

# Hempablade Edge 171

Pushing liquid LEP to the edge

## Product description

Hempablade Edge 171 is a fast-cure, solvent free liquid LEP (Leading Edge Protection) coating for wind turbine rotor blades.

On a wind turbine, the blade's leading edge is exposed to extremely high airflow speeds (even >300km/h). At these speeds, the impact from rain may cause significant coating erosion or even composite damage. In severe cases the erosion may lead to a loss of aerodynamic performance and a 2-3% drop in Annual Energy Production. This loss of performance and need for maintenance makes leading edge erosion one of the wind industry's most significant maintenance cost and performance challenges.

## Typical uses

Onshore, Offshore, for new blades or during on-site maintenance situations.

Hempablade Edge 171 is a top-layer coating which provides exceptional protection against rain erosion, reducing blade maintenance cost and maintaining the blade aerodynamic integrity. When applied as the recommended two layer system, Hempablade Edge 171 offers best in class protection against erosion. A one layer system can also be used for maintenance situations.

As an easy-to-apply, fast-cure system, Hempablade Edge 171 is particularly suitable when high application productivity is needed.

## Key features

- ✓ Very strong protection performance (RET).
- ✓ Highly flexible providing strong rain drop energy absorption
- ✓ Very fast and simple manual application with roller & brush
- ✓ DNV-GL RP-0171 compliant
- ✓ Extremely low coating thickness equals low consumption
- ✓ Wide application window allows for optimized use during blade maintenance situations
- ✓ Has undergone over 400 Rain Erosion Tests (RET) sessions at Hempel's RET facility
- ✓ Strong UV resistance



Physical constants	
Number of components:	2
Colour:	Light Grey 11150
Dry film thickness:	Low: 125 microns [3.9 mils] High: 175 microns [6.5 mils] Recommended: 150 microns [4.9 mils]
Volume solids, %:	98 ± 2%
Mixing:	1:1 by volume, supplied in cartridges
Pot life:	12 minutes at 20 °C [68 °F]
VOC content:	12 g/L [0.10 lb/US gal]
Maximum temperature, dry exposure only	150 °C [302 °F]
Application temperature:	5-35 °C [40-95 °F]

The physical constants stated are nominal data according to the Hempel Group's approved formulas. They are subject to normal manufacturing tolerances. This product should be used with reference to the Technical Specifications.

Since 2019 Hempel has used in-house Rain Erosion Test facilities to optimise the product development and LEP validation process.

For more information, please contact Hempel at [blades@hempel.com](mailto:blades@hempel.com)

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