

# HYDROFLEX

MORTAR-TLHF-315 / DRX-307



## HYDROFLEX

Adhesive for Ceramic, Vitrified Tiles,  
Natural Stone & Tile-On-Tile Application



[www.duroxx.com](http://www.duroxx.com)



Polymer modified thin-set tile adhesive for fixing ceramic tiles, vitrified tiles, natural stones & tile-n-tile applications. It is suitable for both vertical & horizontal surfaces over the cementitious substrates for interior.



### Features / Benefits

- Single component, just add water
- Economical & Easy to use
- Interior applications, polymer based
- Bonds to various substrates
- Complies with EN / ISO with a C1TE classification.
- Exceeds IS 15477:2019 – Type 2T Adhesive standards.
- Can be fortified with latex admix for external Tile and Stone installations.

### Application

Designed especially for dry areas of interior floor and interior wall installations of all types of ceramic tile and small format natural stones over concrete and on a variety of cement-based substrates. Can be used up to maximum 12mm bed thickness.

### Substrates

- Cement Plaster
- Concrete
- Concrete Masonry
- Cement Mortar Beds
- Ceramic Tile, Vitrified Tile
- Regular Natural Stone, Tile-On-Tile\*
- Brick Masonry
- Cement Terrazzo

\* Surface to be cleaned and roughened before installation of tiles or stones.

### Certification

ISO 9001 : 2015

HYM International Certifications Pvt. Ltd.



Certificate No. : Q9186414975



Authorized signature  
For HYM International Certifications Pvt. Ltd.

PERFORMANCE PROPERTIES

**HYDROFLEX**

Adhesive for Ceramic, Vitrified Tiles,  
Natural Stone & Tile-On-Tile Application



APPLICATION PROPERTIES

TESTING PROPERTIES	TEST RESULTS
Tentative Mixing Ratio (Powder: Water)	1:0.20-0.28 by volume 1:0.20-0.22 by weight approx.
Mixed Density	1.60-1.85 kg/litre
Open Time (IS 15477: 2019)	Approx. 30 minutes
Adjustability (IS 15477: 2019)	Approx. 35 minutes
Pot Life	Approx. 120 minutes
Sag/Slip	$\leq 0.50$ mm
VOC Content (EPA 24)	$< 1.20$ gm/kg
Application Temperature (substrates and materials)	5°C to 35°C
Adhesive Thickness	3-12 mm
Setting/Trafficable/Grouting Time	24 hours

PERFORMANCE PROPERTIES AS PER IS 15477: 2019 (TYPE 2T)

TESTING PROPERTIES	REQUIREMENT	TEST RESULTS
a) Tensile Adhesion at Dry Condition	$\geq 1.00$ N/mm <sup>2</sup>	1.10-1.18 N/mm <sup>2</sup>
b) Tensile Adhesion at Wet Condition	$\geq 1.00$ N/mm <sup>2</sup>	1.10-1.20 N/mm <sup>2</sup>
c) Shear Adhesion at Dry Condition	$\geq 1.25$ N/mm <sup>2</sup>	1.25-1.35 N/mm <sup>2</sup>
d) Shear Adhesion at Wet Condition	$\geq 1.00$ N/mm <sup>2</sup>	1.10-1.20 N/mm <sup>2</sup>
e) Shear Adhesion at Heat Ageing	$\geq 1.00$ N/mm <sup>2</sup>	1.10-1.20 N/mm <sup>2</sup>
f) Slip Resistance (T)	$\leq 0.50$ mm	0.40-0.45 mm

PERFORMANCE PROPERTIES AS PER ISO 13007 AND EN 12004 (C1TE)

TESTING PROPERTIES	REQUIREMENT	TEST RESULTS
a) Tensile Adhesion strength after 28 days	$\geq 0.50$ N/mm <sup>2</sup>	$\geq 1.0$ -1.2 N/mm <sup>2</sup>
b) Tensile Adhesion strength after water immersion	$\geq 0.50$ N/mm <sup>2</sup>	$\geq 0.5$ N/mm <sup>2</sup>
c) Tensile Adhesion strength after heat ageing	$\geq 0.50$ N/mm <sup>2</sup>	$\geq 0.5$ N/mm <sup>2</sup>
d) Tensile Adhesion strength after freeze-thaw cycle	$\geq 0.50$ N/mm <sup>2</sup>	$\geq 0.5$ N/mm <sup>2</sup>
e) Slip Resistance	$\leq 0.50$ mm	$\leq 0.4$ -0.45 mm
f) Extended open time (at 30 minutes)	$\geq 0.50$ N/mm <sup>2</sup>	$\geq 0.64$ -0.69 N/mm <sup>2</sup>

Note: Test results are indicative as per testing method specified in standard. Test results may vary as per substrate, site condition & testing machine etc. Actual field performance will depend on installation methods and site conditions.



Packaging:

20 kg bags

Colour:

Grey

### INSTALLATION

#### Surface Preparation:

All surfaces should be between 10°C and 40°C and structurally sound, clean and free of all dirt, oil, grease, loose peeling paint, laitance, concrete sealers or curing compounds.

Check the surface to be true to plumb. All slabs must be plumb and true to within ¼" (6mm) in 10 ft (3m). Rough or uneven concrete surfaces should be made smooth with Screed/Plaster material to provide a wood float (or better) finish.

Dry, dusty concrete slabs or masonry should be dampened and excess water swept off. Installation may be made on a damp surface. New concrete slabs shall be damp cured and 28\* days old before application.

\*No minimum cure time for concrete slabs when thin-set mortar is mixed with latex additive.

Expansion joints shall be provided through the tile work from all construction or expansion joints in the substrate. Do not cover expansion joints with thin set mortar. Follow ANSI Specification AN-3.8 "Requirements for Expansion Joints" or TCA Detail EJ171 "Expansion Joints". For tile installation over Cement Backer Board: follow TCA installation details W244.

#### Mixing:

Place clean, potable water into a clean mixing bowl. Add **HYDROFLEX / DRX-307** powder into the mixing bowl. Use approximately 5 – 6 Ltr of water for 20 kg of powder.

Mix by hand or with a slow speed mixer to a smooth, trowelable consistency. Allow adhesive to slake for 4-5 minutes. Adjust consistency if necessary. Remix and apply with the proper sized notched trowel.

Note: Addition of DUROMIX latex admix\*, partially or completely replacing water would enhance the bond strength, flexibility of the thinset mortar.

Coverage:

Approx. 55-60 Sft per 20 Kg pack, using 1/4" x 1/4" (6mm x 6mm) square notched trowel for a bed of 3mm.

*Coverage will vary depending on trowel notch size, type and size of tile and substrate smoothness and evenness.*

Specifications subject to change without notification. Results shown are typical but reflect test procedures used. Actual field performance will depend on installation methods and site conditions.

\* Contact DUROXZ technical services for large format tile or stone installations on exterior surfaces.

### APPLICATION

Apply adhesive to the substrate with the flat side of the trowel, pressing firmly to work into surface. Comb on additional adhesive with the notched side. Use the proper sized notched trowel to ensure full bedding of the tile. Spread as much adhesive as can be covered with tile in 10 minutes. Back butter large format tiles (> 12"x12") to provide full bedding and firm support. Place tiles into wet, sticky adhesive and beat in using a beating block and rubber mallet to imbed tile and adjust level. Check adhesive for complete coverage by periodically removing a tile and inspecting bedding adhesive transfer onto back of tile. Use of spacer is recommended to provide grout joints between tiles / stones. The joint width shall be as per the recommendation of architect / engineer. Remove the spacers when the adhesive is set firm.

If adhesive is skinned over (not sticky), remove and replace with fresh adhesive.

For highly absorbent natural stones which may form a wet patch when adhesive is used, it is recommended to use suitable impregnating sealers on all sides. Duromix Latex admix can also be used as a bottom coat for natural stones to prevent or reduce wet patches during installation. Please refer Technical Data Sheets of product intended for use for specific instructions of use.

#### Grouting:

Grout installation shall be commenced after a minimum of 24 hours curing time at 21° C. Grout with Sanded or Unsanded Grout mixed with DUROMIX Grout Admix. For maximum stain resistance of Internal spacer joints applications, use DUROPOXY-15K EPOXY Grout.



**DUROXZ ITAL CHEMTECH PVT. LTD.,**

Kirlampudi, E.G. Dist. Andhra Pradesh, INDIA.

E-mail : sales@duroxz.com | website : www.duroxz.com

DUROXZ-TDS- (HYDROFLEX/DRX-315)

(2025-26)