











# ROCKBAR<sup>®</sup> COMPOSITE REBARS

#### Intended use

ROCKBAR® composite rebars are intended for reinforcement of prestressed and non-prestressed construction structures and elements, such as foundations of buildings and structures, concrete floors and road surface.

### Areas of application

ROCKBAR® should be used in accordance with the following design solutions:

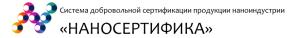
RESIDENTIAL	■ Foundations of buildings and structures	
CONSTRUCTION	■ Repair and reinforcement of bearing capacity of brick	
AND CIVIL ENGINEERING	and reinforced concrete structures	
	■ Reinforcement of concrete reservoirs, storages of	
INDUSTRIAL	treatment facilities, lids of sewage wells	
CONSTRUCTION	Elements of chemical production infrastructure	
CONSTRUCTION	■ Reinforcement of concrete floors	
	■ Hydraulic structures	
	■ Reinforcement of road surface	
ROAD ENGINEERING	Overhead poles	
	■ Road, airfield slabs; sulfur concrete slabs	
	■ Bridge deck slabs	
BRIDGE ENGINEERING	■ Bridge guardrails	
AND STRENGTHENING	■ Pedestrian footpaths	
	■ Reinforcement of onshore structures	
DAIL DOAD CONSTRUCTION	■ Elements of concrete sleepers for high speed	
RAILROAD CONSTRUCTION		







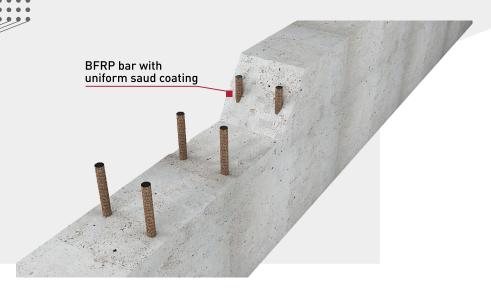




## **Advantages**

The use of ROCKBAR $^{\otimes}$  allows for increase of structure's lifetime, reduction of maintenance, reduction of costs for transportation due to the following characteristics:

ABSOLUTE CORROSION RESISTANCE, ALKALI RESISTANCE; HIGH STRENGTH; LIGHT WEIGHT; LOW THERMAL CONDUCTIVITY; DURABILITY; ABSOLUTE ECO-FRIENDLINESS, FIRE SAFETY.



#### Technical characteristics

Characteristic	BFRP rebars
Length	•
Tensile modulus, not less than	
Density	2.0 g/cm3
Thermal conductivity coefficient	< 0.46 W/(m°C)
Elongation coefficient	
Heat resistance	300 °C

# Physical and mechanical properties depending on rebars' diameter

	BFRP rebars		
Rebars' diameter	Ultimate tensile stress, MPa, not less than	Bending stress, MPa, not less than	
2	1000	1000	
4	1000	1000	
5	1000	1000	
6	1000	1000	
8	1000	900	
10	1000	900	
12	900	900	
14	800	900	
16	800	800	