



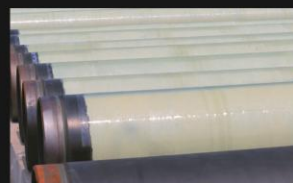
## The Leader in Pipeline Technology

Corrosion Prevention & Mechanical protection



Rehabilitation of Existing Pipeline ▲

### ▼ Innovative Visco-elastic Solutions



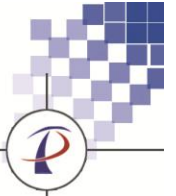
ARO Coating for Directional Drilling ▼

Corrosion Protection of New Pipeline ▲

Shandong PLT Pipe Coating Technology Co.,Ltd

[www.pltac.com](http://www.pltac.com)





PLT is committed to the development of remarkable products, especially for anticorrosion tapes, viscous elastic coating and abrasion resistance overlay. Ensure the safety and efficient operation of the pipeline industry to reduce the cost of pipeline maintenance.

As the development of pipeline industry, there are two challenges which prevent the service life of pipes, anti-corrosion and mechanical protection.

Normally, the effects of conventional anti-corrosion products are not easy to meet customers' needs via different requirements, because their working life cannot last as long as possible. Most of these conventional products only can be used about three to five years maximum, some of them are even more short life. Based on the external environmental issues and aging problem of product itself, which leads the damage of anti-corrosion layer and lose the effectiveness of protection at the same time. The external environmental issues include soil stress, geological movement, temperature change, moisture, PH, microbe and ultraviolet ray, etc.

## ◀ Company Profile

Despite the external environmental issues, the serious construction environment also brings a lot of challenges to customers. Conventional or normal mechanical protection layer is very difficult to protect pipelines or anti-corrosion coating from damages caused by mechanical stress such as horizontal directional drilling, pipe installation and back-fill, and other mechanical damage risks. Further, irregular components anti-corrosion, rehabilitation of existing coating, pipeline reinforcement, heat shrinkable sleeve joint failure, which all of these difficulties are bothering we human beings all the time.

In order to solve the various difficulties in the pipeline industry, Shandong PLT Pipe Coating Technology Co., Ltd specializes in developing and producing innovative products to protect pipelines stay away from corrosion damage and mechanical hurt all over the world, so as to guarantee customers to avoid economic losses and security risks.



## UV-curing FRP Shield

### Product Description

UV-curing FRP Shield is an epoxy polyurethane resin pre-impregnated fiber-reinforced outer wrap material, curing by means of Ultraviolet light.

UV-curing FRP Shield is applied as an additional mechanical protection layer on the corrosion preventing coating systems of pipelines to provide a high performance protection against mechanical impacts, weathering, UV-radiation and chemicals.

After curing with UV-light, UV-curing FRP Shield forms a hard, smooth and highly abrasion resistant shell on top of previously applied coating systems, making it ideal for thrust(slick) bore, directional drilling, or other mechanical protection applications. It has been specified and installed successfully for twenty years and has a proven track record as an abrasion resistance overlay (ARO).



#### Applications:

Directional Drilling

Thrust (slick) Bore

Pull Throughs

Pipeline Protection in Severe Handling Applications

Protection of Mainline Coatings

### Features/Benefits

- Fast and easy to apply.
- 100% Solids, no VOC.
- Excellent mechanical properties.
- Superior abrasion resistance .
- Widely used in directional drill and thrust bore applications.
- Resistant to cold, hot, wet and chemically aggressive environments.
- Wide operational temperature range.
- Complete curing can be obtained by UV-light sources or by sunlight.
- Long pot life when sheltered from UV-light sources.
- Standard thickness 2.50 mm . (also available in 1.2mm, 1.5 mm, 2.0mm)

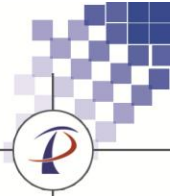




## UV-curing FRP Shield

### Product Properties

Physical Properties	Test Method	Value
Material State	--	Solid
Thickness	ISO 4593:1993(E)	2.5mm±0.2mm
Density	ISO 1183	4000 g/m <sup>2</sup>
Light Sources For Curing	--	UV-A lamps or Sunlight
Application Temperature	--	-30°C to +85 °C
Tensile Strength	ISO 527-4	250MPa
Compressive Strength	ISO 14126	500 MPa
Flexural Strength	ISO 14125	480MPa
Abrasion Resistance	ASTM D4060	70 cycles/micron
Hardness	ASTM D2240	Barcol:≥50 Shore D:≥85
Impact Resistance	ASTM G14	25J



## Viscous-elastic Anticorrosion Tape T900

### Product Description

Viscous-elastic Anticorrosion Tape T900 is a cold-applied, non-crosslinked, non-crystalline solid polyolefin coating in roll form used for the corrosion protection of shaped and non-shaped substrates of under- and aboveground.

T900 offers the pipeline industry an unrivaled visco-elastic technology when it comes to corrosion prevention. The viscosity modulus provides permanent wetting characteristics whereas the elasticity modulus provides the strength and elasticity of a solid. So T900 always has a permanent and intimate contact with the steel or factory coatings like PE, PP and FBE.

T900 is used as a corrosion protective inner wrap and an additional flexible mechanical protective outer wrap is required, that can be a PE, PVC or PU composite outer wrap.



### Features/Benefits

- Adhesion to the substrate without primer.
- No curing time.
- Easy in use, can be moulded onto irregular shaped objects.
- Permanent wetting characteristics .
- Self healing in case of small damages.
- Cohesive fracture.
- Impervious to moisture and gases.
- Extreme high chemical resistance.
- No reactive groups and no deterioration in the course of time.





## Viscous-elastic Anticorrosion Tape T900

### Product Properties

Physical Properties	Test Method	Value
Material State	--	Solid
Thickness	ISO 4593:1993(E)	2.0mm±0.2mm
Density	DIN 53479	1.1 ± 0.1 g/cm <sup>3</sup>
Elongation	ASTM D 1000	200%
Water Absorptivity	ASTM D 570	0.02%
Water Vapor Permeability	ASTM E96	0.2 g/m <sup>2</sup> /day
Drip resistance	ISO 21809-3/A1	No dripping of compound
Dielectric Strength	ASTM D 149	20 kV/mm
Tensile Strength	ASTM D 638	120 N/cm
Peel Adhesion (total system)	ASTM D1000	cohesive fracture
Chemical resistance in aggressive soils	Excellent No deterioration, No corrosion, 72 hours at 70° C	cohesive fracture 1. Sulfuric acid 30% 2. Nitric acid 10% 3. Fosforic acid 20% 4. Chloric acid 10%



## Viscous-elastic Anticorrosion Putty

### Product Description

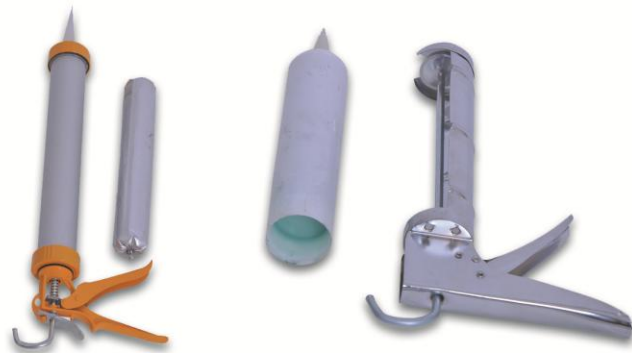
Viscous-elastic Anticorrosion Putty is a non-toxic, non-crystalline, viscous elastic solid polyolefin coating, suited for application on steel pipelines and adjacent factory coatings like PE, PP, FBE, etc. It is used as a corrosion protective moulding compound for filling of voids and leveling of irregular surfaces, for the protection of under- and aboveground pipeline related substrates against corrosion such as flanges, bolts, valves and for sealing casing ends against water infiltration.

Viscous-elastic Anticorrosion Putty is commonly used in conjunction with T900 Tape and a mechanical protective outer wrap that can be a PE, PVC or PU composite outer wrap.



### Features/Benefits

- Adheres on various types of dry substrates.
- No primer required.
- Easy to shape and mould.
- Fills the finest pores of the substrate .
- Minor surface preparation required.
- Non toxic; no solvents.
- Impervious to moisture and gases.
- Can be supplied in special 0.5 kilo sausages form.



### Product Properties

Physical Properties	Test Method	Value
Material State	--	Solid
Density	DIN 53479	1.2-1.5g/cm <sup>3</sup>
Temperature Range	ISO 9001	-45°C to +90°C
Specific Electrical Resistance	EN 12068	1*10 <sup>12</sup> Ω.m <sup>2</sup>
Water Absorption	ASTM D 570	0.04%
Drip Resistance	ISO 21809-3/A1	No dripping of compound
Dielectric Strength	ASTM D 149	20 kV/mm
Adhesion	ASTM D1000	30N / 10 cm <sup>2</sup>
Salt Spray Test	ASTM B117-09	Excellent, no undercreep, no corrosion, rating 10





## CR Tape T800

### Product Description



CR tape T800 is designed for the corrosion protection of new and existing pipelines. The specification of the tape consists of three layers,

Adhesive: Butyl rubber compound.

Film backing: Special blend of stabilized polyolefines.

Interleaf: Anti-adhesive Film treated with Silicone.

CR tape T800 is different from the conventional corrosion prevention tape of which the adhesion comes from physical absorption between its adhesive and the bonding interface. CR tape T800 is chemical reactive-type tape whose adhesion comes from chemical bonding. The cross-linking reaction will occur between CR tape and CR primer. So CR tape T800 has even better adhesion.

Our patented technology helps us print CR primer on the backing of CR tape T800. This will improve the adhesion and overcome the bond failure between overlaps.

### Features/Benefits

- Cold application.
- Long term corrosion protection.
- Resistance to the cathodic disbondment.
- Compatible with common pipe coatings.
- Application by hand or machine.
- Standard thickness 0,70 mm .



### Product Properties

Physical Properties	Test Method	Value
Thickness	ISO 4593	0.7mm±0.035mm
Tensile strength	ASTM D 1000	120 N/cm
Elongation	ASTM D 1000	280%
Peel adhesion to primed steel pipe	ASTM D 1000	40N/cm
Peel adhesion layer to layer	ASTM D 1000	30N/cm
Cathodic Disbondment	ASTM G 8	6.4mm
Dielectric Strength	ASTM D 149	30 KV
Volume Resistivity	ASTM D 257	1.2×10 <sup>12</sup> ohm.cm
Water Absorptivity	ASTM D 570	0.03%
Application Temperature	ISO 9001	-20°C to +70 °C
Max Service Temperature	ISO 9001	+70 °C



## CR Tape T800HS



### Product Description

CR Tape T800HS is improved chemical reactive-type tape with a high-shear elastomeric adhesive and a stabilized polymeric backing for long-term stability at elevated temperature.

CR Tape T800HS is a cold applied coating system designed for the corrosion protection of field joints, fittings, damaged coatings and specialty piping with a maximum operating temperature of 200°F (93°C).

This system does not require a primer or liquid adhesive. It can be applied to wire brushed or sandblasted pipe surface. The high tack butyl rubber adhesive is designed for high initial adhesion even during extreme cold weather applications.

CR Tape T800HS with a very tacky adhesive has a plastic release liner to enable proper unwinding of the roll. It can be applied by hand or with a wrapping machine.



### Features/Benefits

- No Primer needed .
- Heavy duty/high tack adhesive.
- Long term corrosion protection.
- Resistance to the cathodic disbondment.
- Compatible with common pipe coatings.
- Standard thickness 1.80 mm . (also available in 1.0mm, 1.5 mm)

### Product Properties

Physical Properties	Test Method	Value
Thickness	ISO 4593	1.8mm±0.01mm
Tensile strength	ASTM D 1000	120 N/cm
Elongation	ASTM D 1000	280%
Peel adhesion to primed steel pipe	ASTM D 1000	60N/cm
Peel adhesion layer to layer	ASTM D 1000	60N/cm
Cathodic Disbondment	ASTM G 8	6.0mm
Dielectric Strength	ASTM D 149	30 KV
Volume Resistivity	ASTM D 257	$2.5 \times 10^{12}$ ohm.cm
Water Absorptivity	ASTM D 570	0.03%
Application Temperature	ISO 9001	-30°C to +80 °C
Max Service Temperature	ISO 9001	+90 °C



## CR Primer

### Product Description

CR Primer is recommended for use with only CR Tape T800.

It is a two component, phenolic resin-chloroprene, proprietary formulation. It has a strong bond with steel, which up to 223N/cm.

Vulcanizing agents in the CR Primer, which will make a cross-linking reaction of CR Primer with the adhesive of CR Tape T800. This will produce even better adhesion due to the chemical bonding.

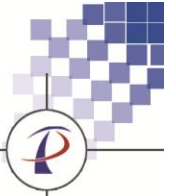


### Features/Benefits

- High adhesion.
- Quickly drying.
- Conformable to irregular pipe.
- Compatible with general coating system.
- Application by hand or machine.

### Product Properties

Physical Properties	Unit	CR Primer
Color	-	Dark red
Solid content	%	23
Density	Kg/liter	0.78
Viscosity +23°C (Out flow time, 4mm nozzle )	Sec	20±5
Drying time	Min	15-30
Dry Thickness	Mils	2.0
Mixing Ratio (by weight)	-	10:1
Pot Life ,(after mixing) ,23°C	Day	3
Shelf Life ,23°C	Year	1
Max Service Temperature	°C	-20 to 60



## PETROLATUM TAPE T700



### Product Description

Petrolatum tape T700 is a cold applied tape which remains plastic over a wide temperature range. It is non-hardening and non-cracking. It is highly resistant to mineral acids, alkalis, salts and micro-organisms and highly impermeable to water, water vapour and gases. Used for the protection of buried or exposed pipes, rods, cables, valves and metal fittings from corrosion.

COMPOSITION: Non-woven synthetic fibre fabric impregnated and coated with a neutral compound based on saturated petroleum hydrocarbons (Petrolatum) and inert siliceous fillers. It is supplied in rolls in a range of widths.

### Features/Benefits

- Provided in 1.15mm, 1.5mm, 2.0mm thickness.
- Cold applied, easily and fast.
- Resistance to the cathodic disbondment.
- Long term corrosion protection, sealing, and waterproofing.
- Compatible with irregular surface profiles.
- Complies with AWWA Standard C217.

### Product Properties

Physical Properties	Test Method	Typical Value
Breaking Strength	ASTM D1000	200N/50mm, minimum
Elongation at Break	ASTM D 1000	10%, average
Breakdown Voltage(55%, overlap)	ASTM G 8	16kv, minimum
Resistance to Cathodic Disbonding	ASTM G 8	<500mm
Resistance to Acids, Alkalis and Salts	ASTM G 8	Excellent
Temperature Range For Application For Service	–	5°C to 55°C -20°C to 70°C
Roll Length	–	10 metres minimum
Thickness	ASTM D1000	1.15mm minimum
Weight	–	1.44kg/m <sup>2</sup> , average
RECOMMENDED PRIMER		Paste, Priming Solution



## INNER ANTICORROSION TAPE T100



### Product Description

Inner anticorrosion tape T100 is a two ply tape with HDPE carrier film and butyl rubber adhesive on one side. It is cold applied tape coating system for corrosion protection of Water, Oil and Gas Pipelines. The T100 is engineered to assure a high bond to the primed surface with excellent conformability characteristics. It shall be applied after primer and before outer mechanical protection tape.

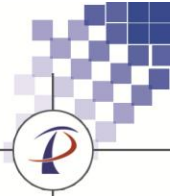
### Features/Benefits

- Provided in 15mil, 18mil, 20mil, 25mil, 30mil thickness.
- Cold applied,easily and fast,without extra heat.
- Resistance to the cathodic disbondment.
- Long term corrosion protection.
- Compatible with common pipe coatings.
- Application by hand or machine.
- Complies with ASTM D1000,EN12068,DIN30672 standards.



### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Backing color	-	Black	Black
Tensile strength	ASTM D 1000	51 lbs/in	90 N/cm
Elongation	ASTM D 1000	400%	400%
Peel adhesion to primed steel pipe	ASTM D 1000	311oz/in	34 N/cm
Cathodic Disbondment	ASTM G 8	0.252 in radius	6.4mm
Dielectric Strength	ASTM D 149	30.0 KV	30.0 KV
Volume Resistivity	ASTM D 257	1.2×10 <sup>12</sup> ohm.cm	1.2×10 <sup>12</sup> ohm.cm
Water Absorptivity	ASTM D 570	0.06%	0.06%
Water Vapor Transmission Rate 24h	ASTM F 1249	0.083 g/100sq in/24h	0.13 g/ m <sup>2</sup> /24h
Application Temperature	-	14°F to 140 °F	-10°C to +60 °C



## Outer Mechanical Protection Tape T200

### Product Description

Outer mechanical protection tape T200 is a two ply tape with HDPE carrier film and butyl rubber adhesive on one side. It is cold applied tape coating system for corrosion protection of Water, Oil and Gas Pipelines. The T200 achieves a complete bond to the T100 inner layer, providing maximum handling and in-service protection for the coating system. It shall be applied after the inner anticorrosion tape.

### Features/Benefits

- Provided in 15mil, 18mil, 20mil, 25mil, 30mil thickness.
- Cold applied,easily and fast,without extra heat.
- Excellent adhesion to inner-layer tape and itself.
- Resistant to UV.
- Protect the coating from damages during the transportation and the installation.
- Application by hand or machine.
- Complies with ASTM D1000,EN12068,DIN30672 standards.

### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Backing color	-	White	White
Tensile strength	ASTM D 1000	51 lbs/in	90N/cm
Elongation	ASTM D 1000	300%	300%
Peel adhesion to inner-layer tape	ASTM D 1000	73oz/in	8 N/cm
Cathodic Disbondment	ASTM G 8	0.252 in radius	6.4mm
Dielectric Strength	ASTM D 149	38.0 KV	38.0 KV
Impact resistance	ASTM G 14	50 in-lbs	5.5 N•m
Volume Resistivity	ASTM D 257	2.5×10 <sup>12</sup> ohm.cm	2.5×10 <sup>12</sup> ohm.cm
Water Absorptivity	ASTM D 570	0.05%	0.05%
Water Vapor TransmissioinRate 24h	ASTM F 1249	0.005 g/100sq in/24h	0.075g/ m <sup>2</sup> /24h
Application Temperature	-	14°F to 140 °F	-10°C to +60 °C
Max Service Temperature	-	185°F	+85 °C



## Joint Tape T300



### Product Description

Joint Tape T300 is a cold applied tape coating system designed for field joints, fittings and specialty piping. It has a Polyethylene backing with a Butyl rubber-based adhesive to assure high bond to primed steel pipe and other coating materials. A release plastic liner on the adhesive to enable proper unwinding of the roll. It is suitable for machine and hand applied applications and delivers excellent conformability when applied over seamed, spiral welded or extruded pipe.

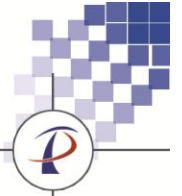
### Features/Benefits

- Provided in 15mil, 18mil, 20mil, 25mil, 30mil, 50mil thickness.
- Cold applied, easily and fast, without extra heat.
- Resistance to the cathodic disbondment.
- Long term corrosion protection.
- Compatible with common pipe coatings.
- Application by hand or machine.
- Complies with ASTM D1000, EN12068, DIN30672 standards.



### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Backing color	-	Black	Black
Tensile strength	ASTM D 1000	51 lbs/in	90 N/cm
Elongation	ASTM D 1000	300%	300%
Peel adhesion to primed steel pipe	ASTM D 1000	347oz/in	38N/cm
Cathodic Disbondment	ASTM G 8	0.252 in radius	6.4mm
Dielectric Strength	ASTM D 149	38 KV	38 KV
Volume Resistivity	ASTM D 257	2.5×10 <sup>12</sup> ohm.cm	2.5×10 <sup>12</sup> ohm.cm
Water Absorptivity	ASTM D 570	0.05%	0.05%
Water Vapor Transmissioin Rate 24h	ASTM F 1249	0.083 g/100sq in/24h	0.13 g/ m <sup>2</sup> /24h
Application Temperature	-	-29°F to 185 °F	-34°C to +85 °C
Max Service Temperature	-	185°F	+85 °C



## Double Faced Anticorrosion Tape T400



### Product Description

Double faced anticorrosion tape T400 is a three ply tape with HDPE carrier film and butyl rubber adhesive on two sides. It is cold applied tape coating system designed for the corrosion protection of pipelines operating in highly corrosive environments and exposed to high mechanical stresses that may be present particularly on large diameter pipes.

The double faced anticorrosion tape T400 assures a strong cohesive bond to the primed steel surface, at the spiral overlap and to the mechanical outer layer.

### Features/Benefits

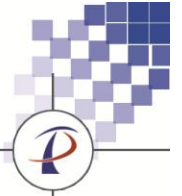
- Provided in 20mil, 25mil, 30mil thickness.
- Cold applied, easily and fast, without extra heat.
- Resistance to the cathodic disbondment.
- Long term corrosion protection.
- Compatible with common pipe coatings.
- Application by hand or machine.
- Complies with ASTM D1000, EN12068, DIN30672 standards.



### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Tensile strength	EN 12068	51 lbs/in	90N/cm
Elongation	EN 12068	300%	300%
Shear Resistance	EN 12068	139 oz/sqin	0.06 N/mm <sup>2</sup>
Peel Adhesion to Primed Steel	EN 12068	311 oz/in	34 N/cm
Peel Adhesion Inner to Inner	EN 12068	311 oz/in	34 N/cm
Peel Adhesion Outer to Inner	EN 12068	329oz/in	36N/cm
Peel Adhesion Outer to Outer	EN 12068	88oz/in	9.6N/cm
Cathodic Disbondment	ASTM G 8	0.252 in radius	6.4mm
Dielectric Strength	ASTM D 149	38.0 KV	38.0 KV
Impact resistance	ASTM G 14	50 in-lbs	5.5 N•m
Volume Resistivity	ASTM D 257	2.5×10 <sup>12</sup> ohm.cm	2.5×10 <sup>12</sup> ohm.cm
Water Absorptivity	ASTM D 570	0.05%	0.05%
Water Vapor Transmission Rate 24h	ASTM F 1249	0.005 g/100sq in/24h	0.075g/ m <sup>2</sup> /24h
Application Temperature	-	-29°F to 185 °F	-34°C to +85 °C
Max Service Temperature	-	185°F	+85 °C





## PVC Outer Wrap T500



### Product Description

PVC Outer Wrap T500 is a UV-resistant, flexible polyvinyl chloride tape, coated with a modified pressure sensitive rubber resin adhesive. The tape is used as an Outer Wrap for the mechanical protection of corrosion preventing coating systems against soil stress, back fill procedures and other forms of mechanical impact. It is well suited for above ground, underground and submerged applications. The heavy-duty adhesive layer provides good adhesion to the other surfaces as well as to its own backing. The Outer Wrap has good resistance to impacts, indentations and abrasion, and is also resistant to chemicals like alkalis and acids. It is wrapped with a 50% overlap by hand or by means of a tape wrap machine.

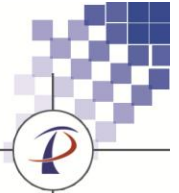
### Features/Benefits

- Cold application, no open fire.
- UV resistant.
- Flexible, good conformability.
- Excellent impact resistance.
- Application by hand or machine.
- Standard thickness 0,50 mm (also available in 0.18mm, 0.25 mm, 0.38mm, 1.15mm).



### Product Properties

Physical Properties	Test Method	Value
Backing color	ISO 9001	Black, White, Yellow, others
Thickness	ISO 4593	0.5mm±0.055mm
Tensile strength	ASTM D 1000	58 N/cm
Elongation	ASTM D 1000	400%
Peel adhesion to wrapping band	ASTM D 1000	4N/cm
Peel adhesion layer to layer	ASTM D 1000	7.5N/cm
UV resistance	ASTM D 4587	Excellent
Thermal aging resistance	ASTM D 4587	Excellent
Flame retardant properties	ASTM D 1000	Self extinguishing
Dielectric Strength	ASTM D 149	15 KV
Water Absorptivity	ASTM D 570	0.03%
Application Temperature	ISO 9001	-30°C to +80 °C
Max Service Temperature	ISO 9001	+85 °C



## Aluminum Flashing Tape T600

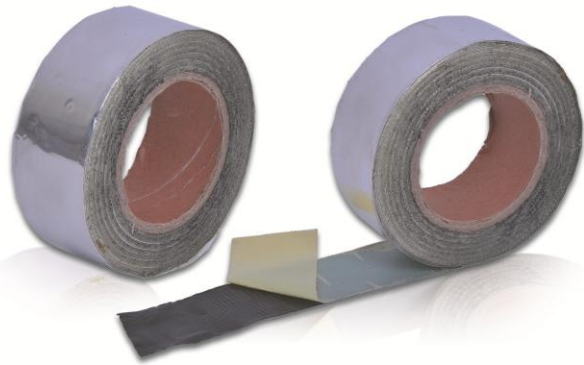


### Product Description

Aluminum flashing tape T600 is a two ply tape with aluminum foil carrier film and butyl rubber adhesive on one side. It is cold applied tape coating system, which has unique capability to reflect sunlight and anti-UV. As well the aluminum flashing tape T600 is Waterproof, anti-aging, non-curing, non-cracking.

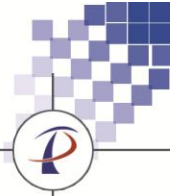
### Features/Benefits

- Resistant to UV.
- Provided in 20mil, 30mil,40mil, 50mil ,60mil thickness.
- Cold applied,easily and fast.
- Excellent adhesion to the protected surfaces.
- Application by hand or machine.
- Complies with ASTM D1000,EN12068,DIN30672 standards.



### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Backing color	-	Silvery	Silvery
Tensile strength	ASTM D 1000	41.2 lbs/in	72.2N/cm
Elongation	ASTM D 1000	140%	140%
Peel adhesion to substrate	ASTM D 1000	503oz/in	55 N/cm
Dielectric Strength	ASTM D 149	25.0 KV	25.0 KV
Impact resistance	ASTM G 14	50 in-lbs	5.5 N•m
Volume Resistivity	ASTM D 257	2.0×10 <sup>12</sup> ohm.cm	2.0×10 <sup>12</sup> ohm.c
Water Absorptivity	ASTM D 570	0.02%	0.02%
Water Vapor Transmission Rate 24h	ASTM F 1249	0.0064 g/100sq in/24h	0.1g/ m <sup>2</sup> /24h
Application Temperature	-	23F to 122 °F	-5°C to +50 °C
Max Service Temperature	-	122°F	+50 °C



## PP Fiber Woven Tape T1100

### Product Description

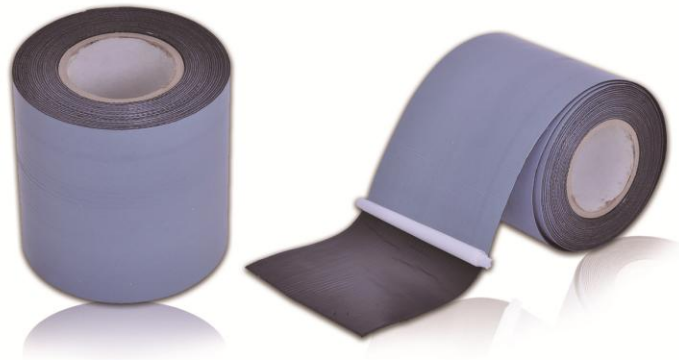


PP fiber woven tape T1100 is a two layer cold applied tape, consisting of a polypropylene geotextile backing laminated to rubberized bitumen adhesive with a release film positioned on the exposed face of the bitumen to enable proper unwinding of the roll.

T1100 can be used for corrosion prevention of buried pipeline steel. Also, it is usually used as an outerwrap with visco-elastic anticorrosion tape T900 for mechanical protection.

### Features/Benefits

- Cold applied, easily and fast, without extra heat.
- Resistance to the cathodic disbondment.
- Long term corrosion protection.
- Compatible with common pipe coatings.
- Application by hand or machine.



### Product Properties

Physical Properties	Test Method	Typical Value	
		English	Metric
Backing color	-	Black	Black
Tensile strength	ASTM D 1000	51 lbs/in	90 N/cm
Peel adhesion to primed steel pipe	ASTM D 1000	347oz/in	38N/cm
Cathodic Disbondment	ASTM G 8	0.252 in radius	6.4mm
Dielectric Strength	ASTM D 149	38 KV	38 KV
Volume Resistivity	ASTM D 257	$2.5 \times 10^{12}$ ohm.cm	$2.5 \times 10^{12}$ ohm.cm
Water Absorptivity	ASTM D 570	0.05%	0.05%
Water Vapor Transmission Rate 24h	ASTM F 1249	0.083 g/100sq in/24h	0.13 g/ m <sup>2</sup> /24h
Application Temperature	-	-29°F to 185 °F	-34°C to +85 °C
Max Service Temperature	-	185°F	+85 °C



## Heat Shrinkable Sleeves RST & RSD



### Product Description

RST is a heat shrinkable tubular sleeve and RSD is a heat shrinkable wrap-around sleeve with a separate closure. They are designed for corrosion protection of buried and exposed steel pipelines. The inner layer is two-components epoxy primer which coated on steel pipe; the middle layer is hot melt adhesive; the outer layer is the modified radiation crosslinked polyethylene backing. Once installed, the sleeve effectively bonds the steel substrates and common mainline pipe coatings including polyethylene and fusion bonded epoxy to form a continuous and durable corrosion protection system.

### Features/Benefits

- Long-term corrosion protection
- Excellent coating compatibility
- Easy field installation
- Apply with the primer at "wet state"
- Saves time & money
- Provided in 2.0mm, 2.2mm, 2.5mm, 2.8mm, 3.0mm thickness



### Properties of Hot Melt Adhesive

Physical Properties	Typical Values	Unit	Test Method
Thickness(min)	1.0	mm	ASTM D1000
Softening Point	110	°C	ASTM E28
Lap Shear Strength at 23 °C	243	N/cm <sup>2</sup>	ASTM D1002
Lap Shear Strength at 100°C	7	N/cm <sup>2</sup>	ASTM D1002



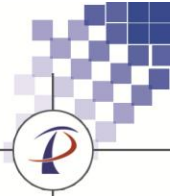
## Heat Shrinkable Sleeves RST & RSD

### Properties of Backing

Physical Properties	Typical Values	Unit	Test Method
Thickness(min)	1.0	mm	ASTM D1000
Specific Gravity	0.94	g/cm <sup>3</sup>	ASTM D792
Tensile Strength	24	Mpa	ASTM D638
Elongation	600	%	ASTM D638
Hardness	50	Shore D	ASTM D2240
Volume Resistivity	1×10 <sup>17</sup>	Ohm-cm	ASTM D257
Dielectric Breakdown	32	KV	ASTM D149
Water Absorption	0.1	%	ASTM D570
Water-Vapour Transmission	0.05	g/ m <sup>2</sup> ·24h	ASTM E96

### Properties of Installed Sleeve

Physical Properties	Typical Values	Unit	Test Method	
Thickness(min)	2.0	mm	ASTM D1000	
Impact Resistance	20	N·m	ASTM G14	
Peel strength	To Primer Steel	160	N/cm	ASTM D1000
	To PE Lining	100	N/cm	ASTM D1000
Cathodic Disbondment, 23°C, 28d	8	mm	ASTM G8	



## Primer P19&P27

### Product Description

Primer P19&P27 is made up of butyl rubber, unsaponifiable resins, tackifier, stabilizer, and solvent. The primer is applied to the appropriately prepared pipe surface before application of inner layer tape. It is used for improving bonding strength and sealing between the anticorrosion tape and the steel pipeline. It can be applied by hand or machine. Hand-application app. 0,2 litre/m<sup>2</sup> pipe surface. Machine application: app. 0,15 litre/m<sup>2</sup> pipe surface.



### Features/Benefits

- High adhesion.
- Quickly drying.
- Conformable to irregular pipe.
- Compatible with general coating system.
- Application by hand or machine.

### Product Properties

Physical Properties	Unit	P19	P27
Color	-	Black	Black
Solid content	%	19	27
Density	Kg/liter	0.78	0.82
Viscosity +23°C (Out flow time,4mm nozzle )	Sec	34±5	37±5
Flash point	°C	0-15	0-20
Drying time	Min	5-10	10-15
Dry Thickness	Mils	2.0	2.5
Application Temperature	°C	5 to 50	5 to 50
Max Service Temperature	°C	-40 to 80	-40 to 80
Package	L	20	20



## Epoxy Primer RX

### Product Description

RX is a two component, solvent free, proprietary formulation epoxy primer. It has excellent waterproof, chemical resistance and sealing performance. So it can be used as an inner anticorrosion layer.

Besides that, RX has a good bond to steel substrates and common mainline pipe coatings including polyethylene and fusion bonded epoxy. Therefore, it is often used with UV-Curing FRP shield in pipeline field joint and directional drilling. Once installed, they will form a whole system, which has a better corrosion prevention and mechanical protection performance.

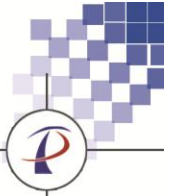


### Features/Benefits

- Mixing ratio, By weight, 4:1(Part A to B).
- Solid content, more than 98%.
- Pot time, after mixing, 23°C, 40 minutes.
- High adhesion.
- Good flexibility.
- Compatible with factory coatings.

### Properties of Hot Melt Adhesive

Physical Properties	Unit	Epoxy Primer RX
Color	-	White
Solid content	%	≥98
Density (after mixing)	Kg/liter	1.45
Adhesion to steel	MPa	≥10
Adhesion to PE	MPa	≥5
Tensile strength	MPa	≥14
Elongation	%	≥15
Impact Resistance, 2mm	J	≥15
Cathodic Disbondment	mm	6.4



## APPLICATION CASE

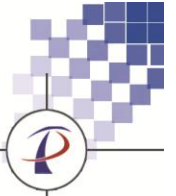
### 01 Sample tubes



### 02 Visco-elastic solutions for repairing damaged coating





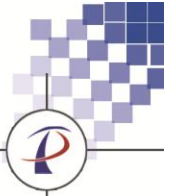


### 03 UV-Curing FRP Shield for Horizontal directional drilling(HDD)



### 04 Visco-elastic solutions for flange corrosion prevention



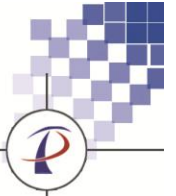


### 05 Visco-elastic solutions for valve corrosion prevention



### 06 Visco-elastic solutions for tank base corrosion prevention



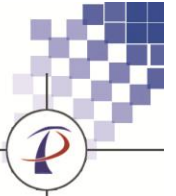


### 07 UV-Curing FRP Shield for field joints in HDD



### 08 CR Tape for rehabilitation of existing pipeline.





### 9 UV-Curing FRP Shield for mechanical protection in plant



### 10 UV-Curing FRP Shield for HDD in the field



### 11 Innovative field joints coating





# PLT PIPELINE COATING SYSTEMS

Add: Economic development zone, Lijin county, Dongying city,  
Shandong Province, China.

Phone: +86-546-7700103

Email : [PLT@pltac.com](mailto:PLT@pltac.com)

Website: [www.pltac.com](http://www.pltac.com)

