



FIBREFRAX® BLANKETS

The Fibrefrax® Durablanket® family of lightweight needled blankets are manufactured from Fiberfrax refractory ceramic fibres and provide effective solutions to a wide spectrum of thermal management problems.

Utilizing our proprietary spinning technique these blankets offer superior insulating performance, flexibility and resilience. Fiberfrax Durablanket products are unaffected by most chemicals (except hydrofluoric & phosphoric acid and concentrated alkalis). Thermal and physical properties are retained after drying following wetting by oil, steam or water.

Fiberfrax Durablanket products are completely inorganic, so there are no fumes when heating for the first time. Available in a variety of chemistry, density and thickness combinations, the Fibrefrax Durablanket range is one of the most versatile available to the market today.

GENERAL CHARACTERISTICS

Fibrefrax Durablanket products have these outstanding characteristics :

- High tensile strength
- Low shrinkage
- Light weight
- Excellent hot strength
- High resiliency
- Low thermal conductivity
- Low heat storage
- Resistance to thermal shock
- Good sound absorption
- High heat reflectance

Fire Test Data

Fibrefrax Durablanket is non-combustible and is approved for use against cellulosic and hydrocarbon fires. It is used for dry wrapping of structural steel and variety of other Passive Fire Protection applications. Certification details can be supplied on request.



TYPICAL APPLICATIONS

- Crude Oil, Reformer & Pyrolysis heater linings
- High temp. pipe, duct & turbine reusable insulation
- Tube seals, Gaskets & Expansion joints
- Heat treatment furnaces, Reheating furnaces,
- Soaking pit seals.
- Kinds & Kiln cars insulation & seals
- Stress relieving insulation
- Ovens & stack linings
- Boilers, Exhaust duct & Air preheater insulation
- Acoustic application
- Fire protection
- Glass furnace crown insulation
- High temperature gasketing
- High temperature filtration
- Etc.

Availability

Density (Kg/m ³)								
	Durablanket S				Durablanket Z			
Thickness	64	96	128	160	96	128	160	Roll length
6 mm			✓	✓		✓	✓	7620 mm
13 mm		✓	✓	✓	✓	✓	✓	7620 mm
19 mm	✓	✓	✓	✓	✓	✓	✓	7620 mm
25 mm	✓	✓	✓	✓	✓	✓	✓	7620 mm
38 mm	✓	✓	✓	✓	✓	✓	✓	5080 mm
50 mm	✓	✓	✓		✓	✓		3810 mm

Standard Roll Width : 610 mm

Other thicknesses / sizes may be available on request subject to minimum order requirements. Versions with aluminium foil and other coverings also may be available.

FIBERFRAX DURABLANKET S

Fibrefrac Durablanket S is a premium grade product made from spun 1260 Deg. C ceramic fibers. The extra long spun fibers make one of the strongest blankets available. This coupled with its superior resilience make it particularly tough and suitable for applications involving further handling or difficult environments.

FIBERFRAX DURABLANKET Z

Fibrefrac Durablanket Z is a high temperature blanket made from Zirconia stabilised Spun ceramic fibre. It is a highly efficient insulator with extremely low shrinkage characteristics

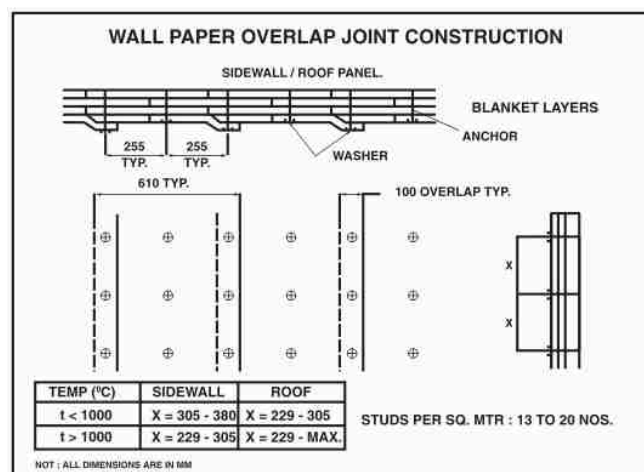
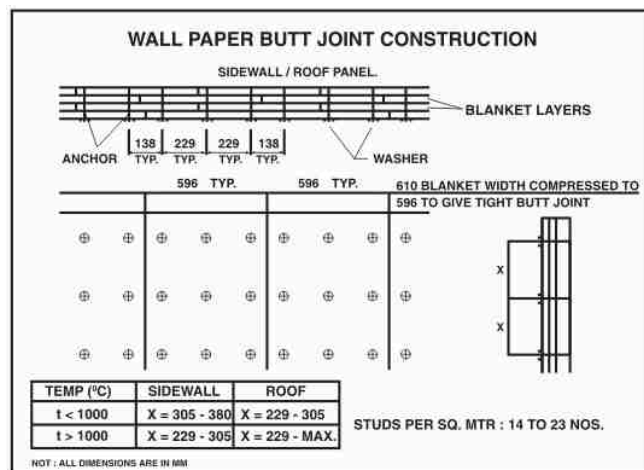
PARAMETERS	Durablanket S	Durablanket Z
Classification Temperature, Deg. C	1260	1425
Colour	White	White
Composition, %		
Alumina	42 - 47	30 - 33
Silica	53 - 58	51 - 55
Zircon	Nil	14 - 18
Fibre Index, %	Min. 48	Min. 48
Mean Fibre Dia, μ m	2.6 - 3.4	2.6 - 3.4
Melting Point, Deg. C	1760	1760
Tensile strength (Longitudinal), Kpa		
96 kg/m ³	40 Min., 60 Typ.	40 Min., 60 Typ.
128 kg/m ³	55 Min., 80 Typ.	55 Min., 80 Typ.
Sizes Tolerance		
Thickness (before rolling)	-0	-0
Width	-0mm + 3mm	-0mm + 3mm
Length	-0mm + 150mm	-0mm + 150mm
Permanent Linear Shrinkage, %		
24 hours soak at 1250 Deg. C	3.5 Maximum	
24 hours soak at 1400 Deg. C		3.3 Maximum
Thermal Conductivity W/mk		
At 600 Deg. C mean temp.	96 kg./m ³ 128 kg/m ³ 0.14 0.12	96kg./m ³ 128kg/m ³ 0.14 0.12

APPLICATION

Important factors to consider in selecting Ceramic Fibre and method of installation are : maximum and normal operating temperatures, desired cold face temperature, maximum gas velocity furnace atmosphere, condition and type of fuel used.

WALL PAPER LINING

Joints should be staggered while installing the layers of blanket to avoid heat leakage. Ceramic Fibre shrinks at high temperatures and as such blankets should not be stretched while installing. Studes and washers of SS 304, SS 310, SS 330, Inconel 600 and 601 alloy are used depending on operating temperatures and furnace atmosphere. But joints on hot face layer are used upto temperature of 800 °C while over lap construction is used for higher temperatures and high gas velocities.



Information contained in this publication is for illustrative purposes only and is not intended to create any contractual obligation.

Unifrax India Limited,

Mumbai Office : 402, Kailash Tower, Behind STC Colony, Andheri East, Mumbai - 400 069. Phone : 91 22 2682 3479 / 2682 3256 / 2682 1505
Fax : 91 22 2682 0005 • E mail : unifrax.mumbai@unifrax.co.in
Website : www.unifrax.com

Chennai Office : New No. 58, Velacherry Road, Little Mount, Saidapet, Chennai - 600015
Phone : 91 44 22353171 • Fax : 91 44 22352352
E mail : unifrax.chennai@unifrax.co.in

Delhi Office : 1603, Chiranjiv Tower, 43, Nehru Place, New Delhi - 110019 • Phone : 91 11 26440881 / 65651065
Fax : 91 11 26440879 • E mail : unifrax.delhi@unifrax.co.in

Kolkata Office : 5, Lala Lajpat Rai Sarani (Elgin Road) Gujarat Centre, 4th Floor, Kolkata - 700020
Phone : 91 33 30580169 / 70 / 71 / 72 / 73
Fax : 91 33 30580170 / 22809138 • E mail : unifrax@vsnl.com