

Excel-Coat Epoxy Coatings

Application Guide

Garage Floor Coatings (Vinyl Chip or Solid Color Finish)

MATERIALS & TOOLS

MATERIALS

- Excel-Coat Primer PC-155
- Excel-Poxy 122 - Epoxy Intermediate Coat
- Excel-Thane CRU Polyurethane Clear Coat
- Vinyl Chips or 30-60 mesh Bleached Aluminum Oxide
- Epoxy Crack Repair Material
- Urethane Sealant

TOOLS

- Cartridge-Type Respirator
- Roller Frame
- 3/8" Nap Phenolic Roller Cover
- Wallboard Scraper
- Brushes
- Shop Vac
- Drill Motor & Mixing Attachment
- Red or White 12"-18" Squeegee
- Protection Cloth or Paper
- Tape
- 3-5 Gallon Pails for Mixing
- Stiff-Bristle Broom
- Spiked Shoes or Golf Shoes with Spikes

SURFACE PREPARATION

CONCRETE

1. All surfaces must be clean, sound and free of mastics or other contaminants that may interfere with bonding.
2. Curing of concrete shall be by means of water cure or dissipating compounds. Curing compounds shall be approved by an authorized representative of Excellent Coatings International.
3. Concrete shall be cured a minimum of 28 days prior to installation of the Excel-Coat Garage Floor Coating System.
4. On-grade slabs should have an effective moisture vapor barrier in place.
5. On-grade substrates shall be tested for moisture vapor prior to application of the garage floor coating. Test according to ASTM Standard Practice E 1907-97. Calcium Chloride test results shall not exceed more than 3.0 pounds per 1,000 square feet per 24 hours.
6. Concrete finish shall be power metal float followed by a fine - medium hair broom finish or equivalent.
7. Concrete surfaces shall be free of excessive roughness, voids and protrusions.
8. Concrete shall be steel shot blasted or acid etched to assure a clean open surface. Surface profile should be

between 5.0-10.0 mils. If acid etching neutralize well, rinse thoroughly with clean water. Allow to dry thoroughly. (pH level shall be between 7.0-8.5.)

9. All tooled joints and control joints shall be routed, primed and caulked with a sealant approved by Excellent Coatings International. Moving structural cracks should be primed and filled with an epoxy crack repair material.
10. Apply primer at a rate of 250 square feet per gallon. Allow primer to cure for 2-4 hours or until tack is gone. Cold or inclement weather will affect the cure time of all Excel-Coat products. Do not exceed 24 hours recoat window.

Note: Pot life of primer is brief. It may be best to mix half of the two-gallon kit at a time.

A degreaser may be necessary prior to shot-blasting if floor has an accumulation of grease and oil.

APPLICATION

INTERMEDIATE COAT & BROADCAST

1. Mix the Excel-Poxy 122 for 4 minutes at a low to medium speed with a drill motor and mixing attachment.
2. Apply material at the rate of 200 square feet per gallon to yield 8.0 Mils dry. Pour material in a ribbon pattern and use a red or white squeegee to pull the material tight over the substrate. Using a 3/8" nap phenolic core roller, back roll the material, keeping the roll cover wet at all times.
3. Vinyl Chip Broadcast: Immediately following application of Excel-Poxy 122 Epoxy, chips may be broadcast into the wet material. Wear spiked (golf) shoes to gain access to the wet area during broadcast process. Broadcast chips by hand or by use of a sprinkling can. Chips may be broadcast for 100% coverage using 5-6 lbs. per 100 square feet or for a lighter sprinkling, use 3-4 lbs. per 100 square feet. Monitor the application carefully for even coverage over the entire area. Allow to dry approximately 6-8 hours.
4. Aggregate Broadcast: For a solid color floor having a non-skid finish broadcast 36-60 mesh, bleached aluminum oxide. Wear spiked (golf) shoes to gain access to the wet area during broadcast process. Broadcast carefully by hand to achieve an even texture over the entire area. Ensure that aggregate is adequately embedded into at least 5.0 mils of wet material. Allow to dry approximately 6-8 hours.

Sweep the surface with a stiff bristle broom so that chips or aggregate are lightly scraped and those setting on an angle are removed. Using a wallboard scraper, scrape the surface carefully in one direction to remove loose and angled chips. Repeat the process in the

other direction. Thoroughly sweep or blow floor clean of any remaining loose chips.

If using aluminum oxide, use a stiff bristle broom to sweep the entire surface to remove any loose aggregate.

CLEAR OR PIGMENTED SEAL COAT(S)

Clear Finish:

For a clear finish, mix Excel-Thane CRU according to manufacturer's directions. Apply material in a ribbon pattern and squeegee material tight to surface and back roll, ensuring that the roller cover stays wet at all times. Apply material at the rate of 350 square feet per gallon. Allow seal coat to dry 12-24 hours before applying a 2nd clear coat. Do not exceed 24 hours between coats. Allow material to dry 3-5 days before driving onto surface.

Pigmented Finish:

For a pigmented finish over aluminum oxide texture, apply Excel-Poxy 122 in the same manner as above. A second pigment coat using Excel-Poxy 122 is optional.

Note: Refer to individual data sheets for product information regarding mixing instructions and coverage rates.

Note: Be sure to look across the surface when applying seal coats to ensure there are no puddles. Puddles should be rolled out to provide a smooth consistent finish.

ADDITIONAL CLEAR SEAL COAT (Optional)

A final clear coat may be applied to the pigmented seal coat or the clear seal coat in the same manner as the previous seal coat. Allow material to dry 3-5 days before driving onto surface.

IMPORTANT NOTES

- Read individual Product Data Sheets for each product used in the system.
- System should be applied by a professional, experienced flooring contractor.
- On-grade slabs must have vapor barriers.
- This system is not recommended for areas exposed to sunlight.
- Airflow and ventilation is required to ensure proper cure and applicator protection.
- Application temperature should be between 60 – 80 degrees F.
- Concrete should have profile of 5.0-10.0 mils; similar to 80 grit sandpaper.
- Epoxy floor coatings are slippery when water or fluids are on them. Ensure that adequate non-skid material is included for the specific application.