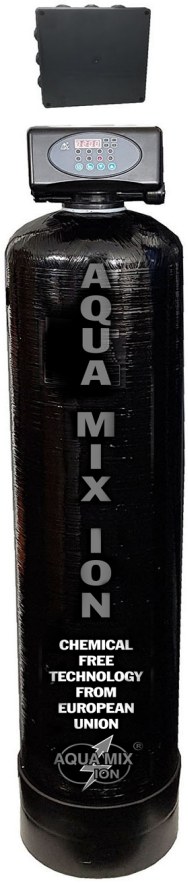
Multi-Functional Reagentless Water Filter System

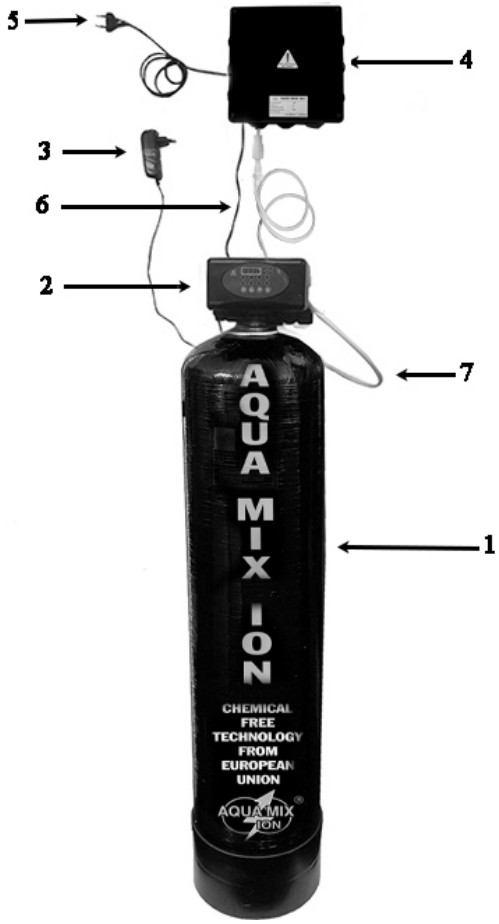
for

Removing dissolved Fe, Mn, Cu, Cd, Co, Ni, Hg, PB, Zn, H2S, hardness



AQUA MIX is Unique filter media, which for the past 11 years has shown the highest performance properties in our reagentless filtration principle. Aqua MIX ION can be used to remove iron from the water for private homes, as well as for office buildings, hotels, industrial plants and many other types of objects. This media is suitable for removing from the water dissolved Fe, Mn, Cu, Cd, Co, Ni, Hg, PB, Zn, H2S and part of the hardness (about 20-35%) as well.
The system has very low power consumption. According with the settings electrical power consumption usually between 2 – 3,5 Kwt per year. The customer expenses is less than 1 euro per year!

PRODUCT PARTS:

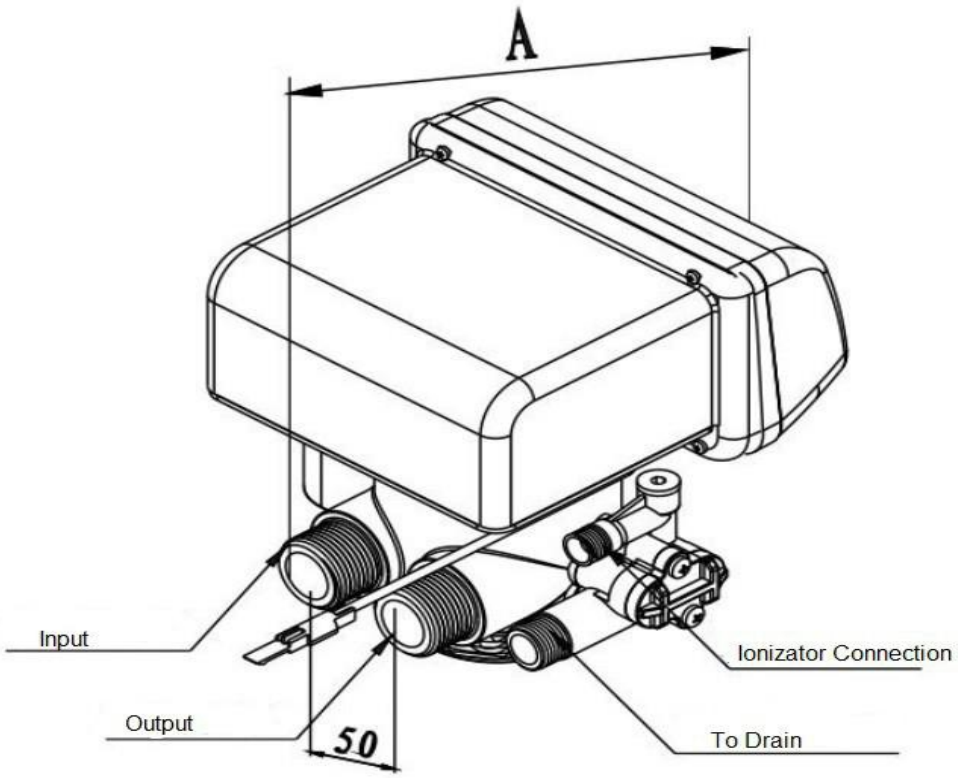


Description	Qunatity (pcs)
Vessel with Aqua Mix media	1
Automatic Control Valve	1
Control Valve transformer	1
Ionizer Box	1
T fitting with connection	1
Tube 3/8 — 0.50 m	1

Technical parameters:

Ionizer Box & Control Valve power supply	AC 220-240 V, 50 Hz
Maximum power consuption during regeneration cycle	0,5 W — 50 W
Typical power consuption during service cycle (filtration)	< 0,5 W
Inlet water pressure during bachwash cycle for AM — 30	not less 3,0 bar
Inlet water pressure during bachwash cycle for AM — 50	not less 3,5 bar
MAximum pressure for AM — 30 and AM — 50	5,5 bar
Ambient temperature	5 — 30 °C
Maximum ambient humidity	75.00%
Ionizet flow rate	see table Nr.1
Water filtration inlet PH range	5,9 and higher
Recommended water filtration inlet PH range for AM — 30	7,0 and higher
Recommended water filtration inlet PH range for AM — 50	5,9 — 7,0
Electric power consumption (per year)	<3,5 Kwt

Schematic installation Manual:



The valve adjustment with AQUA MIX media

We recommended to use our requirements in table Nr.1. However, it possible to change the parameters according with incoming water results.

Table Nr.1. (with Aqua Mix Ion 30)

Vessel diameter Size	9"	10"	12"	13"	14"	16"	18"	21"	24"
Ionizer model	1000/1	1000/1	1000/1	2000/1	2000/1	2000/1	3000/1	3000/1	4000/1
Valve's in-out connections	¾	¾	¾	¾	1”	1”	1”	2”	2”
System flow rate (t/h)	0.8	1.0	1.4	1.7	2.0	2.6	3.3	4.4	5.8
Backwash time (min)	1-5	1-5	1-5	1-5	1-5	1-5	1-5	1-5	1-5
Regeneration time (min)	30	36	50	30	35	35	27	37	36
Tank refill time (min)	0	0	0	0	0	0	0	0	0
Rinse time (min)	1-2	1-2	1-2	1-2	1-2	1-2	1-2	1-2	1-2

The rinse time is very important. It can reduce working value if the concentration of water pollution is too high. The higher concentration is so the shorter rinse time should be.
If the result will not satisfy the requirements of the iron and others elements levels' by adding the regular day, it will be necessary to adjust period of time which was fixed before the requirements' degradation. The degradation of the iron results, in example, it means the result from 0,05 — 0,10 and degraded to 0,10 – 0,15 mg/lit. The standard for the iron level is 0,05 – 0,10.
The regeneration will happen automatically with use of Ionizer power. In fact, just the water for backwash cycle will be a consumable material.
Thus we can recommend to adjust the regeneration more often, and after the water test if the result will satisfy, to adjust data by the adding one by one day and to decrease the regeneration frequency.

Systems' parameters settings

AM Ion 10			PH>6,7		Vreg = Z x V am10 / 2.0 x K met				
vessel size	Volume AM	Service flow	Min BW flow	Min BW pressure	Min valve flow	Ionizer	Back Wash	Regeneration	Direct flush
948	30 Lit	1.2 m.cub/h	1.3 m.cub/h	2.6 Bar	2.0 m.cub/h	1000/1	1-5 Min	30 Min	1-2 Min
1044	33 Lit	1.5 m.cub/h	1.6 m.cub/h	2.6 Bar	2.0 m.cub/h	1000/1	1-5 Min	36 Min	1-2 Min
1144	40 Lit	1.8 m.cub/h	2.0 m.cub/h	2.6 Bar	2.0 m.cub/h	1000/1	1-5 Min	43 Min	1-2 Min
1248	53 Lit	2.1 m.cub/h	2.3 m.cub/h	2.6 Bar	3.0 m.cub/h	1000/1	1-5 Min	50 Min	1-2 Min
1348	62 Lit	2.5 m.cub/h	2.7 m.cub/h	2.6 Bar	3.0 m.cub/h	2000/1	1-5 Min	30 Min	1-2 Min
1465	99 Lit	2.9 m.cub/h	3.2 m.cub/h	2.6 Bar	4.0 m.cub/h	2000/1	1-5 Min	35 Min	1-2 Min

AM Ion 20			PH>6,5		Vreg = Z x V am20 / 1.6 x K met				
vessel size	Volume AM	Service flow	Min BW flow	Min BW pressure	Min valve flow	Ionizer	Back Wash	Regeneration	Direct flush
948	30 Lit	0.9 m.cub/h	1.5 m.cub/h	2.8 Bar	2.0 m.cub/h	1000/1	1-5 Min	30 Min	1-2 Min
1044	33 Lit	1.2 m.cub/h	1.8 m.cub/h	2.8 Bar	2.0 m.cub/h	1000/1	1-5 Min	36 Min	1-2 Min
1144	40 Lit	1.4 m.cub/h	2.2 m.cub/h	2.8 Bar	3.0 m.cub/h	1000/1	1-5 Min	43 Min	1-2 Min
1248	53 Lit	1.7 m.cub/h	2.6 m.cub/h	2.8 Bar	3.0 m.cub/h	1000/1	1-5 Min	50 Min	1-2 Min
1348	62 Lit	2.0 m.cub/h	3.1 m.cub/h	2.8 Bar	4.0 m.cub/h	2000/1	1-5 Min	30 Min	1-2 Min
1465	99 Lit	2.4 m.cub/h	3.6 m.cub/h	2.8 Bar	4.0 m.cub/h	2000/1	1-5 Min	35 Min	1-2 Min

AM Ion 30			PH>6,3		Vreg = Z x V am30 / 1.2 x K met				
vessel size	Volume AM	Service flow	Min BW flow	Min BW pressure	Min valve flow	Ionizer	Back Wash	Regeneration	Direct flush
948	30 Lit	0.9 m.cub/h	1.6 m.cub/h	3.0 Bar	2.0 m.cub/h	1000/1	1-5 Min	30 Min	1-2 Min
1044	33 Lit	1.0 m.cub/h	2.0 m.cub/h	3.0 Bar	2.0 m.cub/h	1000/1	1-5 Min	36 Min	1-2 Min
1144	40 Lit	1.2 m.cub/h	2.4 m.cub/h	3.0 Bar	3.0 m.cub/h	1000/1	1-5 Min	43 Min	1-2 Min
1248	53 Lit	1.4 m.cub/h	2.9 m.cub/h	3.0 Bar	3.0 m.cub/h	1000/1	1-5 Min	50 Min	1-2 Min
1348	62 Lit	1.7 m.cub/h	3.4 m.cub/h	3.0 Bar	4.0 m.cub/h	2000/1	1-5 Min	30 Min	1-2 Min
1465	99 Lit	2.0 m.cub/h	4.0 m.cub/h	3.0 Bar	4.0 m.cub/h	2000/1	1-5 Min	35 Min	1-2 Min

The variable units in the formula for calculating the frequency of regeneration AQUA MIX 10 , AQUA MIX ION 20 and AQUA MIX 30 in the table above are:

Vreg - volume of water between regenerations in m3 (intervals between regeneration in cubic meters)
V am10, V am20, V am30 – volume of the Aqua Mix media in litters
K met - the total concentration of heavy and non-ferrous metals MGR/LIT (milligrams / litter)
Z – water polution factor

How to set the system Aqua Mix Ion per day according with water volume?
The usual family use about 0,5m3 of water per day. It means, if regeneration, in example, should be after 2,3m3 of water, so the valve needed to program for every 4 days.
Example, 2,3 m3 / 0,5 m3 = 4,6 days
It's should be round down and the result will be – 4.
It's means, that 4 days between regenerations will be equal of 2,3 m3 of water pass.

The are some samples of the media usage in reality:

1. AQUA MIX ION 30 tests with water PH>7:

Vessel 1035 with AQUA MIX-30 and ionizer 500/3	**PH**	**Fe**	**Mn**	**Met**	**NTU**	**TDS**	**HARD**
Water test results before filter system	7,4	8,7	1,1	1,5	24	395	10,7
Water test results after 2,1 m3 with Aqua Mix 30	7,5	0,2	0,15	0,2	5	390	8
Water test results after 2,5 m3 with Aqua Mix 30	7,5	0,15	0,08	0,1	5	385	8

Met - means the amount of heavy non-ferrous metals, such as:
Co - Cobalt
Zn - Zinc
Cd - Cadmium
NI - Nickel
Pb -Lead
Hg – Mercury

2. AQUA MIX ION 50 tests with water PH<7:
3.

Test of vessel 2162 (130 Lit) with AQUA MIX-50	**PH**	**Fe**	**Mn**	**Met**	**NTU**	**TDS**	**HARD**
Water test results before filter system	6.4	31.2	1.82	1.72	48	488	0.9
Water test results after 3,5 m3 with Aqua Mix 50 and ionizer 2000/8	6.7	1.1	0.4	0.7	16	489	0.1

WATER FLOW SYSTEM REQUIREMENTS

System water flow capacity with Aqua Mix Ion 30					
Vessel Ø (inch)	**Max.Vessel Water Flow (m3/h)**	**Valve water flow (m3/h)**	**Ionizer model**	**Recommended working time (minutes)**	**Rated water flow (m3/h)**
8"	1.0	2.0	500 / 1000	32/16	0.65
9"	1.25	2.0	500 / 1000	40 / 30	0.90
10"	1.5	2.0	1000	36	1.00
12"	2.2	3.0	1000	43	1.40
13"	2.55	4.0	1000 / 2000	40 / 30	1.70
14"	3.0	4.0	2000	35	2.00
16"	3.9	5.0	2000	35	2.55
18"	5.0	8.0	2000 / 3000	40 / 27	3.25
21"	6.7	10.0	3000	37	4.40
24"	8.8	18.0	4000	36	5.80
30"	13.7	18.0	6000	38	9.00
36"	19.7	30.0	9000	40	13.00
48"	35.0	50.0	18000	40	23.00
60"	54.5	50.0	27000	40	36.00

Inlet water pressure must be no less than 3,0 bar for **Aqua Mix Ion 30** and not less than 3,5 bar for **Aqua Mix Ion 50**. The Rated (nominal) water flow means that the system with Aqua Mix Ion will provide a required water filtration during all process of the system. The rated water is not a maximal flow rate and it can be bigger up to 1,5 times depending on water analysis.
The pressure should be not less 4.5 bar during backwash cycle for the vessel 60”.

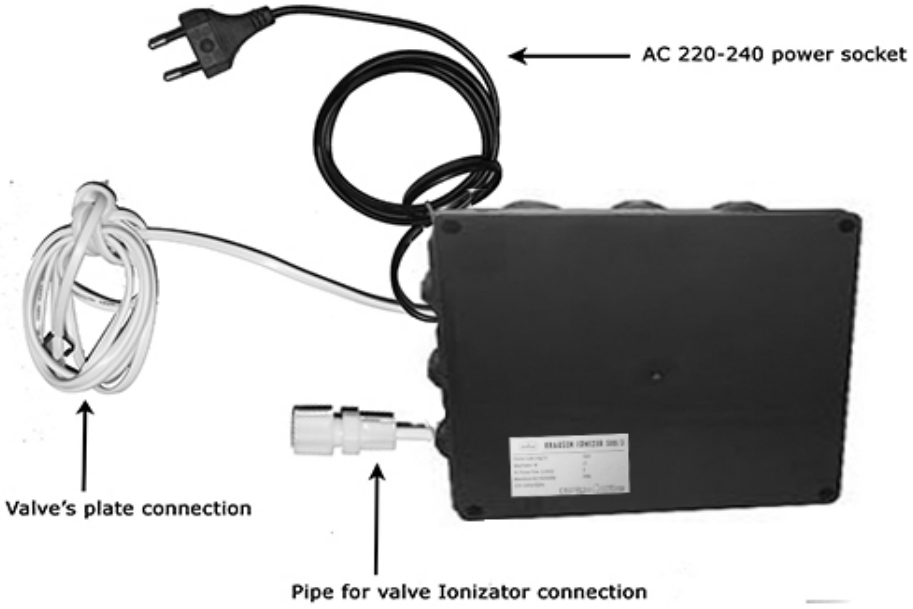
The recommendations for valve capacity according with size of the vessel:

Vessel (inch)	**Valve capacity (m2/h)**
7"-11"	2
12"-16"	4
18"-24"	10
30"	18
36"	20

Ionizer Installation

!!!Please read and check it carefully!!!

Picture Nr.1



GENERAL REQUIREMENTS

!!! The water system with Ionizer unit should be kept away the heater, located only indoor in the dry place with air humidity no more than 75% and the constant temperature above 5 degrees. !!!

!!! The Ionizer should be situated higher than the valve of the system for about 40 cm and higher if the ceiling in the room has such possibility. !!!

!!! The ionizer tube connection must be downwards!!!

!!! The water filter should be situated close to drain.!!!

FILTER SYSTEM INSTALLATION

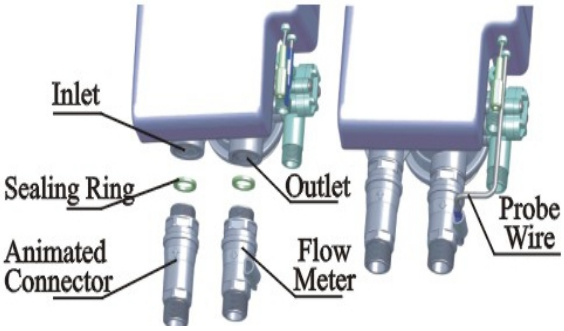
The installation of the system: Ionizer unit, iron removal system should be accomplished by professional to be sure the product can operate normally.
Perform installation according to the relative pipeline regulations and specifications of water inlet, water outlet and drain outlet.

1) Connect 3 check valves for inlet, outlet and drain connection (if equipped).

Picture Nr.2

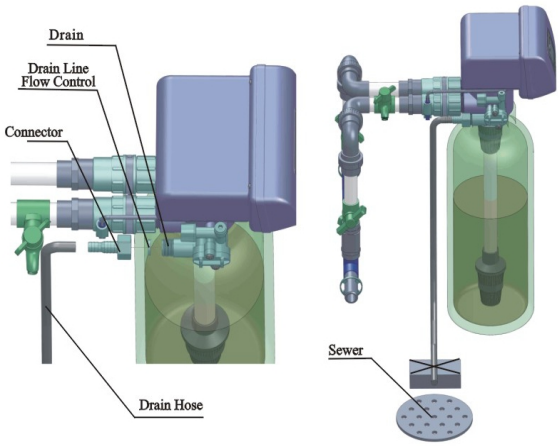
3) Install the connections of the valve: animated connectors or by pass (if equipped).

Picture Nr.3

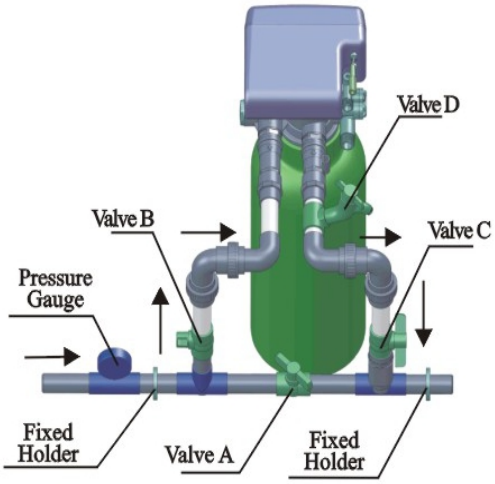


4) Install the water pipeline connections. Connect the valve to inlet, outlet water and drain connections.

Picture Nr.4



Picture Nr.5



The requirements for Filter system Aqua Mix connection to the drain:

- the distance between Control valve and drain pipe no more than 2,5 meters.
- the length of the drain pipe, which go out from the control valve to the drain should not exceed 0,5 m and transformed to the lager diameter in 2-3 times.
- It's recommended to install the check valve for drain tube to protect automatic control valve from incoming drain water from the main drain system.
- It's recommended to install the check valves for inlet&outlet ports to prevent a possible water slug to the automatic control valve.
- the inside diameter for outgoing drain pipe (drain hose) of the control valve :

- for the control valve 2 m3/h is not less than 16 mm
- for the control valve 4,5 m3/h is not less than 25 mm
- for the control valve 10 m3/h is not less than 32 mm

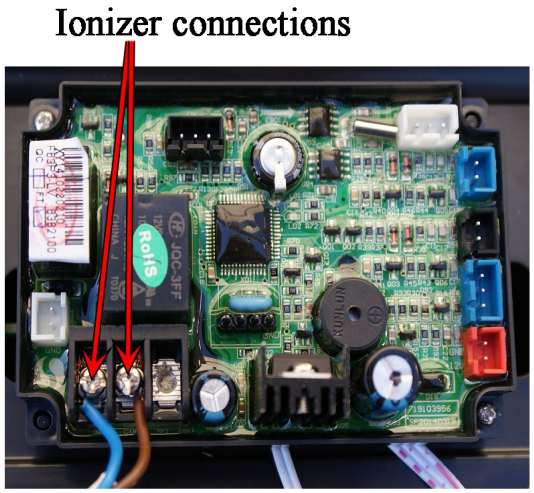
- the diameter of drain pipe after drain hose should be not less than 50mm.
- the drain pipe with diameter 50mm should be no longer 4-6 meters and transformed to the drain pipe 100mm after that.

5) Install the Ionizer Box on the wall as higher as possible than the water system, about 40 sm and higher. Connect the pipe 3/8 between the valve and ionizer box.
!!! The ionizer tube connection must be downwards!!!

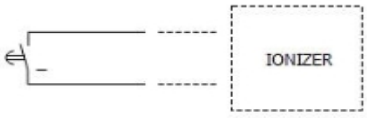
Picture 6.

7) Connect the wire of Ionizer to the valve's plate.

Picture Nr.7



Picture Nr.8

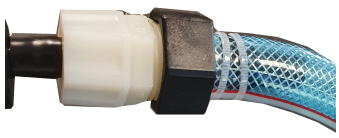


8) Connect the pipe 3/8 from Ionizer box to “T” fitting and “T” fitting to control valve as on the picture below.

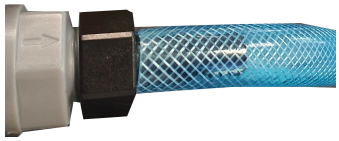
Picture Nr.9

Picture Nr.10

9) Connect 2 drain hoses. One to automatic control valves line and second to ionizer line.



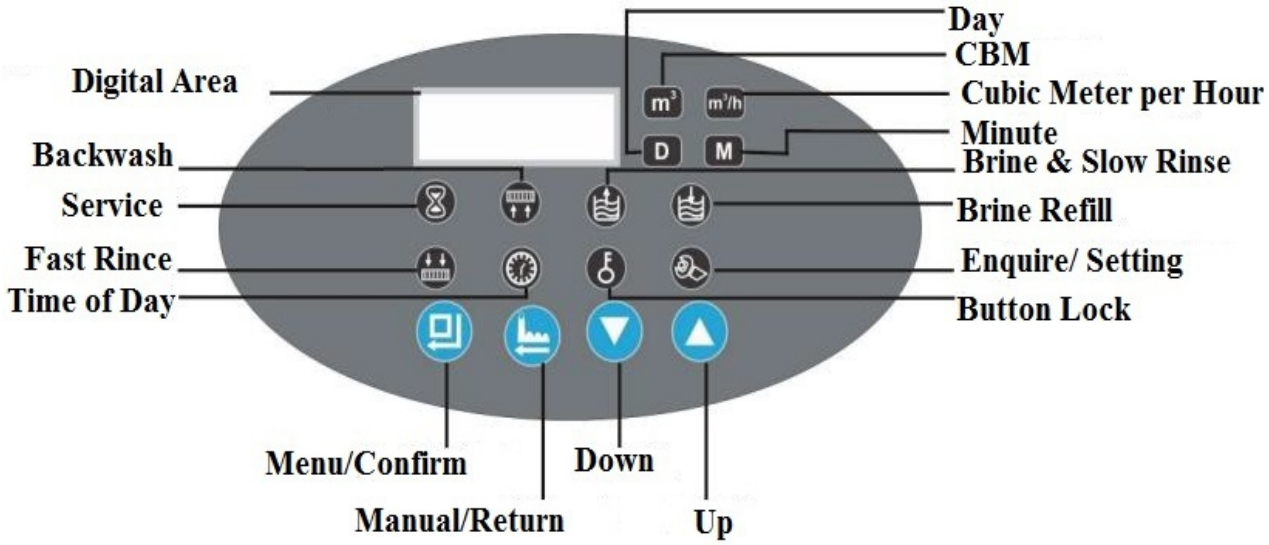
Picture Nr.11



10) Connect the transformer of the system's valve to power socket. The water system valve will make 1 cycle.

11) According with requirements input all data to PC board, such as: current time, regeneration time, cycles time. See section BASIC SETTINGS.

Picture Nr.12



12) The 4th cycle – tank refill - put in 0, 00:00 .
Some models have a default seting 00:00 already.

BASIC SETTINGS

Table Nr.2

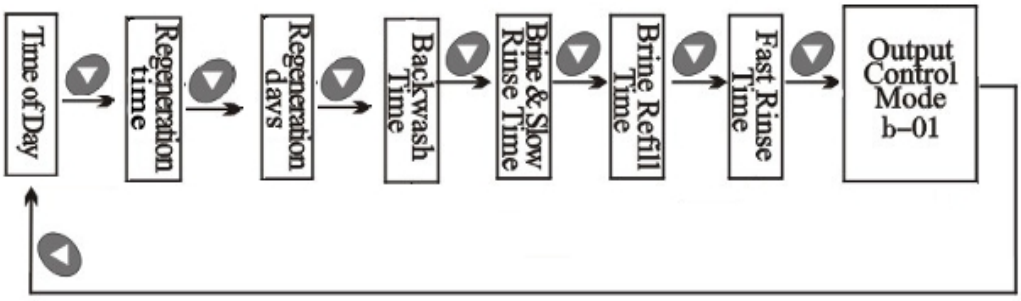
Function	Indicators	Default	Parameter Set Range	Instruction
Time of day		Random	00:00~23:59	Set the time of day when use, «:» flash
Service Days		1-03 D	0~99 Days	Regeneration by days
Regeneration Time	02:00	02:00	00:00~23:59	Regeneration time; « : » light on
Backwash Time		10 min	0~99:59	Backwash time in minutes
Brine & Slow Rinse Time		60 min	0~99:59	Brine&Slow rinse time in minutes
Brine Refill Time		5 min	0~99:59	Brine Refill time in minutes
Fast Rinse Time		10 min	0~99:59	Fast Rinse time in minutes
Output Control Mode	b-01	01	01 or 02	Mode b-01: The signal turn on in start of regeneration and turn off at the end of regenration. Mode b-02: The signal turn on only in intervals of regeneration cycles and in service.

When light on, press and hold both and for 5 seconds to lift the button lock statues.

Then press and light on, enter to program display mode.

Press or to view each value according to below process.

Press exit and turn back to service status.



Control valve parameter settings example.

Items	Process steps	Symbol
Time of Day	When time of day "12:12" continuously flash, it reminds to reset; 1. Press to enter into program display mode; both and "" symbol light on, ":" flicker; Press , both and hour value flash, through or to adjust the hour value; 2. Press again, both and minute value flash, through or to adjust the minute value; 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Regeneration Time	1.In regeneration time display status, it shows 02:00 Press and enter into program set mode. And 02 flash; Press or to adjust the hour value; 2. Press again, and 00 flash, press or to adjust the minute value; 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Service Days	1. In water treatment capacity display status, it shows and 1-03 . Press and enter into program set mode. And 03 flash; 2. Press or to adjust the water treatment capacity value (D); 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Backwash Time	1. In backwash time display status, it shows and 2-10:00. Press and enter into program set mode. and 10:00 flash; 2. Press or to adjust the backwash time (minute); 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Brine& Slow Rinse Time	1. In brine& slow rinse time display status, it shows and 3-60:00. Press and enter into program set mode. and 60:00 flash; 2. Press or to adjust the brine time(minute); 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	

Table Nr.3

Brine Refill Time	1. In brine refill time display status, it shows and 4-05:00, Press and enter into program set mode. And 05:00 flash; 2. Press or to modify the brine refill time to 00:00 (minute); 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Fast Rinse Time	1. In fast rinse time display status, it shows and 5-10:00. Press and enter into program set mode. And 10:00 flash; 2. Press or to adjust the fast rinse time (minute); 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	
Signal Output Mode	1. In signal output mode display status, it shows b-01. Press and enter into program set mode. and 01flash; 2. Press or to adjust the b-01; 3. Press and hear a sound "Di", then finish adjustment, press to turn back.	

WATER FILTRATION SYSTEM TRIAL RUNNIG

1) Make the system connection according with FILTER SYSTEM INSTALLATION requirements.
2) Connect the control valve to power supply. The Control valve will start to work and will stop in the right position in 30 seconds.
3) Unlock the PC board by pushing 2 buttons "Up and Down" for 5 sec.
4) Make the filter control valve programming according with Your water requirements.
5) The system PC board should be in Service position.
6) Open the water pass valve (A) to input water inside the system, Picture Nr.5.
7) Disconnect the pipe 3/8 from the Ionizer Box. Pipe between system's valve and Ionizer box. Put pipe to the drain to make a test.
8) Unlock the PC board by pushing 2 buttons "Up and Down" for 5 sec.
9) Push the button "Manual" twice, to put valve in "Brine & Slow Rinse". Some little quantity of the water could be go out via pipe 3/8 during cycles' changes process.
10) Check the system suction process, put the finger on pipe 3/8 end. If there is a suction everything working right. If there is no water or water come out via pipe it's wrong. It could be problem with inlet pressure or system's distributors (top and down) could be closed by media or something else during transportation.
!!! If there is no suction in "Brine & Slow Rinse" cycle it's forbidden to connect Ionizer Box to the water system !!!
11) Connect Ionizer Box to power supply. The Box should start to work. Please, note, when the valve situated in "Brine & Slow Rinse" cycle, the Ionizer Box will start to work with the delay about 7 sec. The some little smell air will start to come our from Ionizer Box.
!!!Do not breathe of the air, which come our from the Ionizer Box, it's could be dangerous for lungs!!!
12) Push the button "Manual" to put valve in Service position. Some little quantity of the water could be go out via pipe 3/8 during cycles' changes process.
13) Connect the pipe 3/8 back to the water system valve.

14) If there is no any leakage You must **start the full cycle of regeneration process.** It's important to make a regeneration from the beginning. The regeneration will flush the system from the dust particles, enrich and charge the filter media by the ions, place the media in right condition after system transportation.
!!! Don't forget to program “Brine Refill” cycle to 00:00.!!!

WATER FILTRATION SYSTEM FIRST START

1) If everything is ok, please, **make a system's media flushing**. Unlock the PC board by pushing 2 buttons “Up and Down” for 5 sec.
2) Put the control valve in “Backwash” position for 2 minutes by pushing “Manual” button.
3) After that put the control valve in “Rinse” position for 1 minutes by pushing “Manual” button. The water, which goes to drain has a black color.
4) Repeat these steps → “Backwash and Rinse” few times till the moment when water, which went to drain has a normal color (like inlet water).
5) At the end, put the control valve in “Service” position by pushing “Manual” button.

!!! Please, remember that the system must proceed to full regeneration process before usage !!!

ATTENTIONS:
1. AQUA MIX ION should be in installed in room with goods ventilation;
2. The additional ventilation required;
3. The supplier denied to open the AQUA MIX ION;
4. It's forbidden to situated alone children, people after 70 years old and for person with psychological problems in closed room with working AQUAMIX ION.
5. If you think that something happens with your AQUA MIX ION system, please make next steps:
   - Turn OFF the AQUA MIX ION from the electricity.
   - Open the window;
   - Call to certified service center;
   - Don't make any repairing by yourself;

ATTENTION!!! AQUA MIX ION suitable for preparing the Perfect quality technical water(for bath, boilers and etc.), if you need High quality drinking water, please choose one of the KRAUSEN REVERSE OSMOSIS SYSTEMS.

The manufacturer reserves the right to make any changes to the design, form, colour, specification and service without inform purchaser about it. The illustrations may show accessories, items of optional equipment or other features which are not part of the standard specification.
We strongly recommend to install the equipment only by professionals from the seller's side.

THE MAIN CERTIFICATES FOR AQUA MIX ION

HYGIENIC CERTIFICATE for FRP tanks, which we use in **AQUA MIX ION** systems.

CARSO - LABORATOIRE SANTÉ ENVIRONNEMENT HYGIÈNE DE LYON

Laboratoire Agréé pour les analyses d'eaux par le Ministère de la Santé

ANNEXE à l'ACS 14 ACC LY 046

Réservoirs Pression pour Adoucisseurs couverts par l'ACS 14 ACC LY 046

05×17	08×24	10×16	12×17 (2.5")	16×24 (2.5")
05×20	08×26	10×17	12×17 (4")	16×24 (4")
06×13	08×30	10×17D	12×48 (2.5")	16×36 (2.5")
06×17	08×35	10x18	12×48 (4")	16×36 (4")
06×18	08×44	10x19	12×48 DH	16×44 (2.5")
06×22	09×13	10×24	12×52 (2.5")	16×44 (4")
06×35	09×15	10×26	12×52 (4")	16×52 (2.5")
07×13	09x16	10×30	12×52 DH	16×52 (4")
07×17	09×17	10x32	13×44 (2.5")	16×65 (2.5")
07×19	09×18	10×35	13×44(4")	16×65 (4")
07×22	09×22	10×35D	13×44 DH	18×36 (4")
07×30	09×24	10×35 DH	13×54 (2.5")	18×53 (4")
07×35	09×26	10×40	13×54 (4")	18×65 (4")
07×44	09×30	10×44	13×54 DH	18x65D (4"-4")
08×13	09×32	10×44 DH	14×52 (2.5")	21×36 (4")
08×13D	09×35	10×47	14×52 (4")	21×53 (4")
08×15	09×42	10×54	14×52 DH	21×62 (4")
08×17	09×48	10×54 DH	14×65 (2.5")	21x62D (4"-4")
08×18	10×13	11×35	14×65 (4")	24x38 (4")
08×22	10×15	11×44	14×65 DH	24x38D (4"-4")
				24×72 (4")
				24x72D (4"-4")

Christelle AUTUGELLE
Responsable Laboratoire MCDE

Signature :

A la date du : 04 Avril 2014

SAS au capital de 2 283 622 Euros - RCS Lyon B 410 545 313 - SIRET 410 545 313 00018 - APE 743 B - N° TVA : FR 82 410 545 313
Siège Social : 321, avenue Jean Jaurès - F - 69362 LYON cedex 07 - Tél. : (33) 04 72 76 16 16 - Fax : (33) 04 78 72 12 11

“KRAUSENS BALTIJA” SIA

PVN № 50003393971
Ofiss : Bauskas 20, LV-1004, Rīga
Fakss. +371-67606737, Tālr. +371-67621791
E-mail: jen@krausen.lv
Web site: www.krausen.lv

CE Declaration of Conformity

KRAUSENs Baltija Ltd

01.01.2018

Declares that the product:

Product Name:	IONIZER
Model numbers:	500/1, 500/2, 1000/1, 1000/2, 2000/1, 2000/2, 4000/1, 4000/2, 6000/1, 6000/2, 12000/1, 12000/2, 18000/1, 18000/2
	Conforms to the following products Specifications:
EMC:	2006/95/EC Low Voltage Directive and 2004/108/EC/ Electromagnetic Compatibility Directive
Standards:	EN 55014-1:2006 EN 61000-3-2:2006 EN 61000-3-3:1995+A1:2001+A2:2005 EN 55014-2:1997+A1:2001 EN 60335-2-65:2003+A1:2008 EN 60335-1:2002+A2:2006 EN 62233:2008

Certificate of Conformity of EU Directive for Multi-Functional Valves for **AQUA MIX ION.**

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E-mail: jen@krausen.lv
Web site: www.krausen.lv

Certificate of Conformity

01.01.2017

Declares that the product:

Product Name:	Multi - functional flow Control Valve for Water Treatment Systems
Model numbers:	F63P1-AL;F63P3-AL; F69P1-AL; F69P3-AL; F77A1-AL;F77A3-AL;F74A1-AL, F77A1-AL;F96A3-AL;F112A3-AL;
	Conforms to the following products Specifications:
EMC&LVD:	89/336/EEC; 92/31/EC; 93/68/EEC;2004/108/EC; 87/404/EEC;90/488/EEC
Standards:	EN 61000-6-1:2007, EN-61000-6-3+A1:2011
Test by:	CELAB, Via Maira snc 04100 Latina Italy

Material Safety Data Sheet for **AQUA MIX 30.**

Material Safety Data Sheet

KRAUSENS BALTIJA LTD

(in compliance with Regulation(EU) 1272/2008)

This documents is prepared pursuant to the OSHA Hazard Communication Standard. In addition, other substances not 'Hazardous' per this OSHA Standard may be listed. Where proprietary ingredient shows, the identity may be made available as provided in this standard.

Product Name	AQUA MIX 30 Natural Material

SECTION 1 Contact Information

"KRAUSENS BALTIJA" SIA
VAT № LV50003393971
Legal Address: Valdeķu 52/3-27, Rīga, Latvia, LV-1058

Phone.: +371-29509097
E-mail: jen@krausen.lv
Web site: www.krausen.lv

Hazard Rating		Scale
Toxicity	0	4 = Extreme
Fire	0	3 = High
Reactivity	0	2 = Moderate
Special	N/A	1 = Sight
Date Prepared	January 2017	0 = Insignificant

SECTION 2 Ingredients/Identity Information

Components(Specific Chemical Identity:	Silicon Oxide-62% Manganeese Dioxide- 12% Aluminic Oxide-11% Ferrum - 4% and mineral compounds of natural origin

SECTION 3 Hazards Identification

Hazards identification:	This product does not meet the criteria for slassification as hazardous as defined in Directive 67/548/EEC Directive 67/548/EEC: No classification Contact with particulate may cause moderate eye irritation. Abrasive action of the dust can cause eye damage. Prolonged or repeated skin contact may cause moderate irritation. Inhalation of airborne particulate and dust is irritating to the nose, throat and respiratory tract. Inhalation of excessive levels of dust may be harmful

SECTION 4 First-aid Measures

Eyes: Irrigate immediately with water for at least 5minutes. Mechanical irritation only. Drink plenty of water and contact a Doctor if irritation develops. DO NOT induce vomiting.
Skin: No adverse effects anticipated by this route of exposure. If skin contact occurs, remove contaminated clothing and wash skin thoroughly with soap and water.
Ingestion: No adverse effects anticipated by this route of exposure incidental to proper industrial handling.
Inhalation: No adverse effects anticipated by this route of exposure. Move to fresh air. Monitor for respiratory distress. Seek medical attention if irritation occurs.

SECTION 5 Fire-fighting measures

Extinguishing media: Water, Talc, Dry Chemical, Non- flammable does not support combustion of other Materials, and will not cause dust explosions.
Special Fire Fighting Procedures: MSHA/NIOSH approved self-contained breathing gear.
Firemen have to wear self-contained breathing apparatus.

SECTION 6 Accidental release measures

Take up mechanically, fill into labelled, closable containers. Spilled product causes a risk of slipping. Prevent entering sewer, stormwater drains or waterways. Avoid creating dust wet media or use vacuum to remove spill.

SECTION 7 Storage

Storage: Store in a cool dry place

SECTION 8 Exposure controls/Personal protection

Respiratory protection:	Not required for normal uses
Eye protection:	Splash goggles
Ventilation:	Normal
Protective Gloves:	Not required.

SECTION 9 Physical/Chemcial properties

Boiling Point:	Not Applicable
Vapor Pressure (MM HG):	Not Applicable
Evaporation Rate (water = 1):	1
Appearance & Odor:	Orange and Brown part, Black granules, sand-like in appearance, no odour
Melting Point (deg. F)	> 1000 Degrees Celsius
Solubility in Water:	Insoluble

SECTION 10 Stability

Stability:	Stable

SECTION 11 Toxicological information

Emergency First Aid Procedures: Contact with eyes can and skins can cause irritation.
Carcinogenicity: Not Applicable
All ingredients are non-hazardous

SECTION 12 Ecological information

The product is insoluble in water. Therefore, ecological tests have not been conducted.
Water pollution class: 1 – slightly hazardous to water.

SECTION 13 Transport information

Declaration for land shipment: --
Declaration for sea shipment: --
Deceleration for shipment by air: --
Other information:
Not dangerous cargo. Avoid temperatures below –20℃。Avoid heat above +40℃.
Keep separated from foodstuffs.

SECTION 14 Regulatory information

The information here in is presented in good faith and believed to be accurate as of the effective date shown above. However, no warranty, express or implied, is given. Regulatory requirements are subject to change and may differ from one location to another; it is the buyer's responsibility to ensure that its activities comply with federal, state or provincial, and local laws. The following specific information is made for the purpose of complying with numerous federal, state or provincial, and local laws and regulations.

SECTION 15 Other information

The data given here is based on current knowledge and experience. The purpose of this safety data sheet is to describe the products in terms of their safety requirements. The above details do not imply any guarantee concerning composition, properties or performance.

Material Safety Data Sheet for **AQUA MIX 50.**

Material Safety Data Sheet

KRAUSENS BALTIJA LTD

(in compliance with Regulation(EU) 1272/2008)

This documents is prepared pursuant to the OSHA Hazard Communication Standard. In addition, other substances not 'Hazardous' per this OSHA Standard may be listed**.** Where proprietary ingredient shows, the identity may be made available as provided in this standard.

Product Name	AQUA MIX 50 Natural Material

SECTION 1 Contact Information

"KRAUSENS BALTIJA" SIA VAT № LV50003393971 Legal Address: Valdeķu 52/3-27, Rīga, Latvia, LV-1058	Phone.: +371-29509097 E-mail: jen@krausen.lv Web site: www.krausen.lv	**Hazard Rating**		**Scale**
		Toxicity	0	4 = Extreme
		Fire	0	3 = High
		Reactivity	0	2 = Moderate
		Special	N/A	1 = Sight
	Date Prepared	January 2017		0 = Insignificant

SECTION 2 Ingredients/Identity Information

Components(Specific Chemical Identity:	Silicon Oxide - 50% Manganeese Dioxide - 20% Aluminic Oxide - 12% Ferrum - 7% and mineral compounds of natural origin

SECTION 3 Hazards Identification

Hazards identification:	This product does not meet the criteria for classification as hazardous as defined in Directive 67/548/EEC Directive 67/548/EEC: No classification Contact with particulate may cause moderate eye irritation. Abrasive action of the dust can cause eye damage. Prolonged or repeated skin contact may cause moderate irritation. Inhalation of airborne particulate and dust is irritating to the nose, throat and respiratory tract. Inhalation of excessive levels of dust may be harmful

SECTION 4 First-aid Measures

Eyes: Irrigate immediately with water for at least 5minutes. Mechanical irritation only. Drink plenty of water and contact a Doctor if irritation develops. DO NOT induce vomiting.

Skin: No adverse effects anticipated by this route of exposure. If skin contact occurs, remove contaminated clothing and wash skin thoroughly with soap and water.

Ingestion: No adverse effects anticipated by this route of exposure incidental to proper industrial handling.

Inhalation: No adverse effects anticipated by this route of exposure. Move to fresh air. Monitor for respiratory distress. Seek medical attention if irritation occurs.

SECTION 5 Fire-fighting measures

Extinguishing media: Water, Talc, Dry Chemical, Non- flammable does not support combustion of other Materials, and will not cause dust explosions.

Special Fire Fighting Procedures: MSHA/NIOSH approved self-contained breathing gear.

Firemen have to wear self-contained breathing apparatus.

SECTION 6 Accidental release measures

Take up mechanically, fill into labeled, closable containers. Spilled product causes a risk of slipping. Prevent entering sewer, stormwater drains or waterways. Avoid creating dust wet media or use vacuum to remove spill.

SECTION 7 Storage

Storage: Store in a cool dry place

SECTION 8 Exposure controls/Personal protection

Respiratory protection: Not required for normal uses
Eye protection: Splash goggles
Ventilation: Normal
Protective Gloves: Not required.

SECTION 9 Physical/Chemcial properties

Boiling Point:	Not Applicable
Vapor Pressure (MM HG):	Not Applicable
Evaporation Rate (water = 1):	1
Appearance & Odor:	Orange and Brown part, Black granules, sand-like in appearance, no odour
Melting Point (deg. F)	> 1000 Degrees Celsius
Solubility in Water:	Insoluble

SECTION 10 Stability

Stability: Stable

SECTION 11 Toxicological information

Emergency First Aid Procedures: Contact with eyes can and skins can cause irritation.
Carcinogenicity: Not Applicable
All ingredients are non-hazardous

SECTION 12 Ecological information

The product is insoluble in water. Therefore, ecological tests have not been conducted.
Water pollution class: 1 – slightly hazardous to water.

SECTION 13 Transport information

Declaration for land shipment: --
Declaration for sea shipment: --
Declearation for shipment by air: --
Other information:
Not dangerous cargo. Avoid temperatures below –20℃。Avoid heat above +40℃.
Keep separated from foodstuffs.

SECTION 14 Regulatory information

The information here in is presented in good faith and believed to be accurate as of the effective date shown above. However, no warranty, express or implied, is given. Regulatory requirements are subject to change and may differ from one location to another; it is the buyer's responsibility to ensure that its activities comply with federal, state or provincial, and local laws. The following specific information is made for the purpose of complying with numerous federal, state or provincial, and local laws and regulations.

SECTION 15 Other information

The data given here is based on current knowledge and experience. The purpose of this safety data sheet is to describe the products in terms of their safety requirements. The above details do not imply any guarantee concerning composition, properties or performance.