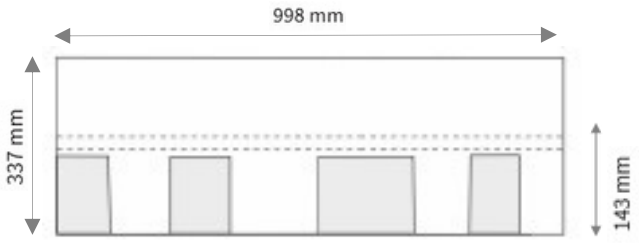
Technical data sheet
SA03 1074 260625 V5

BARDOLINE®
PRO OPERA

Material / Application

BARDOLINE® PRO OPERA is a coloured bitumen shingle for roof.

CE EN 544:2011
DOP N° 2022-001 SA03



Benefits

- Waterproofing
- Aesthetic
- Easy to install
- Mechanical resistance
- Durability
- Lightweight

Technical characteristics

Length	EN 544	998 (± 3) mm
Width	EN 544	337 (± 3) mm
Thickness		3,0 / 6,0mm (±15%)
Weight (finishedproduct)		11,5 (± 8%) kg/m²
Exposed Area		143 mm
Min./max. pitch		19° - 85°*

*Valid for I. and II. snow zone. For III. and more, please add 5°

PRODUCT PERFORMANCE

Mass of bitumen	EN 544	>1500 g/m²
Tensile strength MD/CMD	EN12311-1	>750/>450 N/50 mm
Tear resistance MD/CD (Nail shank method)	EN12310-1	>100 N
Granules adhesion	EN12039	<1,5 g
Water absorption	EN 544	<1%
Resistance to UVradiation	EN 1297	Pass
Flow resistance,at90°	EN 1110	<1 mm
Resistance to blistering	EN 544	Pass

FIRE PERFORMANCE

External fire resistance	EN 13501-5 EN 1187	Broof (t1)
Reaction to fire	EN 13501-1 EN ISO 11925-2	E

Colours

Dark Slate

Dual Red

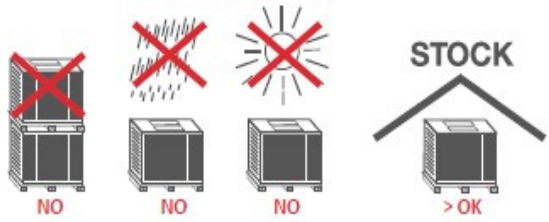
Dual Brown

Packaging

Coverage / bundle	2,00 m²
Shingles / bundle	14
Bundles / pallet	72
Useful m²/ pallet	144

Storage

BARDOLINE® PRO OPERA should be kept under dry conditions, protected from UV and heat as well as rain and moisture.



Warranty

All the claims will be considered with respect to application recommendations issued by Onduline company.

This TDS was made based on currently available information. The producer can update the technical data sheet without notice. Product was made in accordance with above mentioned parameters, but producer/distributor can't anticipate any future change as well as change of regulations. It is the consumer's responsibility to use the product in accordance to producer/ distributor recommendations and his needs.

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Onduline®
Lightweight roofing systems