

# Screwed Rod Heaters

## ETTO



The ETTO screwed rod heater can be used for heating non-aggressive aqueous fluids in containers, machines and systems. Direct contact between the heating pipes and the fluid means that rapid heat transfer takes place. Depending on the surface loading permitted for the process fluid, it is also possible to achieve relatively high heating capacities combined with small installation dimensions. ETTO screwed rod heaters can be mounted quickly and easily in any orientation.

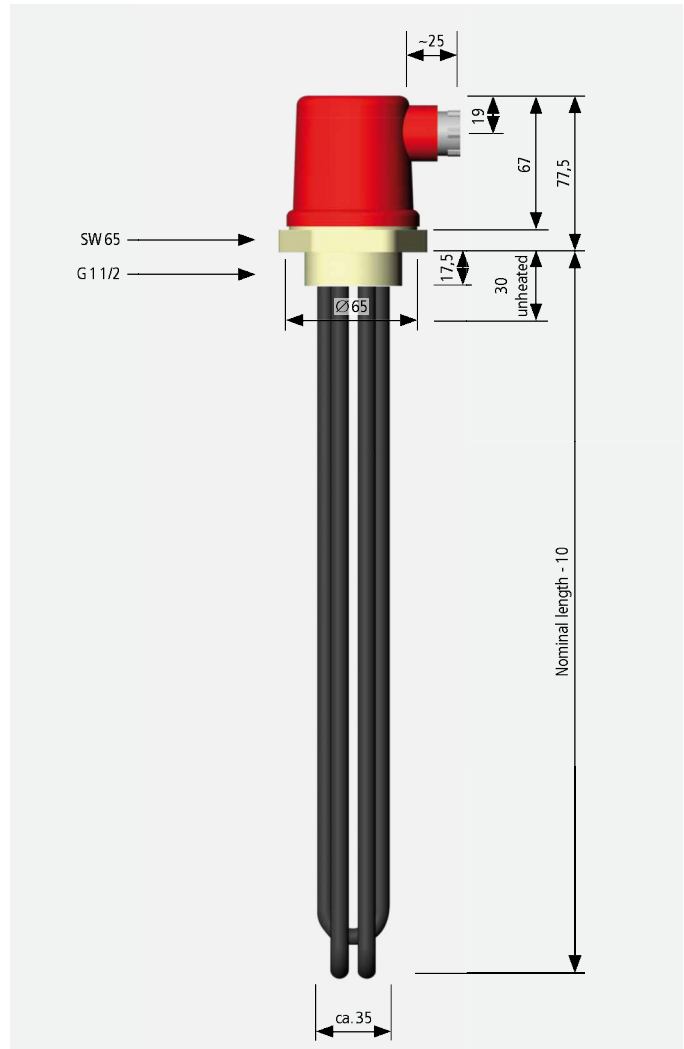
### Structure of the ETTO screwed rod heaters

The screwed rod heaters consist of three U-shaped, highly compressed tubular heating elements with a tube diameter of 8.5 mm, that are soldered into a G 1 1/2" threaded nipple.

Material:

- Tubular heating element made from stainless steel (material no. 1.4541) with threaded nipple made from brass (Ms) (material code letter E)

We supply the screwed rod heater with a terminal cover (material: PP, index of protection: IP 54).



### Performance range

In selecting a suitable screwed rod heater, it is particularly important to consider the maximum possible surface loading of your process fluid. Different installation lengths, with the same nominal power, are used according to the surface loading of the tubular heating elements. The unheated zone in all types is 30 mm.

The screwed rod heaters are configured for 400V 3-phase AC as standard. By repositioning internal jumpers, it is possible to set the heating element for a 230V connection (AC or DC, max. 3 kW heating power) before startup.

### Overview of the screwed rod heaters ETTO made from stainless steel

Type	Nominal power [kW]	Nominal length [mm]	Surface power density [W/cm <sup>2</sup> ]
E1,5/240/F	1,5	240	5
E3,0/390/F	3,0	390	5
E4,5/620/F	4,5	620	5
E6,0/800/F	6,0	800	5
E7,5/1000/F	7,5	1000	5
E3,0/240/F	3,0	240	10
E4,5/340/F	4,5	340	10
E6,0/430/F	6,0	430	10
E7,5/520/F	7,5	520	10
E9,0/620/F	9,0	620	10
E12,0/800/F	12,0	800	10