

**MULTILAY™****PBP grade**

Polyolefin-based barrier grade

Exhibits excellent oxygen gas barrier properties and fragrance protection properties in addition to lightness and crack resistance common to most plastics.

Grade		PBP-N100	PBP-N200	PBP-M100	PBP-T130	PBP-W100	PBP-W200	Test method	
Sheet thickness (mm)		0.8	0.8	0.8	0.8	0.8	0.8	-	
Characteristics		Standard	High barrier	Color	Clear	Standard	High barrier	-	
Color tone		Natural	Natural	Coloring	Clear	White	White	-	
Tensile modulus (MPa)	MD	1,600	1,750	1,800	2,100	1,600	1,700	JIS K 7113	
	TD	1,600	1,750	1,600	2,100	1,600	1,700		
Yield strength (MPa)	MD	31	35	28	39	32	33		
	TD	31	35	25	38	31	32		
Breaking strength (MPa)	MD	42	38	45	39	42	35		
	TD	36	37	34	32	36	32		
Elongation (%)	MD	450	280	470	340	450	340		
	TD	370	390	420	340	370	290		
Olsen stiffness (MPa)	MD	960	960	1,020	1,380	960	1,030		ASTM D 747
	TD	950	910	955	1,290	950	1,000		
Tensile impact strength (kJ/m <sup>2</sup> )	MD	125	125	110	80	125	100	ASTM D 1822	
	TD	125	70	97	55	90	70		
Haze (all/int) (%)	MD	75	79	-	25	-	-	JIS K 7105	
	TD	73	72	-	25	-	-		
Total light transmission(%)		85	88	16	-	14	14	JIS K 7105	
Water vapor transmission (g/m <sup>2</sup> -24h)		0.4	0.4	0.4	0.4	0.4	0.4	JIS K 7129 B	
Oxygen transmission (cc/m <sup>2</sup> -24h)		0.6	0.3以下	0.6	0.6	0.6	0.3以下	JIS K 7126 B	
Du Pont impact strength (J)	0℃	1.6	1.6	3	0.3	1.6	1.7	Measurement condition: Impact center diameter: Φ 15.8Anvil diameter: Φ16.2	
	5℃	2.4	2.4	3	0.9	2	2		
	23℃	3	3.1	3.2	2.4	3.2	3.1		

\*Data described in this document is a representative example of measured values under specific conditions.

\*Contents of this document are subject to change without prior notice due to product improvement.

**Idemitsu Unitech Co.,Ltd.**