MAGNA

CG8-UPS

STRONG ACID CATION

**UNIFORM PARTICLE SIZE
POLYSTYRENIC GEL
8% CROSSLINKED
SODIUM FORM**

ResinTech CG8-UPS is a uniform particle size strong acid cation resin in sodium form. It is amber in color and made from 8% cross-linked gel. The uniform beads and somewhat smaller harmonic mean size yield minimal pressure loss and better regeneration efficiency compared to resins with Gaussian size distribution. It is intended for use in all industrial applications and is recommended for counter currently regenerated systems such as packed beds.

APPLICATIONS

- Softening - Industrial
- Demineralization
- Packed Beds

TYPICAL PROPERTIES & PHYSICAL CHARACTERISTICS

Polymer Matrix	Styrenic Gel
Ionic Form	Sodium
Functional Group	Sulfonic Acid
Physical Form	Spherical Beads
Particle Size	20 to 40 US Mesh (400 - 841 µm)
% < 50 mesh (300µm)	< 0.5% minus 50
Minimum Sphericity	95%
Uniformity Coefficient	1.25
Reversible Swelling	Na to Ca -5% to -3%
Temp Limit	280°F (138°C)
Capacity (meq/mL)	2.0
Moisture Retention	42% to 49%
Shipping Weight	51 - 53 lbs/ft³ (817 - 849 g/L)
Color	Amber
Regenerability	Yes
Uniform Particle Size	Yes

CERTIFICATIONS

- WQA Gold Seal*

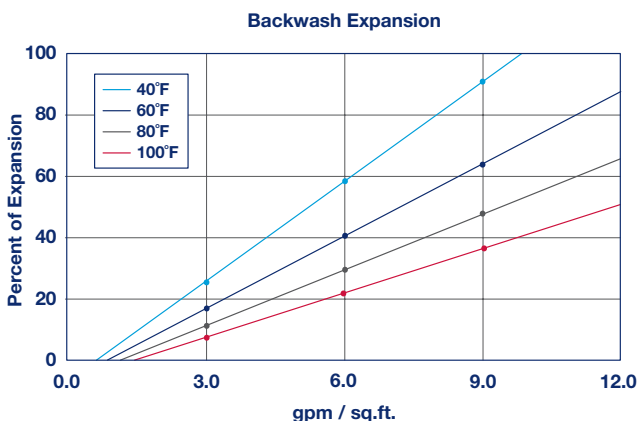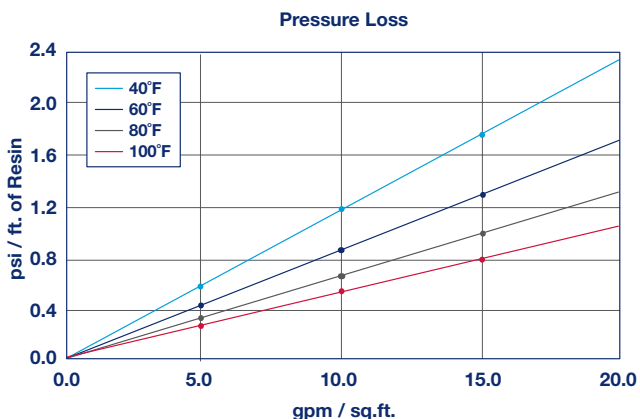* NSF/ANSI/CAN 61: Drinking Water System Components - Health Effects

PACKAGING OPTIONS

- 500 ml samples
- 1 ft³ bags
- 1 ft³ boxes
- 1 ft³ drums
- 7 ft³ drums
- 42 ft³ supersacks

Revision 1.1
ResinTech, Inc.®

RESINTECH INC.
INNOVATIONS IN ION EXCHANGE

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Pressure Loss

Backwash Expansion

PACKED BEDS

CG8-UPS has a very narrow particle size range. The unifor- mity allows a slightly smaller bead size to be used which results in fast- er exchange of ions, more efficient regeneration and lower leakage. CG8-UPS is ideal for packed beds and other types of countercurrent ion exchangers where consistent operation is important cycle after cycle. Higher void space and minimal fine mesh beads provide low pressure loss and helps prevent channeling and other distribution problems. Packed beds typically have limited freeboard (only a few inches with the resin in the swollen form).

SUGGESTED OPERATING CONDITIONS

Maximum continuous temperature	
Sodium form	280°F
Minimum bed depth	24 inches
Backwash expansion	25 to 50 percent
Maximum pressure loss	25 psi
Operating pH range	0 to 14 SU
Regenerant Concentration	
Hydrogen cycle	5 to 10 percent HCl
Hydrogen cycle	1 to 8 percent H_2SO_4
Salt cycle	10 to 15 percent NaCl
Regenerant level	4 to 15 lbs./cu.ft.
Regenerant flow rate.	0.5 to 1.5 gpm/cu.ft.
Regenerant contact time	>20 minutes
Displacement flow rate	Same as dilution water
Displacement volume	10 to 15 gallons/cu.ft.
Rinse flow rate	Same as service flow
Rinse volume	35 to 60 gallons/cu.ft.
Service flow rate	1 to 10 gpm/cu.ft.

Note: These guidelines describe average low risk operating conditions. They are not intend- ed to be absolute minimums or maximums.
For operation outside these guidelines, contact ResinTech Technical Support

SOFTENING

CG8-UPS is an 8% crosslinked cation resin optimized for industrial softening applications. CG8-UPS has higher total capacity than standard crosslinked resins such as CGS and has higher operating capacity when relatively large brine doses are used during regenera- tion. CG8-UPS is suitable for hot water applications and for waters that contain modest levels of chlorine.

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