

Table 1: FilterPave® Porous Pavement Specification

Item	Specifications & Details
Aggregate Material	Post Consumer Recycled Glass and/or Igneous Rock
Binder	Polyurethane (>50% Renewable)
Chemical Resistance.....	Superior
Tensile Strength ¹ (per ASTM D412 and D638).....	.2500 psi (17,170kPa) - 7 days
Tear Strength ¹ (per ASTM D624).....	.600 psi (4120 kPa) – 7 days
Flexural Modulus75,000 psi (515 mPa)
Flexural Strength (per ASTM C78).....	.500 psi (3435 kPa) ⁴
Elongation at Yield ¹ (per ASTM D412 and D368)50% - 28 days
Flexible Pavement Compressive Strength at Yield ² (per ASTM C39).....	.800 psi (5500 kPa) – 7 days ^{3,4} 1,160 psi (7800 kPa) - 28 days ^{3,4}
Coefficient of Friction-Wet/Dry Static (per ASTM C1028)	0.90 – 1.05
Coefficient of Friction-Wet/Dry Kinetic (per ASTM C1028)	0.75 – 0.85
Infiltration Rate	1,600 - 1,750 in/hr
Sustainable Porosity.....	.0.39 - .47 ⁴
Run Off Coefficient0.24 ⁵
Solar Reflectance Index (SRI) of Pigmented FilterPave® (per ASTM E1980)	
Jade Green.....	.62
Amber Brown.....	.61
Sedona Red.....	.53
Topaz Brown.....	.51
Sapphire Blue.....	.49
Minimum Installation Temperature	45° F (7° C)
72 Hour Ambient Temperature Minimum.....	35° F (2° C)
Cure Time-min 60° F (15.5° C) ambient temp.....	.72 hours (3 days)
Cure Time-below 60° F (15.5° C) ambient temp.....	120 hours (5 days)



¹ Testing on Neat Elastomer

² FilterPave maintains greater than 80% compressive strength well beyond yield

³ PSI results achieved under laboratory conditions. Field results may be different due to varying conditions

⁴ University of Central Florida, Evaluation of Filterpave and Firmapave Porous Pavement Systems, December 2010

⁵ Based on UCF website, Pervious Pavement Management Analysis Model for 3.0" Filterpave, 10" base and 4"/hr rain event.

Table 2: Base Guidelines for the FilterPave® System

LOAD DESCRIPTION	DEPTH OF BASE ^{1,3}		DEPTH OF FILTERPAVE	
	CBR ² 2 – 4	CBR ² >4	CBR ² 2 – 4	CBR ² >4
Heavy Fire Truck Access & H-20 Loading Typical 110 psi (758 kPa) maximum tire pressure. Single axle loadings of 32 kip (145 kN), tandem axle loadings of 48 kip (220 kN). Gross vehicle loads of 80,000 lb (36.3 tonne).	12 in (300 mm)	10 in (250 mm)	3.0 in (76 mm)	3.0 in (76 mm)
Light Fire Truck Access & H-15 Loading Typical 85 psi (586 kPa) maximum tire pressure. Single axle loadings of 24 kip (110 kN). Gross vehicle loads of 60,000 lb (27.2 tonne).	10 in (250 mm)	8 in (200 mm)	2.5 in (76 mm)	3.0 in (76 mm)
Utility & Delivery Truck Access & H-10 Loading Typical 60 psi (414 kPa) maximum tire pressure. Single axle loadings of 16 kip (75 kN). Gross vehicle loads of 40,000 lb (18.1 tonne).	10 in (250 mm)	8 in (200 mm)	2.0 in (51 mm)	2.5 in (51 mm)
Cars & Pick-up Truck Access Typical 45 psi (310 kPa) maximum tire pressure. Single axle loadings of 4 kip (18 kN). Gross vehicle loads of 8,000 lb (3.6 tonne).	8 in (200 mm)	6 in (150 mm)	2.0 in (51 mm)	2.0 in (51 mm)
Trail Use Loading for pedestrian, wheelchair, equestrian, bicycle, motorcycle and ATV traffic.	6 in (150 mm)	4 in (100 mm)	1.5 in (51 mm)	2.0 in (51 mm)

¹ **Depth of base recommended is for structural purposes.** Actual base depth is typically driven by storage capacity needs. This is determined by subgrade permeability and the storm event for which the system is designed.

² CBR is the abbreviation for California Bearing Ratio. Methods for determining CBR vary from more sophisticated laboratory methods to simple field identification methods that use hand manipulation of the soil. FPP does not recommend one method over the other. However, the user must have a high degree of confidence in the results produced by the chosen method. If other-than-CBR soil strength values exist, use available correlation charts to relate the value to CBR.

³ Base shall be open-graded base course (OGBC) material with D-50 equal to 3/8" to 1" and less than 5% fines. OGBC must be crushed, angular material lightly compacted via vibratory methods.

FilterPave® is a registered trademark of FilterPave Products LLC, Missouri ©2024