



Milamar PM DCS 200-500

Full Broadcast System

Milamar's **PM DCS** system is a decorative chip/flake floor system with good chemical and abrasion resistance. It is comprised of an epoxy primer and/or color receiving coat and a chemical resistant urethane topcoat.

COMPONENTS

Primer (suggested for rough, porous or shot blasted concrete)

PM100 - Clear Epoxy

PM 125, PM 126 or PM 127 - Hardeners

Receiving Coat

PM200 "A" - Fully Pigmented Industrial Epoxy

PM200 "B" - Hardener

Chips/flakes

Finish Coat

PM 500 - Part "A" Ultra Chemical Resistant Urethane

PM 500 - Part "B" Hardener

(Mix ratio is 2 parts "A" to 1 part "B" by volume)

Optional Finish Coat (Not for exposure to UV)

PM 101 - Clear Epoxy

PM 125 - Hardener

OPTIONAL: Various grades of silica, quartz, white aluminum oxide or glass aggregate can be added for additional slip resistant properties.

RECOMMENDED COVERAGE RATE

150-200 sq.ft. per gallon Epoxy Primer

150-200 sq. ft. per gallon Epoxy Receiving Coat

150-200 sq.ft. per gallon, per coat, Epoxy Finish Coat

175-250 sq. ft. per gallon, per coat, Urethane Finish

NOTE: Consumption rate will be dramatically higher on non-primed or porous substrate.

PREPARATION

(See Floor Preparation Section)

CAUTION

Make certain all personnel has read and fully understood all safety precautions on product labels and Material Safety Data Sheets.

INSTALLATION

Step 1. Mixing

Carefully mix 1 gallon of Milamar PM Epoxy Part "A" with 1/2 gallon of appropriate Milamar PM Part "B" Hardener (see above). Mixing should be done with a 1 gal. Jiffy Mixer and a low speed drill (max. 650 rpm) for a minimum of 2 minutes. NOTE: Larger quantities of epoxy may be mixed if there is sufficient manpower to squeegee and roll before epoxy begins to set up.

Step 2. Priming (Optional)

Milamar PM epoxy primer, PM 100 is designed to be applied by a squeegee or trowel then slowly back rolled. Do not entrain air into the primer by vigorous rolling action.

Application of Primer

Pour entire contents of mix onto floor in a continuous ribbon. Slowly move and level the mixture with a flat squeegee or trowel, then back roll with a medium nap 1/4"-3/8" phenolic core roller to remove any squeegee or trowel marks. A standard 1 ½ gallon mix should cover approximately 300 sq. ft. (200 sq.ft. per gallon) but this will vary depending upon the porosity and texture of the concrete.

NOTE: Larger quantities of epoxy may be mixed if there is sufficient manpower to squeegee and roll before epoxy begins to set up. Working time is approximately 30 minutes for PM 100/125, 20 minutes of PM 100/126 and 10 minutes for PM 100/127 @ 75°F.

Cure Time: Allow to cure until surface is tack free.

CAUTION: If oily film caused by unusual environmental conditions is present on first coat, call TELE TECH at 1-800-459-7659 for information on removal before applying additional coats.

NOTE: If first coat has cured over 24 hours before additional coats can be applied, the receiving coat should be lightly sanded with a medium grit sanding pad and then vacuumed or swept and wiped with solvent.

Step 3. Application of Receiving Coat

When epoxy primer is no longer tacky, mix PM 200 Parts "A" & "B" as noted above in Step 1. Pour entire contents of mix onto floor in a continuous ribbon. Slowly move and level the mixture with a flat squeegee or trowel, then back roll with a medium nap 1/4"-3/8" phenolic core roller to remove any squeegee or trowel marks. A standard 1 ½ gallon mix should cover approximately 300 sq. ft. (200 sq.ft. per gallon) but this may vary depending upon the job specification.

NOTE: Larger quantities of epoxy may be mixed if there is sufficient manpower to squeegee and roll before epoxy begins to set up. Working time is approximately 30 minutes @ 75° F for PM 200.

Full Broadcast

Immediately while PM 200 is still wet, broadcast blended chips/flakes. Broadcasting is done by tossing chips/flakes into the air and letting it rain down on the wet epoxy. Continue broadcasting till floor looks dry, completely covered with no wet spots on surface. A blower can be used to spread excess chips/flakes from heavy to light areas for chip uniformity after chips/flakes have had time to set into the wet epoxy, approximately 20-30 minutes. Be careful not to blow dirt into chips/flakes.

To enhance even distribution of the chips/flakes, it is recommended that the broadcast installer wear spiked shoes (old golf shoes are acceptable) to allow him to walk in the wet epoxy and stay close to the broadcast area.

Cure Time: Allow to cure until surface is tack free or a minimum of 12 hours before coating with epoxy or urethane finish.

After fully cured blow excess chips into a corner and collect for future use. A hard bristle push-broom will remove all other excess chips not bonded to epoxy.

Step 4. Application of Urethane

First topcoat of Urethane

Lightly scrape off any high points prior to coating. Carefully mix 1 gallon of PM 500 Part "A" with 1/2 gallon PM 500 Part "B". Mixing should be done with a Jiffy Mixer and a low speed drill (maximum 650 rpm to avoid bubbling) for a minimum of 2 minutes. Be sure to premix PM 500 Part "A" before mixing with Part "B" as settling may occur during shipping and storage.

Apply PM 500 with a sturdy, long handled, roller frame and a 3/8" napped, non-shedding roller cover being careful not to work the material which may introduce air into the application. A standard 1 1/2 gallon mix should cover approximately 300 sq.ft. (200 sq.ft. per gallon) on a partial broadcast surface and 260 sq.ft. (175 sq.ft. per gallon) on a full broadcast surface. Working time is approximately 20 minutes @ 75°F for PM 500.

Additional topcoat may be installed in the same manner as above after overnight cure at 75° F.

Second topcoat of Urethane

Full broadcast systems typically require a second topcoat of Urethane for best uniformity and gloss. Sand surface to knock off any irregularities and any high points created by the chip distribution. Surface should be lightly sanded with a medium grit sanding pad and then vacuumed or swept and wiped with solvent. Apply the final coat as detailed above.

For skid resistance, fine transparent slip resistant aggregate can be used. PM500 should be mixed thoroughly before adding slip resistant aggregate. Amount of slip resistant aggregate will vary in amount and texture depending on materials used. We recommend a sample of the slip resistant aggregate be tested with the PM500 prior to application for acceptance of texture and appearance by the owner.

Optional Step 4. Clear Epoxy Finish (for interior, non UV exposure)

When applying a Clear Epoxy Finish, two coats of clear are recommended.

First coat. Lightly scrape off any high points prior to coating. Carefully mix 1 gallon of PolyMax PM101 Epoxy Part "A" with 1/2 gallon of PolyMax PM125 Part "B" Hardener. Mixing should be done with a 1 gal. Jiffy Mixer and a low speed drill (max. 650 rpm) for a minimum of 2 minutes. NOTE: Larger quantities of epoxy may be mixed if there is sufficient manpower to squeegee and roll before epoxy begins to set up.

Pour entire contents of mix onto floor in a continuous ribbon. Slowly move and level the mixture with a flat squeegee or trowel, then back roll with a medium nap 1/2" phenolic core roller to remove any squeegee or trowel marks. A standard 1 1/2 gallon mix should cover approximately 225 sq. ft. (150 sq.ft. per gallon) but this will vary depending upon the texture of the chips/flakes to be covered. NOTE: Larger quantities of epoxy may be mixed if there is sufficient manpower to squeegee and roll before epoxy begins to set up. Working time is approximately 30 minutes for PM 101/125. Fast cure hardeners are not recommended for this step.

Cure Time: Allow to cure until surface is tack free, minimum 10 hours.

Second coat. Sand surface to knock off any irregularities and any high points created by the chip distribution. Surface should be lightly sanded with a medium grit sanding pad and then vacuumed or swept and wiped with solvent. Apply PM 101 and/or PM 500 as the final coat as detailed above.

Return to Service

Normally allow new floor to cure a minimum of 24 hours @ 75°F before returning floor to light duty service and 48 hours @ 75°F before returning floor to full service. Be certain that the floor is no longer tacky and hard before turning over to customer. Vehicles with rubber tires should not be parked on finished system within 72 hours of installation at 75° F.

The Decorative Chip system can be installed in different ways varying the amount of chips and top coats. The information above is to be used as a guideline. The coverages and times provided may vary due to temperature, humidity, mixing time, concrete surface and preparation used.