



## RhinoChem 2170PW

### Technical Data Sheet

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**Part A: Isocyanate**

**Part B: Resin**

**DESCRIPTION:**

RhinoChem 2170PW is a two-component, 100% solids, rapid curing, elastomeric polyurethane lining system specifically designed for potable water applications. This product has passed the rigorous testing requirements of the NSF/ANSI 61 potable water standard and is NSF listed. It is also approved and listed under NSF 50 for pool and spa applications. RhinoChem 2170PW is designed to be spray applied using RhinoPro plural component spray equipment, in either either low pressure or high pressure configuration.

**FEATURES:**

- Excellent corrosion resistance.
- Excellent water and chemical resistance.
- Excellent flexibility for impact and abrasion resistance.
- Complies with NSF/ANSI 61 Potable Water Standard.
- Complies with NSF/ANSI 50 Pool and Spa Standard
- 100% solids with no VOCs or solvents.
- Stable from -40°C to 100°C.

**RECOMMENDED USES:**

- Durable yet flexible protective lining with excellent water and chemical resistance for applications such as:
  - Water tank linings
  - Primary and secondary containment.
  - Chemical processing equipment, bund areas, tank lining and wet wells.
  - Sewerage, Water and waste water plants.
  - Immersion service in various liquids.
- Spray-on application creates a monolithic, seamless lining which conforms to any shape and size.

**TYPICAL PHYSICAL PROPERTIES OF RhinoChem 2170PW**

Hardness (Shore D)	70±5	ASTM D-2240
Tensile Strength (psi)*	2000 - 2200	ASTM D-412
Elongation (%)	60-80	ASTM D-412
Taber Abrasion Resistance (mg of loss/1000 cycles)		
CS17 Wheel: 1000 grams weight	50 - 55	ASTM D-4060
Tear Resistance (pli)* Die C	190-210	ASTM D-624
Impact Resistance(2.5mm thick sample)	No cracking deterioration	Gardner Tester

\* Properties were checked using RhinoChem 2170PW at 3mm thick.

**PROCESSING CHARACTERISTICS:**

RhinoChem 2170PW can be applied using either high or low pressure, plural component spray equipment such as the RhinoPro Hi-Flow or the RhinoPro HP21 spray machines. When using Rhino Low pressure application equipment heating of the chemical is not required however optimum mixing will occur if the chemical is at 25C. When using high - pressure application equipment a recommended starting point for heater settings is 55C on the primary heaters and 60C on the hose heaters. Spray pressure (not static pressure) should be a minimum of 1800psi. Adjust according to ambient and substrate temperatures and the specific application.

Initiation	20-30 secs
Gel Time	50-60 secs
Tack Free time	90 secs
Cure time – 98%	24 hours
Re-Coat time (max without priming)	6 hours
Mix ratio	2:1

**SUBSTRATES:**

Concrete, fibreglass, metals, wood and geotextiles.

**DRY FILM THICKNESS RANGE:**

Varies based on application, typically used at 2mm – 6mm. Thickness can be unlimited in one application.

**SHELF LIFE**

Store product in a dry environment away from direct sunlight. Recommended storage temperature is 25C.

Part A – Isocyanate: Nine months, unopened.

Part B – Resin: Nine months, unopened.

**COLOUR OPTIONS:**

Base colour is off-white. Certain custom colours are also available.

**SAFETY PRECAUTIONS OF RhinoChem 2170PW:**

**Health Considerations: Consult the Rhino Linings Material Safety Data Sheets.**

The uncured components of Rhino RhinoChem 2170PW can cause irritation to the eyes, skin, mucous membranes and are harmful if swallowed. When handling, avoid contact with eyes and skin (especially open cuts). In case of contact, immediately wash off with plenty of water for at least fifteen (15) minutes. For eyes, obtain medical attention. Always wash hands before eating. Obtain immediate medical attention in case of ingestion.

Rhino RhinoChem 2170PW contains isocyanates and may cause allergic skin or respiratory reactions. Do not use if you have chronic breathing problems (asthma) or if you have ever had reactions to isocyanates. When applying Rhino RhinoChem 2170PW, avoid breathing harmful vapours. Fresh air-supplied standard painter's hood and full face respirator must be worn by all personnel entering the area where Rhino RhinoChem 2170PW is being spray applied until all vapours have been exhausted. In case of extreme exposure or adverse reaction, remove affected personnel to fresh air immediately and obtain medical help.

Rhino RhinoChem 2170PW components are combustible liquids Class IIIB. Store and transport according to regulation.

**Important: Consult the Rhino Linings Material Safety Data Sheets.**

Read and follow warning labels on all components. For professional use only. Follow cautions and handling guidelines in Rhino Linings Technical Reference Manual. The information herein is believed to be reliable, but unknown risks may be present. All warranties of any kind, expressed or implied, including warranties of fitness for a particular purpose, are specifically disclaimed.

**For Your Protection**

The information and recommendations in this publication are, to the best of our knowledge, reliable. Suggestions made concerning the products and their uses, applications, storage and handling are only the opinion of Rhino Linings Australasia Pty Ltd. Users should conduct their own tests to determine the suitability of these products for their own particular purposes and of the storage and handling methods suggested. The toxicity and risk characteristics of products made by Rhino Linings Australasia Pty Ltd will necessarily differ from the toxicity and risk characteristics developed when such products are used with other materials during a manufacturing process. The resulting risk characteristics should be determined and made known to ultimate end-users and processors. Because of numerous factors affecting results, **Rhino Linings Australasia Pty Ltd makes no warranty of any kind, express or implied**, other than that of the material conforms to its applicable current Standard Specifications. Rhino Linings Australasia Pty Ltd hereby disclaims any and all other warranties, including but not limited to those of merchantability or fitness for a particular purpose. No statements made herein may be construed as a representation or warranty. The liability of Rhino Linings Australasia Pty Ltd for any claims arising from or sounding in breach of warranty, negligence, strict liability, or otherwise shall be limited to the purchase price of the material.

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