

Macroporous Weak Acid Cation Exchange Resin

Purolite C115 is a weak acid carboxylic cation exchange resin in the hydrogen form. Its special chemical structure confers exceptional properties in combination with absolute freedom from toxicity. The very weakly acidic carboxylic groups (pKa=5.5-6.0) make it ideal for the uptake of many complex bases. This can help in their separation and purification. Purolite C115 is delivered in a water swollen state. These properties make Purolite C115 ideal for the use in industrial water treatment where low acidity water is required. Purolite C115E is specially treated to remove extractibles. These properties make it ideal for pharmaceutical and potable applications, when used in accordance with FDA recommended procedures for this type of product.

Basic Features:

Application	Dealkalization & Temporary Hardness Removal
Polymer Structure	Macroporous polymethacrylic crosslinked with divinylbenzene
Appearance	Spherical beads
Functional Group	Carboxylic Acid
Ionic form as shipped	H ⁺

Typical Physical and Chemical Characteristics:

Total Capacity (min.)	H ⁺	3.50 eq/l
Total Capacity (min.)	H ⁺	76.42 kGr/ft ³
Moisture Retention	H ⁺	46-53 %
Mean Size Typical		0.60-0.85 mm
Uniformity Coefficient (max.)		1.70
Reversible Swelling (max.)	H ⁺ → Na ⁺	100 %
Reversible Swelling (max.)	H ⁺ → Ca ₂ ⁺	40 %
Specific Gravity		1.10 g/ml
Shipping Weight (approx.)		660-705 g/l
Shipping Weight (approx.)		41-44 lbs/ft ³
Temp Limit	H ⁺	100 °C
Temp Limit	H ⁺	212 °F
pH Limits		0-14
pH Limits	H ⁺	6-14 (Operating)