CSI
WATER TREATMENT SYSTEMS

PRODUCT CATALOG

13TH EDITION

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CSI WATER TREATMENT SYSTEMS

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Contacting Us Is Easy

Mailing & Shipping Address

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Internet Web Address

http://www.csiwater.com

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Cabinet Softener

Features

- Eliminates Hardness (Calcium & Magnesium)
- Exclusive RS-1 Electronic meter initiated controls
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- High Flow 1” distributor
- Treated Water Refill with pre-brine option

General Specifications	CM24	CM32
Grains Capacity - Regeneration / Lbs Salt Used*	**20,000 / 7.5**	**27,000 / 9**
Maximum Raw Water Hardness (grains)	50	75
Maximum Clear Iron / Manganese	3	5
Exchange Resin (cu ft per tank)	.75	1.0
Mineral Tanks (polyglass)	9 X 35	9 X 35
Brine Tank (polyethylene w grid & safety)	N/A	N/A
Service Flow Rate (gpm per active tank)**	10.0	11.0
Backwash Flow Rate (gpm)	2.0	2.0
Gallons Used / Regeneration	86	88
Space Required	23 X 14 X 45	23 X 14 X 45
Approximate Shipping Weight (lbs)	88	100

* Factory Salt Setting: 9 lbs / cu. ft.
** The pressure drop does not exceed 15.0 psi at the service flow rate.

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Two Tank Softener

Features

- Eliminates Hardness (Calcium & Magnesium)
- Reduces Iron / Manganese stains and taste
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Features Vortech™ tank technology maximizing capacity and efficiency
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plate and brine well

General Specifications	MS24-S3 MS24V-S3	MS32-S3 MS32V-S3	MS48-S3 MS48V-S3	MS64-S3 MS64V-S3	MS96V-S3*
Grains Capacity - Regeneration / Lbs Salt Used**	24,000 / 12 **20,000 / 7.5** 15,000 / 4.5	32,000 / 15 **27,000 / 9** 20,000 / 6	48,000 / 24 **40,000 / 15** 30,000 / 9	64,000 / 30 **54,000 / 18** 40,000 / 12	96,000 / 45 **81,000 / 27** 60,000 / 18
Maximum Raw Water Hardness (grains)	50	75	100	100	100
Maximum Clear Iron / Manganese	3	5	5	5	5
Exchange Resin (cu ft per tank)	.75	1.0	1.5	2.0	3.0
Mineral Tanks (polyglass)	8 x 44	9 x 48	10 x 54	12 x 52	13 x 65
Brine Tank (polyethylene w grid & safety)	16 x 33	16 x 33	16 x 33	16 x 33	18 x 40
Service Flow Rate (gpm per active tank)***	8.0	10.0	11.0	12.0	14.0
Backwash Flow Rate (gpm)	1.5	2.0	2.4	3.5	
Gallons Used / Regeneration	79	90	101	140	
Backwash Flow Rate (gpm) **Vortech (V) Units**	**1.2**	**1.5**	**2.0**	**2.4**	**3.0**
Gallons Used / Regeneration **Vortech (V) Units**	**69**	**78**	**90**	**117**	**126**
Space Required	16 X 26 X 53	16 X 27 X 56	16 X 28 X 62	16 X 30 X 60	18 X 32 X 74
Approximate Shipping Weight (lbs)	88	100	133	164	285

*96 Series only available in Vortech Units
**Factory Salt Settings are 9 lbs / cu ft
***The pressure drop does not exceed 15 psi at the service flow rate

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The TERMINATR™

Features

- Eliminates Hardness (Calcium & Magnesium)
- High Quality Fine Mesh for increased Iron / Manganese Reduction
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Features Vortech™ tank technology maximizing capacity and efficiency
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plate and brine well

General Specifications	MSI32-S3	MSI48-S3	MSI64-S3	MSI96-S3
Grains Capacity - Regeneration / ** Lbs Salt Used	**35,000 / 15** 32,000 / 9 26,000 / 6	**52,000 / 24** 48,000 / 15 40,000 / 9	**70,000 / 30** 64,000 / 18 53,000 / 12	**105,000 / 45** 96,000 / 27 85,000 / 18
Maximum Raw Water Hardness (grains)	75	100	100	100
Maximum Clear Iron / Manganese	5	10	10	10
Exchange Resin (cu ft per tank)	1.0	1.5	2.0	3.0
Mineral Tanks (Vortech)	9 x 48	10 x 54	12 x 52	13 x 65
Brine Tank (polyethylene w grid & safety)	16 x 33	16 x 33	16 x 33	18 x 40
Service Flow Rate (gpm per active tank)*	10.0	11.0	12.0	14.0
Backwash Flow Rate (gpm)	1.2	1.5	2.0	2.4
Gallons Used / Regeneration	72	83	95	112
Space Required	16 x 27 x 56	16 x 28 x 62	16 x 30 x 60	18 x 32 x 74
Approximate Shipping Weight (lbs)	130	163	204	290

* The pressure drop does not exceed 15.0 psi at the service flow rate.
** Factory Salt Setting: 15lbs./cuft.

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Signature Duplex Softener

Features

- Up to 30% savings in water & salt by never needing soft water reserve
- Never runs out of soft water, twin tanks eliminate the risk of untreated water bypass
- Easy installation with injection molded, one-piece Plug-N'-Flow manifold
- Simple, adjustable valve programming makes changing salt setting & backwash / rinse duration easy to achieve peak performance
- No worries about time of day clock
- 3/4" stainless steel bypass (1" stainless steel or plastic bypass optional)
- Easy to maintain because it uses standard Signature valve parts
- Features Vortech™ tank technology maximizing capacity and efficiency
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure

General Specifications	SD48 SD48V	SD64 SD64V	SD96 SD96V	SD128 SD128V
Grains Capacity - Regeneration / Lbs Salt Used (Per Tank)**	24,000 / 12.0 **20,000 / 7.5** 15,000 / 4.5	32,000 / 15.0 **27,000 / 9.0** 20,000 / 6.0	48,000 / 24.0 **40,000 / 15.0** 30,000 / 9.0	64,000 / 30.0 **54,000 / 18.0** 40,000 / 12.0
Maximum Raw Water Hardness (grains)	50	75	100	100
Maximum Clear Iron / Manganese	3	5	5	5
Exchange Resin (cu. ft. per tank)	.75	1.0	1.5	2.0
Mineral Tanks (polyglass)	(2) 8 x 44	(2) 9 x 48	(2) 10 x 54	(2) 12 x 52
Brine Tank (polyethylene w grid & safety)	16 x 33	16 x 33	16 x 33	16 x 33
Service Flow Rate (gpm per active tank)	8.0	10.0	11.0	12.0
Backwash Flow Rate (gpm)	1.5	2.0	2.4	3.5
Gallons Used / Regeneration	79	90	101	140
Backwash Flow Rate (gpm) **Vortech (V) Units**	**1.2**	**1.5**	**2.0**	**2.4**
Gallons Used / Regeneration **Vortech (V) Units**	**69**	**78**	**90**	**117**
Space Required	16 x 34 x 52	16 x 34 x 56	16 x 36 x 62	16 x 40 x 60
Approximate Shipping Weight (lbs)	139	169	237	299

** Factory Salt Setting: 9lbs./cuft.

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Signature Duplex TERMINATR™ System

Features

- High Quality Fine Mesh for increased Iron / Manganese Reduction
- Up to 30% savings in water & salt by never needing soft water reserve
- Never runs out of soft water, twin tanks eliminate the risk of untreated water bypass
- Easy installation with injection molded, one-piece Plug-N'-Flow manifold
- Simple, adjustable valve programming makes changing salt setting & backwash / rinse duration easy to achieve peak performance
- No worries about time of day clock
- 3/4" stainless steel bypass (1" stainless steel or plastic bypass optional)
- Easy to maintain because it uses standard Signature valve parts
- Features Vortech™ tank technology maximizing capacity and efficiency
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure

General Specifications	SDI64	SDI96	SDI128
Grains Capacity - Regeneration / Lbs Salt Used (Per Tank)**	**35,000 / 15** 32,000 / 9 26,000 / 6	**52,000 / 24** 48,000 / 15 40,000	**70,000 / 30** 64,000 / 18 53,000 / 12
Maximum Raw Water Hardness (grains)	75	100	100
Maximum Clear Iron / Manganese	5	10	10
Exchange Resin (cu ft per tank)	1.0	1.5	2.0
Mineral Tanks (Vortech)	(2) 9 X 48	(2) 10 X 54	(2) 12 X 52
Brine Tank (polyethylene w grid & safety)	16 X 33	16 X 33	16 X 33
Service Flow Rate (gpm per active tank)*	10.0	11.0	12.0
Backwash Flow Rate (gpm)	1.2	1.5	2.0
Gallons Used / Regeneration	72	83	95
Space Required	16 X 34 X 56	16 X 36 X 62	16 X 40 X 60
Approximate Shipping Weight (lbs)	169	237	299

* The pressure drop does not exceed 15.0 psi at the service flow rate.
** Factory Salt Setting: 15lbs./cuft.

City Water Softener

Features

- Eliminates Hardness (Calcium & Magnesium)
- Reduces Chlorine & Chloramine taste and odor
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Mid-Vortech Standard
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plates and brine well

General Specifications	MSC32-S3	MSC48-S3
Activated Carbon Media	.5 cu. ft.	1 cu. ft.
Softening Capacity	27,000	40,000
Salt Used / Regeneration (lbs)	9	15
Maximum Raw Water Hardness (gpg)	75	100
Maximum Raw Water Iron (ppm)	5	5
Service Flow Rate (gpm per active tank)*	5	8
Intermittent Flow Rate (gpm)	7	10
Backwash Flow Rate (gpm)	2.4	3.5
Mineral Tank Size (inches)	10 x 54	13 x 54
Gallon Used / Backwash	81	105
Space Required	16 x 28 x 62	16 x 31 x 73
Approximate Shipping Weight (lbs)	130	240

*The pressure drop does not exceed 15.0 psi at the service flow rate.

OPTIMIZR™ Combination Softener & Filter

Features

- Perfect for Filtering and Softening in ONE System
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Features Enpress ® Vortech™ mid-plate technology
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plates and brine well

General Specifications	MSF32-10D-S3	MSF48-15D-S3
Filter Media Capacity	1 cu ft	1.5 cu ft
Softening Capacity	32,000	48,000
Service Flow Rate (gpm)*	5.0	8.0
Intermittent Flow Rate (gpm)	7.0	10.0
Backwash Flow Rate (gpm)	5.0	7.0
Gallons Used / Backwash	130	170
Mineral Tank Size	10 x 65	13 x 54
Space Required	16 x 28 x 73	16 x 31 x 73
Approximate Shipping Weight (lbs)	126	182

* The pressure drop does not exceed 15.0 psi at the service flow rate

Tannin / Hardness

Features

- Eliminates Hardness (Calcium & Magnesium)
- Reduces Tannin stains, taste & odor
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Vortech Standard
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plates and brine well

General Specifications	MST32-S3	MST48-S3	MST64-S3
Grains Capacity / Hardness per Regeneration	24,000	32,000	48,000
**Salt Used / Regeneration (lbs)	12.0	15.0	24.0
Maximum Raw Water Hardness (grains)	50	75	100
Maximum Clear Iron / Manganese (ppm)	.50	.50	.50
Exchange Resin (cu ft) Tannin Resin (cu ft)	.75 .25	1.0 .50	1.5 .50
Mineral Tank (Vortech ™)	9 x 48	10 x 54	12 x 52
Brine Tank (polyethylene with grid & safety)	16 x 33	16 x 33	16 x 33
Service Flow Rate (gpm)*	10.0	11.0	12.0
Backwash Flow Rate ((gpm)	1.2	1.5	2.0
Gallons Used / Regeneration	69	80	93
Space Required	16 x 27 x 56	16 x 28 x 62	16 x 30 x 60
Approximate Shipping Weight (lbs)	100	133	164

* The pressure drop does not exceed 15.0 psi at the service flow rate.
**Factory Salt Setting; 15lbs./cuft.

Nitrate / Sulfate

Features

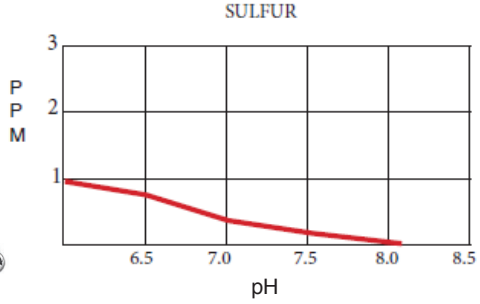
- Reduces Nitrates (EPA MCL* – 10.0 mg/l)
- Reduces Sulfates (EPA SMCL** – 250 mg/l)
- Reduces Fluoride (EPA MCL* – 4.0 mg/l)
- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- Calendar Day Override
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Vortech Standard
- Treated Water Refill with pre-brine option
- Standard brine tank size 16” X 33”
- High Flow brine safety float assembly, overflow fitting, grid plates and brine well

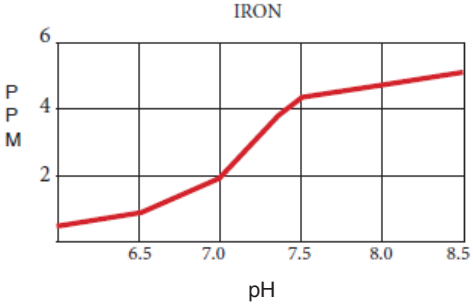
General Specifications	MN15-S3	MN25-S3
Grains Capacity / Regeneration	15,000	25,000
Salt Used / Regeneration	18.0	30.0
Maximum Raw Water Nitrate / Sulfate (mg/l)	100	100
Maximum Clear Iron / Manganese (ppm)	0	0
Exchange Resin (cu ft)	1.5	2.5
Mineral Tank (Vortech ™)	10 x 54	13 x 54
Brine Tank (polyethylene with grid & safety)	16 x 33	16 x 33
Service Flow Rate (gpm)*	5.0	8.0
Backwash Flow Rate ((gpm)	1.2	2.4
Gallons Used / Regeneration	60	80
Space Required	16 x 28 x 62	16 x 31 x 62
Approximate Shipping Weight (lbs)	133	251

NITRO™ Treatment System

Features

- Proprietary Signature 3™ control valve with independently programmable air draw & backwash cycles saving THOUSANDS of gallons of water per year
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Includes meter to provide water usage history
- Simplicity of a single tank aeration system that can be used with any type of well pump and system (standard submersible, constant pressure, jet pump)
- Precise external air injection directly into the media tank to help prevent control valve fouling & for ease of service
- The control valve slowly releases compressed air charge prior to backwash cycle eliminating the explosive blast that can dislodge the drain line
- Operates on low 12 vdc power
- Smart Blend™ media for efficient reduction of iron, manganese, sulfur & correction of low pH
- Enpress® Vortech™ distributor plate for exceptional backwashing capability
- Proprietary two valve bypass with 1” MNPT Connections
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure



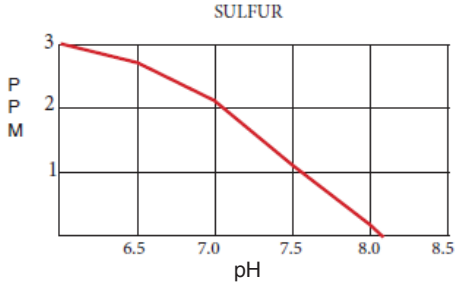


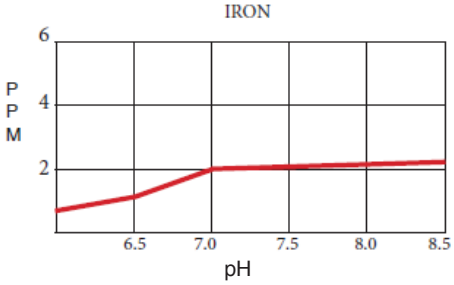
General Specifications	NTF15-S3	NTF25-S3
Filtration (See “Filter Media) section for application	SMART BLEND™	
Filter Media Capacity (cu ft)	1.5	2.5
Mineral Tank (Vortech ™)	10 X 54	13 X 54
Service Flow Rate - Continuous (gpm)	5	8
Service Flow Rate - Intermittent (gpm)	7	10
Backwash Flow Rate (gpm)	5.0	7.0
Gallons Used / Backwash	106	146
Space Required	10 X 10 X 62	13 X 13 X 62
Approximate Shipping Weight (lbs)	145	221

NITRO™ 'S' Treatment System

Features

- Proprietary Signature 3™ control valve with independently programmable air draw & backwash cycles saving THOUSANDS of gallons of water per year
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Includes meter to provide water usage history
- Simplicity of a single tank aeration system that can be used with any type of well pump and system (standard submersible, constant pressure, jet pump)
- Precise external air injection directly into the media tank to help prevent control valve fouling & for ease of service
- The control valve slowly releases compressed air charge prior to backwash cycle eliminating the explosive blast that can dislodge the drain line
- Operates on low 12 vdc power
- Catalytic Carbon media and KDF 85 foam cubes for efficient reduction of sulfur and control of sulfur bacteria.
- Enpress® Vortech™ distributor plate for exceptional backwashing capability
- Proprietary two valve bypass with 1" MNPT Connections
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure





General Specifications	NTF15S-S3	NTF25S-S3
Filter Media Type	CATALYTIC CARBON	
Filter Media Capacity (cu ft)	1.5	2.5
KDF Cubes	1.5 lbs	2.5 lbs
Mineral Tank (Vortech ™)	10 X 54	13 X 54
Service Flow Rate - Continuous (gpm)	5	8
Service Flow Rate - Intermittent (gpm)	7	10
Backwash Flow Rate (gpm)	5.0	7.0
Gallons Used / Backwash	106	146
Space Required	10 X 10 X 62	13 X 13 X 62
Approximate Shipping Weight (lbs)	145	221

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SIDEKICK™
Single Tank Aeration Filter

Features

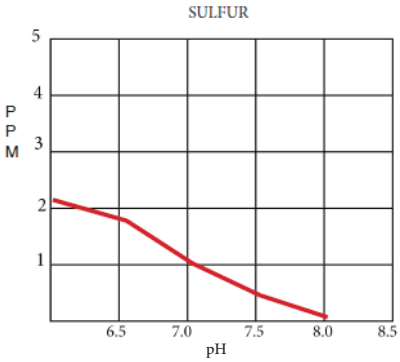
- Air is injected into the top of the tank converting ferrous iron to ferric iron after untreated water has passed through the control valve preventing the control valve from fouling with iron
- Signature 3™ Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Includes meter to provide water usage history
- Air draw cycle can be initiated without a backwash cycle saving 1000's of gallons of water annually
- The control valve slowly releases compressed air charge prior to backwash cycle eliminating the explosive blast that can dislodge the drain line
- Adjustable cycle times
- Proprietary two valve bypass with 1" MNPT Connections
- High Flow 1" distributor
- Smart Blend filter media
- Top cap fill opening for ease of service
- Compatible with any type of well pump system

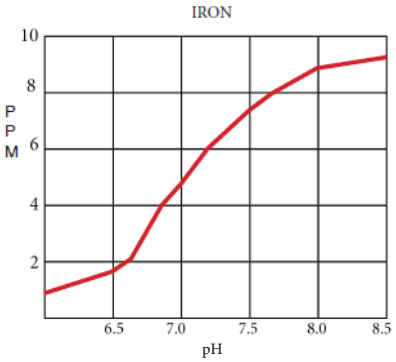
Ozone Complete Option Available

OxyClean Option

The OXY-08NP attaches to your unit, allowing it to inject a peroxide or chlorine solution only during backwash.

Tank Size - 5 Gallons





General Specifications	SK15	SK25
Filtration Media Capacity (CU. FT.)	1.5 cu. ft.	2.5 cu. ft.
Mineral Tank	10 X 54	13 X 54
Service Flow Rate - Continuous (GPM)	5	8
Service Flow Rate - Intermittent (GPM)	7	10
Backwash Flow Rate (GPM)	5.0	7.0
Gallons Used / Backwash	106	146
Space Required (D x W x H inches)	10 X 21 X 61	13 X 24 X 61
Approximate Shipping Weight	160	236

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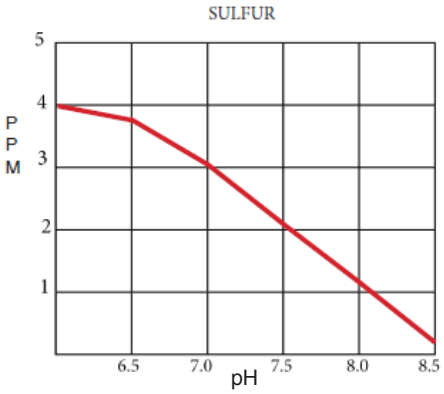
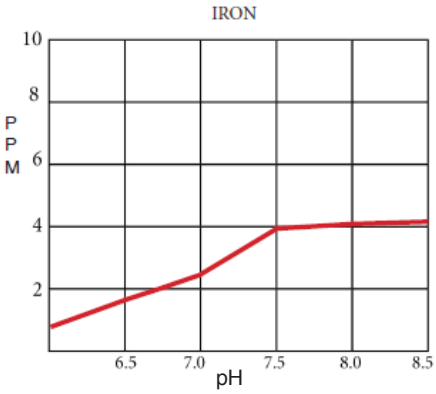
SIDEKICK™ 'S' Single Tank Aeration Filter

Revolutionary Features

- Air is injected into the top of the tank converting ferrous iron to ferric iron after untreated water has passed through the control valve preventing the control valve from fouling with iron
- Signature 3™ Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics an simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Includes meter to provide water usage history
- Air draw cycle can be initiated without a backwash cycle saving 1000's of gallons of water annually
- The control valve slowly releases compressed air charge prior to backwash cycle eliminating the explosive blast that can dislodge the drain line
- Adjustable cycle times
- Proprietary two valve bypass with 1" MNPT Connections
- High Flow 1" distributor
- Catalytic Carbon & KDF cubes for Sulfur Reduction
- Top cap fill opening for ease of service
- Compatible with any type of well pump system





General Specifications	SK15S	SK25S
Filtration Media Capacity (CU. FT.)	1.5 cu. ft.	2.5 cu. ft.
KDF Cubes	1.5 lbs	2.5 lbs
Mineral Tank	10 X 54	13 X 54
Service Flow Rate - Continuous (GPM)	5	8
Service Flow Rate - Intermittent (GPM)	7	10
Backwash Flow Rate (GPM)	5.0	7.0
Gallons Used / Backwash	106	146
Space Required (D x W x H inches)	10 X 21 X 61	13 X 24 X 61
Approximate Shipping Weight	160	236

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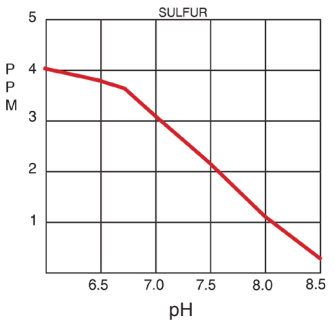
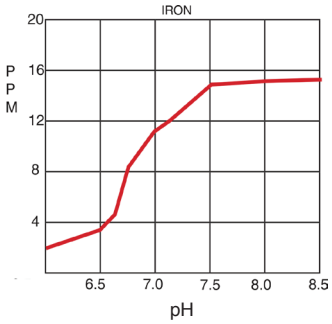
REACTR ™ Treatment System

Features

- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- On demand meter providing data and history
- Adjustable Cycle Times
- High backwash flow capability
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- Features Enpress ® Vortech™ distributor plate

General Specifications	RF15-S3	RF20-S3	RF25-S3	RF30-S3
Filter Media Type	SmartBlend ™			
Filter Media Capacity (cu ft)	1.5	2.0	2.5	3.0
REACTR ™ Tank (polyglass)	10 x 54	10 x 54	10 x 54	16 x 40
Mineral Tanks (Vortech)	10 x 54	12 x 52	13 x 54	13 x 65
Service Flow Rate - Continuous (gpm)	5	6	8	9
Service Flow Rate - Intermittent (gpm)	7	8	10	11
Backwash Flow Rate (gpm)	5.0	6.0	7.0	7.0
Gallons Used / Regeneration	100	120	140	140
Space Required - Filter Tank	10 x 10 x 62	10 x 10 x 62	10 x 10 x 62	16 x 16 x 73
Approximate Shipping Weight (lbs)	165	236	270	311





Manganese Removal	
ReactR ™ capability to remove Manganese from water is critically dependent on the Iron and pH levels as shown below:	
If the Iron to Manganese ration is:	**Then the pH must be at least:**
10:1	7.0
5:1	7.8
1:1	8.3
0:1	8.5

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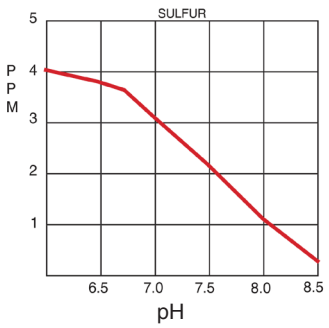
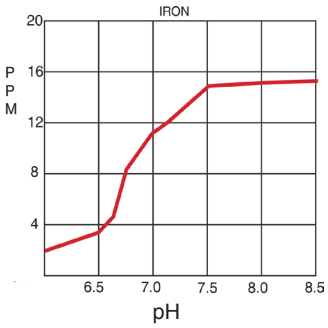
REACTR VS™ Treatment System

Features

- Signature 3 Control Valve with meter for precise compressor control
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Designed for use with constant pressure (variable speed) and jet type pumping systems
- On demand meter for air compressor activation and data / history
- Quiet, high output, oil less air compressor for maximum aeration
- Adjustable Cycle Times
- High backwash flow capability
- Proprietary two valve bypass with 1" MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- Features Enpress ® Vortech™ distributor plate

General Specifications	RF15VS-S3	RF20VS-S3	RF25VS-S3	RF30VS-S3
Filter Media Type	SmartBlend ™			
Filter Media Capacity (cu ft)	1.50	2.00	2.50	3.00
REACTR ™ Tank (polyglass)	10 x 54	10 x 54	10 x 54	16 x 40
Mineral Tank (Vortech ™)	10 x 54	12 x 52	13 x 54	13 x 65
Service Flow Rate - Continuous (gpm)	5	6	8	9
Service Flow Rate - Intermittent (gpm)	7	8	10	11
Backwash Flow Rate (gpm)	5.0	6.0	7.0	7.0
Gallons Used / Backwash	100	120	140	140
Space Required - Filter Tank	10 x 10 x 62	10 x 10 x 62	10 x 10 x 62	16 x 16 x 73
Approximate Shipping Weight (lbs)	175	246	280	321





Manganese Removal	
ReactR ™ capability to remove Manganese from water is critically dependent on the Iron and pH levels as shown below:	
If the Iron to Manganese ration is:	**Then the pH must be at least:**
10:1	7.0
5:1	7.8
1:1	8.3
0:1	8.5

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OXYCLEAN™ Option

REACTR™ Oxyclean Option
OXY-08R

REACTR™ VS Oxyclean Option
OXY-08VS

Features

- Automatically cleans the entire REACTR™ system with every backwash
- Ideal for situations where media bed becomes fouled by high levels of ferric iron, iron or sulfur bacteria* and tannins*
- Installs in minutes
- Can be added to any existing REACTR™ system without changes to the plumbing or electrical wiring
- Effectively uses chlorine* or hydrogen peroxide*
- No pump adjustments required
- No pump check valves to maintain

CSI first introduced the REACTR™, a truly innovative chemical free oxidation system for the reduction of iron, manganese and sulfur gas. Now after extensive research and development CSI is proud to introduce the OXYCLEAN™ Automatic REACTR™ Cleansing System. A system that will enhance the operating performance of a REACTR™ installed on exceptionally poor water quality situations. Situations that are normally tough to handle and require a high level of maintenance can now be solved with the OXYCLEAN™ Automatic Cleansing System. Plugged pipes and fouled media beds can be the result of low levels of iron or sulfur bacteria*, tannins* and high levels of ferric iron. Many times these situations require a messy, time consuming service call. The OXYCLEAN™ Automatic Cleansing System can reduce these types of calls. Installed in minutes the OXYCLEAN™ System will automatically inject chlorine* or hydrogen peroxide* during every backwash to clean the entire REACTR™ system and associated plumbing such as inlet plumbing, tank tees, etc. Every REACTR™ System built has the optional OXYCLEAN™ in mind, installation is easy and can be done during or after installation of the REACTR™ without any changes to the plumbing or electrical wiring. Install the REACTR™ with the OXYCLEAN™ Cleansing System today and reduce those annoying service calls tomorrow.

* Not to be substituted for accepted disinfection techniques for moderate or high levels of these contaminants.

Greensand Plus ™ Filters

Features

- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Includes meter to provide water usage history
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Adjustable Cycle Times
- High Backwash flow capability
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- High Flow 1” distributor
- Features Enpress ® Vortech™ distributor plate
- Includes KMNO4 feed pot with grid platform and float shutoff
- Regenerates with KF02N potassium permanganate

General Specifications	IF10-S3	IF15-S3	IF20-S3	IF25-S3
Filter Media	Greensand Plus ™			
Filter Media Capacity (cu ft)	1.00	1.50	2.00	2.50
Garnet Sand Underbed (lbs)	20	30	50	50
Mineral Tank (Vortech ™)	9 x 48	10 x 54	12 x 52	13 x 54
Potassium Permanganate Solution Tank Size	10 x 16			
Removal Capacities Iron / Sulfur	10 ppm / 3 ppm	10 ppm / 3 ppm	10 ppm / 3 ppm	10 ppm / 3 ppm
Service Flow Rate - Continous (gpm)	4	5	6	8
Service Flow Rate - Intermittent (gpm)	6	7	8	10
Backwash Flow Rate (gpm)	5.0	5.0	6.0	7.0
Gallons Used / Regeneration	128	130	173	193
Space Required	9 x 21 x 57	10 x 22 x 62	13 x 24 x 60	12 x 25 x 62
Approximate Shipping Weight (lbs)	157	215	305	362

Whole House Filter

Features

- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Includes meter to provide water usage history
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Enpress ® Vortech™ distributor plate - provides vigorous backwash with no gravel underbed needed
- Adjustable Cycle Times
- High Backwash flow capability
- Proprietary two valve bypass with 1” MNPT Connections
- Weather / Insect Resistant One-Piece Slide Cover
- Optional dome fill hole and closure
- Optional "natural" color
- No chemical regenerants required

General Specifications	WF10-S3	WF15-S3	WF20-S3	WF25-S3	WF30-S3
Filtration[1]	Less Filter Media				
Filter Media Capacity (cu ft)	1.0	1.5	2.0	2.5	3.0
Mineral Tank (Vortech ™)	9 x 48	10 x 54	12 x 52	13 x 54	13 x 65
Service Flow Rate - Continuous[2] (gpm)	4	5	6	8	9
Service Flow Rate - Intermittent[2] (gpm)	6	7	8	10	11
Backwash Flow Rate[3] (gpm)	5.0	5.0	6.0	7.0	7.0
Gallons Used / Backwash	100	100	120	140	140
Space Required	9 x 9 x 56	10 x 10 x 62	12 x 12 x 60	13 x 13 x 62	14 x 14 x 74
Approximate Shipping Weight (lbs)	27	32	35	40	49

Note 1 - See Filter Media Selection Guide for your filtration application.
Note 2 - Use of a Flow Control in the service line is highly recommended.
Note 3 - Caution should always be used in sizing filters. Always choose a unit by first satisfying the backwash and flow requirement. Consult the factory or your field sales person with questions.

Arsenic / Heavy Metals Filter

Features

- Signature 3 Control Valve
- Legacy View Bluetooth enabled control valve for advanced diagnostics and simplified set up
- Patented NSF Std. 61 validated Titanium Oxide Adsorbent Media for the efficient reduction of both Arsenic III & V
- Includes meter to provide water usage history and totalization
- Proprietary two valve bypass with 1” MNPT Connections
- Simple 9 volt battery back-up keeps electronic meter active and will motor control valve to shut off position if in regeneration during power failure
- Excellent reduction of a wide range of heavy metals including Lead, Cadmium, Copper, Selenium, Uranium, Vanadium & Zinc
- Non-hazardous disposal of media as solid waste - media passes EPA TCLP (Toxicity Characteristic Leach Procedure)
- Higher adsorbent capacity than GFO (Granular Ferric Oxide) & GFH (Granular Ferric Hydroxide)
- Weather / Insect Resistant One-Piece Slide Cover
- Enpress ® Vortech ™ distributor plate for exceptional backwashing capability

General Specifications	WFA10-S3*	WFA20-S3*	WFA30-S3*
Arsenic/Heavy Metals Adsorption Media (cu ft)	1.0	2.0	3.0
Filter Sand Underbedding (lbs.)	10	20	30
Maximum Iron (ppm)	<0.30	<0.30	<0.30
Maximum Manganese (ppm)	< .04	< .04	< .04
Maximum Service Flow Rate	5.0	8.0	11.0
Backwash/Rinse Flow Rate (gpm)	2.0	4.0	5.0
Gallons Used Backwash/Rinse	30	60	75
Mineral Tank (Vortech ™)	9 X 48	12 X 52	13 X 65
Space Required (D X W X H in.)	9 X 9 X 56	12 X 12 X 60	13 X 13 X 74
Approximate Shipping Weight (lbs)	80	140	185

* Please contact the factory for pre-treatment requirements and estimated media capacities per project basis

Upflow Filter

Features

- Bypass with 1” MNPT Connections
- Enpress ® Vortech ™ distributor plate for exceptional backwashing capability
- Optional "natural" color
- Optional dome fill hole and closure
- Simply select and add the desired filter media
- No chemical regenerates required
- Economical alternative in certain applications

General Specifications	U10	U15	U20	U25
Filtration[1]	Less Filter Media			
Filter Media Capacity (cu ft)	1.0	1.5	2.0	2.5
Mineral Tank (Vortech ™)	9 x 48	10 x 54	12 x 52	13 x 54
Service Flow Rate - Continuous[2] (gpm)	4	5	6	8
Service Flow Rate - Intermittent[2] (gpm)	6	7	8	10
Space Required	9 x 9 x 52	10 x 10 x 58	12 x 12 x 56	13 x 13 x 58
Approximate Shipping Weight (lbs)	20	25	30	35

Note 1: See “Filter Media” section for selection of proper media for your filtration application.
Note 2: Use of a flow control in the Service Line is highly recommended.

CSI WATER TREATMENT SYSTEMS

Filter Media Selection Guide

Media	Ship Wt. (lbs)	Description	Handles...	Used in...
SmartBlend ™ SB75 SB10	45 61	Granular / White-Black / Blend of Filter Ag Plus and Katalox Light / Max life expectancy about 8-10 years but is dependent upon water chemistry and usage	Sediment Iron (clear & red) Manganese (clear & red) Sulfur Particles	Nitro Reactr and Sidekick
Neutralizer NE50 NE75 NE10	50 64 85	Granular / White / Sacrificial to water with pH, 7.0 / Max pH correction to 7.2 / Lowest pH application 5.8 / Must be replenished about every 6 months to 1 year	Sediment (downflow) pH correction	WF Filter Upflow and Optimizr
Neu-Cor™ NC75 NC10	62 82	Granular / Semi-round / White & Off-white / 70%-30% Blend of Neutralizer & Corosex® must be replenished on a regular basis since both components are sacrificial to low pH / Use on pH levels as low as 5.0	Sediment (downflow) pH Correction	WF Filter Upflow and Optimizr
Corosex® CX75 CX10	79 103	Semi-round / Off-White / Magnesium Oxide / Extremely reactive to pH dissolving rapidly adding alkalinity / NEVER use 100% Corosex® in a filter as it will "cement"	Sediment (downflow) pH Correction	WF Filter Upflow and Optimizr
Coconut Shell Carbon CN75 CN10	22 30	Black / High carbon-low ash content. Practical for ordinary taste, odor and chrlorine loads. Will impart a high "polish" to the filtered water.	Taste/Odor/Chlorine	WF Filter Upflow and Optimizr
Activated Carbon AC75 AC10	21 28	Granular / Black / Wide application for removal of organics and some inorganics / Must be replaced on a regular basis / Life expectancy varies based on use	Sediment Taste/Odor/Color Chlorine/Iodine	WF Filter Upflow and Optimizr
Catalytic Carbon CC75 CC10	26 34	Granular/Black / enhanced activated carbon that has a higher catalytic power which produces an increased electron transfer for better absorption.	Sulfur Removal Chloramines	WF Filter Nitro and Sidekick City Softener
Filter Ag® FA75 FA10	21 28	Granular / Off-White / Wide application for removal of sediment / Life expectancy is unlimited	Sediment	WF Filter
Filter Ag Plus FP75 FP10	37 50	Light tan to white, 5 micron filtration	Sediment	WF Filter
Katalox Light KL75 KL10	49 66	Granular / Dark Gray / Max iron and Manganese level 10 ppm and H2S 1ppm / Estimated life 8 - 10 years Requires backwashing but not regeneration	Sediment (downflow) Iron (Clear & Red) Manganese (Clear & Red) Sulfur Removal pH Correction	WF Filter Nitro Sidekick Reactr Optimizr
Birm® BM75 BM10	37 29	Granular / Gray / Must not be used on waters with a pH < 6.8 / Must have dissolved oxygen present at a level of at least 15% of iron & manganese ppm / Max iron & manganese level 10 ppm / Estimated life about 8-10 years	Sediment Iron (clear & red) Manganese (clear & red)	WF Filter
Greensand Plus GP75 GP10	63 85	Granular / Black / Must not be used on waters with a pH <6.8 / Must be regenerated with potassium permanganate on a regular basis / Max iron & manganese level 10ppm/ Max H2S level 3ppm / Estimated life about 8-10 years	Sediment Iron (clear & red) Manganese (clear & red) Hydrogen Sulfide	IF Filter
GT10	42	Arsenic Media	Arsenic III and V	WFA Filter
"B" Gravel BG20 BG50	20 50	Semi-Round / Brown / #20 Flint / Used as underbed for all media in all filters providing for excellent flow distribution in both service and backwash modes / Permanent unless fouled but can be cleaned and re-used.	Underbed	All Non-Vortech Filter Tanks

Filter Media and Gravel are shipped in convenient reusable buckets.

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Ultrafilter

Features

- Filtration down to .02 micron - excellent for organic color, tannins, colloidal clay, virus, bacteria & cyst reduction
- Utilizes the Signature Series™ Shuttle Valve System to provide automatic clean water backwash of the UF membranes and tank flushing (a pressure tank with 10-12 gallons draw down is required and is not included)
- Membranes are NSF Standard 61 Certified
- Tank is NSF Standard 44 Certified

General Specifications	UF8C
Micron Rating	.02
Pre-Filtration Required (microns)	<5
Maximum Clear Iron / Manganese (ppm)	0
Service Flow Rate (gpm)	10
Backwash Flow Rate (gpm)	2.0
Gallons Used / Regeneration	10
Space Required	8 x 14 x 56
Approximate Shipping Weight (lbs)	46

Features

- Full flow 1” service lines for Whole House performance of up to 25 gpm
- Longer life and lower pressure drop than traditional 2-½” and 4-½” cartridge filters
- Bypass and Pressure Release Valve allow for quick filter change without removal from plumbing - no tools necessary
- Union connections simplify installation
- Up to 150 psi working pressure
- Top dust Cover Keeps dust and dirt from accumulating and getting inside housing during filter change
- Free Standing - No need for mounting brackets or wall anchoring

Carbon Block Filters

Poly Wound / Melt Blown

Pleated

Carbon Block Filters for Taste/ Odor Removal & Sediment

General Specifications	CT-03-CB	CT-20-CB	CT-03-CB-AMINE
Micron Rating	3	20	3
Treatment Description	Chlorine / Sediment	Chlorine / Sediment	Chlorine / Sediment / Chloramine
Max Flow Rate / psi drop	25 gpm / 4 psi	25 gpm / 3 psi	25 gpm / 4 psi
Estimated Gallon Capacity	250,000 gallons of water @ 15 gpm with greater than 90% reduction, estimated capacity using 2ppm of free chlorine	150,000 gallons of water with 90% reduction using 2.0 ppm free chlorine at 7 gpm.	50,000 gallons of water with 85% reduction of chloramine @ 7 gpm.

Filters for Sediment Removal

General Specifications	CT-2005 - SWMB	CT-2010	CT-1005
Micron Rating	Outer layer 20 / Inner core 5	Outer layer 20 / Inner core 10	Outer layer 10 / Inner Core 5
Treatment Description	Sediment	Sediment	Sediment
Max Flow Rate / psi drop	25 gpm / 4 psi	25 gpm / 4 psi	25 gpm / 4 psi
Surface area vs typical 4.5” x 20” cartridge	2 times as much	6.5 times as much	6.5 times as much
Filter Type	String Wound w/ Melt Blown Core	Dual Gradiant / Double Pleated Polyester	Dual Gradiant / Double Pleated Polyester

Legacy View now comes standard on all Signature Valves

Legacy View makes setting up and monitoring your Chandler Systems water treatment system easier than ever. When used with a Legacy View Valve the user, through the app, can do the following functions:

- Conveniently view all valve settings and status
- Easily change valve settings
- View current water usage information
- Graphically view water usage information
- Start a regeneration or backwash cycle from your phone or tablet
- Set / view the servicing water treatment dealer information
- Better understand how your system is working and understand what settings are for
- Connect to all of your valves in your system (if they are all Legacy View Valves)
- Manage your connection to your valves

Signature 3 Control Valve

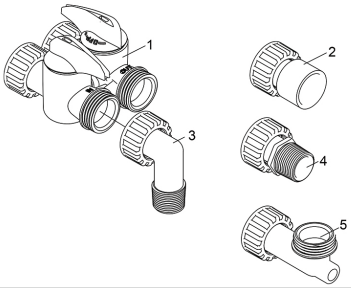
Product Features

- Simple set up through Bluetooth App
- 12 VDC operation
- 5 cycles, all fully adjustable
- Treated Water Refill with pre-brine option
- Programming ease and options increase efficiency, save salt and water
- Strong, durable Noryl® valve body, weather insect resistant one-piece slide cover
- Proprietary two valve bypass with 1” MNPT Connections
- 9V battery back-up
- Will motor to a drain line shut off position if power fails during regeneration
- Switch Output for:
  - -Full Cycle Function
  - -Backwash Function
- Limited 7 year warranty

Optional Configurations

- Backwash filter
- Meter initiated regeneration
- Nitro & Sidekick Single Tank Aeration Systems

Bypass Connector Options



Valve Specifications	
Valve Material	Noryl®*
Inlet / Outlet	1”
Cycles	5
Flow Rates (50 psi inlet) - Valve Alone	
Continuous (15 psi drop)	21 gpm
Peak (25 psi drop)	27 gpm
CV (flow at 1 psi drop)	5.4
Max. backwash (25 psi drop)	17 GPM
Regeneration	
Downflow / Upflow	Downflow
Adjustable Cycles	Yes
Time Available	99 minutes per cycle
Meter Information	
Meter Accuracy Range	.25 - 15 gpm +/- 5%
Meter Capacity Range (gal.)	1 - 9,999
Dimensions	
Distributor Pilot	1.050” O.D.
Drain Line	1/2” NPT Q.C.
Brine Line	3/8”
Mounting Base	2-1/2” - 8 NPSM
Height From Top of Tank	7.7”
Typical Applications	
Water Softener	6” - 16” Diameter up to 4 ft^3 Capacity
Iron Filter	6” - 16” Diameter
Sediment Filter	6” - 16” Diameter
Carbon Filter	6” - 16” Diameter
Neutralizing Filter	6” - 16” Diameter
Additional Information	
Electrical Rating	12 VDC
Pressure	Hydrostatic: 300 psi Working: 20 - 125 psi
Temperature	34 ° - 110 ° F

*Noryl is a registered trademark of General Electric Company

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Signature Duplex Control Valve

Product Features

- Salt and water savings by using 100% capacity of the tank in service, before switching to the second tank
- Regenerates immediately when needed for continuous soft water
- Proven technology and performance
- Corrosion-free Noryl®* valve body
- Most parts common to the Signature Valve
- Simple to service and maintain
- Displays current flow rate
- 9-volt battery back-up will motor valve to shut off position & keeps meter active during power failure
- No time clock to set
- Adjustable cycles

Options

- Noryl® or stainless steel bypass valve

Valve Specifications	
Valve Material	Noryl®*
Inlet / Outlet	3/4” - 1”
Cycles	6
Flow Rates (50 psi inlet) - Valve With Meter	
Continuous (15 psi drop)	8.59 gpm
Peak (25 psi drop)	13.00 gpm
CV (flow at 1 psi drop)	4.01 gpm
Max. backwash (25 psi drop)	8.20 gpm
Regeneration	
Downflow / Upflow	Downflow
Adjustable Cycles	Yes
Meter Information	
Meter Accuracy Range	.25 - 15 gpm +/- 5%
Meter Capacity Range (gal.)	1 - 9,999
Dimensions	
Distributor Pilot	1.050” O.D.
Drain Line	1/2” NPT
Brine Line	3/8”
Mounting Base	2-1/2” - 8 NPSM
Height From Top of Tank	7.7”
Typical Applications	
Water Softener	6” - 12” Diameter
Additional Information	
Electrical Rating	12vdc
Estimated Shipping Weight	12 lbs.
Pressure	Hydrostatic: 300 psi Working: 20 - 125 psi
Temperature	34 ° - 110 ° F

Signature 2 Control Valve

Product Features

- Simple set up through Bluetooth App
- 12 VDC operation
- 5 cycles, all fully adjustable
- Programming ease and options increase efficiency, save salt and water
- Strong, durable Noryl® valve body, weather insect resistant one-piece slide cover
- 9V battery back-up
- Will motor to a drain line shut off position if power fails during regeneration
- Switch Output for:
  - -Full Cycle Function
  - -Backwash Function
- Limited 7 year warranty

Options

- Bypass valve (Noryl® or Stainless Steel)
- Backwash filter
- Meter and time clock initiated regeneration
- Nitro Single Tank Aeration Systems

Valve Specifications	
Valve Material	Noryl®*
Inlet / Outlet	3/4” - 1”
Cycles	5
Flow Rates (50 psi inlet) - Valve Alone	
Continuous (15 psi drop)	21 gpm
Peak (25 psi drop)	27 gpm
CV (flow at 1 psi drop)	5.4
Max. backwash (25 psi drop)	17 GPM
Regeneration	
Downflow / Upflow	Downflow
Adjustable Cycles	Yes
Time Available	99 minutes per cycle
Meter Information	
Meter Accuracy Range	.25 - 15 gpm +/- 5%
Meter Capacity Range (gal.)	1 - 9,999
Dimensions	
Distributor Pilot	1.050” O.D.
Drain Line	1/2” NPT Q.C.
Brine Line	3/8”
Mounting Base	2-1/2” - 8 NPSM
Height From Top of Tank	7.7”
Typical Applications	
Water Softener	6” - 16” Diameter up to 4 ft^3 Capacity
Iron Filter	6” - 16” Diameter
Sediment Filter	6” - 16” Diameter
Carbon Filter	6” - 16” Diameter
Neutralizing Filter	6” - 16” Diameter
Additional Information	
Electrical Rating	12 VDC
Pressure	Hydrostatic: 300 psi Working: 20 - 125 psi
Temperature	34 ° - 110 ° F

*Noryl is a registered trademark of General Electric Company

CSI Water Treatment, 710 Orange Street, Ashland, OH 44805 · Phone 419-281-6829 · 888-363-9434
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Many wells, ponds and other untreated water sources may contain unwanted or harmful organisms. A supply tested drinkable one day, may become contaminated from underground seepage, surface water or ground water fouling from a myriad of sources.
Ultra Violet systems address these concerns without having to add chemicals like chlorine to water or changing its chemical compostion

Water Quality Parameters

UV disinfection is extremely effective against microorganisms but only if the UV light can pass through the water it needs to treat. This means that the quality of your water is very important in order to ensure complete disinfection. Treated water should be tested for at least the parameters listed below. If the water exceeds the listed parameters appropriate pretreatment equipment must be installed (equipment required will depend on parameters being treated):

Hardness: <7 gpg (120 mg/L) – if hardness level is 7 gpg or slightly below the quartz sleeve must be cleaned periodically in order to ensure efficient UV penetration; if above the water should be softened.
Iron (Fe): <0.3 ppm (0.3 mg/L)
Manganese (Mn): <0.05 ppm (0.05 mg/L)
Turbidity: < 1 NTU
Tannins (organics): <0.1 ppm (0.1 mg/L)
UVT (transmittance): >85%

General Specifications	UV6	UV11	UV11D	UV15D
Lamp	UVLMP-6	UVLMP-11	UVLMP-11	UVLMP-15
Sleeve	UVQTZ-6	UVQTZ-11	UVQTZ-11	UVQTZ-15
Max GPM @ 30mj / cm^2	6	11	11	15
Inlet / Outlet	3/4” MNPT	3/4” MNPT	3/4” MNPT	1” MNPT
Chamber	20.5” X 2.5”	35.2” X 2.5”	35.2” X 2.5”	40” X 2.5”
Solenoid	No	No	Optional	Optional
Lamp Out Indicator (audible & visual)	Yes	Yes	Yes	Yes
Lamp Life Countdown	Yes	Yes	Yes	Yes
Digital Display	No	No	Yes	Yes
UV Monitor	No	No	Optional	Optional
Shipping Weight	10 lbs	15 lbs	15 lbs	18 lbs

TFC Reverse Osmosis

Features

All in one simple system that fits under your sink! Treatment of water by reverse osmosis represents a modern breakthrough in water filters. Water is processed at the molecular level, providing you and your family a reliable supply of quality drinking water.

That's why major bottled water companies use this process to filter water prior to bottling. CSI has combined this fantastic reverse osmosis process with quality components to create a compact drinking water appliance that fits neatly under your sink.

General Specifications	TFC3 NSF CERTIFIED	TFC4 NSF CERTIFIED	TFC300
Membrane Rating[1] Production TDS Reduction	41-53 Gallons / Day 96%	41-53 Gallons / Day 96%	41-53 Gallons / Day 96%
System Rating[2] Production TDS Reduction	12 Gallons / Day 95%	12 Gallons / Day 95%	12 Gallons / Day 95%
Input Water Requirements	**TFC3**	**TFC4**	**TFC300**
Water Pressure	40 - 100 psi	40 - 100 psi	40 - 100 psi
Total Dissolved Solids (TDS)	2000 max.	2000 max.	2000 max,
Temperature	40 - 110° F.	40 - 110° F.	40 - 110° F
pH	4 - 11	4 - 11	4 - 11
Maximum Hardness (gpg)	<10	<10	<10
Maximum Iron (ppm)	<.1	<.1	<.1
Maximum Manganese (ppm)	<.05	<.05	<.05
Bacteria	None	None	None
Maximum Hydrogen Sulfide	None	None	None
Tannins	None	None	None
Replacement Components	**TFC3**	**TFC4**	**TFC300**
Sediment / Carbon Prefilter	PRE-GAC	PRE-GAC	PRE-GAC
Membrane	MM-TFC	MM-TFC	MM-TFC
Carbon Postfilter	PST-GAC	PST-GAC	PST-GAC
Carbon Polishing Filter	N/A	M-POL or M-POL-JG	N/A

Note 1: Measured at 65 psi, 77°F, 250 ppm TDS, discharging to atmosphere. Actual system production and contaminant reduction will depend upon water temperature, pressure, pH, and T.D.S. level, membrane variation and usage pattern.
Note 2: Measured at 50 psi, 77°F ±2°, 750 ± 40 mg / LT.D.S

Description	TFC Series
Replacement Membrane	MM-TFC
Replacement Prefilter	PRE-GAC
Replacement Postfilter	PST-GAC
Replacement Polishing Filter (“D” Models Only)	M-POL-JG
Optional Booster Pump Recommended for TDS 800+ or low inlet psi	BP-3

Description	Catalog Number
100” Roll (clear) 1/2” ID Drain Line Tubing for Softeners and Filters	DL-100-C
Potassium Permanganate - Case of 6 / 2# Bottles	KF02N
Media Funnel	U-1006
Res-Care Softener Resin Cleaner-1 Gallon Case of 4	RK128N
Res-Care Kit 64 oz.	RK15
Res-Care 6-pack 64 oz. Kit	RK15K
Res-Care 4-pack 64 oz.	RK64N

Comes Standard with every CSI Softener	
Single Pack	SS1WS
24 Pack	SS24WS

Like millions of people in America, you may have water quality treatment equipment installed in your home. You count on those systems to provide all the benefits of softened water and clean drinking water.

But if your water treatment equipment is not properly sanitized, bacteria can grow and multiply wherever the water sits, including on the inside surfaces of tanks and hoses. When water sits, chlorine levels drop, reducing its chemical ability to prevent bacterial growth. Filters can also filter out chlorine, making the water more susceptible to bacterial growth.

That’s why Water Quality Professionals rely on Sani-System Liquid Sanitizer Concentrate. Specially designed to maintain the quality and performance of water softeners, Sani-System sets the standard for sanitizing.

- Sanitizes in just 60 seconds
- EPA and NSF Certified for use in water softeners

Permanent Sediment Filters

Features

- Economical Alternative to Cartridge Systems
- Reusable Polyester Filter Screen - Standard 100 Mesh
- Centrifuge Spin Down Sediment Separation Technology
- Remove Sediment in Seconds Through Bottom Fitting
- Sediment Visible Through Clear Bowl
- High Service Flow Rate
- Unique Element Design Traps Sediment in Bowl
- All Molded, Non-Corrosive Materials
- Clear Bowl Easily Removed for Total Cleaning
- Clear Sump Removes Without Use of Tools
- Install on Suction or Discharge Side of Pumps
- Screens Available in Sizes From 24 to 1,000 mesh (prices vary)

General Specifications	SS-20100	SS-6060
Application	Sediment Removal	Sediment Removal
Maximum Service Flow Rate (gpm)	20	50
Standard Element Mesh Size	100	60
Optional Mesh Sizes Available	24/30/40/100/140/250/500/1000	24/30/40/100/140/250/500/1000
Plumbing Connection	1” Slip	1.5” Slip
Drain Port Size	1/2” MNPT	1/2” MNPT
Space Required (D x W x H) in inches	3 x 6 x 12	3 x 6 x 13
Approximate Shipping Weight	3 lbs.	3 lbs.

Shark Skin Jacket

- Easy to apply with a quick zip
- No need to remove valve or plumbing
- Insulates tank
- No more condensation
- No more puddles on floor
- Can be applied to most media tank sizes
- Order separately from equipment – Black Color Only

Item Number	Description
SK9J	Shark Skin Jacket for 9 x 48 Tank
SK10J	Shark Skin Jacket for 10 x 54 Tank
SK12J	Shark Skin Jacket for 12 x 52 Tank
SK135J	Shark Skin Jacket for 13 x 54 Tank

REVERE Wireless Low Salt Alarm

Features

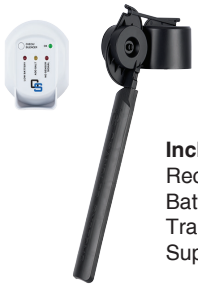
- Notifies you almost anywhere in your home when it's time to add salt
- Installs in minutes onto any 3.5" & 4" Brine Well
- Proprietary paddle design provides the most accurate salt level indication on the market
- Revere Paddle Extender Available
- Patent Pending

Part #R-2014-EXT

Includes:
Receiver w (2) AA Batteries
Transmitter w Power Supply
7" Paddle Extender

Ideal for brine tanks 35"high +

Part #R-2014



Includes:
Receiver w (2) AA Batteries
Transmitter w Power Supply

Ideal for brine tanks 28"-33" high

Field Test Kits

438 Test Kit

Tests for Hardness, pH, Iron, Manganese, Tannin, H2S and TDS

2401 Test Kit

Tests for Hardness, pH and Iron

2059 Test Kit

Tests for Hardness, pH, Iron, Tannin, H2S, Chlorine and Nitrate

K9510 Test Kit

Tests for H2S only

Pocket Meters

pH - Part Number #PPH-1
TDS - Part Number #TDS-4

Arsenic Test Kits

5 Tests - #481297-5
50 Tests - #481297-I

Test Strips

Strips Available to Test the Following:

pH - Part Number 1974

Nitrate / Nitrite - Part Number 2996

Hydrogen Peroxide - Part Number 10254

Manganese - Part Number 481020

Total Hardness - Part Number U1021

Total & Free Chlorine - Part Number U1025

Complete Water Well Testing Kit

Watercheck with Pesticide Option

- Tests for coliform and e-coli bacteria
- Test for 22 heavy metals and minerals (including arsenic)
- Tests for 7 inorganic chemicals, 5 physical factors, 4 trihalomethanes and 47 volation organic chemicals (VOC)
- Tests for 20 additional herbicides and pesticides
- Part Number - WC-9002

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Watercheck with Pesticide Option

Analytes and Minimum Detectable Levels

Parameter	MDL (mg/l)	Parameter	MDL (mg/l)	Parameter	MDL (mg/l)
Bacteria		Organic Chemicals - Trihalomethanes			
Total Coliform and E.Coli	(Presence/Absence)	Bromodichloromethane	0.002	Dichlorodifluoromethane	0.002
Inorganic Chemicals - Metals		Bromoform	0.004	Dichloromethane	0.002
Aluminum	0.1	Chloroform	0.002	Ethylbenzene	0.001
Arsenic	0.005	Dibromochloromethane	0.004	Ethylenedibromide (EDB)	0.001
Barium	0.30	Total THMs	0.002	Methyl Ethyl Ketone	0.010
Cadmium	0.002	Organic Chemicals - Volatiles		Methyl tert-butyl ether	0.004
Calcium	2.0	1,1-Dichloroethene	0.001	Styrene	0.001
Chromium	0.010	1,1-Dichloroethane	0.002	Tetrachloroethene (PCE)	0.002
Copper	0.004	1,1-Dichloropropene	0.002	Tetrahydrofuran	0.010
Iron	0.020	1,2-Dichlorobenzene	0.001	Toluene	0.001
Lead	0.002	1,2-Dichloroethane	0.001	Trans-1,2-Dichloroethene	0.002
Lithium	0.001	1,2-Dichloropropane	0.002	Trans-1,3-Dichloropropene	0.002
Magnesium	0.10	1,3-Dichlorobenzene	0.001	Trichloroethene (TCE)	0.001
Manganese	0.004	1,3-Dichloropropane	0.002	Trichlorofluoromethane	0.002
Mercury	0.001	1,4-Dichlorobenzene	0.001	Vinyl Chloride	0.001
Nickel	0.02	1,1,1-Trichloroethane	0.001	Xylene	0.001
Potassium	1.0	1,1,2-Trichloroethane	0.002	Pesticides, Herbicides and PCBs (Add-on Option)	
Selenium	0.020	1,2,3-Trichlorobenzene	0.002	2,4-D	0.010
Silica	0.1	1,2,3-Trichloropropane	0.002	Alachlor	0.001
Silver	0.002	1,2,4-Trichlorobenzene	0.002	Aldrin	0.002
Sodium	0.1	1,1,1,2-Tetrachloroethane	0.002	Atrazine	0.002
Strontium	0.001	1,1,2,2-Tetrachloroethane	0.002	Chlordane	0.001
Uranium	0.001	2-Chlorotoluene	0.001	Dichloran	0.002
Zinc	0.004	2,2-Dichloropropane	0.002	Dieldrin	0.001
Inorganic Chemicals and Physical Factors		4-Chlorotoluene	0.001	Endrin	0.0001
Alkalinity (Total as CaCO3)	20	Acetone	0.010	Heptachlor	0.0004
Bromide	0.5	Benzene	0.001	Heptachlor Epoxide	0.0001
Chloride	5.0	Bromobenzene	0.002	Hexachlorobenzene	0.0005
Fluoride	0.5	Bromomethane	0.002	Hexachlorocyclopentadiene	0.001
Hardness	10	Carbon Tetrachloride	0.001	Lindane	0.0002
Nitrate as N	0.5	Chlorobenzene	0.001	Methoxychlor	0.002
Nitrite as N	0.5	Chloroethane	0.002	PCBs	0.0005
Orthophosphate	2.0	Chloromethane	0.002	Pentachloronitrobenzene	0.002
pH (Standard Units)	-	Cis-1,2-Dichloroethene	0.002	Silvex (2,4,5-TP)	0.005
Sulfate	5.0	Cis-1,3-Dichloropropene	0.002	Simazine	0.002
Total Dissolved Solids	20	Dibromochloropropane (DBCP)	0.001	Toxaphene	0.001
Turbidity (Turbidity Units)	0.1	Dibromomethane	0.002	Trifluralin	0.002

Note: The Watercheck and Watercheck with Pesticides test packages are intended to be used as informational screening packages and may not be used for regulatory compliance.

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WATER TREATMENT EQUIPMENT

This warranty cannot be transferred - it is extended only to the original purchaser or first user of the product. by accepting and keeping this product, you agree to all of the warranty terms and limitations of liability described below.

Important Warning: Read carefully the CSI Water Treatment Systems Equipment Installation, Operating and Maintenance Instructions Manual to avoid serious personal injury and property HAZARDS and to ensure safe and proper care of this product.

Model Numbers Covered:
Water Softeners, Media Filters and Upflow Filters

*FOR AS LONG AS YOU OWN AND LIVE IN YOUR SINGLE FAMILY HOME, this warranty covers your water treatment equipment, if you are the first user of this CSI Water Treatment Systems equipment and purchased it for single family home use - subject to all of the conditions, limitations and exclusions listed below. Purchasers who buy the CSI Water Treatment Systems equipment for other purposes, and other component parts are subject to more limited warranties and you should read all of the terms included in this form to make sure you understand your warranty.

What is covered by this warranty?
CSI Water Treatment Systems warrants that at the time of manufacture, the water treatment equipment shall be free from defects in material and workmanship as follows:

Product	Warranty
Residential Mineral Tank	10 Years
Proprietary Control Valves	7 Years
Other Softener / Filter Control Valves	5 Years
Brine Tank	5 Years
Residential Reverse Osmosis System	5 Years
Other Accessories and Parts	1 Year
Brine Tank Components	1 Year
REVERE Wireless Low Salt Alarm	90 Days

* This warranty does not include media and/or cartridge filter elements.

Additional Terms & Conditions
What CSI Water Treatment Systems will do if you have a covered warranty claim CSI will at its option either make repairs to correct any defect in material or workmanship or supply and ship either new or used replacement parts or products. CSI will not accept any claims for labor or other costs.

Additional Exclusions and Limitations
This warranty is non-transferable and does not cover any failure or problem unless it was caused solely by a defect in material or workmanship. In addition, this warranty shall not apply:

- If the water treatment equipment is not correctly installed, operated, repaired and maintained as described in the Installation, Operating & Maintenance Instructions Manual provided with the product.
- Defects caused as a direct result of the incoming water quality
- If the tank is not the size indicated for the supply line size of the installation, as described in the manual.
- To any failure or malfunction resulting from abuse (including freezing), improper or negligent; handling, shipping (by anyone
- If the unit has not always been operated within the factory calibrated temperature limits, and at a water pressure not exceeding 125 psi other than CSI), storage, use, operation, accident; or alteration, lightning, flooding or other environmental conditions;
- To any failure or malfunction resulting from failure to keep the unit full of potable water, free to circulate at all times; and with the tank free of damaging water sediment or scale deposits;
- This warranty does not cover labor costs, shipping charges, service charges, delivery expenses, property damage, administrative fees or any costs incurred by the purchaser in removing or reinstalling the water treatment equipment.
- The warranty does not cover any claims submitted to CSI more than 30 days after expiration of the applicable warranty, and does not apply unless prompt notice of any claim is given to an authorized CSI Dealer or to CSI or a designated contractor is provided access to the installation and to the water treatment equipment.

THESE WARRANTIES ARE GIVEN IN LIEU OF ALL OTHER EXPRESS WARRANTIES. NO CSI REPRESENTATIVE OR ANY OTHER PARTY IS AUTHORIZED TO MAKE ANY WARRANTY OTHER THAN THOSE EXPRESSLY CONTAINED IN THIS WARRANTY AGREEMENT.

Additional Warranty Limitations
ANY IMPLIED WARRANTIES THE PURCHASER MAY HAVE, INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, SHALL NOT EXTEND BEYOND THE APPLICABLE TIME PERIODS SPECIFIED ABOVE. Some states do not allow limitations on how long an implied warranty lasts, so the above limitations may not apply to you.

Limitations of Remedies
The remedies contained in this warranty are the purchaser's exclusive remedies. In no circumstances will CSI or the seller of the product be liable for more than, and purchaser-user's remedies shall not exceed, the price paid for the product. In no case shall CSI or seller be liable for any special, incidental, contingent or consequential damages. Special, incidental, contingent and consequential damages for which CSI is not liable include, but are not limited to, inconvenience, loss or damage to property, consequential mold damage, loss of profits, loss of savings or revenue, loss of use of the products or any associated equipment, facilities, buildings or services, downtime, and the claims of third parties including customers. Some states do not allow the exclusion or the limitation of incidental or consequential damages, so the above limitations or exclusion may not apply to you.

What to do if you have a problem covered by this warranty
Any warranty coverage must be authorized by CSI. Contact the person from whom you purchased the product, who must receive authorization from a CSI Dealer.

If your product is new and not used and you wish to return it, contact your CSI Dealer.