



Qtech-407 Anti-Microbial Polyurea Material

PRODUCTION INFORMATION

Production Description :

Qtech-407 Anti-Microbial Polyurea Material is the state of the art 100% solids, ultra fast cure, flexible, spray-applied, high build, and two components aromatic pure polyurea elastomer. The system consists of A component, a quasi-prepolymer rich of free NCO, and B component, a mixture of polyetheramines, amine extenders and other additives. **Qtech-407** has been chemically engineered to inhibit the growth of a broad range of micro-organisms such as gram-negative and gram-positive bacteria, fungi and select viruses, so it will not wash or wear off or lose its biostatic properties after installation. **Qtech-407** can produce an extremely tough film at all thicknesses; it may be applied in all positions and to any suitably prepared substrate. **Qtech-407** is relatively moisture and temperature insensitive, allowing application in the most problematic ambient conditions. It is the optimum choice where a tough, flexible, anti –microbial surfacing system which exhibits extraordinary performance.

Advantages :

1. Fast cure, short down time, no sagging
2. Excellent Anti-microbial and Mildew Proof Properties
3. Bondable and paintable to various kinds of substrates
4. Ambient insensitive, good thermal stability
5. 100% Solids, No VOC's, Odorless, No Toxic Vapors
6. Good resistance to a wide range of chemical attack
7. High impact and abuse resistant-replaces fiberglass and FRP
8. Good weather ability, Added color stability, no chalking
9. Seamless, flexible, slick and non-porous
10. Bridge moving cracks to 1/16"

Recommended Uses:

Qtech-407 Anti-Microbial Polyurea Material is an ultra fast cure system; it can be applied at thicknesses of several ten millimeters, or greater, in a single application. It can be widely used in:

- Clean Room Walls Ceilings and Floors
- Food and Beverage Processing Areas
- Pharmaceutical Facilities
- Hospital and Research Facilities
- Lavatories
- Correctional Facilities



Physical Properties:

Tensile Strength/ MPa	17.5
Elongation/%	400
Tear Strength/(N/mm)	55
Shore Hardness	A80
Abrasion Resistance /(GB/T 1689-1998, cm ³ /1.61km, mg)	≤0.35
Impact Strength/(Kg.cm)	20
Anti-Microbial Rate/%	99.9
Adhesion (Pull off, MPa)	≥2.5
Density/(g/cm ³)	0.95~1.05

Product Characteristics:

Solids/%	100
VOC (calculated)	0
Gel Time/s	11
Tack Free/s	20~30
Shelf Life	6 months, unopened at 15~40 °C
Flash Point/ °C	150
Mix Ratio V/V	1: 1
Recommended Spreading Thickness/mm	2~3
Colors	Optional

Drying time is temperature, humidity, and film thickness dependent.

Chemical Resistance:

Consult our technician and chemical test data for corrosive environment applications.

Installation:

Consult our application information and recommended method statements.

Packaging:

Part A: 220kilogram per drums.

Part B: 200 kilogram per drums. (Custom package available at additional charge)



Notes:

1. Qtech product is intended for industrial use by properly trained professional applicators only.
2. Thoroughly mix container of B component with an air-driven power mixer for a minimum of 15 minutes prior to application.
3. Adding a nitrogen blanket is strongly recommended for use on the “A” component for storage after opening.
4. It is a 100% solids production, strictly prohibit add any diluents.
5. The quality and fitness of the product is depending upon the proper mixture and application of the component by the applicator.
6. This specification is an accumulation of long term testing and experience. Published technical data and instructions are subject to change without notice.
7. For more information please contact us or visit our website www.shamu-intl.com and www.polyurea.cn.