

# FINE MESH TYPE I ANION POLYSTYRENIC GEL CHLORIDE FORM

ResinTech SBG1-F is a fine mesh type 1 strong base anion gel resin in chloride form. It has similar chemical and physical properties as other resins in the SBG1 family. Its fine mesh size yields faster kinetics and improved regeneration efficiency compared to larger bead resins. SBG1-F is intended for industrial applications where resin bed depth is less than ideal and for applications that challenge the kinetic limits of larger size resins.

### **APPLICATIONS**

• Chemical Purification

TYPICAL PROPERTIES & PHYSICAL CHARACTERISTICS		
Polymer Matrix	Styrenic Gel	
Ionic Form	Chloride	
Functional Group	Trimethylamine	
Physical Form	Spherical Beads	
Particle Size	30 to 50 US Mesh (297 - 595 μm)	
% < 50 mesh (300µm)	< 5%	
Minimum Sphericity	93%	
Uniformity Coefficient	1.3	
Reversible Swelling	CI to OH 18% to 25%	
Temp Limit	170°F (77°C)	
Capacity (meq/mL)	1.4	
Moisture Retention	42% to 51%	
Shipping Weight	43 - 45 lbs/ft³ (689 - 721 g/L)	
Color	White to Yellow	
Regenerability	Yes	

### PACKAGING OPTIONS

- 1 ft<sup>3</sup> bags
  - bayes
- 1 ft<sup>3</sup> drums
- 7 ft<sup>3</sup> drums
- 1 ft<sup>3</sup> boxes
- 42 ft<sup>3</sup> supersacks

**ResinTech Inc.** 

Revision 1.0 ResinTech, Inc.®



## FINE MESH TYPE I ANION POLYSTYRENIC GEL CHLORIDE FORM

**FECH INC.** 

ION EXCHANGE





#### SUGGESTED OPERATING CONDITIONS

Maximum continuous temperature	
Chloride form	170°F
Minimum bed depth	24 inches
Backwash expansion	25 to 50 percent
Maximum pressure loss	20 psi
Operating pH range	0 to 14 SU
Regenerant Concentration	
Salt cycle	2 to 10 percent NaCl
Regenerant level	4 to 10 lbs./cu.ft.
Regenerant flow rate	0.25 to 1.0 gpm/cu.ft.
Regenerant contact time	>40 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 intended to be absolute minimums or maximums. For operation outside these guidelines, contact ResinTech Technical Support

**Resin** 

Revision 1.0 ResinTech, Inc.®