

# FAST QUARTZ 105 LT

## Technical Data Sheet



**ATLAS**  
POLYMERS

### MATERIAL DESCRIPTION

Atlas Fast Quartz 105 LT is an odorless three component self-priming epoxy concrete system. This industrial grade material was designed to provide high strength and a fast return to service at temperatures as low as 20 °F. Additionally, it provides excellent resistance to thermal shock, chemical exposure, impact and abrasion.

### INTENDED USES

- Pipe stand bases
- Food & Chemical Processing Areas
- Loading Docks
- Secondary Containment
- Pulp and paper mills
- Airport Runways
- Reconstruction of concrete/masonry
- Warehouse Floors

### STORAGE AND TECHNICAL INFORMATION

Unit Size ..... 5 US Gallon Pail (42 Lbs)  
Shelf Life ..... 3 Years when stored between 20 °F and 86 °F  
Application Temperature (Ambient) ..... 20°F - 95°F (Ambient)  
Mixing Ratio (Volume) ..... 5 Base : 1 Hardener : 27 Aggregate  
Coverage Rate @ 1/4" ..... 15 ft<sup>2</sup> per unit  
Volume Capacity ..... 540 in<sup>3</sup> (0.31 ft<sup>3</sup>) per unit  
VOC ..... 0.0 Lbs/Gal; 0.0 g/L  
Consistency ..... Trowelable Mortar  
Available Colors: ..... Gray, Red, Natural

### PRODUCT PERFORMANCE

Heat Resistance:	300 °F Dry / 220 °F Immersed	NACE TM 0174
Compressive Strength (psi):	12,800	ASTM D695
Tensile Strength (psi):	2,000	ASTM D638
Flexural Strength (psi):	4,600	ASTM D790
Hardness:	92 Shore D	ASTM D2240
Impact Resistance:	0.45 ft-lb/in	ASTM D4226
Adhesion to Concrete:	>500 (Concrete Failure)	

### CURE SCHEDULE

Service / Temperature	20 °F	59 °F	68 °F	72 °F	90 °F
Pot Life	30 mins	16 mins	14 mins	10 mins	5 mins
Light Traffic	16 hrs	6 hrs	2 hrs	1 hr	30 min
Heavy Traffic	24 hrs	8 hrs	3 hrs	2 hrs	1 hr
Full Cure (Chemical Immersion)	2 days	40 hrs	36 hrs	24 hrs	10 hrs

### CHEMICAL RESISTANCE

**\*EX = 30 Days @ 72°F**

10% Lactic Acid	Ex*	10% Hydrochloric Acid	Ex*	Bleach	Ex*
10% Nitric Acid	Ex*	75% Phosphoric Acid	Ex*	Diesel	Ex*
50% Sulfuric Acid	Ex*	50% Sodium Hydroxide	Ex*	Oil	Ex*
Motor Oil	Ex*	Diesel Fuel	Ex*	Kerosene	Ex*

### TECHNICAL SUPPORT

Atlas Fast Quartz 105 LT is backed with technical support from staff engineers, certified coatings inspectors, research laboratories and personnel 24 hours a day 7 days a week  
**Call (786) 312-1231**

MADE IN THE USA

3328 NW 29th St. Miami, FL 33142  
(786) 312-1231 | FAX (786) 217-1244

[contact@atlas-polymers.com](mailto:contact@atlas-polymers.com)  
[www.atlas-polymers.com](http://www.atlas-polymers.com)

# FAST QUARTZ 105 LT

## Material Application Guidelines



### SURFACE PREPARATION

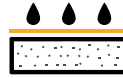
Surfaces to which Atlas Fast Quartz 105 LT is to be applied must be clean, firm and dry. Any contamination such as rust, mill scale, dust, oils, grease, fats, waxes, laitance and other coatings/sealers must be removed and or washed prior to the application of Fast Quartz 105 LT.

- Surfaces should be abraded through mechanical means to provide a surface profile of CSP-3 to 5 for concrete and NACE No. 2 / SSPC-SP 10 with a profile of 3 mils for metals. The surface roughness of these profiles is equal to 60-grit sandpaper or coarser.
- New concrete must cure for a minimum of 28 days and have a vapor transmission rate of no more than 3 pounds per 1,000 ft<sup>2</sup> over a 24 hour period. This could be confirmed through a calcium chloride test as per ASTM E-1907.
- Concrete that has been contaminated with chemicals or other foreign matter must be neutralized to a neutral pH prior to the application of Fast Quartz 105 LT. Neutralization should be carried out by rinsing the contaminated concrete with water and either baking soda or ammonia.
- Please note that any surface irregularities such as cracks, expansion joint and control joints should be properly addressed prior to the application of Fast Quartz 105 LT. Also, please note that waxes, oils or greases should be removed with water and soap. Solvent such as acetone or MEK will not remove them.



### MIXING

1. To mix Atlas Fast Quartz 105 LT pour the contents of the Hardener into the Base.
2. Mix for 2-3 minutes using a Jiffy Mixer and a slow speed drill (Less than 800 RPM).
3. Ensure that amount of material mixed can be used within the stated pot life.
4. Using a slow speed drill or a rotating pail mixer add the resin and half of the aggregate to the pail.
5. Let mix for 1-2 minutes.
6. Add the remaining aggregate.
7. Mix for an additional 2-3 minutes.



### APPLICATION

1. Immediately pour out the mixed kit onto the floor in 7-10" wide strips.
2. Spread evenly with a clean trowel (steel finishing trowel, 3 x 14).
3. Fast Quartz 105 LT should be troweled to a finished thickness of at least 1/4", but may be built to 1" or more.
4. Finish each kit before mixing another to insure proper working times and surface textures.
5. As Fast Quartz 105 LT begins to set up the trowel will pull on the surface creating a porous surface, this can be corrected by cleaning the trowel with isopropyl alcohol or acetone.



### CLEAN-UP AND CONSIDERATIONS

Clean Atlas Fast Quartz 105 LT from tools with isopropyl alcohol, acetone or mineral spirits. This should only be done before it has hardened. Once hard, it can only be removed through mechanical abrasion or grit-blasting.

The cured surface of Atlas Fast Quartz 105 LT may be slightly oily by touch. To make it tack-free wash the surface with isopropyl alcohol using a stiff brush or grind it.



### SAFETY & WARRANTY

Atlas Fast Quartz 105 LT is an epoxy resin system. Please refer to the Material Safety Data Sheets prior to using this product. Do not weld on or near the Hardener epoxy, hazardous fumes will be released.

Atlas Polymers, Corp. guarantees this product will meet the performance claims stated herein when material is stored and used as instructed in this document. Atlas Polymers further guarantees that all its products are carefully manufactured to ensure the highest quality possible and tested strictly in accordance with universally recognized standards. Since Atlas Polymers has no control over the use of the product described herein, no warranty for any application can be given.