



Graver Technologies

## Product Specification

**GRAVEX<sup>®</sup> GR-4-17 NG**  
**Nuclear Grade**  
**Lithium-7/Hydroxide**

Spec No.	GTS-417-NG
Rev No.	1
Date	October 23, 2018

<b>Properties</b>	<b>Limits</b>
Resin Type	Strongly Acidic Macroporous Cation Exchange Resin Strongly Basic Type 1 Gel Anion Exchange Resin
Functionality	Sulfonic Acid / Quaternary Ammonium
Matrix	Styrene Divinylbenzene
Cation:Anion Ratio	1:1 Equivalents
Total Exchange Capacity	2.1 meq/mL (Cation, H form) (min) 1.1 meq/mL (Anion) (min)
Ionic Conversion	99.0% Lithium-7 (min) 97% Hydroxide (min) 0.1% Chloride (max) 0.1% Sulfate (max)
Particle Size	2% plus 16 mesh (~1,190 µm) (max) 5% minus 40 mesh (~420 µm) 0.5% minus 50 mesh (~300 µm) (max)
Friability	Cation - 500 g/bead avg.; Anion - 350 g/bead avg (min) Cation & Anion - 95% > 200 g/bead (min)
Whole Bead	95% (min)
Metals (mg/dry kg)	
Aluminum	40 (max)
Calcium	50 (max)
Copper	10 (max)
Iron	50 (max)
Lead	10 (max)
Magnesium	50 (max)
Potassium	40 (max)
Sodium	30 (max)
Zinc	50 (max)