

## TEHNICAL DATA SHEET CLEANEX® RAD PLUS

### Fast-acting ECO scale remover for boilers and steel radiators

#### 1. OVERVIEW

This technical sheet refers to CLEANEX RAD PLUS descaling agent. The product is a concentrated acid solution, formulated with non-toxic organic acids, used to remove scale and rust deposits on the surfaces of installations that carry out heat transfer processes.

#### 2. WAY OF USAGE

The product contains surfactants that ensure the effective removal of rust and sludge from the cleaned system through the combined action of dissolving lime deposits and mobilizing and dispersing the rust.

**CLEANEX® RAD PLUS** can also be used to clean heat exchangers in both conventional and condensing power plants. The product cleans efficiently, being recommended both in the case of new installations and in the case of old installations that present a risk of penetration with classic chemical cleaning. The product can also be used for equipment with aluminum components. It doesn't attack plastics, rubber or PPR.

#### 3. INSTRUCTIONS FOR USE

1. Dilute the scale remover with water in a proportion of 20% - 30%, depending on the degree of incrustation, at a temperature of 20-30 °C.
2. Circulate the solution in the installation with a cleaning pump with plastic tank and check valve, 40-60 minutes, reversing the direction every 20 minutes.
3. Being an organic product, it can be left to circulate in the functional system, up to max.3 days .
4. The descaling phenomenon is followed by means of the color indicator (red) at acidic pH. If the solution discolors, it is supplemented with new descaling agent in a concentration of 10%.
5. If the product is still acidic (red) and there are still portions of deposits, extend the cleaning time. The reaction is accelerated if the recirculated solution can be heated to 40-50°C.
6. After descaling, the installation is emptied and washed well with water.
7. The pump is charged again with a 1%-4% ALKALINE NEUTRALIZER solution that circulates for 10-20 minutes. It is rinsed with water until a neutral pH - measured with a pH determination kit, or with a pH-meter.
8. In order to protect the cleaned system against corrosion, it is recommended to fill the installation with Thermotechnical Antifreeze from the CHEMSTAL range, or to introduce a corrosion inhibitor (INSTAL PROTECT 1% solution).

#### 4. LABOR AND ENVIRONMENTAL PROTECTION MEASURES

**Product recommended for professional use;** When handling the concentrated solution, wear protective equipment (anti-acid gloves, protective glasses).

**The product contains citric acid.**

The provisions regarding work and environmental safety provided in the product safety data sheet will be respected. Don't use empty packaging for food storage

#### 5. TECHNICAL QUALITY CONDITIONS

No.	CHARACTERISTICS	CLEANEX RAD Plus	
		Provided	Results
1	Appearance	red	red
2	pH ,max	2	<2
3	Corrosion on copper, in proportion with water 1:1, 3h at 40 °C	pass	pass
4	Corrosion on steel, in proportion with water 1:1, 3h, 40°C	pass	pass

Packing: 1kg, 5kg containers. **Warranty period - 5 years in storage.**