

METALTMX

Recommended System Operating Conditions

Inlet water pH	5.8 – 10.5	
Freeboard	40%	
Minimal Bed Depth	US	29.5 inches
	SI	75 cm
Optimal Bed Depth	US	47 inches
	SI	120 cm
Service flow	US	4 – 12 gpm/ ft ²
	SI	10 – 30 m/h
Backwash velocity**	US	10 – 12 gpm/ ft ²
	SI	25 – 30 m/h
Backwash time**	10 – 15 minutes	
Rinse time**	2 – 3 minutes	

** Note: Starred parameters could be more or less in some cases depending on inlet parameters.

Composition

Compounds	Typical value	Specifications
ZEOSORB (Naturally Mined)	85%	>85%
Manganese dioxide	10%	>9.5%
Hydrated Lime	5%	<5%

Physical Properties

Appearance	Granular black beads	
Odor	none	
Mesh size	US	14 x 30
	SI	0.6 – 1.4 mm
Uniformity Coefficient	≤ 1.75	
Bulk density	US	66 lb/ ft ³
	SI	1060 kg/ m ³
Moisture Content	<0.5% as shipped	
Filtration	<3 micron	
Loading Capacity	for Fe ²⁺ alone	3000 mg/ l
	for Mn ²⁺ alone	85000 mg/ ft ³ (aprx)
	for H ₂ S alone	500 mg/ l
		14000 mg/ ft ³ (aprx)

FILTRATION OF

- <3 MICRON
- SUSPENDED SOLIDS
- SEDIMENTS
- TURBIDITY
- ODOR

REMOVAL OF

- IRON
- MANGANESE
- HYDROGEN SULFIDE
- ARSENIC
- RADIUM
- HEAVY METALS
- RADIO NUCLIDES

Regeneration / Dosing*

for 1.0 mg/ l of

	Fe ²⁺	Mn ²⁺	H ₂ S
H ₂ O ₂	0.9 mg/ l	1.8 mg/ l	4.5 mg/ l
KMnO ₄ /Cl	1.0 mg/ l	2.0 mg/ l	5.0 mg/ l

Standard Pressure Vessel Listing for Systems (Manual/Automatic)

Pressure Vessel			KL media amount					Service flow rate		Backwash Flow Rate			
Vessel Mode	Tank Volume (liters)	Free-board (%)	Volume (%)	(liters)	(ft ³)	Bed Height (mm)	Standard (m ³ /h)	(gpm)	Maximum (m ³ /h)	(gpm)	(m ³ /h)	(gpm)	(gpm)
10x44	49.0	40	55	28.0	1.0	580	0.5	2.20	0.6	2.64	1.40	6.2	
13x54	105.7	40	55	56.0	2.0	740	1.0	4.40	1.2	5.28	2.39	10.5	
14x65	148.0	40	55	84.0	3.0	897	1.5	6.60	1.8	7.96	3.63	16.0	
18x65	257.0	40	55	140.0	5.0	940	2.5	11.00	3.0	13.20	4.59	20.2	
21x60	310.0	40	55	168.0	6.0	834	3.0	13.21	3.6	15.85	6.25	27.6	
24x69	450.0	40	55	252.0	9.0	926	4.5	19.81	5.4	23.77	8.84	39.0	
30x78	710.0	40	55	392.0	14.0	935	7.0	30.82	8.4	36.98	12.76	56.3	
36x78	1020.0	40	55	560.0	20.0	932	10.0	44.02	12.0	52.83	18.37	81.0	
42x78	1360.0	40	55	756.0	27.0	913	13.5	59.44	16.2	71.32	25.01	110.3	
48x82	1840.0	40	55	1008.0	36.0	946	18.0	79.25	21.6	95.10	32.67	144.0	



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PRODUCT DATA SHEET