



Site of manufacture :

Rohm and Haas France S.A.S.
Une filiale de The Dow Chemical Company
Rue des Grands Navoirs prolongée
BP 48
F-02301 CHAUNY
Tél. +33 (0)3 23 38 34 56
Fax +33 (0)3 23 39 26 78

CERTIFICATE OF ANALYSIS

AMBERLITE™ IRP69, Sodium Polystyrene Sulfonate USP
Code 10044637 **Batch n° A075CAN012**

DETERMINATION / UNIT	TEST METHOD	ACCEPTANCE LIMITS	RESULT
Appearance	Visual inspection (TA059)	Golden brown, fine powder Free of foreign matter Free of agglomeration	Pass
Identification (infra-red)	FTIR - derived from USP <197K> (TA024)	Conforms to ref. spectrum (in-house ref. standard)	Pass
Assay (on the anhydrous basis)			
Potassium exchange capacity (mg/g)	USP	110 - 135	125
Sodium content (%)	USP	9.4 - 11.5	10.8
Purity Testing			
Limit of ammonium salts	USP	No blue coloration of litmus paper	Pass
Organic impurities (ppm)	Gas chromatography GC/FID (107R)		
Styrene		≤ 1.0	< 0.2
Divinylbenzene		≤ 1.0	< 0.4
Ethylvinylbenzene		≤ 1.0	< 0.4
Di-ethylbenzene		≤ 1.0	< 0.4
Naphthalene		≤ 1.0	< 0.2
Individual unknown impurity (max. peak)		≤ 1.0	< 0.2
Total unknown impurities		≤ 3.0	0.3
Water extractable impurities (%)	Gravimetry (TA064)	≤ 1.0	0.3
Physico-chemical Testing			
pH (in brine)	pH-meter (TA044)	6.0 - 9.5	6.5
Water content (%)	USP <921> Method I	≤ 10.0	6.4
Particle Size (%)	Dry sieving method derived from USP <811> and <786> (TA019)		
% > 0.150 mm		≤ 1.0	0.0
% > 0.075 mm		10.0 - 25.0	18.1
% > 0.045 mm		≥ 40.0	61.5
Microbial Purity	Ph. Eur. 2.6.12		
Total Bacteria (col/g)		< 100	< 2
Total Molds (col/g)		< 50	< 2

Certificate model n°:	21-B
Certificate version n°:	11
Control specification version n°:	07
Dates of release :	13.11.2012
(DD.MM.YYYY) of manufacture :	24.10.2012
of retest :	24.10.2014

Name and Title :	☒ Sylvie PROISY : Quality Assurance Manager ☐ Cyril MARTIN : Quality Control Manager (backup)
Conformance :	CONFORM
Date and Signature :	February 5, 2013

Siège social : 23, avenue Jules Rimet - 93200 Saint Denis
Tél. +33(0)1 49 21 78 78 - Télécopie +33 (0)1 49 21 79 79

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