

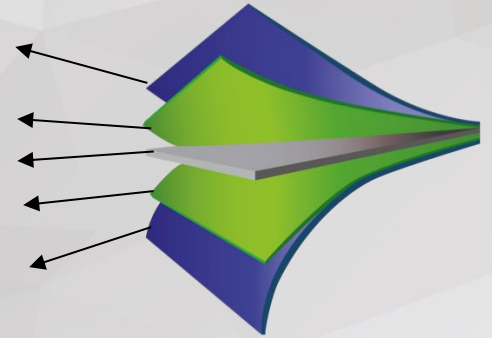
Treated Polyethylene Layer

Polyamide Layer

EVOH

Polyamide Layer

Polyethylene Layer



## TOPGUARD

## NB 2011 CH

**PRELIMINARY**

### Description

TOPGUARD NB 2011 CH is a transparent, one side treated, both sides heat sealable, multilayer high barrier film. It can be used as a single apply and/or as lamination base film for different applications.

It is suitable to make lamination with different substrates such as PVC, PET, PE, PP, etc. to have higher barrier and heatsealable packaging and industrial applications

### Properties

- Broad seal range
- Excellent hot tack and heat seal strength
- A to B sealing capability
- Excellent high barrier properties
- Excellent resistance to chemicals, greases and oils
- Excellent adhesion to inks and lamination adhesives
- The film shelf life is 6 months

## Technical Features

PROPERTIES	TEST METHOD	UNITS	NB 2011 CH	
THICKNESS	ASTM F 2251	micron	35	50
		Gauge	140	200
YIELD	ASTM D 4321	m <sup>2</sup> /kg	30,4	21.3
		in <sup>2</sup> /Lbs	21.400	15.000
UNIT WEIGHT	ASTM D 4321	g/m <sup>2</sup>	32,9	47,0
HAZE	ASTM D 1003	%	3,5	4.0
GLOSS (45 °)	ASTM D 2457	%	90	
OXYGEN TRANSMISSION RATE (23°C-0%RH)	ASTM D 3985	cc/m <sup>2</sup> /24hrs	1,5	1,3
		cc/100in <sup>2</sup> /24hrs	0,10	0,08
WATER VAPOUR TRANSMISSION RATE (38°C-90%RH)	ASTM F 1249	g/m <sup>2</sup> /24hrs	8,0	6,0
		g/100in <sup>2</sup> /24hrs	0,52	0,39
COEFFICIENT OF FRICTION	ASTM D 1894	Film/Film	0,25	
		Film/Metal	0,20	
SURFACE TENSION	ASTM D 2578	Dyne/cm	Treated Side	Min 36
			Other Side	-
HEATSEAL RANGE	ASTM F 88	°C	110-160	
		°F	220-320	
HEATSEAL STRENGTH (120 °C, 1 MPa, 1 s)	ASTM F 88	N/15mm	4	

Product Identification (Decision 97/129/EC): PP5

### Regulatory Status

Our product complies with the applicable EC legislation on packaging involving direct contact with foods except metallized films. Full details are given on the Regulatory Compliance Certificate and can be found on our web site.

The information contained in this data sheet is true and accurate according to current state of our knowledge and intended to give general information on our products and their applications. Above values are to be considered as guidelines and not as product specifications. Since the actual conditions of use are beyond our control, users are advised to make their own tests at their specific conditions of laboratory and/or actual use. We suggest our customers to determine final suitability for their specific end uses.

Also be advised that information on this data sheet shall not be construed as an inducement or recommendation to use any process or to manufacture or use any product in conflict with existing, pending or future patents.

For related spec sheet with tolerance values, please contact our sales departments

STANDARD ROLL DIMENSIONS			
CORE INNER DIAMETER (ID)	CORE OUTER DIAMETER (OD)	LENGTH TOLERANCE	WIDTH TOLERANCE
76 mm (3 in) & 152 mm (6 in)	530 mm & 790 mm *	± % 10 for all OD's	- 0 & + 1 mm

REV: 04 Date: 20.03.2025