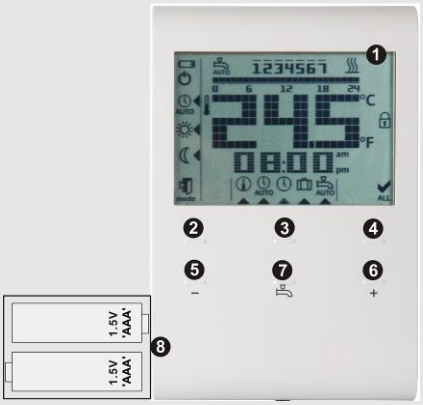
SIEMENS

en Operating Instructions RDE100.1DHW

RDE100.1DHW is a room thermostat that allows you to set the ideal room temperature at the time you want.
In addition, it offers independent control of DHW. There are several switching patterns available that can be set to your specific needs.



1. Display

- Indicating that batteries need to be replaced
- Frost protection (heating) is active
- Auto Timer mode
- View and set Auto Time switch
- Comfort mode
- Economy mode
- Escape
- Display of time
- Permanent setpoint setting
- Day and time setting
- Holiday mode setting
- View and set DHW Auto Time switch
- DHW Auto Time switch activated
- am / pm — Morning: 12-hour format; Afternoon: 12-hour format
- ALL — Confirmation
- °F — Room temperature in degrees Fahrenheit
- °C — Room temperature in degrees Celsius
- Button lock activated
- 245 — Display of room temperature, setpoint, etc.
- Heating ON
- 1234567 — Weekday 1 = Monday, 7 = Sunday
- Timer bar
- The actual room temperature

2. Change operating mode

3. Set

4. Ok

5. Decrease value

6. Increase value

7 DHW switch ON/AUTO/OFF button

8. Battery holder

Do you want to adjust the time and day?

You can set the current time of day.

set **ok** **+** **–** **mode**	Proceed as follows: • Press **set** and select ⏲ • Press **ok** and the time flashes for setting • Press **+** or **–** to adjust the time • Press **ok** to confirm • The weekday flashes, press **+** or **–** to select the desired day • Press **ok** to save the value • Press **mode** to exit or wait for the program to exit automatically

Do you want to lock the buttons?

mode	Press and hold **mode** for at least 7 seconds to activate a button lock. Repeat to unlock. The unit operates normally when the buttons are locked, but no changes are possible while the buttons are locked.

Are your rooms too warm/too cold?

+ **–** **ok** **set** **mode**	Press **+** or **–** to increase or decrease the room temperature setpoint in increments of 0.5 °C / 1 °F. Proceed as follows: • Press **+** or **–** to adjust the setpoint temporarily. This adjustment is reset as soon as the operating mode changes. • Press **ok**, **set** or **mode** to save the value or wait for the program to exit automatically • To lock the setpoints, use parameters P06 and P08.

Do you want to change the operating mode?

mode	The thermostat provides Comfort mode, Economy mode, and Auto mode. Changeover between the operating modes can be made manually by pressing **mode**. **Comfort** mode is the permanent (24 h) selection of Comfort. Select this mode to maintain Comfort temperature permanently without any time switch. It is used during occupancy periods, for example. **Economy mode** is the permanent (24 h) selection of Economy. Select this mode to maintain the Economy temperature permanently without any time switch. It is used during non-occupancy periods, for example at night. AUTO In **Auto timer mode**, operating modes (Comfort, Economy) are changed automatically according to the time switch set.
!	**Note:** **Frost protection** is a function always active in the background. As soon the room temperature falls below 5 ºC, the unit automatically activates the heating.

Do you want to set permanent temperature setpoints?

set **ok** **+** **–** **mode**	• Press **set** and select • Press **ok** to confirm • Press **mode** to select an operating mode, Comfort or Economy • Press **+** or **–** to adjust the setpoint permanently. • Press **ok** to confirm • Press **mode** to exit or wait for the program to exit automatically
!	**Note:** This permanent setpoint is used during Auto timer mode.

Energy saving tips without loss of comfort

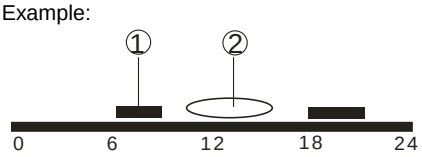
- Select Auto timer mode during the heating period, and set the time switch according to your normal habits at home
- Select Economy mode or Holiday mode for long periods of non-occupancy and during summer period

Do you want to set your Holiday mode?

set **ok** **+** **–** **mode**	Use the Holiday mode to set the thermostat to a constant temperature while absent**.** • Press **set** and select • Press **ok** to confirm • Press **+** or **–** to adjust the temperature setpoint • Press **ok** to confirm • Press **+** or **–** to adjust the number of days for holidays (Note: 0 = Holiday mode OFF) • Press **ok** to save the value • When Holiday mode is activated, the remaining days are displayed on the screen
!	**Note:** If you press **mode** while Holiday mode is active, the function is turned off and the symbol disappears. If the Comfort and Economy setpoint values are both locked, the lowest locked setpoint value is the Holiday mode setpoint value. You can adjust the setpoint temperature from 5 ºC up to the lowest locked setpoint value.

Do you want to enter your own time switch?

Option 1: Time switch with individual day selection (P11=0)

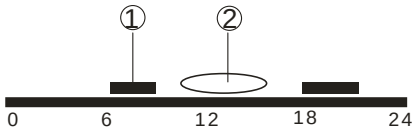
set **ok** **+** **–** **mode**	You can select Comfort or Economy at 15 minute intervals throughout the day. The 0:00 to 24:00 hour time bar allows you to set the operating mode for the selected day(s). Example:  ① Visible bars: Control to Comfort temperature ② Invisible bars: Control to Economy temperature When Auto timer mode is enabled, changeover between the operating modes is automatic after the settings are saved. Proceed as follows: 1) Press **set** and select AUTO. 2) Press **ok** to confirm. 3) Time switch for day Mon(1) is displayed. 4) Press **+** or **–** to select the day, from Mon(1) to Sun(7). 5) Press **ok** to confirm the selection and initiate time programming. **During programming step**: 6) Press **mode** to select an operating mode, (Comfort or Economy) **or** 7) Press **+** or **–** to adjust the time setpoint by 15 minutes for the selected mode. 8) Press **ok** to save the time switch. 9) Repeat steps 4-8 for all remaining days (if required); or 10) Press **mode** or wait for the program to exit automatically.

Option 2: Time switch with the same 7 day selection (P11=1)

set
ok
+
–
mode

You can set all the 7 day time switches at the same time.

Example:



① Visible bars: Control to Comfort temperature

② Invisible bars: Control to Economy temperature

Proceed as follows:

1) Set the parameter (P11=1). Please refer to the section "**Do you want to change parameters**".
2) Press **set** and select AUTO.
3) Press **ok** to confirm.
4) Time switch for period Mon (1) - Sun (7) is displayed.
5) Press **ok** to initiate time programming.

During programming step:

6) Press **mode** to select an operating mode, (Comfort or Economy) **or**
7) Press **+** or **–** to adjust time setpoint by 15 minutes for the selected mode.

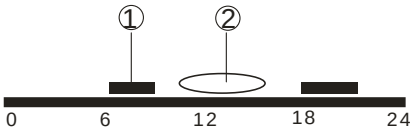
8) Press **ok** to save the time switch.
9) Press **mode** or wait for the program to exit automatically.

Option 3: Time switch with 5-2 day selection (P11=2)

set
ok
+
–
mode

You can set Monday - Friday time switch at once and Saturday - Sunday time switch at once.

Example:



① Visible bars: Control to Comfort temperature

② Invisible bars: Control to Economy temperature

Proceed as follows:

1) Set the parameter (P11=2). Please refer to the section "**Do you want to change parameters**".
2) Press **set** and select AUTO.
3) Press **ok** to confirm.
4) Time switch for period Mon(1) - Fri(5) is displayed.
5) Press **+** or **–** to select the period, Mon (1) - Fri(5) or Sat (6) - Sun (7).
6) Press **ok** to confirm the selected period and initiate time programming.

During programming step:

7) Press **mode** to select an operating mode, (Comfort or Economy) **or**
8) Press **+** or **–** to adjust the time setpoint by 15 minutes for the selected mode.

9) Press **ok** to save the time switch.
10) Repeat the steps 5-9 for the other period if necessary; or
11) Press **mode** or wait for the program to exit automatically.

Factory default for 7-day Time switch

Default value	Day/s	Comfort mode	Economy mode
	Mo (1) – Fr (5)	6:00 – 8:00 hr 17:00 – 22:00 hr	22:00 – 6:00 hr 8:00 – 17:00 hr
	Sa (6) – Su (7)	7:00 – 22:00 hr	22:00 – 7:00 hr

Do you want to activate DHW control?

- Press to switch on DHW heating
- While DHW heating is switched on, the symbol is displayed
- Press again
- DHW is in the auto status, the AUTO symbol is displayed. DHW switches according to the DHW time switch.

  If you want to see the DHW time bar, press and hold for 5 seconds. The time bar flashes to show the programmed DHW times. The timeout of the DHW timer bar is set with parameter P13
- Press again
- DHW heating is switched off and the symbol disappears

DHW can also be switched on/off while frost protection is active.

Do you want to enter your own time switch for DHW control?

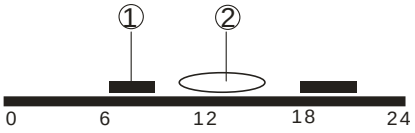
set
ok

You can enter the DHW Auto Time switch as follows:

- Press **set** and select AUTO, then press **ok**

You can select DHW on or off for every 15 minutes interval of the day. The 0:00 to 24:00 hour time bar allows you to set DHW on or off for the selected day(s).

Example:



① Visible bars: DHW control is switched on

② Invisible bars: DHW control is switched off

There are 3 options for DHW Time switch setting: Individual day, 7 day and 5/2 day.
To set the DHW Time switch, please follow the same steps as in the section "**Do you want to enter your own time switch**".

Factory default of 7-day time switch for DHW

Default value	Day/s	DHW control ON	DHW control OFF
	Mo (1) – Fr (5)	6:00 – 8:00 hr 17:00 – 22:00 hr	22:00 – 6:00 hr 8:00 – 17:00 hr
	Sa (6) – Su (7)	7:00 – 22:00 hr	22:00 – 7:00 hr

Does symbol appear on the display?

Symbol is displayed when the batteries are low. Replace them with 2 new alkaline batteries type AAA. Proceed as follows:

- Get 2 new alkaline batteries type AAA
- Remove the battery holder, then the batteries, insert the new batteries and, within 1.5 minutes, replace the battery holder
- Ensure the exhausted batteries are disposed of correctly, in compliance with environmental requirements

Do you want to change the parameters?

+ **–** **ok** **mode**	If you want to change control parameters, proceed as follows: • Press **+** and **–** simultaneously for 5 seconds • Release them and parameter "P01" is displayed on the bottom segment • Press **+** or **–** to scroll to the parameter that needs to be adjusted • Press **ok** to select this parameter • Press **+** or **–** to adjust the value • Press **ok** to confirm the adjusted value • Press **mode** to exit the parameters without saving or wait for the program to exit automatically

Parameter list

Parameter no.	Description	Setting range (default)
P01	Time format	1 = 24:00 hours (default) 2 = 12:00 AM/PM
P02	Selection of °C or °F	1 = °C (default) 2 = °F
P03	Standard temperature display	1 = room temperature (default) 2 = setpoint
P04	Temperature sensor calibration	-3…3 °C Step 0.5 °C (-6…6 °F, step 1 °F) Default: 0 °C
P06	Comfort setpoint lock	0 = OFF (default) 1 = ON → locked according to setting in permanent temperature setpoint
P08	Economy setpoint lock	0 = OFF (default) 1 = ON → locked according to setting in permanent temperature setpoint
P09	Buzzer	0 = OFF 1 = ON (default)
P10	Show frost protection icon	0 = OFF (default) 1 = ON
P11	Time switch type for autotimer and DHW	0 = individual Days (default) 1= all 7 days 2= 5/2 days
P12	Periodic pump run	0 = OFF (default) 1 = ON
P13	DHW timer bar timeout	0 = no DHW bar 1 = 1 minute (default) 2 = 2 minutes Adjustable range 0 to 15 minutes
P21	Button scanning rate for the capacitive buttons Note: a higher scanning rate means shorter battery life.	0.2 = 0.25 s 0.5 = 0.5 s 1.0 = 1.0 s (default) 1.5 = 1.5 s
P22	Reload factory settings	0 = OFF (default) 1 = reload
P23	Software version information	No adjustment possible
P78	Control behavior	0 = On/Off, 1.0K 1 = On/Off, 0.3K 2 = TPI fast 3 = TPI medium 4 = TPI slow (default)
P89	Forward shift on max	0, 0.5,…24 h Default: 0 h
P90	Early shutdown max	0, 0.5,…6 h Default: 0 h