



INSTRUCTION MANUAL

(Translation of the original instructions)

EN

SuperVisorKontrol



FOR SAFE AND CORRECT USE, FOLLOW
THESE INSTRUCTIONS.
KEEP THEM FOR FUTURE REFERENCE.

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1 SUPERVISOR

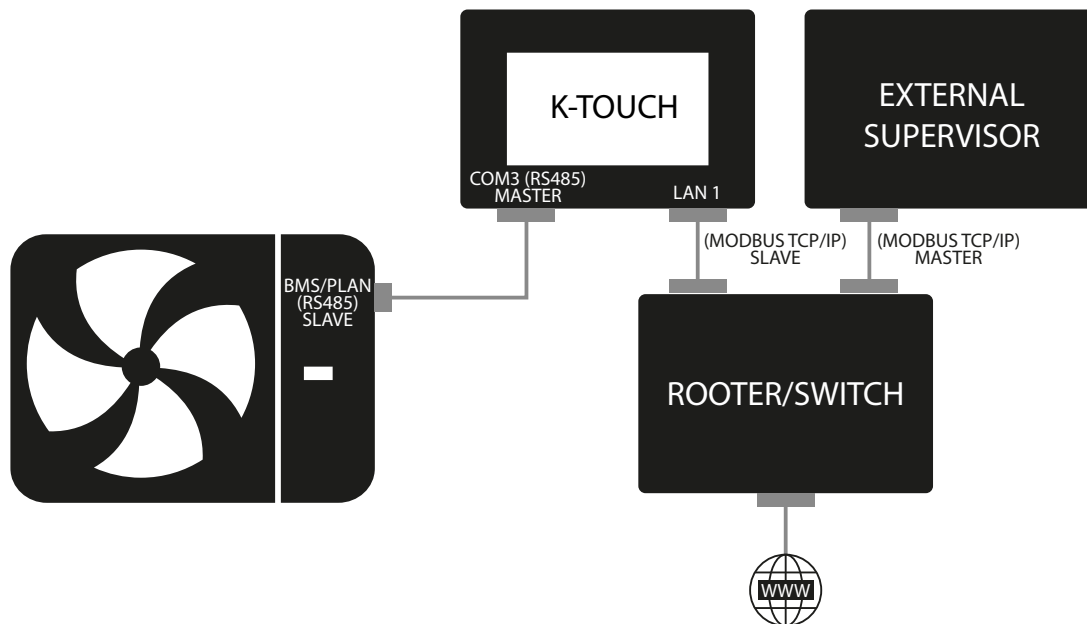
For versions 1.8 or higher of the HCC SW, it is possible to request remote activation of the SuperVisorControl (SVK) service.

This function allows an external, third-party supervisor to manage and control certain functions of the K-Touch panel control software and the Templari heat pumps. To permit the supervision device to manage and communicate with the K-Touch panel, both must be connected to the same local LAN. The K-Touch must be connected to the local network via the LAN1 port, and connected to the heat pump via the BUS COM3 port.

The supervisor must communicate with the K-Touch panel using only the ModBus over TCP/IP protocol, via port 8000 for MT models, or 8010 for CMT models.

The communication is kept valid as long as the supervisor enters a known value into the PASSWORD register and keeps a valid value (>0) in the HEARTBIT register. The latter will be decremented by one unit every second, functioning as a time-out, to validate communication between K-Touch and the external supervisor.

When this timer expires, some of the parameters modified by the external supervisor could return to the values set before its activation, and others remain in the last set condition. See the paragraph Registers for SVK communication.



1.1 SUPERVISORKONTROL SCREEN

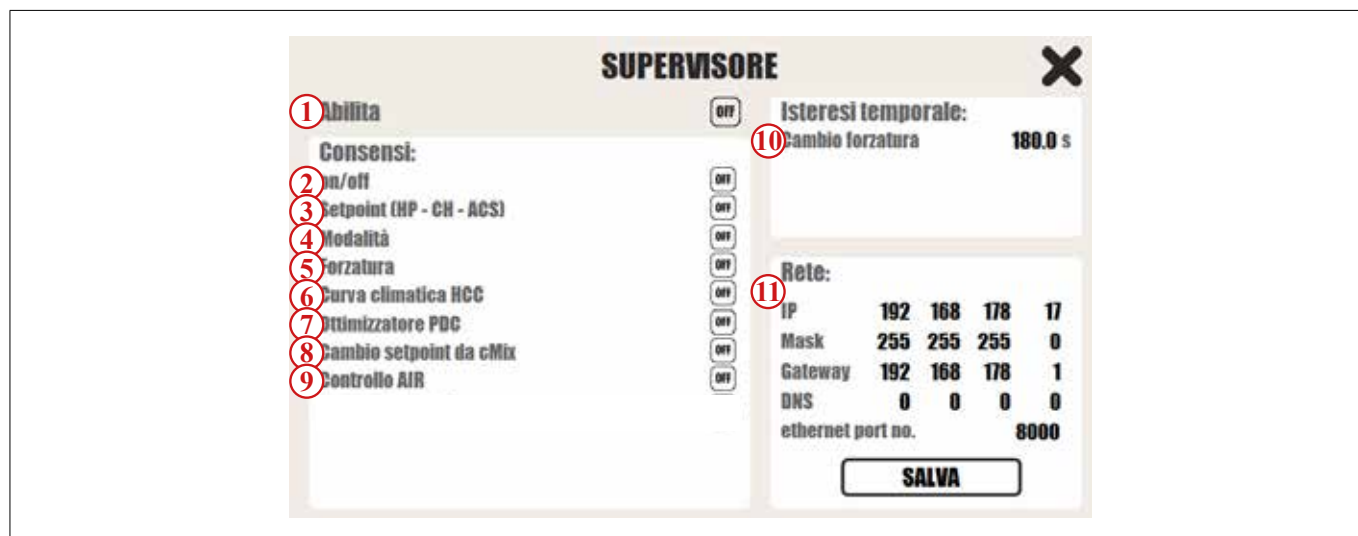
Here you can see some of the information sent from the remote control device to the K-Touch panel.



Ref.	
1	Heartbit: integer numerical value expressed in seconds. It is sent by the external supervision device in order to keep the communication between it and the K-Touch panel active. This value must be sent constantly to the panel at regular intervals, together with a password. Otherwise, the SUPERVISORKONTROL is disabled.
2	On/Off of the heat pump.
3	Cooling setpoint: setpoint set by an external supervisor for cooling mode.
4	Heating setpoint: setpoint set by an external supervisor for heating mode.
5	DHW setpoint: setpoint set by an external supervisor for domestic hot water production.
6	Operating mode: indicates the operating mode of the heat pump selected by the external supervisory device. It can be: DHW only, heating and DHW, cooling and DHW, heating only, cooling only.
7	Forcing in progress: the external supervisory device can force the heat pump to work in certain modes, regardless of the set mode (6). The forcing can be: no forcing, stop, winter/summer, DHW only.
8	Climatic curve: switched on if the external supervisory device enables the use of the climatic curve of the K-Touch panel.
9	Optimiser: switched on if the external supervisory device activates the optimisation function of the heat pump.
10	Consent to CMIX to replace the pump setpoint: switched on if the external supervisory device allows the CMIX cards to change the heat pump setpoint.
11	Tap to switch to the SVK settings screen.

1.2 SUPERVISORKONTROL SETTINGS SCREEN

On this screen, the user can select which of the commands set by the external supervisor can be used in the SVK.



Ref.	
1	Enable SVK: enables the operation of the SVK, and delegates control of the activated functions to the external supervisor. For the function to remain active, the external supervisor must already be active and transmitting.
2	On/Off: allows the external supervisor to switch the heat pump on or off.
3	Setpoint: allows the external supervisor to change the setpoints of the heat pump.
4	Mode: allows the external supervisor to change the working mode of the heat pump.
5	Forcing: allows the external supervisor to force the heat pump to work in a different mode than the current one. See paragraph Registers for SVK Communication .
6	Climatic curve: allows the external supervisor to enable the climatic curve.
7	Optimiser: allows the external supervisor to enable the heat pump optimiser.
8	Consent to CMIX to replace the pump setpoint: allows the external supervisor to enable consent to CMIX to change the pump setpoint, as required by activations of the HT and MIX circuits.
9	AIR control: allows the external supervisor to change values for fan operation for AIR heat pumps. In accordance with machine use.
10	Forcing time hysteresis: each time an external supervisor applies forcing, it will be necessary to wait this number of seconds before forcing the system again.
11	Network properties: here it is possible to set values for the panel network parameters. Pressing the SAVE button activates the changes.

1.3 REGISTERS FOR SVK COMMUNICATION

The external supervisor must communicate with the panel using the following registers listed in the table.

4x: Read holding registers / Write multiple holding registers

0x: Read coils / Write a single coil

Ref.	INTEGER 4X ADDRESS -		
Address	Description		Unit of Measurement
1001	Password		N
1002	Heartbit		N
1003	On/Off	A	1/0
1004	Setpoint CH	B	°C x 10
1005	Setpoint HP	B	°C x 10
1006	DHW setpoint	B	°C x 10
1007	Operating configuration (0 = DHW; 1 = Winter+DHW; 2 = Summer+DHW; 3 = Winter only; 4 = Summer only)	A	N
1008	Forcing (0 = no forcing, 1 = stop, 2 = plant [HP or CH], 3 = DHW)	B	N

A: Overwrite. If the supervisor or authorisation fails, the status of a value remains as it was set by the supervisor.
 B: Replace. If the supervisor or authorisation fails, the status returns to the value prior to replacement.

Ref.	INTEGER 4X ADDRESS -		
Address	Description		Unit of Measurement
1001	enable/disable HCC climatic curve	A	1/0
1002	enable/disable HCC optimizer	A	1/0
1003	enable/disable solar boost HCC/HP		currently not in use
1004	enable/disable set switching from CMIX cards	B	1/0
1005	enable/disable accumulation	A	1/0
1006	reset alarm	B	1/0
1007	Stop all activity and start the internal fan (AIR only)	A	1/0
1008	Enable manual use of internal fan (#751) (AIR only)	A	1/0
1009	Enable manual use of external fan (#750) (AIR only)	A	1/0
1010	Set to true to force the defrost. At the end it is reset to false automatically	B	1/0

A: Overwrite. If the supervisor or authorisation fails, the status of a value remains as it was set by the supervisor.
 B: Replace. If the supervisor or authorisation fails, the status returns to the value prior to replacement.



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