



2019  
EDITION

# WATER-BASED RESINS

 **HELIOS** RESINS

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## ENVIRONMENTALLY FRIENDLY HIGH-QUALITY COATINGS WITH HELIOS RESINS

### GOLDEN RESINS

Helios Resins is a separate business unit of Helios, now part of Kansai Paint, one of the world's leading paint and coatings producers. Today, Helios Resins produces around 60,000 tons of liquid resins annually, including coating resins, composite resins, and polyester polyols for PU flexible foams. Our coating resin brands – DOMOPOL, DOMACRYL, DOMALKYD, DOMEMUL and DOMOPUR – have achieved a strong market position and are trusted for their quality and performance. We currently serve more than 50 countries worldwide.

### QUALITY OF SERVICE

We are committed to providing a flexible and reliable service while satisfying our customers' specific requests. Helios Resins ensures the quality, stability and reproducibility of every delivery. Our extensive know-how, resulting from more than 100 years of experience, enables us to provide solutions to our customers' challenges. Helios Resins experts produce tailor-made resins for specific needs and offer support in developing customized applications.

### DEVELOPED WITH ADVANCED TECHNOLOGIES

Our laboratories and production facilities are fully equipped with the most advanced technologies, which enables the development and production of resins. Our R&D has advanced skills as well as equipment for polyester and acrylic chemistry, including synthesis under pressure. We are constantly upgrading our production lines and increasing our production capacities to meet the highest demands of our customers. In 2018 we introduced a new reactor line for water-based resins.

### WATER-BASED RESINS

Water-based resin technology uses water as a carrier medium and diluent instead of the traditionally used VOCs (Volatile Organic Compounds). Helios Resins offers a wide portfolio of water-based resin systems tailored for both specific substrates and end-use applications. Water-based resin solutions help our customers meet environmental compliance requirements and reduce human health hazards while maintaining the high-performance level expected from markets. We are focused on eco-friendly, sustainable and high-quality products that deliver great performance.

**DOMEMUL** – Primary Acrylic Emulsions

**DOMACRYL** – Secondary Acrylic Emulsions

**DOMALKYD** – Alkyd Emulsions and Water Thinnable Resins

**DOMOPOL** – Polyester Emulsions and Water Thinnable Resins

**DOMOPUR** – Polyurethane Dispersions (PUD)

RESIN	DELIVERY FORM	ACID VALUE on solid resin [mgKOH/g]	HYDROXYL CONTENT on solid resin [% OH]	VISCOSITY 23 °C [mPa.s]	MFFT [°C]	pH
DOMEMUL AA 7601	44 Wa			max. 1000	30	8.0 – 10.0
DOMEMUL AA 7695	40 Wa			50 – 500	29	7.5 – 9.0
DOMEMUL AA 7760	41 Wa			20 – 500	32	7.5 – 9.0
DOMEMUL AA 7960	45 Wa			20 – 250	0	6.0 – 8.0
DOMEMUL AA 9670	40 Wa			100 – 800	0	7.5 – 9.5
DOMEMUL AA 9672	44 Wa			max. 150	0	7.5 – 9.5
DOMEMUL AA 9673	42 Wa			20 – 250	7	7.5 – 8.5
DOMEMUL RA 9675	35 Wa			50 – 1000	0	6.0 – 7.0
DOMEMUL SA 2700	50 Wa			100 – 800	90	8.0 – 9.5
DOMEMUL SA 9262	42 Wa			50 – 250	30	8.0 – 8.5
DOMEMUL SA 9263	40 Wa			20 – 350	45	8.0 – 8.5
DOMEMUL PA 2000	26 Wa			300 – 350		5.0 – 5.5
DOMEMUL SA 2000	50 Wa			100 – 400		7.0 – 9.0
DOMEMUL OHA 9200	45 Wa		2.8	20 – 600		7.5 – 9.0
DOMACRYL 0769	45 Wa / BG / SA	20 – 30	3.3	200 – 1000		7.0 – 8.5
DOMACRYL 0707	43 Wa / DPM	35 – 45	3.3	100 – 3000		8.0 – 9.0
DOMACRYL 0724	45 Wa / PnB / SA	24 – 30	4.1	200 – 1000		7.0 – 8.0
DOMACRYL 0765	42 Wa / BG / SA	24 – 32	4.1	200 – 1000		7.0 – 8.5
DOMACRYL 0768	42 Wa / PnB	15 – 25	4.1	200 – 3000		8.0 – 9.0
DOMACRYL 0795	41 Wa / PnB	24 – 30	5.0	200 – 2000		7.0 – 8.0
DOMALKYD 0234	80 DMM	38 – 50		70000 – 80000		
DOMALKYD 0246	70 BG	35 – 65		8000 – 22000		
DOMALKYD 0261	75 BG / 2B	35 – 45		17000 – 23000		
DOMALKYD 0264	70 BG / iB	38 – 42		13000 – 18000		
DOMALKYD 0265	70 BG / 2B / PnB	30 – 35		15000 – 20000		
DOMALKYD 0391	80 Wa / BG	40 – 50	6.1	30000 – 60000		7.0 – 9.0
DOMALKYD 0460	38 Wa / MP			9000 – 15000		8.0 – 9.0
DOMALKYD 0461	38 Wa / BG			2000 – 10000		7.5 – 9.0
DOMALKYD 0545	40 Wa		1.0	50 – 500		7.0 – 8.0
DOMOPOL 0358	70 Wa / BDG	40 – 60	3.0	15000 – 20000		7.0 – 8.0
DOMOPUR 0211	36 Wa	20 – 25		20 – 400		7.5 – 9.0
DOMOPUR 0231	40 Wa	15 – 20		100 – 1000		7.0 – 8.0
DOMOPUR 0431	35 Wa / DMM	23 – 28	1.8	10 – 100		7.0 – 8.5
ADDITIVE EP024	73 Wa / BG	40 – 50		5000 – 8000		

APEO = Alkylphenol ethoxylate, BDG = Butyldiglycol, BG = Butylglycol, 2B = 2-Butanol, DMM = Dipropylene glycol dimethyl ether, DPM = Dipropylene glycol monomethyl ether

RESIN	General Industry	Transport & ACE	Car refinisn	Wood & plastic	Decorative	Road marking	Primer	Basecoat	Clearcoat	Topcoat	1K	Stoving	2K
DOMEMUL AA 7601	•				•	•	•			•	•		
DOMEMUL AA 7695				•					•		•		
DOMEMUL AA 7760				•	•		•		•	•	•		
DOMEMUL AA 7960				•	•		•			•	•		
DOMEMUL AA 9670				•	•		•		•	•			
DOMEMUL AA 9672	•			•	•		•		•	•	•		
DOMEMUL AA 9673	•			•	•		•		•	•	•		
DOMEMUL RA 9675	•	•	•	•				•			•		
DOMEMUL SA 2700				•							•		
DOMEMUL SA 9262	•			•			•			•	•		
DOMEMUL SA 9263	•			•	•						•		
DOMEMUL PA 2000											•		
DOMEMUL SA 2000											•		
DOMEMUL OHA 9200	•	•		•			•		•	•			•
DOMACRYL 0769	•	•	•	•					•	•			•
DOMACRYL 0707	•	•	•	•					•	•		•	•
DOMACRYL 0724	•	•	•	•					•	•			•
DOMACRYL 0765	•	•	•						•	•			•
DOMACRYL 0768	•	•	•						•	•			•
DOMACRYL 0795	•	•	•				•		•	•			•
DOMALKYD 0234	•									•			•
DOMALKYD 0246	•						•			•		•	
DOMALKYD 0261	•						•			•	•	•	
DOMALKYD 0264	•						•			•	•	•	
DOMALKYD 0265	•						•			•	•	•	
DOMALKYD 0391	•						•			•		•	
DOMALKYD 0460	•				•					•	•		
DOMALKYD 0461	•				•					•	•		
DOMALKYD 0545	•				•		•			•	•	•	
DOMOPOL 0358	•									•		•	
DOMOPUR 0211	•	•	•	•	•		•	•	•	•	•		
DOMOPUR 0231				•	•		•	•	•	•	•		
DOMOPUR 0431	•	•	•	•			•	•	•	•		•	•
ADDITIVE EP024	•						•					•	

ether, DTM = Direct-to-metal, iB = Isobutanol, MP = Methoxypropanol, PnB = Propylene glycol monobutyl ether, SA = Aromatic solvent 100, Wa = Water.

RESIN	DESCRIPTION
DOMEMUL AA 7601	Acrylic APEO-free emulsion, used for preparation fast drying paints. Application on asphalt, concrete, metal.
DOMEMUL AA 7695	Self-crosslinking acrylic emulsion for interior wood finishes. Chemical resistance, transparency.
DOMEMUL AA 7760	Self-crosslinking APEO-free acrylic emulsion for interior wood coatings. Good chemical and mechanical resistance.
DOMEMUL AA 7960	Core-shell emulsion for wood coatings, joinery and furniture. Good anti-blocking. APEO-free version is available by request (Blue-Angel).
DOMEMUL AA 9670	Core-shell APEO-free acrylic emulsion for interior and exterior wood coatings and joinery. Good anti-blocking.
DOMEMUL AA 9672	Core-shell APEO-free acrylic emulsion for interior and exterior wood coatings. Good gloss.
DOMEMUL AA 9673	Self-crosslinking APEO-free acrylic emulsion for interior and exterior wood coatings. Fast drying and anti-blocking.
DOMEMUL RA 9675	Acrylic APEO-free latex resin for effect pigmented based coats (metallic, pearlescent).
DOMEMUL SA 2700	Acrylic APEO-free emulsion. High performance teletronics (TV, Hi-Fi) applications. Good water and chemical resistance.
DOMEMUL SA 9262	Styrene-acrylic emulsion. Good mechanical and chemical resistance. APEO-free version is available by request.
DOMEMUL SA 9263	Styrene-acrylic APEO-free emulsion. Harder than DOMEMUL SA 9262.
DOMEMUL PA 2000	Industrial poly-acrylic emulsion for dye-application process. Improved resolution and short drying time.
DOMEMUL SA 2000	Industrial styrene-acrylic emulsion for impregnating textile and similar material. Improved durability.
DOMEMUL OHA 9200	OH-functional styrene-acrylic primary emulsion. Good gloss and adhesion to metal, suitable for DTM. Cost-efficient.
DOMACRYL 0769	Standard secondary acrylic resin for medium OH PUR coatings.
DOMACRYL 0707	Modified acrylic secondary dispersion. Very flexible. Good wet-on-wet application.
DOMACRYL 0724	Acrylic secondary dispersion. Standard resin for PUR systems.
DOMACRYL 0765	Acrylic secondary dispersion. High hardness, without aromatic co-solvent.
DOMACRYL 0768	Acrylic secondary dispersion. Standard resin for PUR systems. High gloss, without aromatic co-solvent.
DOMACRYL 0795	Acrylic secondary dispersion. Top quality for PUR systems. Suitable for DTM.
DOMALKYD 0234	Alkyd resin, water reducible after neutralization. Good resistance to chemicals, high gloss, good hardness and elasticity.
DOMALKYD 0246	Epoxy modified alkyd resin, water reducible after neutralization. Good pigment wetting, enhanced adhesion, rapid curing, good anticorrosion properties.
DOMALKYD 0261	Alkyd resin, water reducible after neutralization. Very fast drying and excellent corrosion resistance.
DOMALKYD 0264	Alkyd resin, water reducible after neutralization. Fast drying, high hardness, high flexibility and good anticorrosion properties.
DOMALKYD 0265	Alkyd resin, water reducible after neutralization. Fast drying, high gloss and good corrosion resistance.
DOMALKYD 0391	Waterborne alkyd for primers and top coats with less than 2% co-solvent. Very suitable for drums.
DOMALKYD 0460	Acrylic modified alkyd emulsion. Fast air drying, high gloss, excellent flow and very low-yellowing. Low VOC content.
DOMALKYD 0461	Styrene-free acrylic modified alkyd emulsion. Fast air drying, high gloss, excellent flow and very low-yellowing. Low VOC content.
DOMALKYD 0545	PU modified alkyd emulsion without organic solvents. Rapid air drying, high gloss and hardness, good water and chemical resistance.
DOMOPOL 0358	Waterborne polyester for low co-solvent non-yellowing industrial stoving lacquers.
DOMOPUR 0211	Solvent-free PU dispersion without organic solvents. Very flexible, very good adhesion on ABS, PC, PVC, PU, PA and PS, very good pigmentability. A good plasticizer barrier on PVC-foils.
DOMOPUR 0231	Solvent-free PU dispersion without organic solvents. Based on aliphatic polyester-isocyanate. Good anti-blocking and abrasion resistance.
DOMOPUR 0431	OH functional PU dispersion. In combination with melamine, blocked isocyanate and/or phenolic hardeners excellent applicability, adhesion, chemical resistance and appearance is achieved.
ADDITIVE EP024	Epoxy phosphate additive for waterborne stoving enamels. Improves adhesion and corrosion, chemical and stain resistance.



ISO 9001  
ISO 14001

BUREAU VERITAS  
Certification



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