

DURO-WEAR

Heavy Duty Wear Resistant Lining

GENERAL DESCRIPTION

DURO-WEAR is a specially formulated 100% solids epoxy lining, used for the protection and repair of areas subjected to severe abrasion and impact. Areas coated with **DURO-WEAR** are tough, abrasion and chemically resistant to a wide range of environments.

FEATURES

- Good chemical resistance
- Outstanding resistance to abrasion
- Outstanding resistance to impact
- Easy to apply
- Self-Priming

PACKAGING

DURO-WEAR is available in 5 kg and 11 kg kits.

COVERAGE

DURO-WEAR has the consistency of a heavy paste. Theoretical coverage at 250 mils is 84 sq. in. /kg

MIXING RATIO

5 parts base (B) to 2 part (A) hardener by weight
2 parts base (B) to 1 part (A) hardener by volume
3 parts Ceramic Beads to 1 part actives by weight
3 parts Ceramic Beads to 2 part actives by volume

POT LIFE

Pot life for a unit mixed with sand is about 30 minutes at 70° F. Higher temperatures or larger volumes will shorten this time. Lower temperatures or spreading out the mix will extend the pot life.

COLORS

DURO-WEAR is dark grey in color. Other colors are available by special order.

TECHNICAL DATA AND INFORMATION

Basic Chemical Resistance at Room Temperature:

Inorganic Acids	Very Good
Organic Acids	Very Good
Solvents	Good
Alkalis	Excellent
Salts	Excellent
Alcohols	Excellent
Hydrocarbons	Excellent

Typical Physical Properties of Cured System:

Density	2.9
% Solids	100
Flexural Strength @ 70°F	>10,000 psi
Tensile Strength @ 70°F	>10,000 psi
Tensile Adhesion @ 70°F	>1,800 psi
Max. Dry Operating Temp	500°F
Compressive strength	>12,000 psi
Operating pH Range	1.5-14.0

SURFACE PREPARATION

- For maximum adhesion, material should be applied to a firm, clean, dry and abraded surface.
- Clean greasy, oily or waxed surfaces with suitable solvent before applying material.
- Best results will be obtained by abrasive blasting or grinding to give a surface profile.



Registered
to ISO 9001

MIXING & APPLICATION

Before mixing, make sure all surfaces are clean and dry.

Use complete units to insure correct mix ratio. Place the Base (B) portion of the Kit into a suitably sized and clean mixing container. Add the Hardener (A) to the Base (B) and mix for about 30 seconds. Once mixed, add the ceramic beads to obtain the desired consistency. Blend until thoroughly wetted, about 1 to 2 minutes. For a dryer mix use more beads, for a more fluid mix use less beads. Material temperature should be between 70° and 95°F and surface temperature at least 40°F.

- Min. Thickness/Coat (mils) 90
- Max. Thickness/Coat (mils) 2000
- Number of Coats 1-2
- Min. Application Temperature (°F) 40

CLEANUP

Most solvents and commonly used thinners such as MEK, acetone, xylene, 1,1,1 trichloroethane, and safety solvents such as Ensolv, etc., can be used for cleaning tools and equipment. However, as many of these materials are flammable or present other safety hazards, the user should read the MSDS for these materials before using. In no event should these materials be used to clean material from the skin, eyes or clothing.

OVERCOATING

Vacuum, sweep, or otherwise remove all loose sand from the above surface. The resulting rough sand textured surface may be coated with a variety of topcoats, depending on the application and additional desired features.

DURO-WEAR Overcoating Window

55°F	70°F	85°F
10 - 48 h	6 - 36 h	4 - 24 h

CURING @ 70°F

- Dry to Touch (hours) 8
- Functional Cure (hours) 36
- Full Cure (hours) 120

Q/C

The material should be visually inspected just after application and touched up where necessary. Because of the concrete surface, Q/C techniques are limited. Therefore extreme care must be used when inspecting the surface for imperfections.

FORCE CURING

Force cures are recommended for severe service conditions as both the physical and chemical properties are enhanced. Force curing should not start until material has firmly set.

Recommended Force Cure Schedule:

- Full Cure 4 hours @ 180°F
- Functional Cure 8 hours @ 120°F

STORAGE/SHELF LIFE

Store in dry area in closed containers between 50°F and 100°F. Shelf life at these conditions is greater than one year.

HEALTH AND SAFETY

READ AND UNDERSTAND ALL MATERIAL GIVEN IN THE MSDS SHEETS BEFORE USING THE PRODUCT.

DURO-WEAR DOES NOT CONTAIN ANY FLAMMABLE MATERIAL OF ANY KIND. HOWEVER, THE MATERIAL IS COMBUSTIBLE. IN THE EVENT OF A FIRE, DRY POWDER, FOAM, OR CARBON DIOXIDE FIRE EXTINGUISHERS SHOULD BE USED. FIRE FIGHTERS SHOULD WEAR RESPIRATORS.

USE PROTECTIVE GLOVES AND EYEGASSES WHEN USING.

USE IN AREAS OF GOOD VENTILATION.

LIMITED WARRANTY

All recommendations covering the use of this product are based on past experience and laboratory findings. Methods or conditions of application and use of the product are beyond our control. We assume responsibility only for the uniformity of our product within normal manufacturing balances.

All Duromar products are formulated based on over 25 years of experience, laboratory tests, material data, field installations, and technical publications, which we believe to be, to the best of our knowledge, accurate and reliable. This information is intended to be used for guidance only. Because the only true reliable test is one that is in actual operation, Duromar will make available at no charge samples of materials for that testing purpose. Duromar, Inc. has no control over either the quality or condition of the substrate, or the many factors affecting the use and application of the product. Duromar, Inc. does, therefore, not accept any liability arising from loss, injury, or damage resulting from such use or the contents of this data sheet (unless there are written agreements stating otherwise). The data contained herein is liable to modification as a result of practical experience and continuous product development. This data sheet replaces and annuls all previous issues, and it is, therefore, the user's responsibility to ensure that this sheet is current prior to using the product.

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