

INDION[®] 850

Description

INDION 850 is a high porosity weak base anion exchanger in bead form, containing tertiary and quaternary ammonium groups. Its styrene-divinylbenzene macroporous structure gives excellent mechanical strength and exceptional resistance to osmotic shock.

INDION 850 also has excellent resistance to fouling by organic matter present in natural waters.

This anion exchanger can be operated at high regeneration efficiency like most weak base anion exchangers. The excellent kinetics of INDION 850 makes operation possible over a relatively wide range of flow rates.

Characteristics	
Appearance	Opaque off white to brown beads
Matrix	Styrene divinyl benzene copolymer
Functional Group	Tertiary & quaternary ammonium
Ionic form as supplied	Free base
Total exchange capacity	1.5 meq/ml, minimum
Moisture holding capacity in free base form	44 - 52 %
Shipping weight*	620 - 670 kg/m ³
Particle size range	0.3 to 1.2 mm
> 1.2 mm	5.0%, maximum
< 0.3 mm	1.0%, maximum
Uniformity co-efficient	1.7, maximum
Effective size	0.40 to 0.55 mm
Volume change	Free base to hydrochloride form, 25%, maximum
Osmotic strength	Excellent
Mechanical strength	Excellent
Maximum operating temperature	60° C free base form, 80° C hydrochloride form
Operating pH range	0 to 7
Resistance to reducing agents	Good
Resistance to oxidizing agents	Generally good, chlorine should be absent
*Weight of resin, as supplied, occupying 1 m ³ in a unit after backwashing and draining.	

Use of good quality regenerants

All ion exchange resins are subject to fouling and blockage of active groups by precipitated iron. Hence the iron content in the feed water should be low and the regenerant sodium hydroxide must be essentially free from iron and heavy metals. All resins, especially the anion exchangers are prone to oxidative attack resulting in problems such as loss of capacity, resin clumping, etc. Therefore sodium hydroxide should have as low a chlorate content as possible. Good quality regenerant of technical or chemically pure grade should be used to obtain best results.

Packing

HDPE Lined bags	:	25/50 lts
LDPE bags	:	1 cft/25 lts
Super sack	:	1000 lts
Super sack	:	35/40/42 cft
MS/HDPE drums with liner bags	:	180/200 lts
Fiber drums with liner bags	:	7 cft

Storage

Ion exchange resins require proper care at all times. The resin must never be allowed to become dry. Regularly open the plastic bags and check the condition of the resin when in storage. If not moist, add enough clean demineralised water and keep it in completely moist condition. Always keep the resin drum in the shade. Recommended storage temperature is between 20°C and 40°C

Safety

Acid and alkali solutions used for regeneration are corrosive and should be handled in a manner that will prevent eye and skin contact. If any oxidising agents are used, necessary safety precautions should be observed to avoid accidents and damage to the resin.

INDION range of Ion Exchange resins are produced in a state-of-the-art ISO 9001 and ISO 14001 certified manufacturing facilities at Ankleshwar, in the state of Gujarat in India.

To the best of our knowledge the information contained in this publication is accurate. Ion Exchange (India) Ltd. maintains a policy of continuous development and reserves the right to amend the information given herein without notice.

INDION® is the registered trademark of Ion Exchange (India) Ltd.



ION EXCHANGE (INDIA) LTD.

Corporate Office

Ion House, Dr. E. Moses Road, Mahalaxmi,
Mumbai - 400011 | Tel: +91 22 6231 2000
E-mail: ieil@ionexchange.co.in

International Division

R-14, T.T.C MIDC, Thane - Belapur Road, Rabale,
Navi Mumbai - 400 701 | Tel: +91 22 6857 2400
E-mail: export.sales@ionexchange.co.in

Regional and Branch Offices

Bengaluru | Bhubaneswar | Chandigarh | Chennai
Delhi | Hyderabad | Kolkata | Lucknow | Vadodara
Vashi | Visakhapatnam

Overseas Offices

Bangladesh | Canada | Indonesia | Kenya
Malaysia | Oman | Portugal | Saudi Arabia | Singapore
South Africa | Sri Lanka | Tanzania | Thailand | UAE | USA

Manufacturing Units

India - Ankleshwar | Hosur | Patancheru | Rabale | Verna | Wada

Overseas - Bangladesh | Indonesia | Saudi Arabia | UAE

All India Service and Dealer Network

www.ionexchangeglobal.com | www.ionresins.com

