

1" Nelsen Water Solutions Softener System Specifications



FEATURES

- Service flow rate of 27 gpm, backwash 27 gpm
- Progressive System Flow Built-in
- Service Alarm - Time, Volume or Both
- Scrolling Dealer Name & Contact Number
- Optional double backwash feature offers optimum regen, cleaning ability and efficiency
- Fully adjustable cycle times with 6-cycle control delivers controlled backwash, downflow brining/slow rinse, second backwash, fast rinse, refill and downflow service
- Downflow or upflow brining regeneration
- Level VI 15-volt output DC power supply provides safe and easy installation
- Post treated water regenerant refill



CYCLES - FACTORY SETTINGS

1 - Backwash 1st	8 min
2 - Regenerant Draw/Slow Rinse	60 min
3 - Backwash 2nd	8 min
4 - Fast Rinse	8 min
5 - Regenerant Refill Pre or Post	0.1-99.0
6 - Service	

VALVE SPECS

Inlet/Outlet Plumbing Connections	3/4" to 1.5" NPS
Valve Material	Fiber Reinforced Composite
Regeneration	Downflow
Operating Pressures - Min/Max	20psi/125psi
Operating Temperatures - Min/Max	40°/110° F

Dimensions

Distributor Pilot	1.050" OD Pipe (3/4" NPS)
Drain Line	3/4" Male NPT
Brine Line	3/8" Push Fit or 1/2" Compression

GENERAL SPECIFICATIONS

Grains Capacity	24,000	32,000	40,000	48,000	64,000	80,000	110,000	120,000	150,000	210,000
Grains Capacity ¹	18,000	24,000	30,000	36,000	48,000	60,000	84,000	96,000	120,000	168,000
9lbs/cu.ft - Pounds of Salt	6.8	9	11.3	13.5	18	22.5	31.5	36	45	64
Grains Capacity ²	22,500	30,000	37,500	45,000	60,000	75,000	105,000	120,000	150,000	210,000
15lbs/cu.ft - Pounds of Salt	11.3	15	18.5	22.5	30	37.5	52	60	76	106
Cubic Ft. Resin	0.75	1	1.25	1.5	2	2.5	3.5	4	5	7
Pounds Resin	38	50	63	75	100	125	175	200	250	350
Service Flow Rate GPM*	7	9	10	12	13	18	22	27	27	27
Overall Height	51"	55"	51"	61"	55"	61"	71"	71"	71"	68"
Floor Space Required w/Std Brine Tank	25" x 17"	26" x 17"	27" x 17"	27" x 18"	29" x 18"	30" x 18"	31" x 24"	42" x 24"	47" x 24"	47" x 24"
Approximate Weight - Pounds	83	98	111	124	152	219	292	333	407	567

BRINE SYSTEM

Standard Brine Tank Size	15"x17"x36"	15"x17"x36"	15"x17"x36"	15"x17"x36"	18" x 33"	18" x 33"	24" x 41"	24" x 50"	24" x 50"	24" x 50"
Brine Tank Salt Capacity (w/o Grid)	275 lbs	275 lbs	275 lbs	275 lbs	375 lbs	375 lbs	700 lbs	850 lbs	850 lbs	850 lbs
Brine Valve Included	Clack-474	Clack- 474	Clack- 474	Clack- 474	Clack- 474	Clack- 474	Clack- 484	Clack- 484	Clack- 484	Clack- 484
Injector Color/Draw Rate (at 50 psi) GPM	Violet/.17	Red/.22	White/.27	White/.27	Blue/.38	Yellow/.43	Green/.48	Orange/.60	Lt Blue/.70	Lt Green/.75

UNITS WITH STANDARD MESH RESIN

Mineral Tank Size	8" x 44"	9" x 48"	10" x 44"	10" x 54"	12" x 48"	13" x 54"	14" x 65"	16" x 65"	18" x 65"	21" x 62"
Backwash Flow w/Basket Distributor	1.7	2.2	2.7	2.7	3.2	4.2	5.3	7.5	10	13
Backwash Flow w/Turbulator	2.2	2.2	3.2	3.2	5.3	5.3	6.5			
Gravel Under-bed - Pounds ³	optional	optional	optional	optional	optional	optional	50	75	100	150

Regeneration Water Usage Standard Distributor/Turbulator

Gallons Used at 9lbs/cu.ft. Salt ⁴	60/72	76/88	92/104	93/105	116/120	150/176	185/213	260	342	453
Gallons Used at 15lbs/cu.ft Salt ⁴	61/73	78/90	94/106	96/108	120/170	155/181	191/220	268	352	467

Units with Plated Tanks

Backwash Flow-Gal/Per/Min	1.3	1.7	1.7	1.7	2.2	3.2	4.2	5.3		
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Regeneration Water Usage w/Plated Tanks

Gallons Used at 9lbs/cu.ft. Salt ⁴	50	64	68	69	92	126	158	207		
Gallons Used at 15lbs/cu.ft Salt ⁴	52	66	70	72	96	131	165	215		

UNITS WITH FINE MESH RESIN

Mineral Tank Size	8" x 44"	9" x 48"	10" x 44 "	10" x 54"	12" x 48"	13" x 54"	14" x 65"			
Backwash Flow in GPM	1.3	1.7	1.7	1.7	2.2	2.2	3.2			
Gravel Under-bed in Pounds ³	10	12	16	16	20	35	50			
Water Used for Regeneration - Gal. ⁴	52	56	70	72	96	131	165			

¹ @ 9lbs/ft³ = 24,000 grains/ft³ resin ³ Gravel under-bed is optional with standard mesh resin units under 80,000 grains and included with fine mesh units

² @ 15lbs/ft³ = 30,000 grains/ft³ resin ⁴ When using pre-programmed cycle times

* Note - due to varying water conditions, water pressures and assembly materials the service flow rate should be used only as a guideline.