

Specification Document Product: SpecHard - Intraseal

DIVISION 3 - CONCRETE
Section 03 05 00 - Concrete Mixing
Section 03 39 00 - Concrete Curing
Section 03 55 50 - Polished Concrete Floors

Part 1 - General

1.01 Summary

- A. This specification covers the use of SpecHard Intraseal as a densifying sealer for concrete surfaces.
- B. Intended for use in both new construction and repair projects.

1.02 Quality Assurance

- A. Manufacturer qualifications: SpecChem must have an ongoing quality assurance program, independently audited regularly.
- B. Comply with all safety and environmental conditions as recommended by SpecChem and local, state, and federal regulations. Refer to Safety Data Sheets (SDS) for safety and handling practices.

1.03 Delivery, Storage, and Handling

- A. Deliver materials in original, unopened containers with labels intact.
- B. Store materials off the ground, protected from the elements.
- C. Follow manufacturer's recommendations for product conditioning.

1.04 Job Conditions

- A. Environmental Conditions: Apply only when the temperature is above 40°F and below 95°F.
- B. Protect adjacent areas to prevent damage during application.



1.05 Submittals

A. Provide SpecChem Technical Data Sheet (TDS) and Safety Data Sheets (SDS).

Part 2 - Products

2.01 Manufacturer

A. SpecHard - Intraseal as produced by SpecChem.

2.02 Materials

- A. Lithium silicate-based concrete densifier and sealer.
- B. Available in liquid form ready to use.

2.03 Performance Criteria

- A. Improved Abrasion Resistance
 - **ASTM C-779**: >26%
- B. Improved Compressive Strength
 - **ASTM C-140**: >14%
- C. Improved Impact Resistance
 - **ASTM C-805**: >10%
- D. Reduced Permeability
 - **ASTM C-642**: >76%
- E. Reduced Vapor Transmission
 - **ASTM E-96**: >8.0 gm/hr/sq-ft
- F. Depth of Penetration
 - 3.5 mm
- G. Weatherability/UV Stability
 - **ASTM G-23**: No change
- H. Specific Gravity
 - 1.16



I. USDA Acceptance

Yes

J. Water Requirements

- Water requirement: Approximately 41% by weight
 - For example, 40 pounds of Final Finish require 15.8 to 16.0 pints of water
 (1.9 to 2.0 gallons).

K. Physical Properties

• Color: Clear

L. Environmental and Application Conditions

- **Apply above 40°F & rising**. Protect from rain or excess water until cured. Avoid extreme weather conditions such as intense heat and wind.
- Packaging and Coverage:
 - Packaging: Available in 55-gallon drums (208.2 L) and 5-gallon pails (18.9 L).
 - Coverage:

Hard Troweled Finish: 200-350 ft²/gal

Broom or Float Finish: 150-250 ft²/gal

Rough Slab Finish: 150-200 ft²/gal

• Old Concrete: 150-250 ft²/gal

Part 3 - Execution

3.01 Surface Preparation

- A. Ensure Cleanliness: The concrete must be clean and free from oil, grease, dust, laitance, or any surface contaminants.
- B. Existing Concrete: Surface must be open textured and absorbent.
- C. New Concrete: Allow curing for a minimum of 28 days unless using moisture-tolerant products.



3.02 Mixing and Application

- A. Product requires no mixing; ready to use as delivered.
- B. Apply with a low-pressure sprayer or roller.
- C. Coverage: Approximately 300-500 sq ft per gallon, depending on surface porosity.

3.03 Placement Procedure

- A. Apply a single, uniform coat ensuring complete coverage.
- B. Allow material to penetrate for up to 30 minutes. Remove excess material thoroughly with squeegees or mops.

3.04 Finishing/Curing

- A. SpecHard Intraseal does not require additional finishing once applied.
- B. Product is self-curing; no additional measures are necessary under normal conditions.

3.05 Cleaning

A. Clean tools and equipment with water before the product hardens.