



# PARADIENE® 20 HT TS

## Commercial Product Data Sheet

Paradiene 20 HT TS is the modified bitumen base ply designed for use in homogeneous multi-layer modified bitumen roof membrane systems. Paradiene 20 HT TS consists of a fiberglass scrim/fiberglass mat impregnated and coated with high quality styrene-butadiene-styrene (SBS) modified bitumen. The unique back surface design consists of factory-applied, heat activated adhesive stripes combined with proprietary acrylic coating between the strips, which provided for uniform bonding of approximately 50% of the total surface area of the sheet.

Contact Siplast for information on approved product uses.

### USES: BASE PLY

### PRODUCT INFORMATION

Standards	ASTM D6163 Type II, Grade S; CSA A123.23-15 Type A, Grade 3
Roll Length	Min: 33.5 ft (10.21 m)
Roll Width	Avg: 3.28 ft (1.00 m)
Coverage	1.0 Square (9.3 m <sup>2</sup> )
Coverage Weight Per Square	Min: 76 lb (3.7 kg/m <sup>2</sup> )
Selvage Width	Avg. 3 in (76 mm) Green laying line is 3 in (76 mm) from the edge of the sheet.
Selvage Surfacing	Polyolefin Burn-off Film
Top Surfacing	Silica Parting Agent
Back Surfacing	Adhesive Stripes, Acrylic Coating Between Stripes
Product Options	RoofTag

#### Application

Refer to the Siplast Technical Guide for detailed application information and slope limitations. Paradiene 20 HT TS is lapped 3 inches (76 mm) side and end.



#### Storage and Handling

All Siplast roll roofing products should be stored on end on a clean, flat surface. Rolls should not be dropped on ends or edges or stored in a leaning position. Deformation resulting from these actions will make proper installation difficult. All roofing products should be stored in a dry place out of direct exposure to the elements and should not be double stacked. Material should be handled so that it remains dry prior to and during installation.

See product packaging and the Safety Data Sheet for specific information on the safe handling of this product.

#### Packaging

Pallet: 41 in x 48 in (104 cm x 122 cm) wooden pallet  
Rolls Per Pallet: 25  
Pallets Per Truckload (Typical): 20  
Minimum Roll Weight: 76 lb (34.5 kg)  
Max Pallet Weight (Typical): 2175 lb (987 kg)

#### Listings, Approvals, & Certifications



Classified by UL in accordance with ANSI/UL 790. Refer to UL Product IQ for specific assemblies.  
FM Approved - Refer to RoofNav.com for specific assemblies.  
Meets or Exceeds CSA A123.23.

**U.S. TEST STANDARDS**

Property (as Manufactured)		Values / Units	Test Method
*Thickness (minimum)		87 mils (2.2 mm)	ASTM D5147 Section 6
*Thickness (average)		91 mils (2.3 mm)	ASTM D5147 Section 6
**Peak Load	@ 73.4°F (23°C) (average)	80 lbf/inch (14.1 kN/m)	ASTM D5147 Section 7
	@ 0°F (-18°C) (average)	150 lbf/inch (26.5 kN/m)	
**Elongation @ Peak Load	@ 73.4°F (23°C) (average)	5%	ASTM D5147 Section 7
	@ 0°F (-18°C) (average)	4%	
**Ultimate Elongation @ 73.4°F (23°C) (average)		55%	ASTM D5147 Section 7
**Tear Strength (average)		120 lbf (0.54 kN)	ASTM D5147 Section 8
Water Absorption (maximum)		1%	ASTM D5147 Section 10
Dimensional Stability (maximum)		0.1%	ASTM D5147 Section 11
Low Temperature Flexibility (maximum)		-15°F (-26°C)	ASTM D5147 Section 12
Compound Stability (minimum)		250°F (121°C)	ASTM D5147 Section 16
Coating Thickness – Back Surface		≥40 mils (1 mm)	ASTM D5147 Section 17
Cyclic Fatigue		Paradiene 20 base ply bonded to an acceptable Paradiene 30, Paradiene 40, or Parafor 50 cap sheet, with an approved method of attachment, passes ASTM D5849 both as manufactured and after heat conditioning, according to ASTM D5147.	

**CANADIAN TEST STANDARDS**

Property (as Manufactured)		Units	CASA123.23 Requirement	Test Method	Test Performance
*Thickness (minimum)		mm (mils)	2.0 (80)	ASTM D5147	2.5 (98)
*Selvage Thickness (minimum)		mm (mils)	2.0 (80)	ASTM D5147	2.4 (94)
Mass Per Unit Area (minimum)		kg/m <sup>2</sup> (lb/100 ft <sup>2</sup> )	2.2 (45)	ASTM D5147	3.0 (61)
Back Surface Coating Thickness (minimum)		mm (mils)	1.0 (40)	ASTM D5147	1.0 (40)
**Strain Energy (Before After Heat Conditioning)	@ 23 ± 2°C (73.4 ± 3.6°F)	kN/m (lbf/in)	See Tested Value	CSA A123.23	>1.4 (>8.0)
	@ -18 ± 2°C (-0.4 ± 3.6°F)				>1.3 (>7.5)
**Peak Load (Before and After Heat Conditioning)	@ 23 ± 2°C (73.4 ± 3.6°F)	kN/m (lbf/in)	5.3 (30)	ASTM D5147	>17 (>97)
	@ -18 ± 2°C (-0.4 ± 3.6°F)		12.3 (70)		>26.5 (>151)
**Elongation @ Peak Load (Before and After Heat Conditioning)	@ 23 ± 2°C (73.4 ± 3.6°F)	%	2	ASTM D5147	>9
	@ -18 ± 2°C (-0.4 ± 3.6°F)		1		>6
**Ultimate Elongation (Before and After Heat Conditioning), @ 23 ± 2°C (73.4 ± 3.6°F)		%	3	ASTM D5147	>55
Dimensional Stability (maximum)		%	0.5%	ASTM D5147	0.5
Low Temperature Flexibility (maximum)		°C (°F)	-18 (-0.4)	ASTM D5147	-18 (-0.4)
Low Temperature Weathered Flexibility (maximum)		°C (°F)	N/A	ASTM D5147	N/A
Compound Stability (minimum)		°C (°F)	91 (195)	ASTM D5147	91 (195)
Resistance to Puncture		N/A	N/A	CSA A123.23	N/A
Granule Loss		g (oz)	N/A	ASTM D5147	N/A

Data is based upon typical product performance and is subject to normal manufacturing and packaging tolerance and variation.

\*The thickness does not include the thickness of the adhesive stripes.

\*\*The value reported is the lower of either MD or XD.