Solid Supports and Packings

Tenax® Porous Polymers

Tenax®-TA is a porous polymer based on 2,6-Diphenyl-*p*-phenylene Oxide. Tenax®-TA is a low bleeding material with a very low level of impurities. Tenax®-TA can be used as both a column packing material and as a trapping adsorbent for organic volatile and semi-volatile compounds. Both the EPA and NIOSH specify the use of Tenax® in their standard methods. Tenax® is particularly useful for the analysis of high boiling compounds such as alcohols, polyethylene glycols, diols, phenols, monoamines and diamines, ethanolamines, aldehydes, ketones and chlorinated aromatics. Surface area is 35m²/g. Density is 0.25g/cc. Maximum temperature limit is 350°C

Tenax®-GR contains 23% graphitized carbon as an integral part of the material. The resulting material gives higher break-through volumes for most materials, yet is less water retentive than Tenax®-TA. This makes it an ideal material for the preparation of adsorbent traps. When using this material for packing GC columns, better peak symmetry is observed. Surface area is 24.1m²/g. Density is 0.55g/cc. Maximum temperature limit is 350°C.

Breakthrough Volumes at 20°C				
	Tenax®-TA		Tenax®-GR	
Test compounds	mL/g	mL/mL	mL/g	mL/mL
Methane	5.7	1.1	2.2	1.2
Ethane	19.7	3.9	14.4	8.0
Bromotrifluoromethane	56.0	11.2	18.2	10.0
Water	55	11	47	26
Methyl Chloride	190	37.9	182	100
Butane	676	135	395	217
Vinyl Chloride	345	69	506	278
Benzene	44,400	8,880	33,800	18,600
1,1,2-Trichloroethane	110,000	21,900	105,000	57,700

Ordering Information		
Packings, Mesh size	QTY	Part No.
Tenax®-TA		
20/35	10g	0900-F001
35/60	10g	0900-F002
60/80	10g	0900-F003
80/100	10g	0900-F004
Tenax®-GR		
20/35	10g	0900-F005
35/60	10g	0900-F006
60/80	10g	0900-F007
80/100	10g	0900-F008