

Grzejemy jak Kawaleria®



Operating and assembly manual:

System additional heater Rifleman for central heating installations

Rifleman – version 3kW/230V



Rifleman – version 6kW/400V



Dimensions and parameters of Rifleman electric heaters

Parameter	3kW	6kW
Item code	02 11 003	02 11 006
Power	3kW/230V	6kW/400V
Power cord	3 x 1,5mm²	5 x 1,5mm²
Electric fuses	1 x 16A	3 x 10A
Width/height/depth	58/13/13 cm	70/15/15 cm
Heater temperature range	7-70°C	9-75°C
Supply connections	DN 32 int. thread	DN 40 int. thread
Return connections	DN 32 int. thread	DN 40 int. thread

Application

Rifleman is a device dedicated to heat central heating installation – main application:

- **1.** preventing the building from getting cold (f.i.: nights with premises heated with fireplace with water jacket or other solid fuel boiler),
- 2. preventing form water freezing in temporarily not used buildings,
- **3.** using "free" kWh from photovoltaic installation,
- **4.** adding extra heating capacity to main heat source in case of very cold weather.

Can be also use as a back-up heat source in case of main unit malfunction.

Rifleman cannot be sole source of heat. Requested water temperature can be set on the front panel of heating element. Device is equipped with 97°C emergency reset switch. With temperature exceeding that level, device is disconnected from power source. In that case, source of overheating needs to be diagnosed, removed and switch has to be activated. I order to do so, press membrane in an opening placed on control box – characteristic sound of reset is heard. Installation using Rifleman flow heater can be filled with water or other glycol-based fluid (max. 50% concentration).

Electrical and hydraulic assembly

There are two versions of Rifleman:

- 3kW with 1-phase 230V supply, equipped with standard power cable with plug compatible with socket with protective pin.
- 6kW with 3-phase 400V supply equipped with 5-wire cable. It needs to be connected to 3-phase supply using terminal block, switch needs to be installed. Task is to be performed by qualified electrician with appropriate permissions.

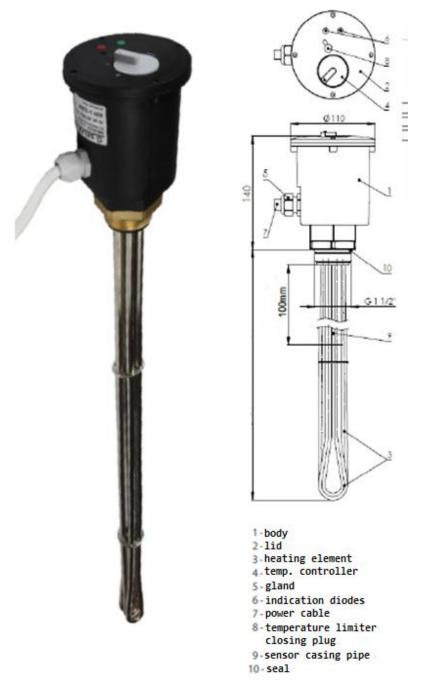
Rifleman is to be installed in series with the flow to the main heat source (boiler, heat pump, fireplace with water jacket) either on supply or return pipe. Both vertical and horizontal operation is acceptable, wherein the latter requires proper venting assurance. Hydraulic installation is to be performed by qualified electrician with appropriate permissions.

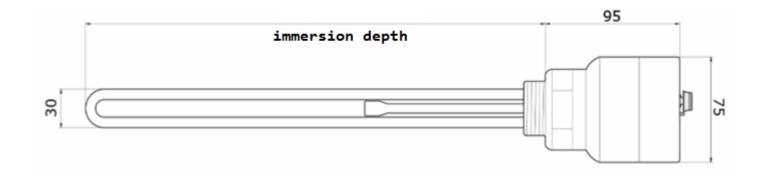


Heating element characteristics (3kW or 6kW)

Heating elements (type: mWM or EJK) are designed to heat water in open and closed metal tanks, enameled and made of stainless steel.

- **1.** Heating elements insulation is kept by installing them in orifice isolated from head entirely made of brass including thread.
- 2. A grounding resistor was used to partially connect the heating elements with the tank which incorporates these elements into the tank's cathodic corrosion protection. This solution optimally protects the electric heater in the enameled tank against accelerated electrochemical corrosion, with cathodic protection of the tank and the life of the magnesium anode.
- **3.** Temperature range: from $7/9^{\circ}$ C (\pm 6K) to $70/75^{\circ}$ C (\pm 3K)
- **4.** Automated heating element shut-off is controlled by thermostat. In case of its malfunction, non-operated temperature limiter is activated: 85°C (3kW) or 98°C (-8K, 6kW)
- **5.** Function protecting against water freezing is available: 7/9°C.
- **6.** Green light indicates connected heating element to the electricity grid. Operation is indicated by red light.
- 7. Protection class: IP24 (3kW) or IP44 (6kW)
- 8. Thread connection: G 1 ½ "
- **9.** Maximum allowable pressure in tank: 10 bar







Grzejemy jak Kawaleria®



Declaration of conformity CE - EN1/2019

Elterm M.M.Kaszuba Sp.j., ul Przemysłowa 5, 86-200, Chełmno, Polska

We herewith declare, under our sole responsibility, that the following products: additional system Rifleman:

Variants:

- \sim 230V, 50Hz, max. power 3kW
- 3N~400V, 50Hz, max. power 6kW

manufactured at the Elterm production plant, are in conformity with the applicable provisions of the following EC Directives:

Number	Title	
2006/95/WE as amended	Low Voltage Directive (LVD)	
2004/108/WE as amended	Electromagnetic Compatibility Directive (EMC)	
2002/95/WE as amended	Directive on the restriction of the use of certain hazardous substances in	
	electrical and electronic equipment (RoHS)	
2002/96/WE as amended	Directive on waste electrical and electronic equipment (WEEE), GIOŚ	
	register number E0001767	
ErP 2009/125/WE	General rules for setting requirements concerning Ecodesign for energy	
	related products (Attachment 13)	

and that the standards hereinafter referred to have been duly applied and observed.

Chełmno, March 1st 2019

Device type, production date	Date of sales	Legible stamp of a retail outlet and signature
Unless the above stamps are present the guarantee is invalid		

GUARANTEE

- 1. Guarantee for trouble-free operation is valid for a period of 24 months.
- 2. Guarantee expires if any alterations are made to the product without the manufacturer's consent, or if assembly or use are not in accordance with the enclosed operation manual and terms and conditions of guarantee.
- 3. Guarantee repairs are made by the manufacturer or persons/companies authorized by the same.
- 4. If filled out incompletely, the guarantee is invalid.
- 5. If the serviceperson discovers machine failure resulting from the user's fault (e.g. improperly made wiring system, air-locked central heating system, use or assembly that is not in compliance with the user manual etc.), or in the event the guarantee is invalid, the costs of repair and travelling are borne by the claimant.
- 6. Failure on the part of the user to follow the serviceperson's recommendations provided in the guarantee repair protocol results in the guarantee being suspended until such recommendations are implemented.

Do not call servicemen without becoming fully familiarized with the boiler user manual, as well as conditions of guarantee and assembly.

Stamp of serviceman, short description of repair and recommendations for the user

Following guarantee repair by the serviceman, one of the below guarantee coupons to be cut off, filled out and handed to the serviceman

Guarantee coupon I	Guarantee coupon II	
Full name and address of the device owner	Full name and address of the device owner	
Postal code, town /Device owner tel. no.	Postal code, town /Device owner tel. no.	
Production date	Production date	