

Product Data Sheet

DIAION™ UBK12

DIAION™ UBK12 is a cation exchange resin with a uniform particle size. It has 12% cross-linkages and excellent properties. A wide range of applications, especially in a field of manufacturing and processing pure water, is recommended.

Product

Grade Name	DIAION™ UBK12
Type	Strong Acid Cation
Matrix	Styrene-DVB, Gel
Functional Group	Sulfonic acid
Ionic Form	Na ⁺

Specification

Whole Bead Count	-	90 min.
Salt Splitting Capacity	meq/mL	2.3 min.
Water Content	%	33 - 39
Mean Particle Size	μm	650 ± 50
Uniformity Coefficient	-	1.2 max.

Typical Properties

Shipping Density	g/L	850
Particle Density	g/mL	1.34
Total Swelling (Na ⁺ to H ⁺)	%	6

Recommended Operating Conditions

Maximum Operating Temperature	°C	120
Operating pH Range		0 - 14
Minimum Bed Depth	mm	800
Service Flow Rate	BV/h	10 - 40
Regenerant		HCl
		H ₂ SO ₄
Regenerant Concentration	%	HCl 4 - 10
		H ₂ SO ₄ 1 - 4
Regenerant Level	g/L	30 - 150
Regenerant Flow Rate	BV/h	2 - 10
Total Rinse Requirement	BV	2 - 10

1 BV(Bed Volume)=1 m³/m³-resin



Hydraulic Characteristics

The approximate pressure drop at various temperatures and flow rates for each meter of bed depth of DIAION™ UBK12 resin in normal down flow operation is shown in the graphs below.

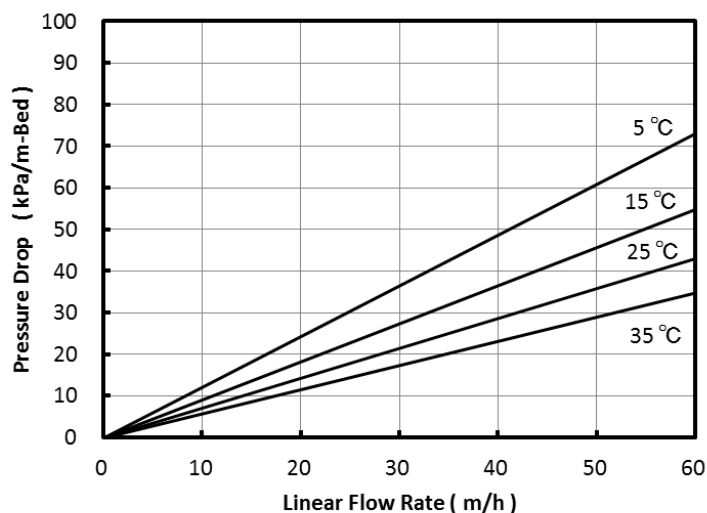


Fig. 1 Pressure Drop of UBK12

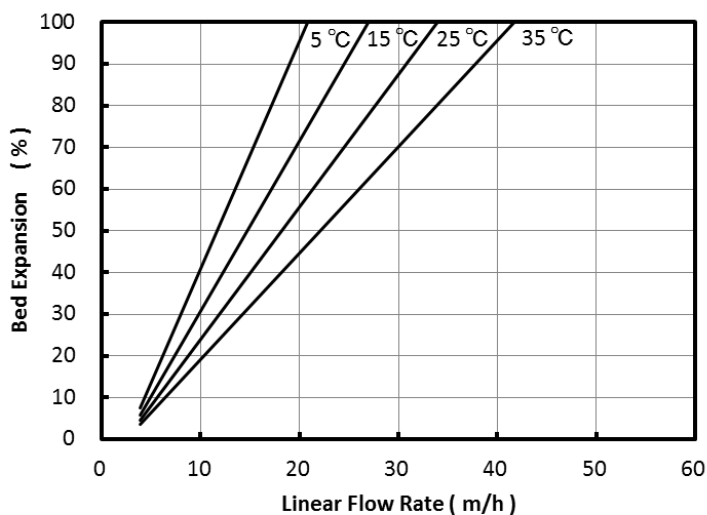


Fig. 2 Bed Expansion of UBK12

Operational Capacity Data

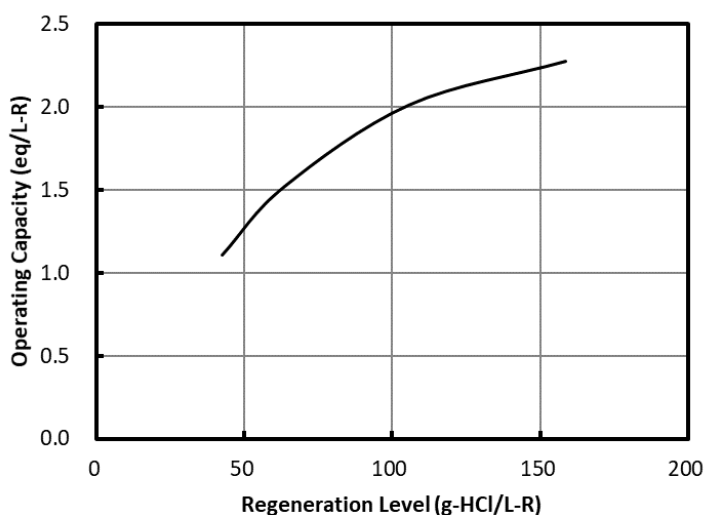


Fig. 3 Operational Capacity Data of UBK12
Regenerant : 4 % HCl

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