## DIAION<sup>™</sup> WA10

DIAION™ WA10 is an acrylic type weakly basic anion exchange resin. It has tertiary amine functionality with high regeneration efficiency. A wide range of applications, especially in a field of pretreatment of starch hydrolysates containing purification of dextrose, beet sugar solutions, and formaldehyde, is recommended.

Product		
Grade Name		DIAION <sup>TM</sup> WA10
Туре		Weak Base Anion
Matrix		Acrylic-DVB, Gel
Functional Group		Tertiary Amine
Ionic Form		Free Base
Specification		
Whole Bead Count	-	90 min.
Total Exchange Capacity	meq/mL	1.2 min.
Water Content	%	63 - 69
Particle Size Distribution on 1180 μm	%	5 max.
Particle Size Distribution thr. 300 $\mu m$	%	1 max.
Effective Size	mm	0.35 min.
Uniformity Coefficient	-	1.6 max.
Typical Properties		
Shipping Density	g/L	690
Mean Particle Size	μm	510
Particle Density	g/mL	1.05
Total Swelling (FB to Cl <sup>-</sup> )	%	22
Recommended Operating Conditions		
Maximum Operating Temperature	°C	60
Operating pH Range		0 - 9
Minimum Bed Depth	mm	800
Service Flow Rate	BV/h	10 - 40
Regenerant		NaOH
Regenerant Concentration	%	NaOH 1 - 4
Regenerant Level	% of ionic load	120
Regenerant Flow Rate	BV/h	2 - 6
Total Rinse Requirement	BV	5 - 10

1 BV(Bed Volume)=1 m<sup>3</sup>/m<sup>3</sup>-resin

## **Hydraulic Characteristics**

The approximate pressure drop at various temperatures and flow rates for each meter of bed depth of DIAION<sup>TM</sup> WA10 resin in normal down flow operation is shown in the graphs below.

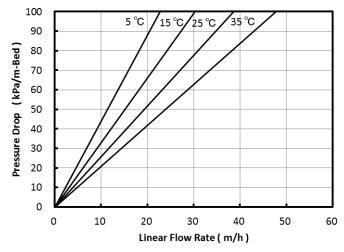


Fig. 1 Pressure Drop of WA10

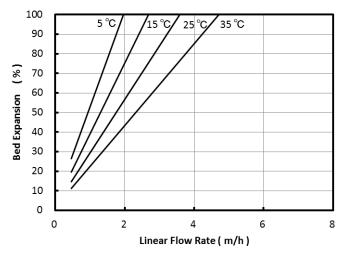


Fig. 2 Bed Expansion of WA10

## **Notice**

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