

CAREL

smart guide



plugging 

CAREL

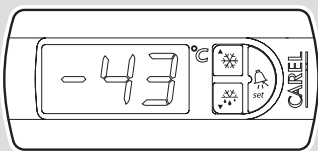
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Setting the set-point

Press **"SET"** and hold for 1 second; the set-point value will appear on the display; after a while, the value will begin to flash;

increase or decrease the set-point value using the buttons **"UP"** or **"DOWN"** until you reach the desired value

Press **"SET"** to confirm the new value.

Manual defrost

Press **"DOWN"** and hold for more than 5 sec the function is activated. (only at the right temperature conditions)

To access the parameters "F"

Press **"SET"** and hold for more than 5 sec

The display shows the code of the first modifiable parameter **"PS"**;

Using the buttons **"UP"** or **"DOWN"** you can look through all the parameters F type.

To access the parameters "C"

Access the parameters F, select the parameter **"PS"** using **"SET"**

00 The display shows "00";

Press **"UP"** or **"DOWN"** until **"22"**;

Confirm pressing **"SET"**;

The display shows the code of the first modifiable parameter (you can see all the parameters F and C).

How to modify the parameters

After having displayed the first parameter, either C or F, follow these instructions:

Press **"UP"** or **"DOWN"** until you reach the parameter code whose value need to be changed;

(**)

Press **"SET"** to display its current value;

increase or decrease its value using **"UP"** or **"DOWN"** until you reach the desired value;

Press **"SET"** for 5 sec to store the new value and display the code of the parameter again;

Press again **"UP"** or **"DOWN"** to go to the next parameter you want to change the value of;

Repeat the operations from the point (**)

Table of the frequent parameters F type

parameter	Type	Min	Max	U.M.	Def
PS PASSWORD	F	00	199	-	22
/ PROBE PARAMETERS					
/C ambient probe calibration (x 0,1 °C/°F)	F	-127	127	°C/°F	0,0
r REGULATOR PARAMETERS					
rd regulator differential (hysteresis 0=0,5°C/°F)	F	0	19	°C/°F	2
d DEFROST PARAMETERS					
dl interval between two defrost cycles	F	0	199	hours	8
dt end defrost temperature	F	-50	127	°C/°F	4
dP max defrost duration or effective duration if d0=2 or 3	F	1	199	min	30
dd dripping time after defrost	F	0	15	min	2
d8 alarm delay after defrost	F	0	15	hours	1
d/ defrost probe temperature display	F	-	-	°C/°F	-
A ALARM PARAMETERS					
AL low temperature alarm (max. variation as to the Set-Point). AL=0 excluded low temperature alarm	F	0	127	°C/°F	0
AH high temperature alarm (max. variation as to the Set-Point). AH=0 excluded high temperature alarm	F	0	127	°C/°F	0
F FAN PARAMETERS (these parameters are used only in the model C)					
F1 fan start-up temp.	F	-50	127	°C/°F	5
Fd post dripping lock active for every value of F0	F	0	15	min	1
H OTHER SELECTIONS					
T external parameter programming	F	-99	199	-	-
H5 identification code for programming key (programmed by supervisor)	F	-99	99	-	0

Table of alarms and signals



/aux

●	regulation probe error
—	defrost probe error
●	immediate external alarm from Dig. Input*
●	low temperature alarm
●	high temperature alarm
—	data storage error
—	defrost ended for time-out
—	defrost in progress

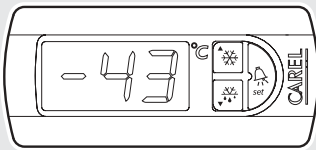
● ON — OFF

(*) if the digital input is present

Table for the configuration of the digital inputs

A4	meaning	S	Y	X	C
0	input not active	•	•	•	•
1	external alarm immed. or delayed (A7)	•	-	•	-
2	defrost start-up (closed= enabl.)	•	-	•	-
3	defrost start-up when the contact is closed	•	-	•	-
4	curtain switch or night operation	•	-	•	-

All models feature the parameter A4, but it can be used only with the models that actually feature the input, alternatively to the second probe. When the input is not present, A4 value have to be zero (0) marked with - (dash).



Button function

UP BUTTON

Normal operation:

pressed for 5 seconds:
- activates/deactivates the continuous cycle

Parameters modification:

- it passes from a parameter to the next;
- it increases the value associated to the parameter.

SET BUTTON

Normal operation:

- it silences the acoustic alarm (if foreseen);
- it displays and/or sets the Set Point;
- if pressed for 5 seconds not in alarm condition; you can access the (frequent) parameters 'F' type menu;
- if pressed at the start-up of the instrument together with the **down** button activates the RESET of the parameters.

Modification of the parameters:

- it displays the value associated to the selected parameter/it goes out from the display;
- if pressed for 5 seconds during the modification of the parameters, it performs the storage recording the modifications.

DOWN BUTTON

Normal operation:

- pressed for 5 seconds: if enabled, it activates manual defrost.

Modification of the parameters:

- it passes from a parameter to the previous one;
- it decreases the value associated to the parameter.

Table of the configuration parameters type "C"

Parameter	Type	Min	Max	U.M.	Def
PROBE PARAMETERS					
/2 measurement stability	C	1	15	-	4
/4 probe display: 0 = regulation probe, 1 = product/food probe (second probe)	C	0	1	flag	0
/5 °C/°F (0=°C, 1=°F)	C	0	1	flag	0
REGULATOR PARAMETERS					
r1 min. allowable set	C	-50	r2	°C/°F	-50
r2 max. allowable set	C	r1	127	°C/°F	60
r3 enabling Ed alarm: max defrost duration is reached (0=no, 1=yes)	C	0	1	flag	0
r4 automatic variation of the Set-Point with closed curtain switch (A4=4)	C	-20	20	°C/°F	3
COMPRESSOR PARAMETERS					
c0 compressor start-up delay after switch-on	C	0	15	min	0
c1 min. time between 2 following compressor start-ups	C	0	15	min	0
c2 compressor shutdown minimum time	C	0	15	min	0
c3 compressor operation minimum time	C	0	15	min	0
c4 compressor safety (0=Off, 100=On)	C	0	100	min	0
cc continuous cycle duration	C	0	15	hours	4
c6 alarm delay after continuous cycle	C	0	15	hours	2
DEFROST PARAMETERS					
d0 defrost type (0=heater, 1=hot gas, 2=time resistor, 3= time hot gas)	C	0	3	flag	0
d4 defrost after control switch-on (0=no, 1=yes)	C	0	1	flag	0
d5 defrost delay after start-up or from digital input (A4=3)	C	0	199	min	0
d6 block of display during defrost (0=no, 1=yes)	C	0	1	flag	1
d9 defrost priority over anticogging (0=no, 1=yes)	C	0	1	flag	0
dC time base (0=hours/min, 1=min/s) only for dl and dP	C	0	1	flag	0
ALARM PARAMETERS					
A0 alarm and fans differential (0=0,5°C/°F)	C	0	19	°C/°F	0
Ad temperature alarm delay	C	0	199	min	0
A4 digital input configuration	C	0	4	-	0
A7 measurement delay time for the input "delayed alarm" (A4= 1)	C	0	199	min	0
FAN PARAMETERS					
F0 fan management	C	0	1	flag	0

parameter	Type	Min	Max	U.M.	Def
F2 fans off with compressor off	C	0	1	flag	1
F3 fans off during defrost	C	0	1	flag	1
H OTHER SELECTIONS					
H0 serial address		0	199	-	1
H1 PJ32S 0=function T; 1= function S with defrost PJ32C alarm relay operation selection 0=alarm OFF, 1=alarm ON	C	0	1	flag	1
H2 0=disabled buttons	C	0	1	flag	1
H4 only S 0=enabled buzzer 1=disabled buzzer	C	0	1	flag	0

PROBLEM	CAUSE	CHECK
The compressor doesn't start (compressor LED flashing)	- compressor delay in operation	c0, c1 e c2
Temperature is outside set limits but no alarm signal	- post defrost dripping in progress	dd
IA alarm signalled	- alarm delay operating	Ad, c6, d8
	Multifunction input open	input status
The alarm connected to the Multifunction input is not signalled	- alarm delay ON if - parameter program. error	A4=1 check the status dig. in. ; checke A7
Defrost not activated	-defrost cycle too short (dP) - interval between defrost dl=0 - low end defrost temperature - high evaporator temperature	dP, dl, H1 for models S dt d/ defrost probe
Manual defrost not activated (def. LED flashing)	- parameter compressor protection delays inverted	d9 (select d9=1,)
High temperature alarm after defrost	- alarm delay after defrost too short - or alarm threshold too low	d8 AH
Display locking continues even after defrost	- room temp. has not yet reached the set or time d8 has not yet elapsed	reduce d8
After the parameter modification the controller keeps working with the old values	- the instrument has not yet updated the value	repeat the programming turn off and then turn on again
For the mod. C: fans don't start	1. delay selected at the start-up of the compressor and fans 2. if F0=1 (fans managed by fan regulator) 2. F0, d/ - the evaporator is <hot>: the evaporator temperature can be read selecting the parameter d/ ; - dripping in progress; - F1 (fan shutdown temp.) low - post dripping delay inserted	1. C0 Fd F1 dd
	3. if F0=0 - F2=1 and the compressor is still - dripping in progress - post dripping lock in progress	3.F0 F2 Fd dd