

OKHE SMART

Intelligent water heater with electronic thermostat. The SMART function adapts the operation of the heater precisely according to your own needs and thereby providing you with greater savings.



**SAVINGS OF AT LEAST
ANOTHER 10 %**

The water heater OKHE SMART

 **DRAŽICE**
MEMBER OF THE NIBE GROUP

www.dzd.cz

What is SMART?

SMART thermostat E1 is an electronic thermostat for regulating the electric water heaters of DZ Dražice. It enables several modes of operation and provides several functions for comfort. The thermostat is equipped with a display and control keys.

Modes of the electronic thermostat

NORMAL

The mode for which the regulator keeps the heating at a constant, user-set temperature set in the range of 5 to 65 °C. The standard function of the thermometer is to keep the heater continuously heated to the set temperature, in the same way as the existing capillary thermostats.

HDO

The regulator keeps the heating at a constant, user-set temperature set in the range of 5 to 65 °C, only when the off-peak rate of electrical energy is detected.

ECO

The same function as in the NORMAL mode, only limited by the maximum attainable temperature of 55 °C.

Smart

In this mode, the regulator passes through 2 phases, with the aim of saving at least 10 % of electrical energy as opposed to in the NORMAL mode. In the first, during 1 calendar week, a constant temperature is maintained in the heater and the user's behaviour is monitored from the standpoint of water consumption. This information is gathered and later processed. In the second phase, the regulator applies information gathered in the first phase, so that it prepares only such amount of water that the user will use in a given time with a certain reserve in the case of an unexpected use of water. In this phase, there is a constant collection and evaluation of information about the consumption of water. Information gained in this way is applied in such a way that it leads to a non-stop adapting to the demands of the user. The heater must never, not even during the SMART mode, be allowed to cool down, the minimum temperature being 45 °C.

Smart HDO

The boiler connected to HDO heats water, unless it is found that the heated water wasn't used up in a given day, then the temperature is lowered for the following day. However, in the case that all the heating water was used up in a given day, the temperature is raised and this is continued until the amount corresponds to the amount of heat produced in the heater.

Antifrost

Offline mode of operation for heater. Here it is secured that the temperature of the water in the heater will not fall below 5 °C (on the condition of a supply of electrical energy). This function is active in all modes except for STOP mode.

Stop

For the preventing of active heating of the heating body under any conditions, there is also the ANTIFROST mode.

In all modes there is a guarantee of a minimum temperature of 5 °C, and a drop below this level causes the activation of the heating body, for which is only necessary a supply of electricity.

Data pictured on the display

The display contains the following areas, resp. data:

1. digital

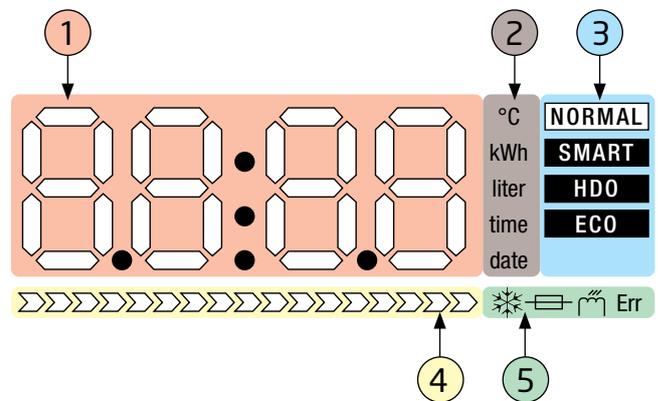
2. specifically displaying number/unit (temperature, consumed energy in kilowatt-hours, amount of available water for mixing to 40 °C, time, date)

3. displaying the chosen thermostat mode (NORMAL, SMART, SMART HDO, HDO, ECO)

4. bargraph, displaying the amount of available water for mixing to 40 °C (100 % = full boiler with water heated to 65 °C)

5. icons alerting as to the current state:

- Symbol of a snowflake – the emergency heating function of ANTIFROST – temperature in boiler was less than +5 °C, which could have caused damage in the water lines
- Symbol of the circuit breaker – activation of the mechanical heating jumper occurred
- Symbol of heating – activity in the heating body
- Symbol Err - malfunction; type of malfunction is displayed on the display



Technical specifications

Type	OKHE 80 SMART	OKHE 100 SMART	OKHE 125 SMART	OKHE 160 SMART
Height [mm]	742	887	1052	1237
Width [mm]	520	520	520	520
Depth [mm]	556	556	556	556
Weight without water [kg]	37	42	49	59

The water heater OKHE SMART

 **DRAŽICE**
MEMBER OF THE NIBE GROUP

www.dzd.cz