

Please contact mowiflex@kuraray.com for additional information on MOWIFLEX™.

MOWIFLEX™ - water soluble support material for 3D printing

MOWIFLEX™ is a water soluble thermoplastic material based on polyvinyl alcohol. Excellent cold water solubility combined with low moisture absorption from the atmosphere render it the perfect support material for FDM (fused deposition molding) based 3D printing processes. The application of MOWIFLEX™ as water soluble support

material enables printing of complex structures even those containing moving parts in one piece and high quality. After printing is complete, the support structures are easily dissolved in water which can then be disposed of conveniently through normal waste water systems due to the biodegradable nature of polyvinyl alcohol.

MOWIFLEX™ properties

■ MOWIFLEX™ 3D 1000 ■ MOWIFLEX™ 3D 2000



- + no organic solvents required
- + low moisture absorption
- + soluble in cold water
- + high melt flow
- + good adhesion to PLA, PVB, PA, TPU
- + biodegradable

MOWIFLEX™ in water



RECOMMENDED CONDITIONS

Nozzle temperature: 190-215°C

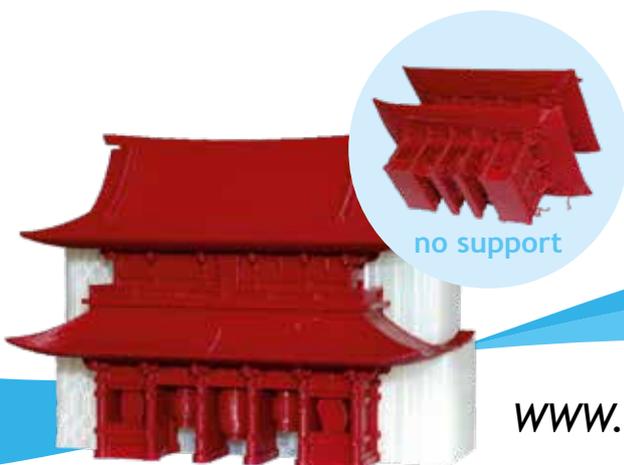
Bed temperature: 25-70°C

Printing speed: 20-50 mm/s

Dissolve in water: 30°C with agitation



MOWIFLEX™ 3D 1000 and 3D 2000 are certified according to TÜV AUSTRIA OK biodegradable water



Adding value to your products - worldwide



KURARAY POVAL™, EXCEVAL™, ELVANOL™ and MOWIFLEX™ are the trademarks for polyvinyl alcohols made by Kuraray. Their key characteristics – outstanding film-forming properties and high binding strength – add real value to your products. Our polymers are water-soluble, highly reactive, crosslinkable and foamable. They have high pigment binding capacity, protective colloid characteristics and thickening effects. The physical and chemical properties of KURARAY POVAL™ make it ideal for a wide variety of applications, ranging from adhesives through paper and ceramics to packaging films. Many of our polymers are food contact-

approved and thus suitable for food applications. Ecologically KURARAY POVAL™ is advantageous due to its biodegradability and the fact that combustion does not generate residues. It is available in various particle sizes from granules to fine powders.

Kuraray produces its wide range of KURARAY POVAL™ grades in Japan, Singapore, Germany and the USA. Kuraray's global production and service network make us your partner of choice for innovative high-quality PVOH resins.

KURARAY - Here to Innovate.

Kuraray America, Inc.
2625 Bay Area Blvd.,
Suite 600 Houston, TX77058
United States of America
Phone: +1 800 423 9762
info.kuraray-poval@kuraray.com

Kuraray Europe GmbH
Philipp-Reis-Str. 4
65795 Hattersheim am Main,
Germany
Phone: +49 69 305 85 351
info.eu-poval@kuraray.com

Kuraray Asia Pacific Pte., Ltd.
331 North Bridge Road
#18-02 Odeon Towers,
Singapore 188720
Phone: +65 6337 4123
infopoal.sg@kuraray.com

Kuraray China Co., Ltd.
Unit 2207, 2 Grand Gateway
3 Hongqiao Road, Xuhui Dis-
trict, Shanghai 200030, China
Phone: +86 21 6119 8111
infopoal.cn@kuraray.com

Head Office:

Kuraray Co., Ltd.
Ote Center Bldg.
1-1-13, Otemachi Chiyoda-ku
Tokyo 100-8115, Japan
Phone: +81 3 67 01 1000
infopoal.jp@kuraray.com