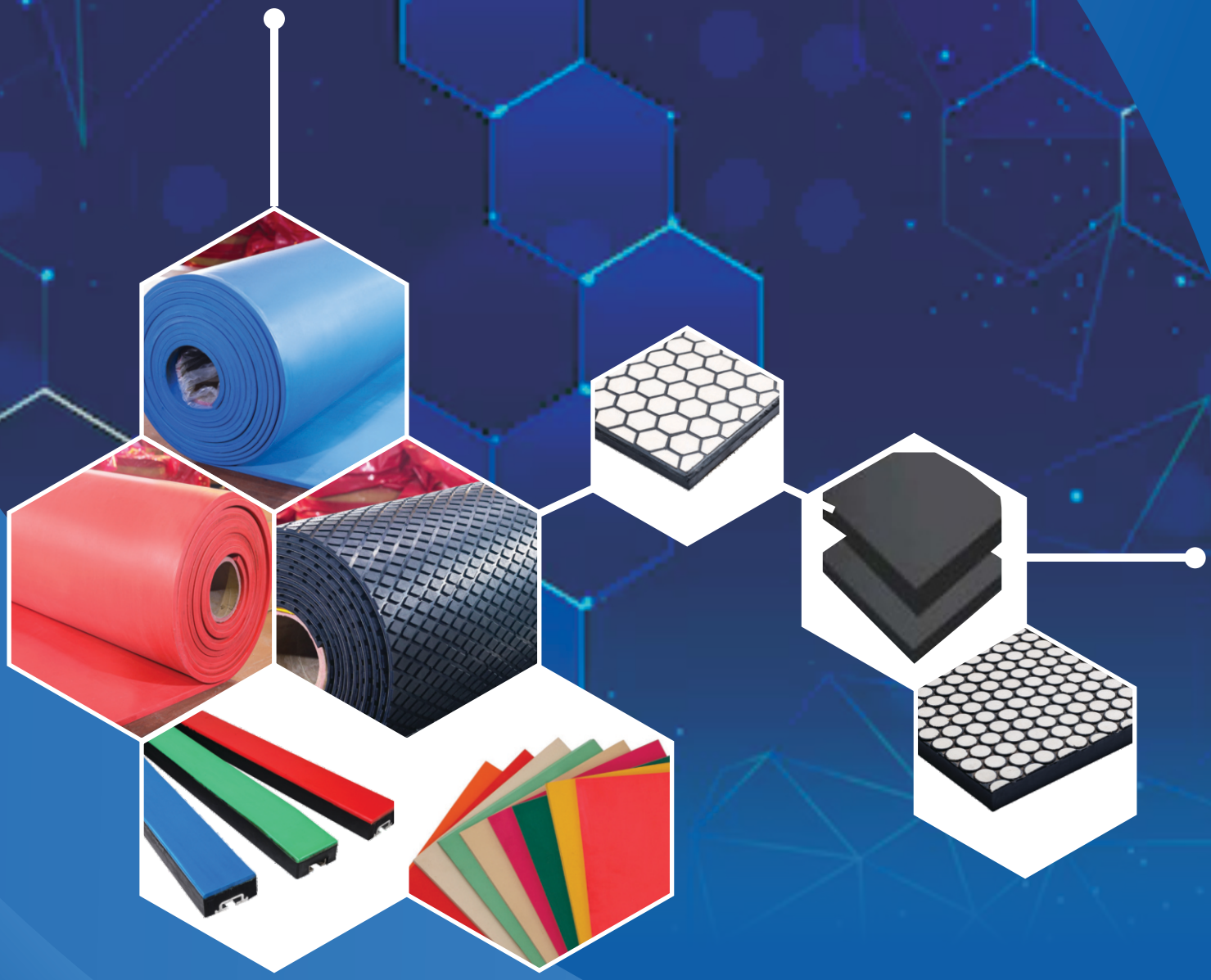
FORECH

RUBBER LINING SHEETS AND ACCESSORIES



WWW.FORECH.COM

FORECH

ABOUT US

"FORECH GROUP" comprising of two primary companies; M/s. Forech India Pvt. Limited and M/s. Forech Mining & Construction International LLP. is India's largest manufacturer of steel cord and textile-reinforced conveyor belts along with anti-wear and corrosion-resistant lining rubber sheets. Forech offers a comprehensive range of accessories for material handling installations and equipment, including ceramic and rubber pulley lagging, impact bars, chute and hopper linings, splicing materials and rubberized mechanical fasteners etc.

The Group has over 40 years of experience in delivering high-quality conveyor products to customers across the globe. Our offerings include an extensive range of products designed to ensure an efficient and cost-effective operation of conveyor systems. We are committed to quality and performance and are holding accreditations from various global certification agencies. Our conveyor belts conform to nearly all internationally recognized standards, including DIN, RMA, JIS, AS, SABS, SANS, MSHA, and EN-ISO. Additionally, all our manufacturing facilities hold ISO certifications and we also are proudly approved by the Canadian Bureau of Mines, MSHA and FRAS in Australia.

Our diverse product portfolio includes Textile and Steel Reinforced Conveyor Belts, Surface protection lining rubber sheets, providing solutions for anti-wear, anti-corrosion and chemical-resistant applications. Our product range also includes a wide range of material handling accessories, such as Wear-Resistant PP Elements and Ceramic Liners, Impact Bars and Lifter Bars, Pulley Lagging (Rubber and Ceramic), Wear-Resistant and Corrosion-Protection Rubber Sheeting, Conveyor Belt Repair Materials and Screen Elements and rubberized belt Fasteners etc.

Our manufacturing capabilities are bolstered by four strategically located units across India; two in Dhaturi, District Sonepat, (Haryana) and two in Cheyyar, District Thiruvannamalai (Tamil Nadu). Each facility is equipped with state-of-the-art testing laboratories, with the Cheyyar plant housing an NABL-accredited laboratory to uphold stringent quality standards.

Our guiding philosophy has always been to improvise our products with the help of developments that are accurately aligned with the ever evolving needs of our customers.

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SWL-2.0 T
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FORLINE: ANTI ABRASIVE & ANTI CORROSION RUBBER SHEETS

Abrasion-resistant rubber sheets, as the name suggests are highly resistant to wear due to abrasion, and also gives excellent resistance to any impact. They also have a wide temperature range within which they can operate without any problems.

FORLINE ULTRA-35

FORLINE ULTRA-35 is specially designed for wet applications, providing excellent flexibility and durability in challenging conditions. It excels in environments exposed to water, moisture, or other wet substances, maintaining its integrity even under constant abrasion. Its excellent performance in damp environments ensures long-lasting reliability, making it the perfect solution for industries dealing with wet, high-friction material conditions.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1346		24	800	35	0.98	95	50	NR
R-1352		19	650	35	1.00	85	50	NR
R-1353		18	650	35	0.98	85	60	NR
R-1356		19	650	35	1.00	85	60	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE ULTRA-40

FORLINE ULTRA-40 is commonly utilized as a protective coating for metal drums in the conveyor belt industry or to shield metal surfaces from wear and damage. Notably, it offers reliable resistance to abrasion, making it suitable for applications where surfaces are subjected to constant friction. Additionally, its ability to withstand repeated stress and its strong physical and mechanical characteristics make it an excellent choice for lining slurry chutes and tanks, where durability and long-lasting performance are essential. Its versatility and strength ensures effectiveness even in challenging industrial conditions.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1402		20	600	40	1.08	85	45	NR
R-1403		17	650	40	1.08	85	60	NR
R-1405		20	550	40	1.00	85	60	NR
R-1417		20	700	40	1.06	85	60	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE ULTRA-45

FORLINE ULTRA-45 is a versatile rubber material offering exceptional performance in both wet and dry applications. Combining superior durability and flexibility, it is ideal for various industrial uses. With enhanced abrasion resistance, it withstands harsh conditions, including constant wear and tear. Whether exposed to dry abrasive materials or wet environments, it maintains its integrity, ensuring long-lasting performance.

TECHNICAL SPECIFICATION

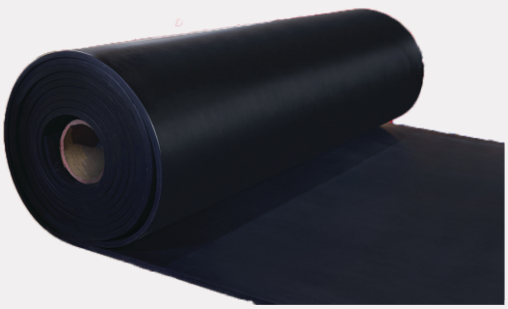
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1445 R-1447		20	650	45	1.05	85	60	NR
R-1450 R-1451		20	600	45	1.08	85	60	NR
R-1452 R-1461		18	600	45	1.10	85	60	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORLINE ULTRA-50

These NR based sheets with a hardness of 50 offer excellent durability and flexibility, making them ideal for various industrial applications. These sheets provide good abrasion resistance, making them perfect for use in different conveyor accessories and general purpose lining applications.

TECHNICAL SPECIFICATION

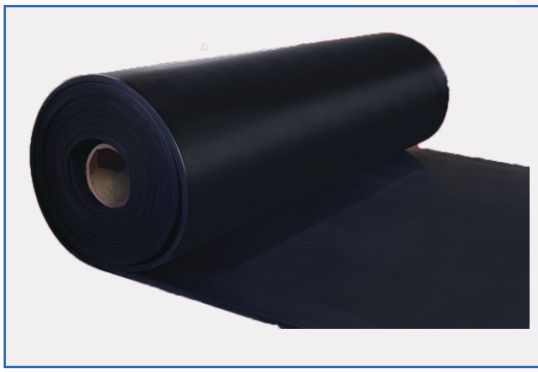
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1501		19	550	50	1.18	100	60	NR
R-1502		21	500	50	1.08	100	60	NR
R-1515		19	650	50	1.16	100	60	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORLINE ULTRA-60

FORLINE ULTRA-60 rubber sheeting is engineered to offer outstanding abrasion resistance, making it a top choice for demanding industrial applications. FORLINE ULTRA-60 excels in fine slurry environments, where its high resilience and low modulus provide superior durability and flexibility under tough conditions. This rubber sheeting also delivers excellent corrosion resistance.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1602	●	18	450	60	1.10	60	80	NR/BR
R-1605	●	21	450	60	1.10	90	80	NR/BR
R-1627	●	17.5	450	60	1.13	100	50	SBR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE SUPER-45

FORLINE SUPER-45 is a durable rubber sheeting designed for tough industrial environments, offering exceptional abrasion resistance and flexibility. It performs exceptionally well in fine slurry conditions, where its high resilience and low modulus ensure lasting durability. The material also excels in corrosion resistance, maintaining its integrity when exposed to harsh chemicals and corrosive substances. Its superior properties reduce maintenance needs and downtime, making it a trusted solution for high-performance, long-lasting protection in challenging environments.

TECHNICAL SPECIFICATION

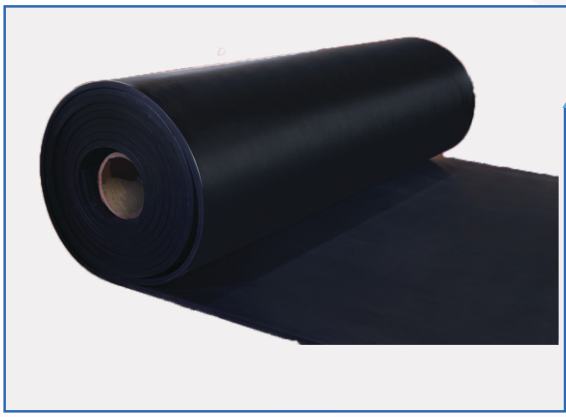
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1412	●	18	650	40	1.16	110	50	NR
R-1464	●	18	550	45	1.12	120	60	NR
R-1470	●	15	550	45	1.20	125	50	NR
R-1474	●	15	550	45	1.20	125	50	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORLINE SUPER-60

FORLINE SUPER-60 is a durable rubber sheeting designed for tough industrial environments, offering exceptional abrasion resistance and flexibility. It performs exceptionally well in dry conditions. The material also excels in corrosion resistance. Ideal for industries such as mining, manufacturing, and materials handling, FORLINE SUPER-60 provides reliable performance in demanding conditions. Its superior properties reduce maintenance needs and downtime, making it a trusted solution for high-performance, long-lasting protection.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1606	●	17	450	60	1.15	120	60	NR/BR
R-1617	●	15	450	60	1.13	110	30	SBR
R-1624	●	15	400	60	1.13	140	60	NR/BR
R-1665	●	17	400	65	1.13	45	60	NR/BR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

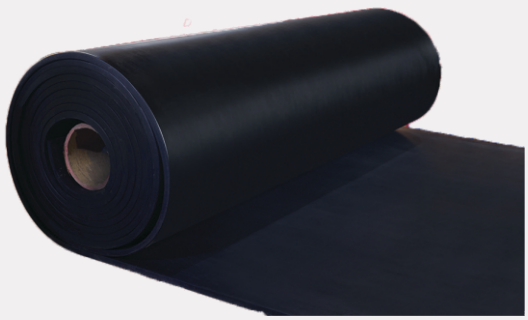
STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE FRAS & 60 'V'

FORLINE FRAS range of lining material offers high quality rubber sheeting with antistatic and self-extinguishing properties conforming to ISO 340. These are high wear resistant rubber sheets, well suited for over ground applications where fire safety regulations are a prime requirement.

FORLINE 60 'V' is a high quality Fire Retardant, Antistatic and self-extinguishing rubber sheet, well suited in wet and dry applications in any challenging and tough operating conditions. This lining material is highly recommended for ATEX operating requirements in underground explosive environment. This lining material is also moderately oil resistant.



TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1421	●	12.5	450	45	1.20	125 at 5 N	-	NR/BR
R-1621	●	14	350	60	1.28	180	40	SBR
R-1653	●	15	450	65	1.20	90	-	NR/BR
R-1721	●	14	350	70	1.28	180	60	SBR/BR
R-2615 V	●	20	450	70	1.43	150	70	CR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE DUST SEALING

FORLINE DUST SEALING cloth is a textured sheet which is extremely flexible and stretchy with excellent physical and UV protection properties. It is an ideal choice for dust encapsulation systems across the globe. The sheet has a fabric impression on both the sides that gives it an increased grip on the surface. DUST SEALING sheet can be customised to suit any fixture such as top frame of a screen, conveyor feeders and chutes, etc.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1405A	●	20	550	40	1.00	100	60	NR
R-2521	●	12	350	50	1.36	250	10	CR/NR

STANDARD THICKNESS
3mm ~ 50mm

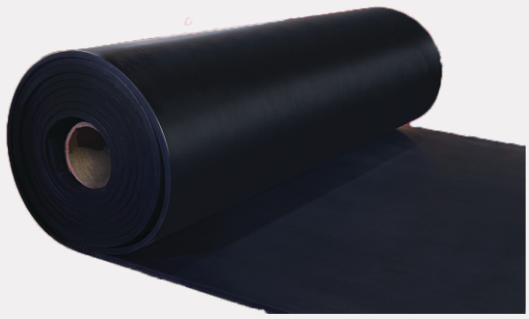
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE ECO-60

FORLINE Eco-60 is a cost-effective wear protection solution designed to meet the needs of a wide range of industrial applications. This economical grade rubber sheeting is specifically engineered for use in dry environments, offering a balanced resistance to wear and tear. While designed to be an affordable option, FORLINE Eco-60 does not compromise on quality, ensuring dependable performance for industries that require reliable and durable materials at a lower cost.



TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1630	●	15	400	65	1.15	200	30	SBR
R-1631R	●	10	475	60	1.20	320	44	SBR
R-1640	●	12.5	300	60	1.24	250	25	NR/SBR
R-1650	●	10	350	65	1.27	210	33	NR

STANDARD THICKNESS
3mm ~ 50mm

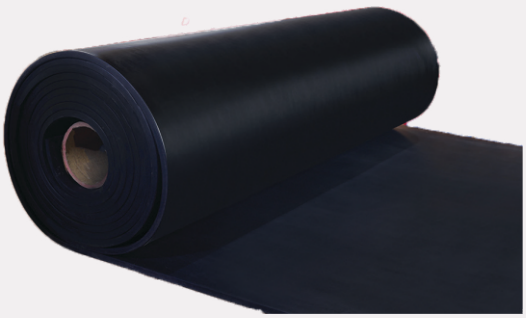
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORSKIRT

FORSKIRT is specifically designed for use as skirt in industrial conveyor systems. It is a durable, flexible material that provides excellent protection against wear, abrasion, and impact. Typically made from natural and synthetic rubber, skirt rubber forms seals along the edges of conveyor belts to prevent material spillage and dust, ensuring efficient operation.



TECHNICAL SPECIFICATION

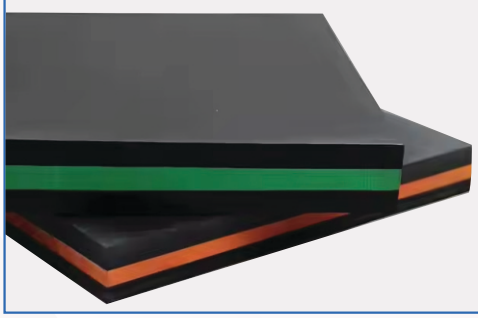
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1514	●	8.5	350	50	1.2	130 at 5 N	30	NR
R-1630	●	15	400	65	1.15	200	30	SBR
R-1670	●	10	350	65	1.27	275	30	NR
R-1661	●	4	250	65	1.28	-	10	SBR
R-1650	●	10	350	65	1.27	210	35	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORSKIRT - TRIPLE SANDWICH

Sandwich rubber is a durable and flexible material commonly used as skirt rubber in conveyor systems. Made from layers of rubber bonded together, it offers excellent resistance to wear, abrasion, and impact. Sandwich rubber is ideal for sealing conveyor belt edges, preventing material spillage, and minimizing dust. Its strength and resilience make it perfect for heavy-duty industrial applications, such as mining, construction, and bulk material handling, ensuring smooth, efficient operations in challenging environments.

TECHNICAL SPECIFICATION

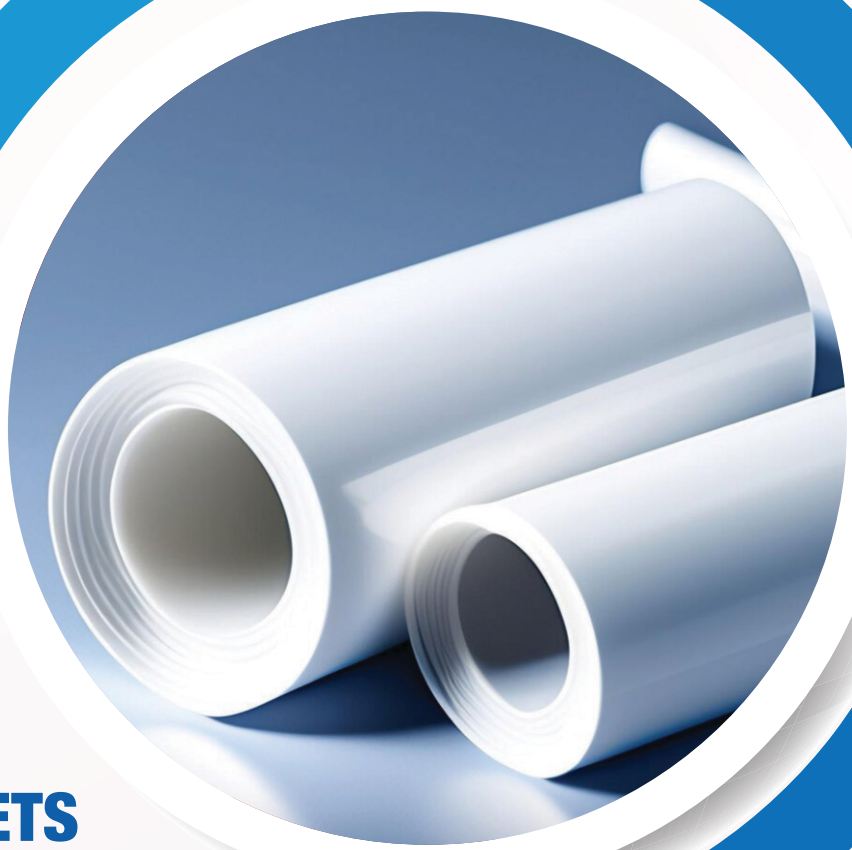
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
1624-1450-1624								
R-1624	●	15	400	60	1.13	140	60	NR/BR
R-1450	●	20	600	45	1.07	85 at 5N	60	NR
1624-1515-1624								
R-1624	●	15	400	60	1.13	140	60	NR/BR
R-1515	●	19	650	50	1.16	100 at 5N	60	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORLINE: FDA QUALITY RUBBER SHEETS

FDA Quality Rubber Sheets are high-grade and food-safe designed to meet the standards set by the U.S. Food and Drug Administration (FDA). These sheets are widely used in industries such as food processing, pharmaceuticals, and beverages, where hygiene and safety are of utmost importance.

FORLINE-NR-FDA WHITE

FORLINE-NR-FDA sheets can be used in contact with stationary capitation systems, treatment, carrying and distribution of water intended for human consumption. In particular, it is recommended for strict hygiene and aesthetic requirement.
It complies with:

- Food grade rubber sheet compliant with the US FDA meets the 21CFR 177.2600 regulations.
- Food grade rubber sheet compliant with the EU commission regulation EU 10/2011.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-1355	◯	20	650	35	1.00	95	60	NR
R-1571	◯	17	550	55	1.27	100	60	NR

STANDARD THICKNESS
3mm ~ 30mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m-50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE-NR/BR-FDA WHITE

FORLINE-NR/BR-FDA sheets are designed for food industry with different hygienic applications. This rubber sheet is formulated to meet the rigorous standards required for food contact materials, ensuring safety and compliance across a wide range of food processing, handling, and distribution operations.
It complies with:

- Food grade rubber sheet compliant with the US FDA meets the 21CFR 177.2600 regulations.
- Food grade rubber sheet compliant with the EU commission regulation EU 10/2011.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1610	◯	15	450	60	1.18	160	50	NR/BR

STANDARD THICKNESS
3mm ~ 30mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m-50M

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE-NBR/NR-FDA WHITE

FORLINE-NBR/NR-FDA WHITE sheets are also suitable for contact with substances containing grease and oil, further broadening its range of uses in industrial food settings along with food-safe applications.
It complies with:

- Food grade rubber sheet compliant with the US FDA meets the 21CFR 177.2600 regulations.
- Food grade rubber sheet compliant with the EU commission regulation EU 10/2011.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-3605	○	10	500	60	1.15	250	40	PLC/NBR/SBR

STANDARD THICKNESS
3mm ~ 30mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m-50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORLINE-NBR-FDA BLUE

Specially designed FDA blue rubber sheets are for the food industry, offering excellent abrasion resistance and suitability for contact with substances containing grease and oil. It is ideal for food-safe applications and industrial environments where hygiene, durability, and safety are crucial. Additionally, it meets high standards for cleanliness and aesthetic quality, ensuring optimal performance and maintaining the highest levels of food safety throughout the production process.
It complies with:

- Food grade rubber sheet compliant with the US FDA meets the 21CFR 177.2600 regulations.
- Food grade rubber sheet compliant with the EU commission regulation EU 10/2011

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss,	Tear Strength, N/mm	Polymer
R-3655	●	10	500	65	1.39	-	20	NBR

STANDARD THICKNESS
3mm ~ 30mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m-50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

BONGSHIN

FORCHEM: CHEMICAL RESISTANT RUBBER SHEETS

FORCHEM special grade rubber sheets are high-performance materials designed to cater to specific industrial applications requiring enhanced properties such as durability, flexibility, and resistance to harsh conditions. These sheets are formulated with advanced rubber compounds and additives to provide superior performance across various environments.

FORCHEM-SILICONE

FORCHEM-Silicone is specifically recommended for applications where outstanding resistance to both high and low temperatures is essential. It offers exceptional protection against UV rays, ozone, atmospheric agents, and aging, ensuring long-term durability even in harsh environmental conditions. Additionally, it maintains strong physical and mechanical properties, even when exposed to high-temperature environments, making it ideal for use in demanding applications. Its ability to withstand a range of extreme conditions, including UV degradation and ozone exposure, makes it a reliable choice for industries requiring resilient and stable materials over time

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss,	Tear Strength, N/mm	Polymer
R-7411		8	600	40	1.12	-	15	Silicone

STANDARD THICKNESS
3mm ~ 50mm

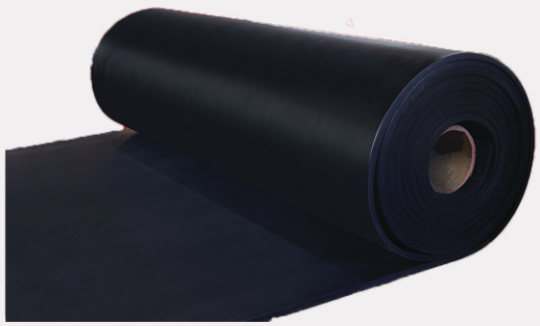
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM- EPDM

This material contains a high percentage of EPDM (Ethylene Propylene Diene Monomer), which enhances its overall physical and mechanical properties. It offers exceptional resistance to high temperatures, as well as to various atmospheric agents, aging, and seawater, ensuring long-lasting durability in harsh environments. EPDM is particularly well-suited for outdoor applications, where it provides optimal resistance to ozone and temperature fluctuations. Additionally, this material is suitable for use in environments exposed to acids and solvents with medium to low concentrations, offering reliable performance and protection in these specific conditions. Its versatility and resilience make it ideal for a wide range of industrial and outdoor applications.



TECHNICAL SPECIFICATION

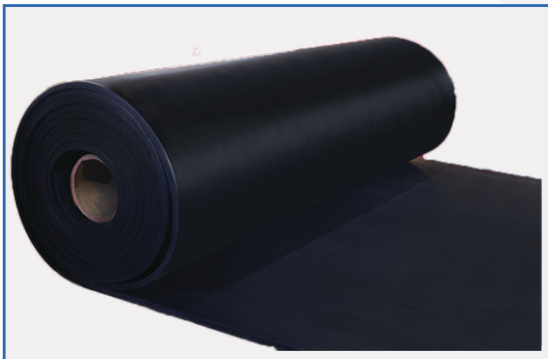
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-4650		13	400	65	1.10	150	30	EPDM
R-4651		11	400	65	1.10	150	30	EPDM
R-4654		10	550	65	1.25	—	30	EPDM
R-4653		12	350	60	1.12	150	30	EPDM

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORCHEM-NITRILE/NBR+SBR

FORCHEM-NITRILE sheeting has a high content of nitrile polymer making it well suited for contact with unleaded petrol, diesel and other oils in general.It provides exceptional resistance to aging and offers reliable mechanical properties with effective performance in environments where exposure to oils and fuels is severe.

FORCHEM BLENDED NBR/SBR sheets contain a moderate amount of nitrile polymer. These sheets demonstrate excellent resistance to oils, Petroleum based substances and under varying environmental conditions. The material maintains good mechanical properties and offers a balanced combination of strength and flexibility making it ideal for a variety of industrial applications.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-3600	●	20	450	60	1.16	100	50	NBR
R-3606	●	10	400	60	1.20	200	40	NBR
R-3654	●	11	450	65	1.23	250	30	NBR
R-3650	●	14	450	65	1.25	200	30	NBR
R-3660	●	14	500	65	1.17	150	40	NBR/SBR
R-3661	●	15	400	65	1.14	150	30	NBR/SBR
R-3670	●	12	400	65	1.25	250	-	NBR/SBR

STANDARD THICKNESS
3mm ~ 50mm

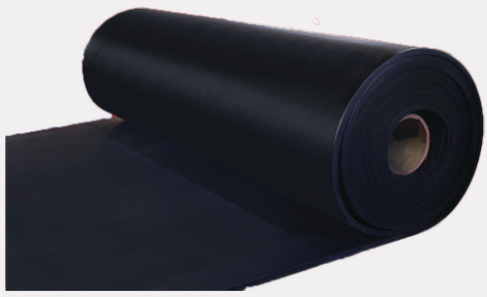
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM BIIR

FORCHEM BIIR lining material offers excellent diffusion resistance to gases and saturated water vapor. It has excellent chemical resistance to mineral acids and bases. An ideal material for lining of Flue Gas Desulphurization (FGD) plants, crystallizers, ship cargo holds and pickling tanks. It is an excellent weather proofing material as well.



TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-5506	●	8	600	50	1.20	225	-	BIIR

STANDARD THICKNESS
3mm ~ 50mm

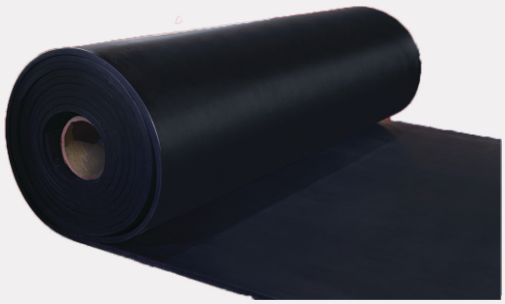
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM-CR

FORCHEM-CR sheets are fire-resistant and anti-static, having passed rigorous testing, making it ideal for overground mining applications. These specialized anti-static rubber sheets provides excellent physical properties, including high mechanical strength and moderate resistance to abrasion, impact, and UV exposure. As a result, it is perfectly suited for sealing, insulating, and isolating in atex environments.



TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-2500	●	12	500	50	1.35	-	40	CR
R-2651	●	10	350	65	1.45	350	40	CR
R-2701	●	20	400	70	1.35	100	45	CR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM-CR ECO

This special grade rubber sheet is cost-effective wear protection option for a range of applications which is combination of chloroprene and natural rubber. This has a moderate resilience to wear and tear and is intended for use in dry applications. This eco grade rubber sheets with CN bonding layer guarantees that the adhesive will hold up for a long time. Even in harsh temperatures or demanding locations, this durable bond offers dependable performance. It increases the bonded surfaces and materials overall strength.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-2606	●	10	450	60	1.30	250	40	NR/CR/NBR
R-2706	●	10	350	70	1.30	200	30	NR/CR/NBR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM-BLEND

FORCHEM blended material is widely utilized for anti-vibration purposes in pre-fabricated buildings or as a containment panel. It offers reliable physical and mechanical properties, making it suitable for a variety of applications. In addition, it provides excellent resistance to atmospheric conditions, ensuring durability and long-lasting performance. Whether used in construction or industrial settings, this material ensures enhanced stability and protection against external forces and environmental factors.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-3620	●	10	350	60	1.23	250	30	PVC-NBR/CR
R-3662	●	12	400	60	1.14	200	30	NBR/SBR
R-3670	●	12	400	65	1.25	250	30	NBR/SBR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORCHEM HYPALON

FORCHEM HYPALON offers moderate resistance to aging, ozone, atmospheric agents, heat, and abrasion. Additionally, it provides good resistance to highly oxidizing chemicals and medium to low concentration chemical agents.

TECHNICAL SPECIFICATION

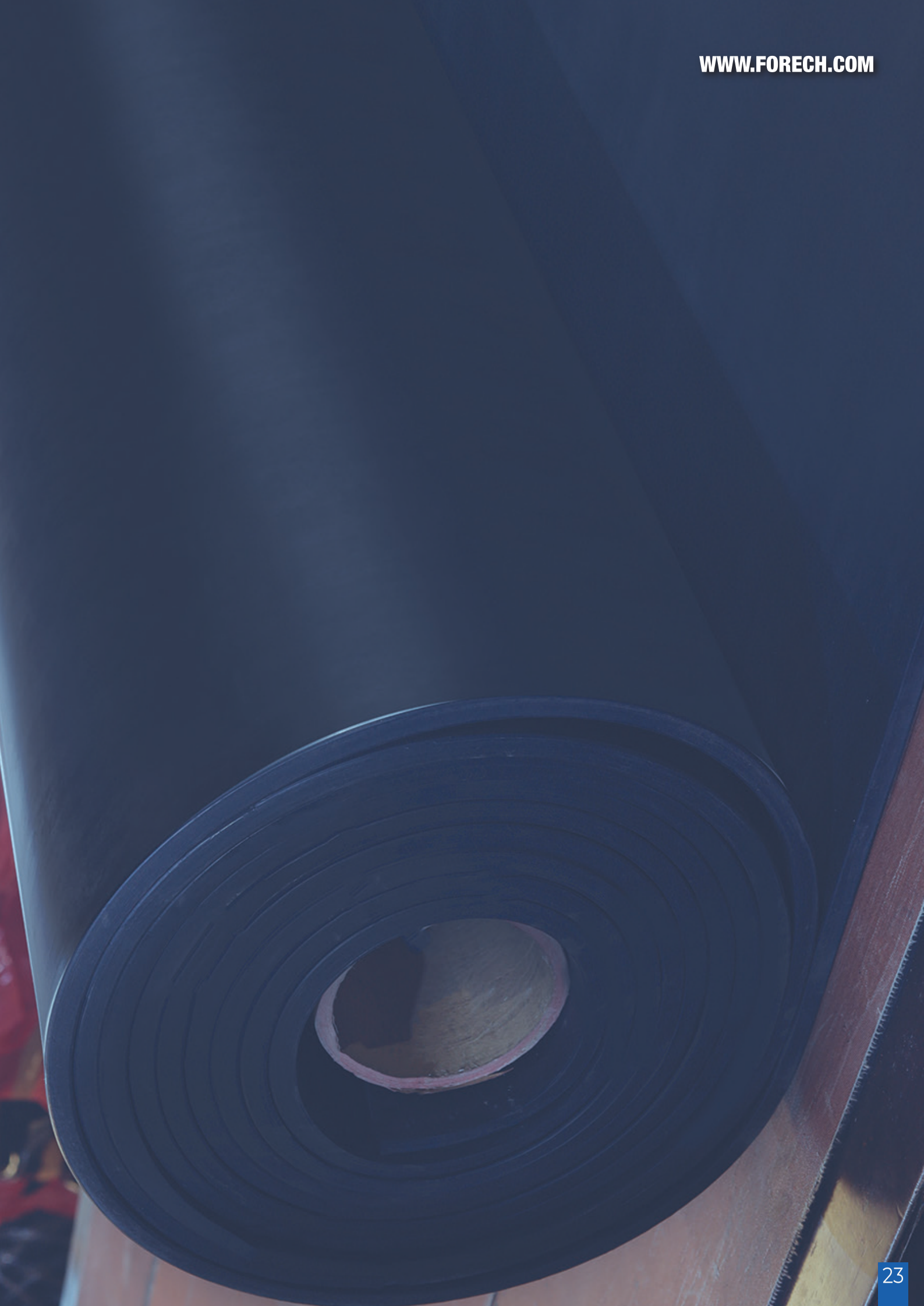
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-6700	●	5	400	70	1.45	250	20	HYPALON
R-6701	●	7	350	70	1.38	200	50	HYPALON
R-6702	●	12	350	70	1.32	175	40	HYPALON

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

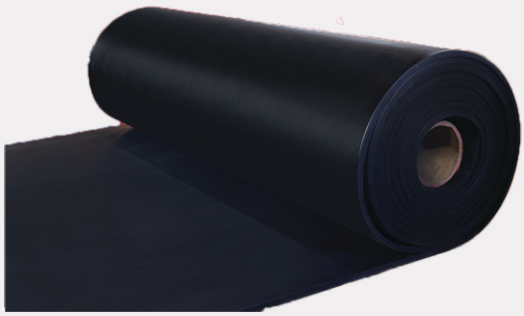
STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORSEAL: INDUSTRIAL RUBBER SHEETS

Industrial rubber sheets are highly versatile materials made from natural or synthetic rubber, intended for various industrial applications. They are known for their outstanding durability, flexibility, and resistance to environmental elements such as abrasion, heat, chemicals, and weathering. In addition to being used in numerous sectors, these rubber sheets also serve as key components in applications like gaskets, seals, and other sealing solutions.



FORSEAL-EPDM

The product contains moderate EPDM content, offering excellent physical and mechanical properties. It demonstrates strong resistance to heat, atmospheric agents, and aging. Specifically, it is commonly used outdoors, where superior resistance to ozone and temperature variations is essential.

TECHNICAL SPECIFICATION

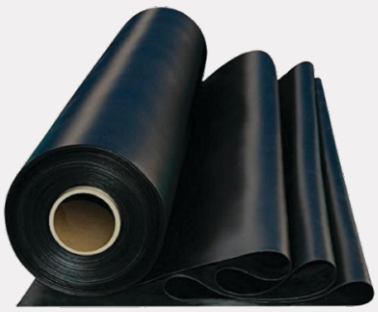
CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-4657	●	6	250	65	1.23	-	-	EPDM
R-4656	●	8	350	65	1.20	350	-	EPDM
R-4700	●	4	200	70	1.30	-	-	EPDM

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back



FORSEAL-CR

FORSEAL-CR sheets are Ideal for industrial applications such as gaskets, seals, and other isolating applications, they offer comparative resistance to impact, providing an environmentally responsible alternative to synthetic materials without sacrificing performance.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-2700	●	4	200	70	1.32	450	-	CR 10
R-2730	●	5	225	70	1.32	400	16	CR 30

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORSEAL-NBR

FORSEAL-NBR is a cost effective material with a low Nitrile content, making it particularly suitable for contact with various oils. This rubber sheet provides outstanding resistance to aging and maintains reliable mechanical properties, ensuring long-lasting performance. Additionally, it offers moderate resistance to gas permeability, making it effective in environments frequently exposed to oils and fuels.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 5 N)	Tear Strength, N/mm	Polymer
R-3706	●	4	200	70	1.38	-	-	NBR 10
R-3707	●	5	250	70	1.30	-	-	NBR 30

STANDARD THICKNESS
3mm ~ 50mm

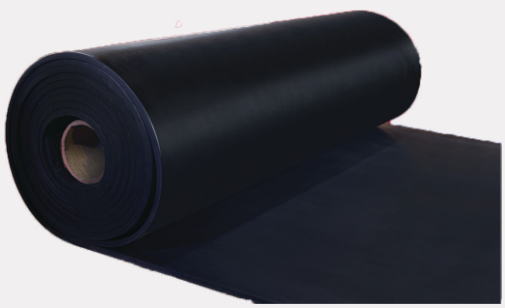
STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORSEAL-NR65

FORSEAL-NR65 grade is cost-effective wear protection option for a range of applications is. This has a moderate resilience to wear and tear and is intended for use in dry situations. Customers can satisfy their rubber sheeting needs and get dependable performance without sacrificing quality thanks to the economy grade.



TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1661	●	4	250	65	1.28	-	10	SBR
R-1670	●	10	350	65	1.27	275	20	NR

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

RANGE
- With & without bonding layer
- With tear off fabric backing
- Buffed back

FORSEAL-SILICONE

FORSEAL-SILICONE grade is especially advised for applications where moderate resistance to both high and low temperatures is crucial. It ensures long-term endurance even in mild weather circumstances by providing good protection against UV radiation, ozone, atmospheric pollutants, and aging.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss,	Tear Strength, N/mm	Polymer
R-7511(IS50)		8	500	50	1.16	-	15	Silicone
R-7611(IS60)		8	400	60	1.18	-	15	Silicone
R-7711(IS70)		8	350	70	1.21	-	15	Silicone

STANDARD THICKNESS
3mm ~ 50mm

STANDARD PRODUCTION WIDTH
1200mm ~ 2000mm

STANDARD ROLL LENGTH
10m - 50m

Test Bench

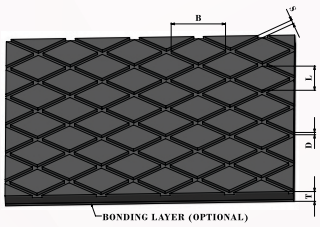
FORLAG: DIAMOND PULLEY LAGGING SHEETS AND PATTERNED LAGGING STRIPS

FORLAG DIAMOND RUBBER LAGGING

Diamond rubber lagging is a specialized material used to enhance the performance and longevity of conveyor belts, particularly in demanding industrial environments. It consists of a durable rubber surface molded with a distinctive diamond-shaped pattern, which provides superior grip and traction between the conveyor belt and the drive pulley. This design significantly reduces slippage, ensuring efficient power transmission and consistent belt movement. The diamond pattern also helps to expel water, dirt, and debris, preventing material build up and reducing maintenance requirements.

TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1605	●	20	450	60	1.10	90	80	NR+BR
R-1624	●	15	400	60	1.13	140	60	NR+BR
R-1630	●	15	400	65	1.15	200	30	SBR

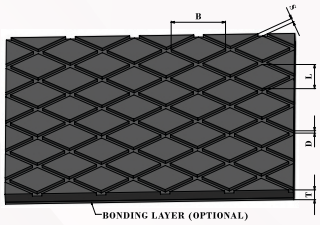


DIAMOND PROFILE
Large Diamond
B=88, L=51, S=8
D=6, T=10

PRODUCT WIDTH
1000mm, 1500mm, 2000mm

FINISH ON THE PULLEY SIDE
With Bonding Layer (Adhesive/Tie Gum Layer) & Without Bonding Layer - Smooth

STANDARD ROLL LENGTH (M)
10m

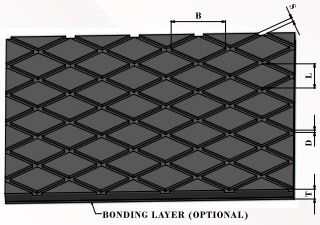


DIAMOND PROFILE
Small Diamond
B=47, L=27, S=6
4=6, T=8

PRODUCT WIDTH
1000mm, 1500mm, 1600mm, 2000mm

FINISH ON THE PULLEY SIDE
With Bonding Layer (Adhesive/Tie Gum Layer) & Without Bonding Layer - Smooth

STANDARD ROLL LENGTH (M)
10m

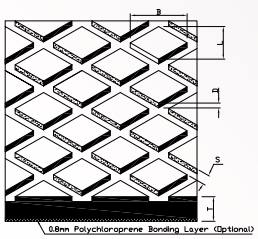


DIAMOND PROFILE
Mini Diamond
B=33, L=17, S=6
D=3, T=7

PRODUCT WIDTH
1000mm, 1200mm, 1500mm, 1800mm, 2000mm

FINISH ON THE PULLEY SIDE
With Bonding Layer (Adhesive/Tie Gum Layer) & Without Bonding Layer - Smooth

STANDARD ROLL LENGTH (M)
10m



DIAMOND PROFILE
B=28, L=28, S=4.5
D=3, T=8

PRODUCT WIDTH
1800mm

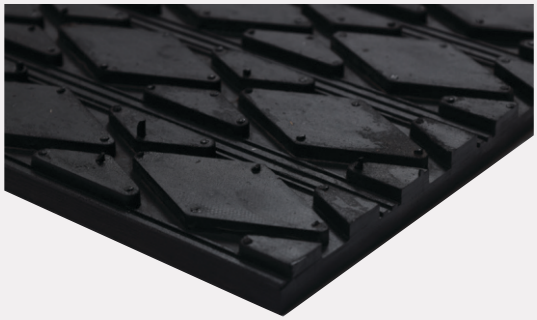
FINISH ON THE PULLEY SIDE
With Bonding Layer (Adhesive/Tie Gum Layer) & Without Bonding Layer - Smooth

STANDARD ROLL LENGTH (M)
10m

FORLAG PATTERNED STRIP PULLEY LAGGING

FORLAG Strips have been specially developed for covering of conveyor pulleys. These easy to use Lagging Strips can be fitted to the Pulleys with the help of cold bonding adhesives in the workshop or at the conveyor site itself, providing extraordinary saving in terms of expenses incurred on account of down time and usage of autoclave. It has been proven that similar adhesion levels can now be achieved with cold bond adhesives as with vulcanization.

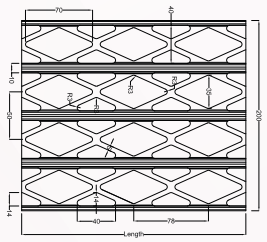
FORLAG is available in a variety of designs, to suit the various application requirements. These are manufactured with 60 to 65 Durometer rubber compound, having an excellent abrasion resistance. All the designs offered by FORECH have excellent water shedding characteristics. Supplied in Roll sizes ranging from 10 to 85 metres in a width of 205mm, they can be custom fitted to any pulley size with minimal wastage.



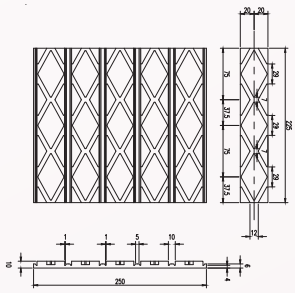
TECHNICAL SPECIFICATION

CODE	Colour	Tensile Strength, MPa	Elongation at Break, %	Shore Hardness, °A ±5	Specific Gravity g/cm³ ±0.03	Abrasion Loss, mm³ (at 10 N)	Tear Strength, N/mm	Polymer
R-1605	●	20	450	60	1.10	90	80	NR+BR
R-1624	●	15	400	60	1.13	140	60	NR+BR
R-1630	●	15	400	65	1.15	200	30	SBR

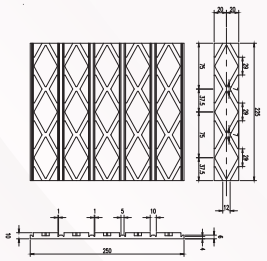
AVAILABLE DESIGN & PATTERNS



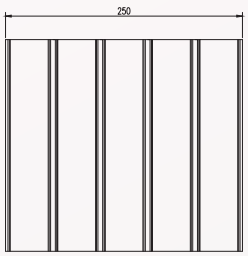
PRODUCT WIDTH
200mm
AVAILABLE THICKNESS
10mm, 12mm & 15mm
DIAMOND SIZE
35mm X 70mm
DEPTH OF DIAMOND
5mm
GAP BETWEEN PROFILE
5mm



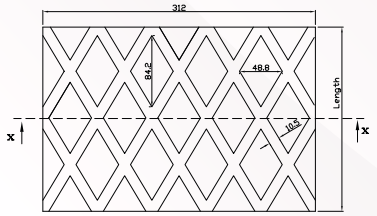
PRODUCT WIDTH
250mm
AVAILABLE THICKNESS
10mm, 12mm & 15mm
DIAMOND SIZE
38mm X 68mm
DEPTH OF DIAMOND
6mm
GAP BETWEEN PROFILE
7mm



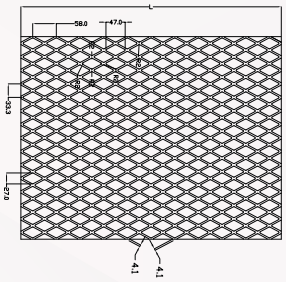
PRODUCT WIDTH
200mm
AVAILABLE THICKNESS
10mm, 12mm & 15mm
DIAMOND SIZE
35mm X 70mm
DEPTH OF DIAMOND
5mm
GAP BETWEEN PROFILE
5mm



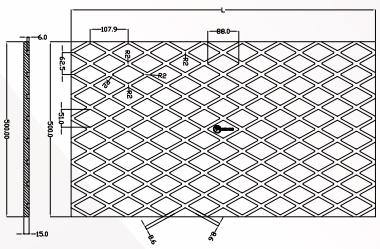
PRODUCT WIDTH
200mm
AVAILABLE THICKNESS
10mm, 12mm & 15mm
DIAMOND SIZE
35mm X 70mm
DEPTH OF DIAMOND
5mm
GAP BETWEEN PROFILE
5mm



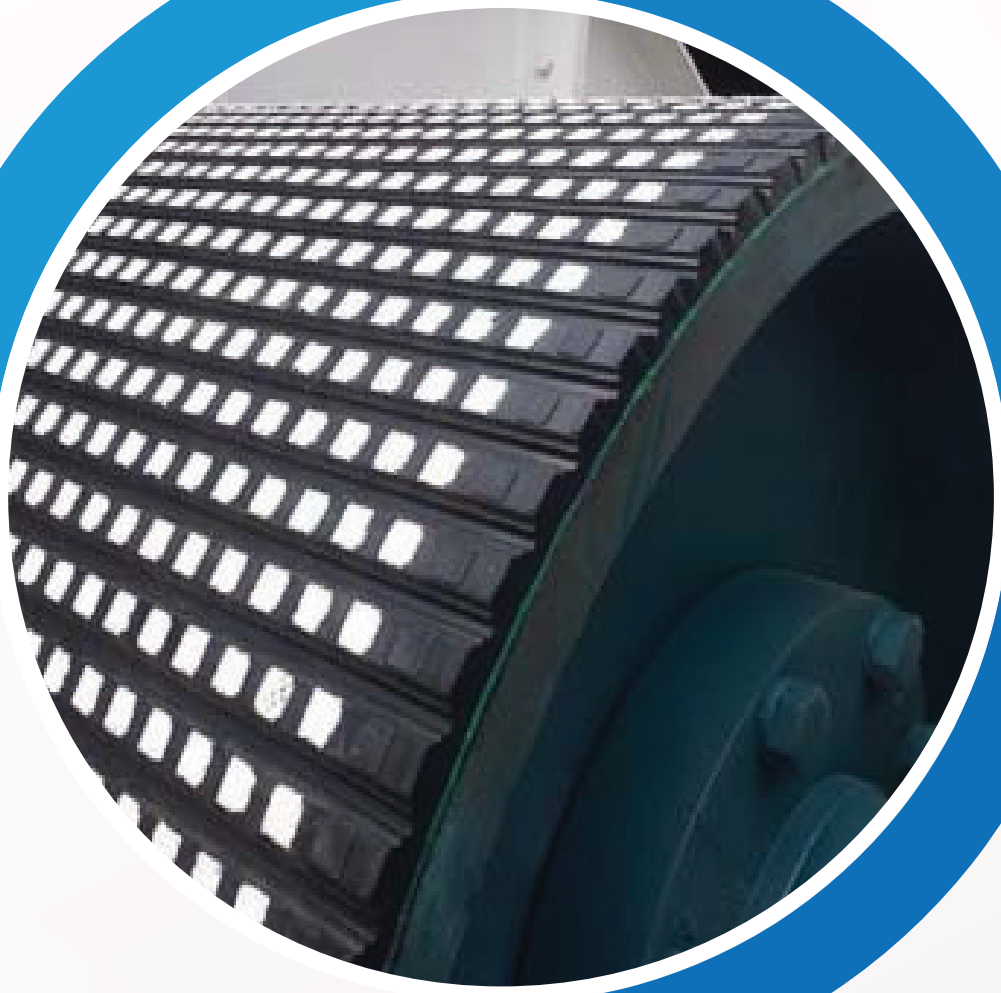
PRODUCT WIDTH
310mm
AVAILABLE THICKNESS
12mm & 19mm
DIAMOND SIZE
48mm X 84mm
DEPTH OF DIAMOND
8mm
GAP BETWEEN PROFILE
10mm



PRODUCT WIDTH
500mm
AVAILABLE THICKNESS
10mm & 12mm
DIAMOND SIZE
27mm X 47mm
DEPTH OF DIAMOND
4mm
GAP BETWEEN PROFILE
4mm



PRODUCT WIDTH
500mm
AVAILABLE THICKNESS
15mm
DIAMOND SIZE
51mm X 88mm
DEPTH OF DIAMOND
6mm
GAP BETWEEN PROFILE
8.5mm



FORLAG: CERAMIC PULLEY LAGGING

FORLAG CERAMIC PULLEY LAGGING

FORLAG ceramic pulley lagging provides the best grip for your drive pulley. The ceramic inserts in the lagging surface provide both high friction and high wear resistance-providing the best protection for your pulley and belt in the most demanding conditions. Ceramic pulley lagging is ideally suited for wet and muddy conditions where belt slippage can be a major problem. The high co-efficient of friction of the ceramic tile inserts with the belt also allows for belt tension to be reduced. This also improves the life of the belt, as well as that of the other belt components as they come under less stress. The surface of the lagging is profiled similar to that of profiled rubber pulley lagging. This allows for effective drainage.

FORLAG Ceramic Lagging is offered as easy to install strips. These come with a bonding layer backing, or a buffed surface as per your needs and budget. Ceramic tiles embedded in rubber, are also supplied in Fire Resistant Anti Static(FRAS) approved grades of rubber compound for underground applications.

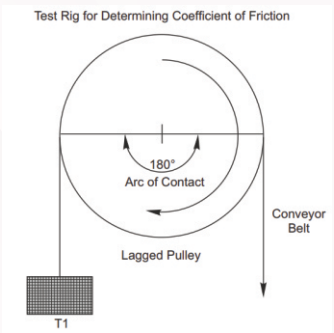
COEFFICIENT OF FRICTION

The maximum tension T1, generated in any conveyor belt is the tension which is required to be imparted on the belt in order to transmit, through traction, at the belt-pulley interface, the tension, Te, necessary to overcome all the system resistances and convey the desired through put at stipulated operating parameters in the diagram. The residual tension T2, is responsible for maintaining the integrity of the belt run and limits the inter-idler sag of the belt to permissible limits. The three tension values are related through mathematical equations, namely.

$$T1 - T2 = Te, \text{ and } T1/T2 = e^{\mu\varnothing}$$

μ = Coefficient of friction between belt and pulley, Ø = Arc of contact between belt and pulley

The value of μ is determined using the dynamic test rig as shown below. A section of belt is wrapped around a pulley (180 degree Arc of Contact) with a constant load on one end. Amotor applies a torque force to the pulley. At a threshold torque the pulley begins to rotate.



From the second relationship in the diagram ($T1/T2 = e^{\mu\varnothing}$) we see that the tension on the belt (T1) increases significantly as coefficient of friction (μ) increase. Increasing the coefficient of the friction therefore has the following benefits:

- Reduced belt tension required
- Reduced slip and therefore less wear on belt and lagging.
- Reduced load on shaft and bearings

The frictional force is significantly increased in the ceramic lagging due to the mechanics of the dimples. However care has been taken that this does not damage the conveyor belt.

COMPARISON TABLE FOR CO-EFFICIENT OF FRICTION

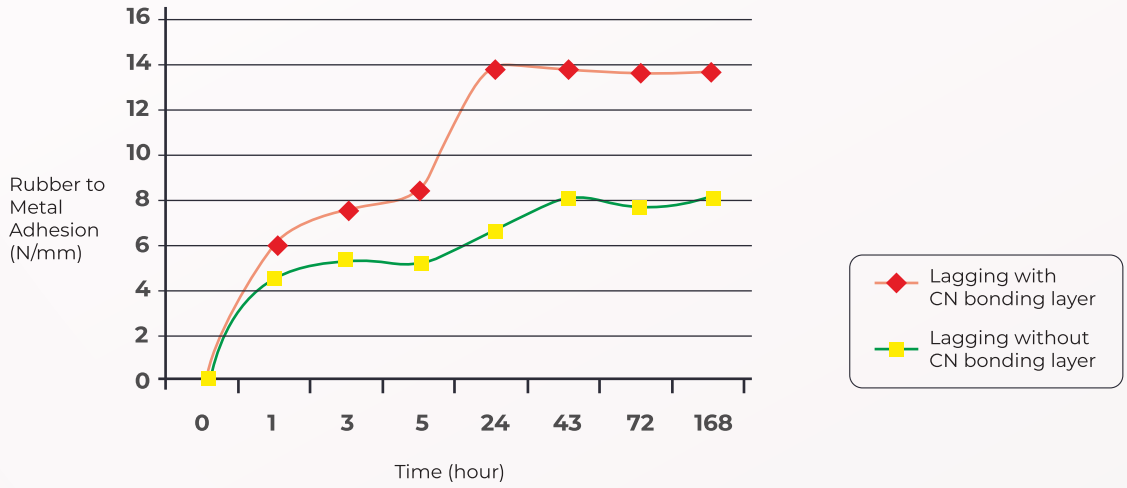
Co-efficient of Friction	Bare Steel Pulley	Rubber Lagging	Ceramic Lagging
Dry	0.25	0.50	0.75
Wet	0.15	0.35	0.55

Ceramic Tile Specifications	
Aluminium Oxide (min) Al_2O_3	92%
Density (g/cc)	3.65
Hardness (R 45 N)	79 min.
Cold Crushing Strength (Mpa)	2050 min.
Flexural Strength at Room Temp. (Mpa)	240 min.
Water absorption	0%

Test	Specification
Abrasion by impingement	0.05 grams max.
Abrasion by Rubbing	0.1 grams max.

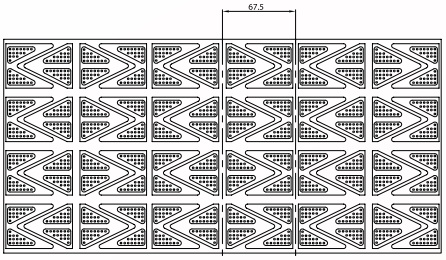
Base Rubber Specification	
Compound Code	R-1608
Polymer	SBR
Specific Gravity	1.13 +/– 0.03
Shore Hardness °A	60 +/– 5
Elongation at break % Min.	450%
Tensile Strength	17.5 N/mm²
Abrasion Loss	150 mm³ at 10N

SUMMARY RESULTS OF PULLEY LAGGING ADHESION TESTS

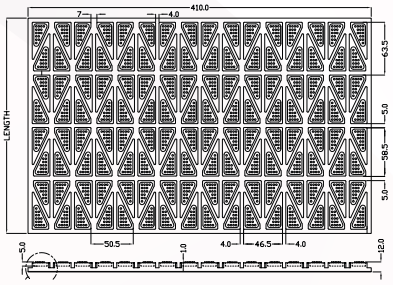


Pulley Lagging Selection Chart				
Criteria	Plain Sheet Lagging	Diamond Sheet Lagging	Rubber Strip Lagging	Ceramic Strip Lagging
Dry Performance	Very Good	Excellent	Excellent	Excellent
Wet Performance	Average	Very Good	Very Good	Excellent
Wear Life	Very Good	Very Good	Very Good	Excellent
Ease of Installation	Good	Good	Excellent	Excellent
Fire Resistance	Yes	Yes	Yes	Yes
Drainage Grooves	No	Yes	Yes	Yes

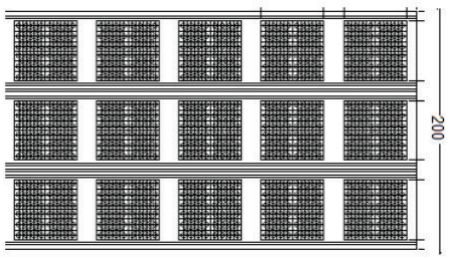
AVAILABLE DESIGN & PATTERNS



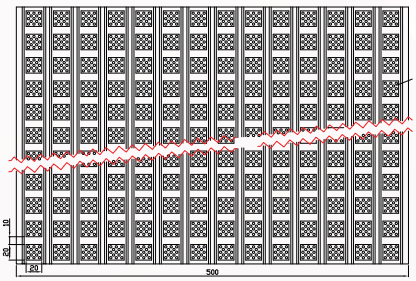
DESIGN
Triangular - Dimpled
PRODUCT WIDTH
200mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
16mm X 26mm Triangle
CERAMIC TILE THICKNESS
5mm
CERAMIC COVERAGE AREA
25%



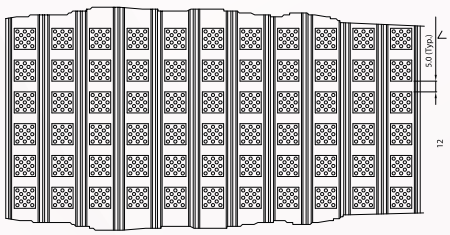
DESIGN
Square - Dimpled
PRODUCT WIDTH
410mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
20mm X 20mm
CERAMIC TILE THICKNESS
5mm
GAP BETWEEN TILES
5mm
CERAMIC COVERAGE AREA
46%



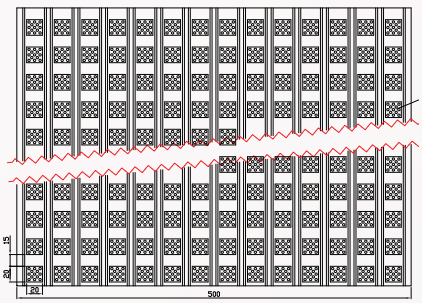
DESIGN
Square - Dimpled
PRODUCT WIDTH
200mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
25.4mm X 25.4mm
CERAMIC TILE THICKNESS
7mm
GAP BETWEEN TILES
16mm
CERAMIC COVERAGE AREA
58%



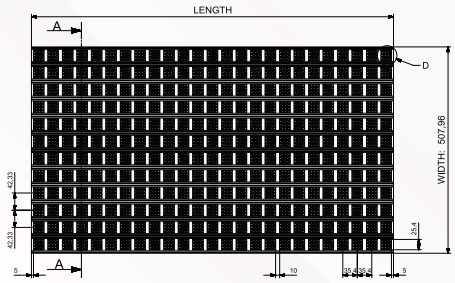
DESIGN
Square - Dimpled
PRODUCT WIDTH
500mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
20mm X 20mm
CERAMIC TILE THICKNESS
5mm
GAP BETWEEN TILES
10mm
CERAMIC COVERAGE AREA
38%



DESIGN
Square - Dimpled
PRODUCT WIDTH
385mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
20mm X 20mm
CERAMIC TILE THICKNESS
5mm
GAP BETWEEN TILES
5mm
CERAMIC COVERAGE AREA
46%



DESIGN
Square - Dimpled
PRODUCT WIDTH
500mm
AVAILABLE THICKNESS
12mm X 15mm
CERAMIC TILE SIZE
20mm X 20mm
CERAMIC TILE THICKNESS
5mm
GAP BETWEEN TILES
15mm
CERAMIC COVERAGE AREA
32%



DESIGN
Square - Dimpled
PRODUCT WIDTH
508mm
AVAILABLE THICKNESS
20mm Ceramic
CERAMIC TILE SIZE
25.4mm X 25.4mm
CERAMIC TILE THICKNESS
8mm
GAP BETWEEN TILES
10mm
CERAMIC COVERAGE AREA
44%

FORLAG: CERAMIC PULLEY LAGGING GREEN (CL-GREEN)

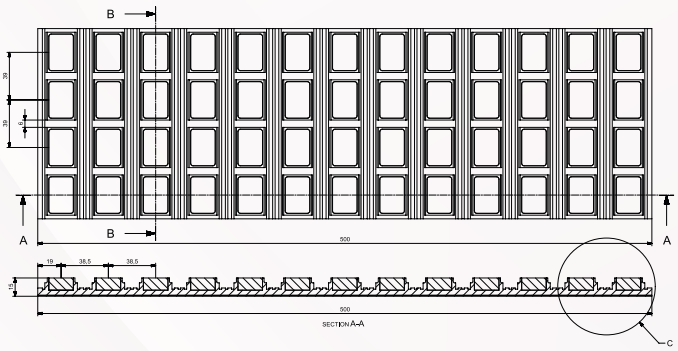
FORLAG ceramic pulley lagging with porous green ceramic non dimpled tiles provides the best grip for your drive pulley. The ceramic inserts in the lagging surface provide both high friction and high wear resistance-providing the best protection for your pulley and belt in the most demanding conditions. Ceramic pulley lagging is ideally suited for wet and muddy conditions where belt slippage can be a major problem. The high co-efficient of friction of the ceramic tile inserts with the belt also allows for belt tension to be reduced. This also improves the life of the belt, as well as that of the other belt components as they come under less stress. The surface of the lagging is profiled similar to that of profiled rubber pulley lagging. This allows for effective drainage.

INTRODUCTION

Ceramic lagging is a crucial component in enhancing the friction between conveyor belts and pulleys, ensuring efficient and safe belt movement in industrial applications. The main purpose of ceramic lagging is to increase the friction coefficient, which helps in preventing belt slippage, improving operational efficiency, and extending the lifespan of both the conveyor belt and pulleys. Ceramic lagging typically comes in two types: porous and non-porous. Porous ceramic lagging, like the FORLAG: CL-Green features ceramic tiles with a high degree of porosity that retain friction properties over time, offering exceptional wear resistance and long-term performance. On the other hand, non-porous ceramic lagging often uses small, shallow dimples on the tile surface to generate friction but tends to lose this capability quickly as the dimples wear down.

WHY CHOOSE FORLAG: CL-GREEN?

FORLAG: CL-Green ceramic lagging offers superior friction performance and durability, providing clear advantages over traditional non-porous, dimpled ceramic lagging. Our proprietary technology delivers high static friction coefficients and excellent wear resistance, helping industries maintain smooth and safe operations. Our ECOGRIP series includes porous ceramic tiles, which are ideal for applications where high friction and long-lasting durability are essential. These tiles feature a friction coefficient ranging from μ = 1.0 to 1.5, significantly higher than that of traditional non-porous lagging tiles. This ensures safer, slip-free operation for conveyors, particularly in heavy-duty, high- tension environments.



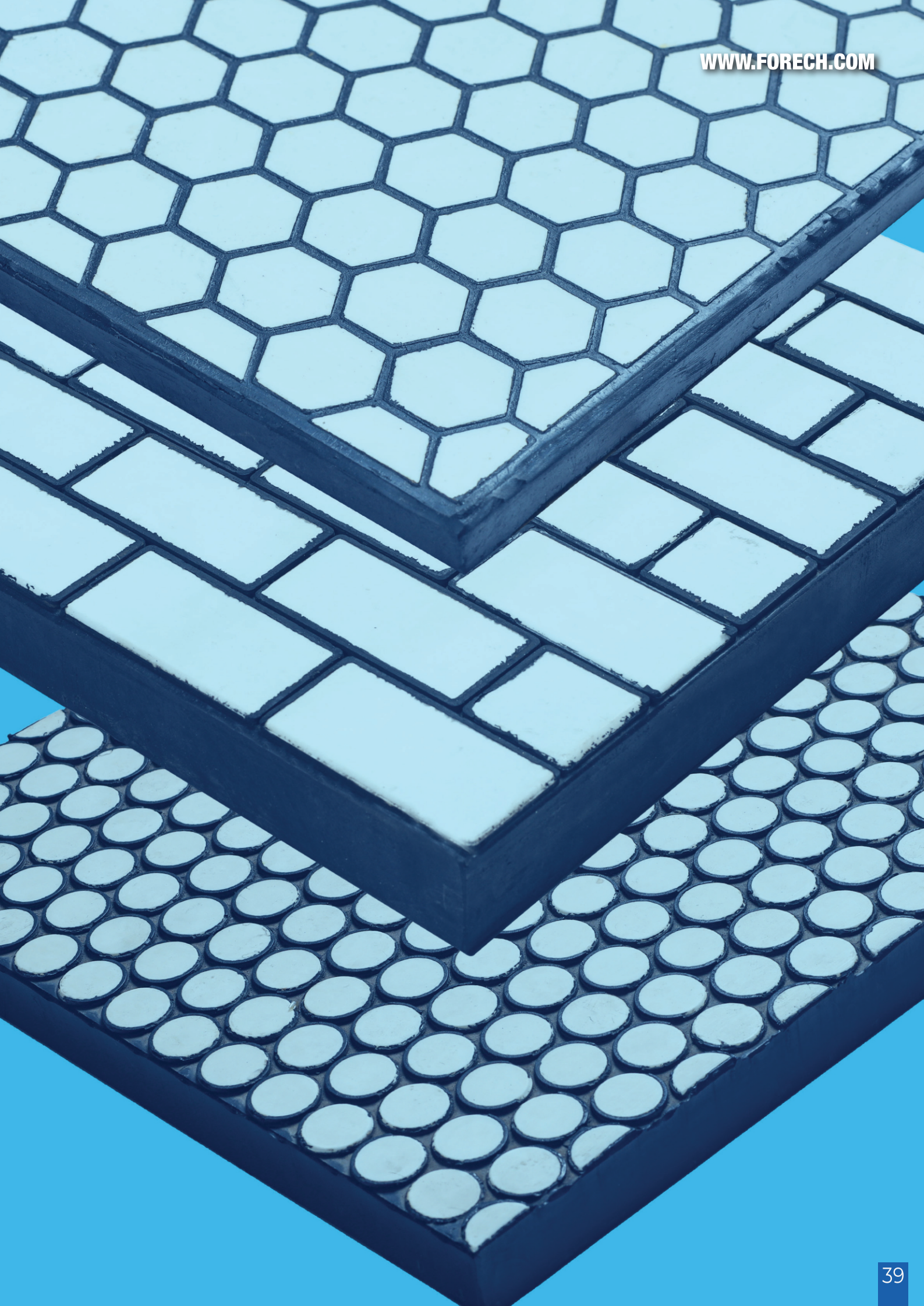
KEY FEATURES

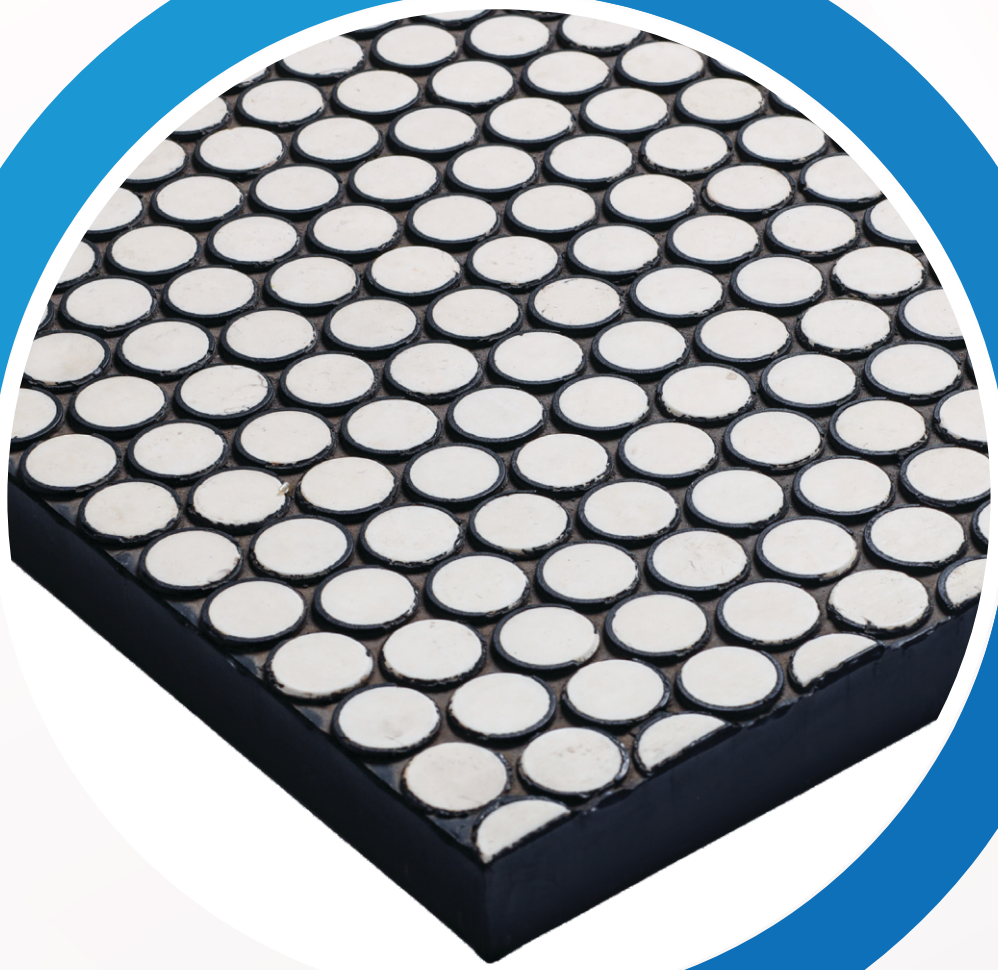
High Friction Coefficient:
Achieve maximum friction with μ = 1.0 to 1.5 for both non- driven and drive pulleys, ensuring safe and non-slip belt movement.

Long Wear Life:
Our 10+ mm thick porous ceramic tiles maintain high friction performance throughout their wear cycle, offering extended operational life compared to competitors' products.

Reliable and Durable:
Hot-vulcanized porous ceramic tiles provide a sturdy and durable solution, resisting wear and reducing maintenance costs over time.

Protects Conveyor Belts:
The consistent high friction reduces belt slippage and wear, prolonging the life of both the ceramic tiles and conveyor belts.





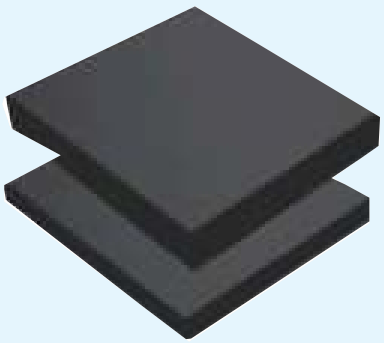
FORWEAR: COMPOSITE RUBBER & CERAMIC LINERS

RUBBER WEAR LINERS

FORECH offers a wide range of Wear Resistant Elements in various dimensions, with thicknesses from 30 to 150 mm. These elements are designed as modular units to facilitate quick and easy replaceability of a worn out element from an entire chute, hopper or a truck-bed.
Each element is made of a rubber plate, which is bonded to a 5mm - 10mm thick steel plate, depending on the overall thickness of the total element. This provides the element with secure fastening.
FORECH Wear Resistant Elements are made of a very high quality wear resistant rubber grade developed specially to meet the mining and mineral processing industries' need for economical, high performance wear protection systems. These products have a high wear strength and provide a long service life, which results in less down time and even lesser maintenance costs.
FORECH Wear Resistant Elements are easy to handle and drastically reduce noise and vibration when installed and prove to be much more economical when compared to steel liners.

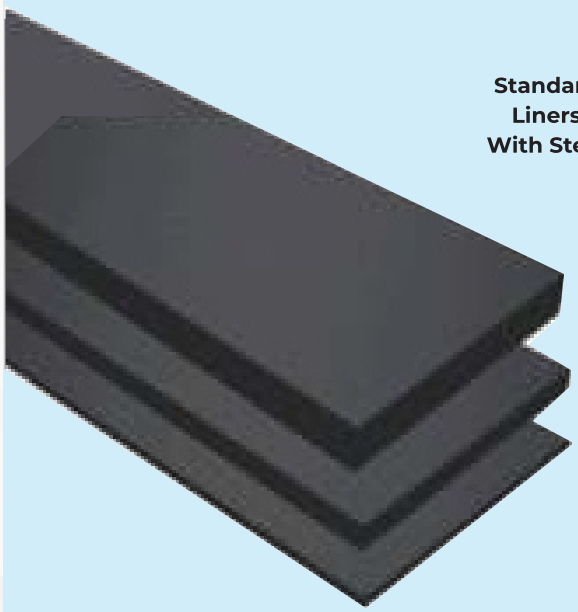
P P TYPE WEAR ELEMENTS
Smooth Wear Resistant Rubber 60 Shore A (with and without Steel Backing)

Thickness	Width x Length (mm)
PP 30	300x300 500x500
PP 40	300x300 500x500
PP 50	300x300 500x500
PP 60	300x300 500x500
PP 80	300x300 500x500



Small Square Liners With Steel

PP 30	500X1000 750X1500
PP 40	500X1000 750X1500
PP 50	500X1000 750X1500
PP 60	500X1000 750X1500
PP 80	500X1000 750X1500
PP 100	500X1000 750X1500
PP 120	500X1000 750X1500
PP 150	500X1000 750X1500

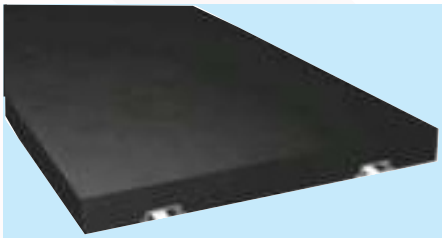


Standard Liners With Steel

Steel back liners are supplied with 5mm thick steel upto a total thickness of 80mm above which the steel backing is 10mm thick.

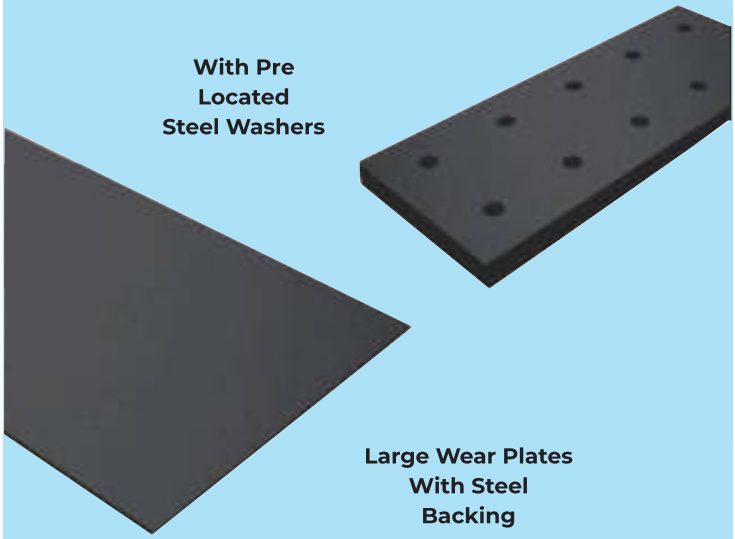
P P TYPE WEAR ELEMENTS
Smooth Wear Resistant Rubber 60 Shore A (with and without Steel Backing)

Thickness	Width x Length (mm)
SP 80	750X1500
PT 50	500X1000 750X1500
PT 75	500X1000 750X1500
PT 100	500X1000 750X1500



With Aluminium T-Track

PP-L 20	1500X2000
PP-L 30	1500X2000
PP-L 40	1500X2000
PP-L 50	1500X2000
PP-L 60	1500X2000
PP-L 80	1500X2000
PP-L 100	1500X2000
PP-L 125	1500X2000



With Pre Located Steel Washers

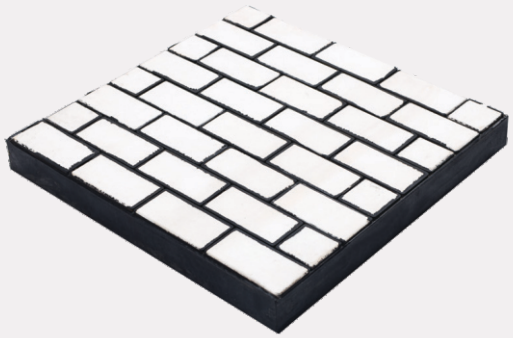
Large Wear Plates With Steel Backing

APPLICATION AREAS

- Forech Wear Liners offer excellent wear protection in tough conditions such as primary chutes, truck beds, bins and hoppers.
- Forech Wear Liners are resistant to all PH values and types of water and to most oils in small concentrations.
- Forech Wear Liners are not to be exposed to continuous heat in excess of 70° C.

CERAMIC WEAR LINERS

Huge volumes of ROM and crushed material at very high transport speeds in conjunction with low angles of impact tend to accelerate wear which requires frequent change of lining surface resulting in costly down times.
For such high wear and extreme applications, high density aluminium oxide ceramic tiles have proven to be an excellent choice as a lining material.
By embedding the ceramic tiles on to the rubber, it is also possible to achieve impact cushioning along with the superior wear resistance provided by alumina ceramic tiles.



They key advantages of using Ceramic Pads as a lining material are:

- Long service life
- Reduced down times
- Quick and easy installation
- Special Ceramic Design Shapes
- Noise reduction on the system

Forech's ceramic pad range encompasses light, medium and heavy duty applications.
We provide ceramic liners of varying thicknesses to suit the needs of specific installations

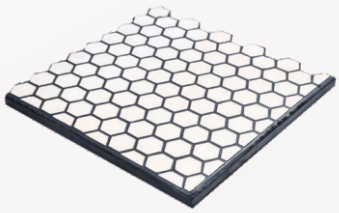
Ceramic Tile Specifications	
Aluminium Oxide (min) Al_2O_3	92%
Density (g/cc)	3.65
Hardness (R 45 N)	79 min.
Cold Crushing Strength (Mpa)	2050 min.
Flexural Strength at Room Temp. (Mpa)	240 min.
Water absorption	0%

Test	Specification
Abrasion by impingement	0.05 grams max.
Abrasion by Rubbing	0.1 grams max.

Base Rubber Specification	
Compound Code	R-1608
Polymer	SBR
Specific Gravity	1.13 +/– 0.03
Shore Hardness °A	60 +/– 5
Elongation at break % Min.	450%
Tensile Strength	17.5 N/mm^2
Abrasion Loss	150 mm^3 at 10N

LIGHT DUTY APPLICATIONS

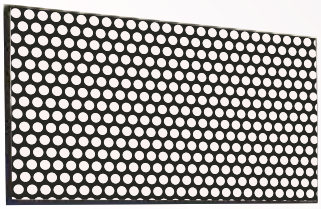
For light duty application, Forech provides a square/hex tile design with flushed tiles or with rubber between tiles that allows the product to be light and flexible.
The gap allows for easy installation on both concave and convex surfaces. The size of the sheet can also be easily changed by cutting between the ceramic tiles and through the rubber-allowing you to customize the sheet according to your installation's needs.
The back of the liner for light duty applications is provided with a Bonding Layer to strengthen the rubber to metal bond, as well as to reduce the time required to glue the sheet during installation.



STANDARD RANGE

S. No.	Dimensions	Ceramic Thickness (mm)	Backing Thickness Including BL/Steel (mm)	Tile Design	Backing Type
1.	500mm X 500mm X 5mm without gap	3	2	Square	Bonding Layer
2.	500mm X 500mm X 6mm with / without gap	3	3	Square	Bonding Layer
3.	500mm X 500mm X 6mm with / without gap	4	2	Square	Bonding Layer
4.	500mm X 500mm X 8mm with / without gap	4	4	Square	Bonding Layer
5.	500mm X 500mm X 10mm with / without gap	4	6	Square	Bonding Layer
6.	500mm X 500mm X 10mm with / without gap	5	5	Square	Bonding Layer
7.	500mm X 500mm X 10mm with gap	6	4	Hexagonal	Bonding Layer
8.	500mm X 500mm X 15mm with / without gap	10	5	Square	Bonding Layer

MEDIUM DUTY APPLICATIONS

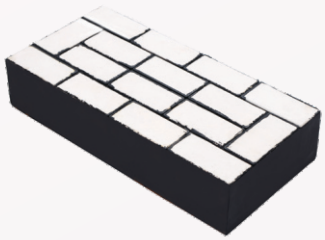


For applications handling medium to heavy and more abrasive material, Forech recommends its ceramic liners with medium thickness (10-20mm) tiles duty applications.
These pads commonly come with a steel backing for stud welding. Rubber spacing between the tiles allows the pads to be cut to size by hand; allowing quick change overs and easy maintenance.
Ceramic liners for medium duty applications, specially for curved surfaces are supplied with a CN bonding layer.

STANDARD RANGE

S. No.	Dimensions	Ceramic Thickness (mm)	Backing Thickness Including BL/Steel (mm)	Tile Design	Backing Type
1.	500mm X 500mm X 20mm with gap	12	8	Hexagonal	Bonding Layer / Stee
2.	500mm X 500mm X 20mm without gap	12	8	Hexagonal	Bonding Layer / Stee
3.	507mm X 532mm X 20mm with gap	12	8	Hexagonal	Bonding Layer
4.	500mm X 500mm X 30mm with gap	25	5	Hexagonal	Bonding Layer
5.	500mm X 500mm X 35mm with gap	25	10	Hexagonal	Steel
6.	150mm X 303mm X 32mm with gap	20	12	Rectangular	Steel
7.	303mm X 303mm X 32mm with gap	20	12	Rectangular	Steel
8.	303mm X 456mm X 32mm with gap	20	12	Rectangular	Steel
9.	303mm X 606mm X 32mm with gap	20	12	Rectangular	Steel
10.	430mm X 430mm X 32mm with gap	20	12	Rectangular	Steel
11.	456mm X 456mm X 32mm with gap	20	12	Rectangular	Steel
12.	500mm X 500mm X 32mm with gap	20	12	Rectangular	Steel
13.	150mm X 303mm X 32mm with gap	20	12	Cylinder	Steel
14.	303mm X 303mm X 32mm with gap	20	12	Cylinder	Steel
15.	303mm X 456mm X 32mm with gap	20	12	Cylinder	Steel
16.	303mm X 606mm X 32mm with gap	20	12	Cylinder	Steel
17.	500mm X 500mm X 32mm with gap	20	12	Cylinder	Steel

HEAVY DUTY APPLICATIONS



For handling extremely abrasive materials with very high material flow rates, Forech recommends its ceramic liners for heavy duty applications.
This range offers ceramic wear liners with large ceramic blocks embedded into rubber upto 75mm deep and are supported by heavy steel plate backing designed for stud welding.
The special rubber backing provides impact cushioning that allows movement of the tile within the rubber under heavy impact resulting in long use of the liner without the danger of cracking the ceramic tile.

STANDARD RANGE

S. No.	Dimensions	Ceramic Thickness (mm)	Backing Thickness Including BL/Steel (mm)	Tile Design	Backing Type
1.	150mm X 303mm X 64mm with gap	50	14	Rectangular	Steel
2.	303mm X 303mm X 64mm with gap	50	14	Rectangular	Steel
3.	303mm X 456mm X 64mm with gap	50	14	Rectangular	Steel
4.	303mm X 606mm X 64mm with gap	50	14	Rectangular	Steel
5.	150mm X 303mm X 69mm with gap	50	14	Rectangular	Steel
6.	303mm X 303mm X 69mm with gap	50	14	Rectangular	Steel
7.	303mm X 456mm X 69mm with gap	50	14	Rectangular	Steel
8.	303mm X 606mm X 69mm with gap	50	14	Rectangular	Steel

FORCORD: SCREENING MATS

FORCORD: Screeing Mats are an unpunched Screen Cloth made of a combination of high quality impact and abrasion resistant rubber, with special heat treated, tyre cord reinforcement, to enable tensioning and to maintain the same without the need for continuous adjustments.

The FORCORD: Screeing Mats are supplied in duly customized widths and lengths or in long rolls, which can be suitably customized as per the requirements on-site.

These mats are available in standard thicknesses from 5mm to 35mm and can be suitably punched as per the requirements of the customer.

Main advantages of Rubber Screens as compared to Metal Screens:

- Much reduced noise level
- Non-corrosive in wet conditions
- Does not suffer from pitting or stress corrosion (especially in the presence of sea water)
- Does not suffer from fatigue, which is accelerated by vibration of the screen.
- Good abrasion resistance normally outlasting steel by up to 4:1
- Can be punched rapidly from stock to suit specific requirements.
- More cost effective.

Main advantages of Rubber Screens as compared to Pulyurethene Screens:

- Rubber is less inclined to break soft or brittle particles into smaller sizes (especially suitable for coal)
- Rubber is a more lively screen which prevents blinding and pegging.
- Rubber has excellent tear resistance
- Rubber has excellent impact resistance
- Rubber has excellent puncture resistance
- Out performs Urethanes where particles are greater than 3.0mm.

Properties	Unit	Value	Test according standard
Hardness	Shore A	65±5	ISO 48-4
Tensile Strength	MPa	20	ISO 37
Elongation at break	%	Min. 450	ISO 37
Tear Strength (crescent)	kN/m	Min. 450	ISO -34-1 (METHOD C)
Abrasion Loss	mm^3	Max. 90	ISO 4649
Ageing 7 days at 70°C Change in hardness Change in tensile strength Change in elongation at break	 Shore A % %	 Max.+8 Max.-25 Max.-25	 ISO 188 ISO 188 ISO 188
Density	g/cm^3	1.12±0.03	g/cm^3 ISO 2781

FORECH: CONVEYOR BELT REPAIR MATERIALS

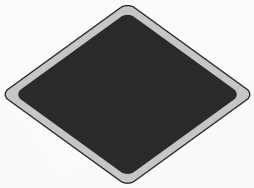
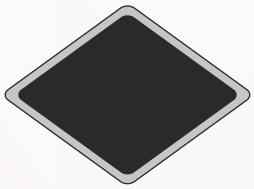
Due to entrapment of material from large material size or because of wear caused by the skirt rubber or any other variants, the conveyor belts can have cuts and gouges, which result in sustained wear in a certain area. If this is not immediately repaired, the cut or wear can cause damage to the belt.

FORECH cold bonding repair materials are specially suited to repair Conveyor Belts on-site. The repair system offered is reliable, time-saving and can be carried out by the on-site maintenance team. These Repair Materials are designed for application on almost all grades of Conveyor Belts, except for hot material and food stuffs handling belts.

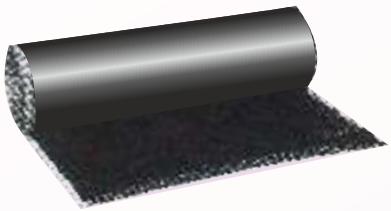
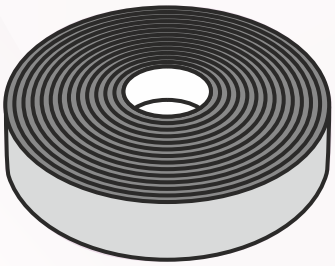
The Patches and Strips are supplied with a Bonding Layer and in protective plastic films. They come with a special feather edge, enabling the Repair/Patch/Strip to merge with the covers of conveyor belts completely.

Following are the range of Patches, Strips and Repair Materials offered by FORECH.

RANGE

	PRODUCT CODE NO.	PRODUCT DESCRIPTION	DIMENSION (IN MM)
	300130	Diamond Patch	450 x 470
	300140	Diamond Patch	135 X 160
	300150	Diamond Patch	200 x 260
	300160	Diamond Patch	270 X 360
	300130 R	Diamond Patch	450 x 470
	300140 R	Diamond Patch	135 X 160
	300150 R	Diamond Patch	200 x 260
	300160 R	Diamond Patch	270 X 360
	300320	Rectangular Patch	50x10000
	300330	Rectangular Patch	70x10000
	300340	Rectangular Patch	100x10000
	300350	Rectangular Patch	150x10000
	300360	Rectangular Patch	220x10000
	300370	Rectangular Patch	300x10000
	300380	Rectangular Patch	400x10000
	300330 R	Rectangular Patch	70x10000
	300340 R	Rectangular Patch	100x10000
	300350 R	Rectangular Patch	150x10000
	300360 R	Rectangular Patch	220x10000
	300370 R	Rectangular Patch	300x10000
	300380 R	Rectangular Patch	400x10000

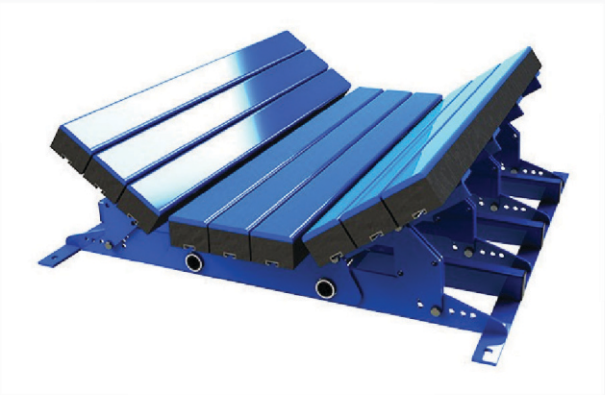
RANGE

	PRODUCT CODE NO.	PRODUCT DESCRIPTION	DIMENSION (IN MM)
	300110	Cover Strip	1.7mmx100mmx10000mm
	300404 Normal Quality	Sheet for repair of damaged belt covers with CN bonding layer on one side	0.8x500mmx10000mm 1mmx500mmx10000mm 1.5mmx500mmx10000mm 2mmx500mmx10000mm 3mmx500mmx10000mm 4mmx500mmx10000mm 5mmx500mmx10000mm
	FRAS	Sheet for repair of damaged belt covers with CN bonding layer on one side	1mmx500mmx10000mm 1.5mmx500mmx10000mm 2mmx500mmx10000mm 3mmx500mmx10000mm 4mmx500mmx10000mm 5mmx500mmx10000mm
	300850 300851 300852 300853 Normal Quality	Filler Rubber	3mmx50mmx10000mm 3mmx500mmx10000mm 1.8mmx50mmx10000mm 1.8mmx500mmx10000mm
	FRAS	Filler Rubber	3mmx50mmx10000mm 3mmx500mmx10000mm 1.8mmx50mmx10000mm 1.8mmx500mmx10000mm
	300870	EP Conveyor Repair Fabric with BL on both sides	2.2mmx500mmx10000mm

FORGLIDE: IMPACT BARS

FORGLIDE: Impact Bars are designed to absorb impact at the loading points of conveyor belt installations, where a combination of high energy absorption and low friction is needed.

Due to ease of installation, these Impact Bars replace the conventional idler sets. The top cover is made of an Ultra High Molecular Weight Polyethelene, which gives these Impact Bars a vey low friction top surface. The middle portion is of a high quality energy absorbing rubber, which acts as a shock absorber at the loading zones of conveyor installation. These Impact Bars are also available with tapered ends on one side or on both sides to prevent any damage to the conveyor belt.



FORGLIDE: Impact Bars come with a 'T-Track' fastening system, which enables variable fixing points throughout the length of the Bars. A 'T-Track' fastening system also makes the element adaptable to any cradle arrangement, which the conveyor installation might have.

The Impact Bars come in standard lengths of 1220mm, 1500mm and 1524mm with top cover of UHMWPE and are supplied with 8 bolts and Nylock nuts as a standard accessory.

Special sizes of Impact Bars are also manufactured on special requests.

IMPACT BAR
With Top layer of UHMW-PE and Al. Profile for T Bolt having rubber hardness of 60 Deg. A and 45 Deg.A

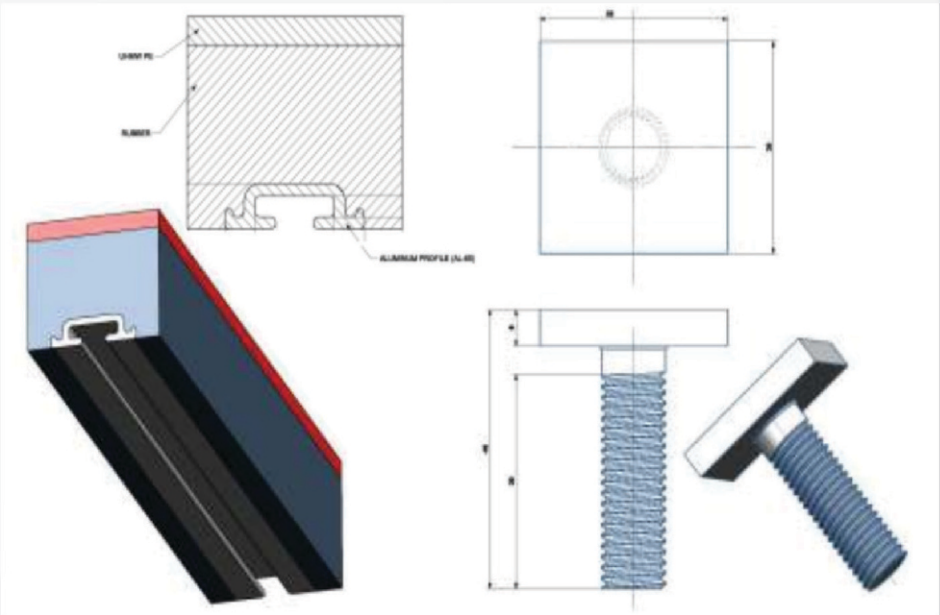
50mm X 100mm X 1220mm - 10mm
50mm X 100mm X 1500mm - 10mm
55mm X 100mm X 1220mm - 10mm
55mm X 100mm X 1500mm - 10mm
55mm X 100mm X 1800mm - 10mm

75mm X 100mm X 1220mm - 10mm
75mm X 100mm X 1220mm - 12.7mm
75mm X 100mm X 1220mm - 25.4mm
75mm X 100mm X 1800mm - 10mm

100mm X 100mm X 1220mm - 10mm
100mm X 100mm X 1220mm - 12.7mm
100mm X 100mm X 1220mm - 25.4mm

75mm X 100mm X 1524mm - 10mm
75mm X 100mm X 1524mm - 12.7mm
75mm X 100mm X 1524mm - 25.4mm

100mm X 100mm X 1524mm - 10mm
100mm X 100mm X 1524mm - 12.7mm
100mm X 100mm X 1524mm - 25.4mm



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