CERALAG-01

CERAMIC LAGGING SHEETING

CERALAG-01, offers the synergy of Rubber and Special grade High Alumina Ceramics for heavy duty pulley lagging application. The high abrasion resistance, non sticky properties of ceramics in conjunction with the flexibility of rubber provides reliable solution for belt slippage problems that conventional rubber lagging offers. The dimpled ceramic pulley lagging features the highest coefficient of friction available for lagging materials – two to three times the friction of rubber in wet, muddy or dry conditions.

High-performance design

- Smooth grooves offer higher Flexibility and ensures better contour taking ability of the sheet.
- Less stress on the ceramic tiles.
- Grooved pattern offers superior water and dirt draining performance making it, self cleaning.
- The design optimizes the ceramic and rubber combination for better efficiency in operations at economic rates.
- Grid work of dimpled ceramic tiles moulded into a durable rubber backing.
- The ceramics contain 90% to 92% of alumina oxide, making it high wear resistant.
- The tiles are designed with raised dimple button profiles. Under normal operating belt compression loads, the moulded ceramic buttons grip the belt's surface, for positive traction and no slippage.
- The rounded design of buttons eliminates the sharp, abrasive edges associated with ordinary ceramic lagging, and helps ensure increased belt life.
- Rubber compounds have higher compression and flexibility properties.
- A special bonding layer ensures superior bond between pulley shell and lagging, hence Abrasion resistance is not compromised to achieve high bond strength.
- Precision moulded and press cured ensures consistent dimensional and physical properties.
- Easy Installation: Ceralag installation saves time because it doesn't require removing the pulley from the conveyor system! An effective and economic cold vulcanizing process makes on site installation fast and efficient.

Technical Specification

Shore hardness (ASTM D2240)	60+/-5° A
Elongation at break (ASTM D412)	> 520%
Specific Gravity	1.12 +/- 0.05
Tensile Strength (ASTM D412)	>160 Kg/cm²

APPLICATION

CERALAG-01 is ideal for heavy duty application of drive pulleys. They are also found to be suitable in cement and sinter based applications for prevention of carry back build up on the snub pulleys.

Dimensional Specifications

CERALAG-01 sheets are available in two varieties,

- for heavy duty application and
- for extreme heavy duty applications

The strips come in 222mm and 666mm width, and length upto 2500mm, for ease in application and adaptability to various pulley diameters.

Shelf Life :

36months @ < 20°C.

Adhesive Systems :

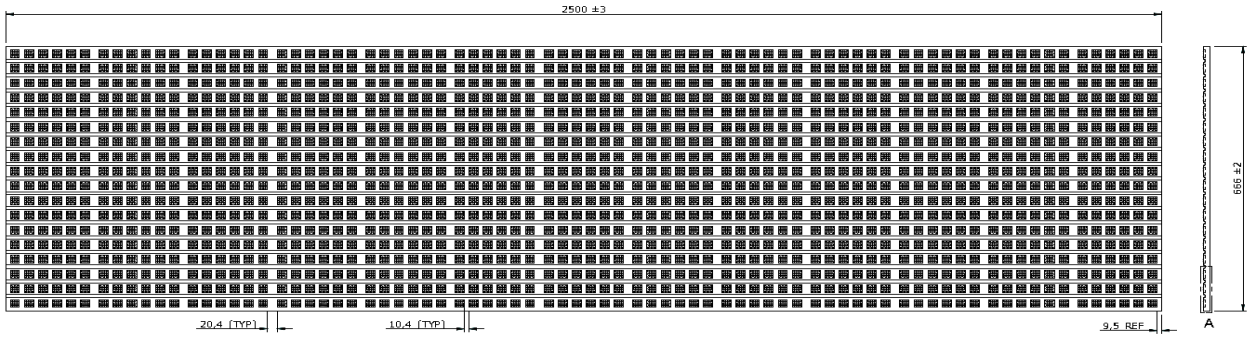
Metal Primer :TPR – 1400

Adhesive System :TBS 3001, TBS 3000 or TN9000 with respective hardener compounds.

Product Code	Belt Width (mm)	Pulley Width (mm)	Ceralag Sheet Size (mm)	Length Ceramic Spread (mm)
TPCLR01-w-t-c-550	450	550	770 x w x t	445
TPCLR01-w-t-c-700	600	700	962 x w x t	557
TPCLR01-w-t-c-900	750	900	1154 x w x t	749
TPCLR01-w-t-c-1050	900	1050	1154 x w x t	952
TPCLR01-w-t-c-1200	1050	1200	1347 x w x t	1083
TPCLR01-w-t-c-1350	1200	1350	1539 x w x t	1215
TPCLR01-w-t-c-1500	1350	1500	1732 x w x t	1407
TPCLR01-w-t-c-1700	1500	1700	1924 x w x t	1600
TPCLR01-w-t-c-1800	1600	1800	1924 x w x t	1600
TPCLR01-w-t-c-2000	1800	2000	2116 x w x t	1853
TPCLR01-w-t-c-2200	2000	2200	2309 x w x t	2106
TPCLR01-w-t-c-2300	2100	2300	2500x w x t	2177
TPCLR01-w-t-c-2400	2200	2400	2500 x w x t	2298

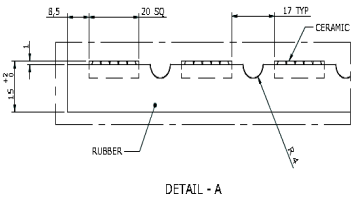
Please Note : *All dimensions are subject to Tolerance of +/- 10% as per ASTM D412.*

'w' denominates Ceramic Sheet width	222mm, 666mm
't' denominates Ceramic Sheet thickness	10mm, 12mm & 15mm
'c' denominates Ceramic tile thickness	5mm & 10mm



Calculations for raw material required for CERALAG-01 lagging

- *Pulley circumference, mm (C)* : *3.14 x (pulley diameter in mm + Lagging thickness in mm)*
- *Number of sheets required, nos (Sn)* : *(C/666)*
- *Length of sheet, mm (Sl)* : *pulley face width in mm + 50mm*



Surface Preparation:

Ideally the Steel surface must be blasted to a metallic white finish. A preparation degree of Sa2½ as specified in DIN EN ISO 12944-4 and a roughness degree of "medium (G)" as specified in DIN EN ISO 88503-1 must be achieved. The blasted surface should be primed immediately.

Application Procedures:

Agitate the metal primer container properly to ensure sedimentation of the contents is avoided. Apply the Primer on the metal surface of the pulley and allow to dry well.

Prepare the adhesive with requisite hardener compound and apply the same on the metal surface and rubber sheet. The first coat is allowed to dry completely. The second coat may be applied and allowed to sufficiently touch dry only, exhibiting tacky property required for closing the bond.

The coated rubber sheet is then uniformly and firmly pressed down on to the metal surface and consolidated using hand tools, in order to achieve good bonding during the curing process. Care to be taken while hammering the ceramic tiles, in order to avoid breakage of the tile.

Health & Safety:

Adequate ventilation shall be provided during execution of work. All vapors that are produced during the execution of the lining should be continuously suctioned off at the bottom level. Follow specific instructions if any.