# **TECHNICAL DATA SHEET**

RCF<sup>™</sup> High Strength Anchoring Epoxy Paste | Revision Date 05/05/2021

8383 Riley Street, Zeeland, MI USA 49464 **P**: +1 888 684 3889

## 01

#### 1. DESCRIPTION

RCF<sup>™</sup> High Strength Anchoring Epoxy Paste is a two-component, 100% solids, moisture-insensitive, high strength, high modulus, multi-purpose liquid epoxy gel adhesive. It meets the current ASTM C881 and AASHTO M235 T ypes I, II, IV & V Grade 3, Classes B & C specifications. It has passed 4 million cycles of simulated seismic tension test.

#### 2. WHERE TO USE

Use as an adhesive for setting/bonding subsurface or external reinforcements to concrete masonry or other substrates. Can also be used for reinforcing steel dowels, threaded rods, bolts, and inserts into existing concrete. Use as a multipurpose bond adhesive for structural bonding fresh or hardened concrete to hardened concrete, sealing cracks, setting injection ports prior to injection grouting, and as a pick-proof sealant.

#### 3. ADVANTAGES

#### Moisture tolerant

•High-strength, high modules structural adhesive

•Made in America

•Convenient 1:1 mix ratio by volume

Rapid cure formula
Agency Independent testing lab certification
Solvent free
No-sag gel consistency

#### 4. SHELF LIFE / S TORAGE

24 month shelf life when stored in unopened containers in dry conditions and stored at 40°F-95°F (4°C-35°C)

#### 5. TECHNICAL DATA

RCF™ High Strength Anchoring Epoxy Paste Technical Data		
Storage Conditions:		40°F − 95°F (5°C − 35°C).
Condition material to:		65°F – 85°F (18°C – 29°C) before using.
Mix Ratio		1:1 by volume
Viscosity		¼ inch no-sag gel
Gel Time (60 g mass)		10 minutes
Tack Free Time (73°F or 23°C)		2 to 3 hours
Tensile Properties (ASTM D638), 7 day cure Tensile Strength: Tensile Elongation:		7,500 psi (51.7 MPa) 1.2%
Bond Strength (ASTM C882)	1 day cure: 7 day cure:	2,000 psi (13.8 MPa) 2,500 psi (17.2 MPa)
Compressive Properties (ASTM D695), 7 day cure Compressive Strength: Compressive Modulus:		12,500 psi (86.2 MPa) 300,000 psi (2,070 MPa )
Shear Strength (ASTM D732)		2,800 psi (19.3 MPa)
Shrinkage on Cure (ASTM D2566)		0.001
Thermal Compatibility (ASTM C884)		Pass
Heat Deflection Temperature (ASTM D648)		140°F (60°C)
Water Absorption (ASTM D570)		0.1% (24 hr)

\*NOTE: Epoxy cure is affected by temperature. Low Temperatures will incr ease cure time, higher temperatures with decrease cure time.

#### 6. CONDITION PRODUCT

Condition cartridge and contents to a temperature of 65°F to 95°F (18°C - 35°C) for easier dispensing.

#### 7. LIMITATIONS & WARNINGS

Minimum substrate temperature is 40°F (5°C). Do not thin. Solvents will prevent proper cure.

#### 8. MANUFACTURER'S PRINTED INSTALLATION INSTRUCTIONS

For complete installation instructions on various applications using RCF <sup>™</sup> High Strength Anchoring Epoxy Paste visit www.rhinocarbonfiber.com or call Rhino Products for more information at 1-888-684-3889.



### 1-888-684-3889 | www.RhinoCarbonFiber.com

© All Rights Reserved

None of the authors, contributors, administrators, or anyone else connected with Rhino Products USA Inc. or any of its affiliates (collectively, "Rhino"), in any way whatsoever, can be responsible for your use of the information, instructions or advice contained in or linked from this or any related document. All liability with respect to actions taken or not taken based on the contents of this or any related document is hereby expressly disclaimed by Rhino. The content of this document is provided "as is;" no representations are made that the content is error-free.

## **TECHNICAL DATA SHEET**

RCF<sup>™</sup> High Strength Anchoring Epoxy Paste | Revision Date 05/05/2021

8383 Riley Street, Zeeland, MI USA 49464 **P:** +1 888 684 3889

#### 9. SURFACE PREPARATION

RCF<sup>™</sup> High Strength Anchoring Epoxy Paste is an ideal bonding agent for multiple surfaces including concrete, brick, stone, block, and metal. Surfaces must be clean and profiled or textured. New concrete must be a minimum of 28 days old. All dirt, oil, debris, wax, grease or dust must be removed. Prepare the surface mechanically using a s carifier, sandblast, shot blast, bush hammer or other equipment that will give the surface profile needed for the application. A roughened surface that exposes the aggregate and/or pores of the substrate is imperative for good adhesion.

#### 10. CLEAN UP

Clean tools and equipment with Rhino Carbon Fiber<sup>™</sup> Tough Wipes, a biodegradable formula that removes and neutralizes the epoxy. Do not allow epoxy to harden on equipment as cured material can only be removed mechanically .

#### 11. SAFETY

Please refer to the SDS for RCF<sup>™</sup> High Strength Anchoring Epoxy Paste published on our Website, www.rhinocarbonfiber.com or call Rhino Products for more information at 1-888-684-3889. This TDS sheet is not intended to list all Safety and Health Requirements necessary for the installation of these products. All Health and Safety Requirements required by OSHA shall be followed.

#### 12. WARRANTY

Rhino Products warrants to the Buyer that this product is in good quality and conforms to the manufacturer's specifications in force on the date of manufacture and when used in accordance with the Installation Instructions and when stored as directed in the technical literature.

Manufacturer cannot warrant or guarantee any particular method of use, performance or application under any particular condition and Buyer is responsible for determining the suitability of intended purpose and assumes all risks therein. RCF  $\stackrel{\text{\tiny M}}{}$  shall not be liable for any injury, loss, cost of labor or consequential damages either directly, indirectly or incidentally, arising out of the use or misuse of any product sold by RCF $\stackrel{\text{\tiny M}}{}$  or another distributor. If the product is proven to be in non-conformance, the Buyers sole remedy shall be a refund of the purchase price or replacement of product.



### 1-888-684-3889 | www.RhinoCarbonFiber.com

© All Rights Reserved

None of the authors, contributors, administrators, or anyone else connected with Rhino Products USA Inc. or any of its affiliates (collectively, "Rhino"), in any way whatsoever, can be responsible for your use of the information, instructions or advice contained in or linked from this or any related document. All liability with respect to actions taken or not taken based on the contents of this or any related document is hereby expressly disclaimed by Rhino. The content of this document is provided "as is;" no representations are made that the content is error-free.