, if this is not the case, use cable that is at least resistant to "RH" hydrocarbons and protect it mechanically with corrugated sheathing (corrugated sheathing adapted to "transport of dangerous goods by road" vehicles - hydrocarbons, LPG, etc. - and in compliance with the French standard NF R 13-903 or refer to the regulations in force)
- ⇒ Take care not to damage the terminal blocks of the various electronic boards when making connections.
 - Screw terminal : Do not damage the screw heads of the terminal blocks.
 - Use insulated cable lugs and ferrules suitable for the cable section.
 - Spring terminals: do not block the springs (blocking a spring on one of the terminals will result in the replacement of the electronic board).
 - Use a flat screwdriver 0.4x2.5 (see fig.1).
 - Insert the screwdriver at a slight angle, then push it in perpendicular to the terminal.
 - Do not go beyond the vertical when the screwdriver is pushed in to avoid blocking the spring.
 - Insert or remove the cable and remove the screwdriver.
- ⇒ Pass the power supply cables (24VDC truck) through the ferrites by making a loop (ALMA supply).
- ⇒ Do not use cables with a section greater than 1.5mm².
- ⇒ Do not insert more than one tip per terminal (unless specifically indicated by ALMA), use a double tip if necessary.
- ⇒ Strictly respect the polarities of the inputs/outputs when making connections, in accordance with the silk-screen printing on the cards and/or the indications in the installation file.
- ⇒ If possible, perform a wire test after wiring.
- ⇒ Respect, as far as possible, the location of the cables recommended in the installation file.
- ⇒ Connect each equipment (external ground) to the chassis ground.
- ⇒ Prefer the shielding of the shielded cables on 360° in the metallic cable glands (see doc. delivered with the equipment).
If not, connect the shields to the devices inside the equipment (earth terminal, earth bar, earth studs, etc.).



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- ⇒ Locate, as far as possible, the cables and conductors according to the installation file in order to facilitate the various interventions after installation.
- ⇒ Respect a homogeneous color coding of the cables.
- ⇒ Colour coding according to DIN 47100.
- ⇒ Colour designation code in accordance with IEC 60757 (except french abbreviations) :

FR				EN	IT	ES	DE
Couleurs	Codes		Norme CEI 60757	Colours	Colori	Colores	Farbe
Blanc	Bc		WH	White	Bianco	Blanco	Weiß
Marron	Mr		BN	Brown	Marrone	Marrón	Braun
Vert	Vt		GN	Green	Verde	Verde	Grün
Jaune	Jn		YE	Yellow	Giallo	Amarillo	Gelb
Gris	Gr		GY	Grey	Grigio	Gris	Grau
Rose	Rs		PK	Pink	Rosa	Rosa	Lila
Bleu	Bl		BU	Blue	Blu	Azul	Blau
Rouge	Rg		RD	Red	Rosso	Rojo	Rot
Noir	Nr		BK	Black	Nero	Negro	Schwarz
Violet	Vi		VL	Violet	Viola	Violeta	Violett
Orange	Or		OG	Orange	Arancio	Naranja	Orange
Vert/Jau ne	V/J		GNYE	Green/Yell ow	Verde/Gial lo	Verde/Amar illo	Grün/Gelb

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2. GENERAL PRESENTATION

The RCT5 remote control is to manage the MICROCOMPT+ remotely.




Its screen and the red, green and blue buttons allow the user :

- to navigate in the menus,
- to display the measurement information.


Safety functions such as emergency stop and deadman switch are controlled by the corresponding buttons.

3. NOMENCLATURE

3.1. SIMPLE NOMENCLATURE

MATERIALS DELIVERED BY ALMA		
Item	Material	Description
1		RCT5 remote control
1		Load support
1		GNSS antenna
Option* : Material(s) sold as an option by ALMA. Does not exempt the installation of this (these) material(s) on the measurement set if the certificate requires it.		

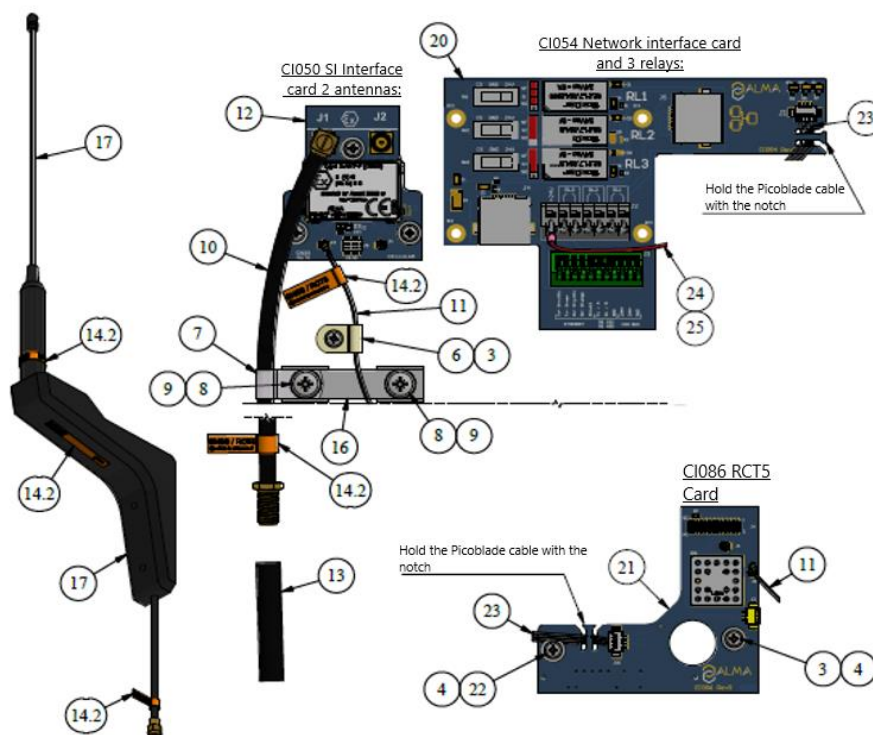
Non-contractual photos

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4. RCT5 INSTALLATION PLAN

4.1. SETTING UP THE RCT5

NOTE : The RCT5 can only be fitted to MICROCOMPT+ without an integrated RCT5 option.



Rep	Qty	Article description
3	5	CBLZ screw M3x6 (ISO 7045-Z)
4	5	M3 corrugated washer (DIN 137)
6	1	Cable ties Ø1.6mm
7	1	Cable ties Ø4.8mm
8	2	CBLZ screw M5x8 (ISO 7045-Z)
9	2	DEC washer M5x8 (ISO 7045-Z)
10	1	Coaxial cable 50OHM SMA(M) angled/SMA (F) 500mm
11	1	50OHM U.FL 200mm coaxial cable
12	1	CI050 card
13	1	Thermo. Adhesive, 4:1 shrinkage, diam. 11mm, 1g. 65mm
14.2	5	GNSS/RCT5 label
16	1	Anti-rotation cable clamp
17	1	GNSS/RCT5 antennas
20	1	CI054 network interface card and 3 relays
21	1	CI086 LORA RCT5 extension board
22	1	CBLZ screw M3x10 (ISO 7045-Z)
23	1	4-wire picoblade cable Length: 300mm
24	2	0.34mm2 pre-insulated wire end cap
25	1	Flexible wire 0.34 mm2 red

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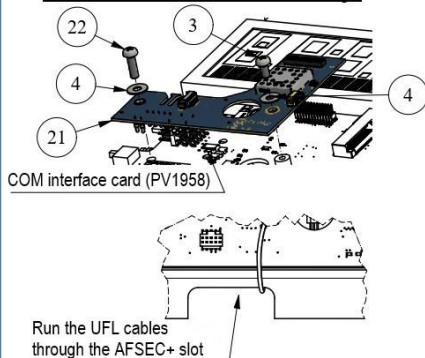
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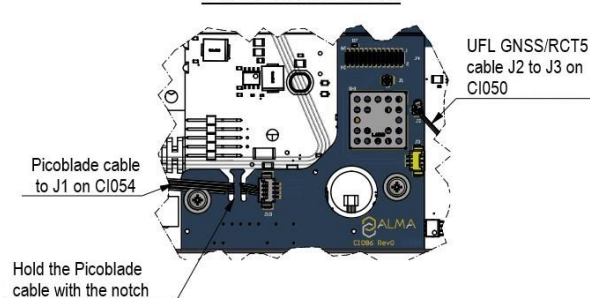
Fitting the RCT5 module into a Microcompt+

Can be fitted with 1 PE: KIT BAD 20 N20 EP ON (3924) or equivalent

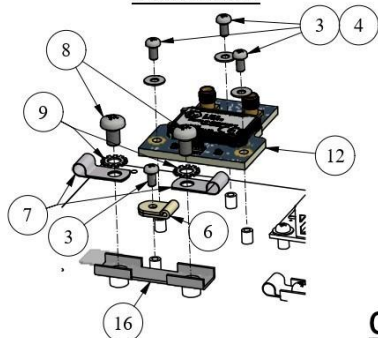
CI086 RCT5 board assembly:



CI086 connection:

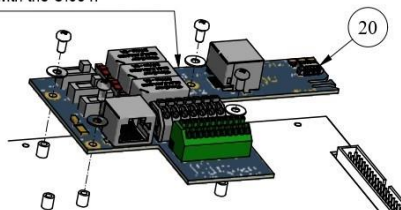


CI050 SI interface card assembly 2 antennas:

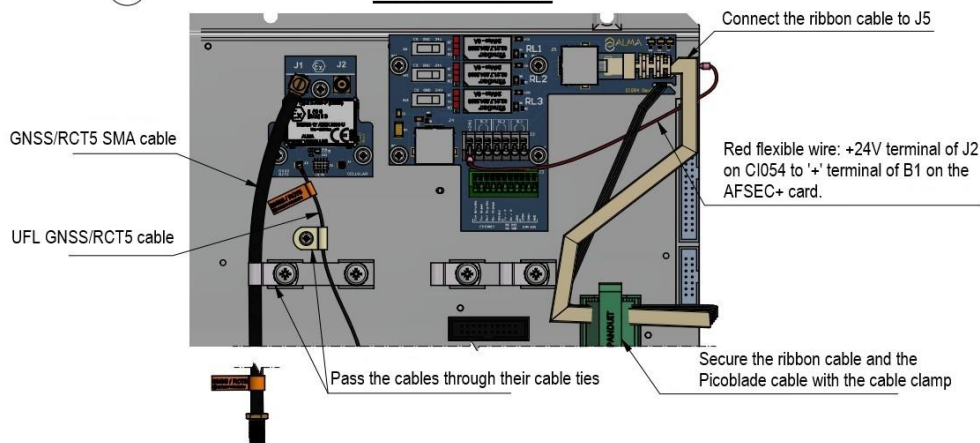


CI054 Network Interface card and 3 relays assembly :

Remove the CI052 (network interface card) and replace it with the CI054.



Connections :



Service
Développement
13127 Vitrolles

Mat: Ech: 1:22
Tol: ISO 2768-mK Code: 12280
N° de plan associé au dossier CET concerné
Métro: ATEX:

Equipped RCT5 module eMicrocompt

981a PV1962.2 D 1 6/12
N° Dev Drawing N° Rev Ind Folio

Description of modification N°829

Removal of the 2 antennas box, new antenna references, Creation of the RCT5 module and the 4G/GNSS and RCT5 module

Modified on 12/04/2023 By CHR
Created on 23/03/2017 CC Verified by DRA
SR

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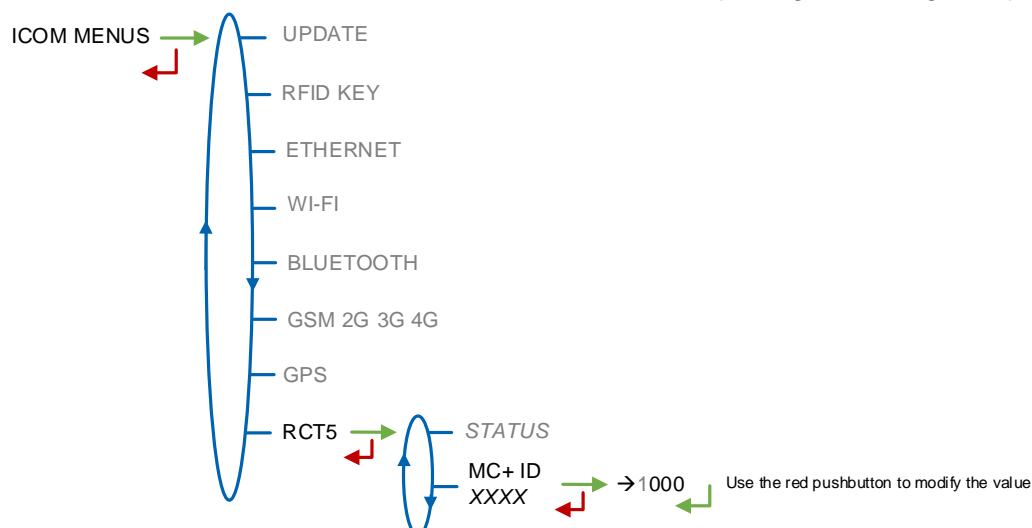
4.3. PAIR THE RCT5 REMOTE CONTROL

On the MICROCOMPT+ with a blue RFID key :

SUPERVISOR>ICOM MENUS>RCT5>ID : Check if the ID of the MICROCOMPT+ is similar to its batch number.

If it is not the case, enter the four digit ID of the MICROCOMPT+. Use the red pushbutton to change the value.

SUPERVISOR>ICOM MENUS>RCT5>RESET : Reset the pairing with the green pushbutton.

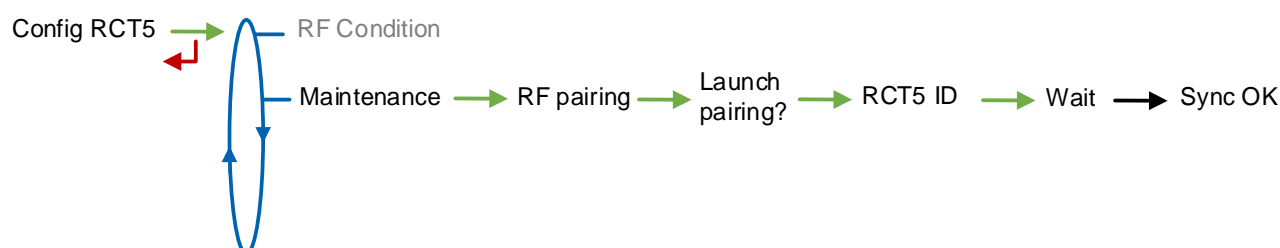


On the RCT5 :

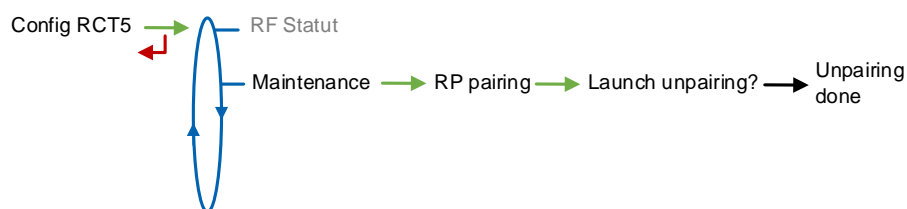
Config RCT5>Maintenance>RF Pairing : enter the batch number of the MICROCOMPT+.


If the remote control is not paired, the message *Launch new pairing ?* appears (very quickly).

The message « Pairing Done » appears when the pairing has been done. Otherwise, the message « Pairing Fail » will appear.



When the remote control is already paired



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