



## USER'S MANUAL



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## INTRODUCTION

Dear Client,

Thank you for purchasing the brand-new member of Quality Water Technologies family. By purchasing THIN10 direct flow reverse osmosis water purification system you have got an up-to-date, modern product that lets you drink effectively made clear water. We have dreamt and established this water purifier to have a device that is stylish and operating economical with the most up-to-date method.

### Benefits of THIN10

#### Narrow size

We have designed the device to fit to the smallest place as possible to not taking up unnecessary area in your kitchen counter. Since it's thickness falls short of 10 cms it can be equipped even under the sink and according to the direct flow technology no tank is needed hence saving even more space.



#### Modern design

The simple casing commonly used for water purifiers was changed to an up-to-date, modern and stylish surface. A multiple prize-winner designer team was working on it to create this modern, stylish outside and the structured inside. Anywhere you place your water purifier, you can be sure that it will be an ornament of your kitchen.

#### Effective operation

The device works in the way of reverse osmosis which is one of the most efficient methods for water purification.

- functioning without tank - The most important benefit of the device against the traditional reverse osmosis systems that it functions without any tank, so the problem of slack water doesn't occur, furthermore thanks to the well-chosen combination of pump and membrane a significant improvement can be noticeable at the amount of waste water.
- water saving - the rate of waste and purified water reaches the 60-40% ratio (60% purified water, 40% waste water)
- effective water emission - the device is set with more membranes that enables to produce even 1,6 litres of purified water per minute.



- by-pass valve - with by-pass valve the hardness of the water can be easily set and no mineral supplement is needed.

#### Safe operation

The innovatively designed microprocessor signs the upcoming date of filter replacement with various audio and visual signals and brings your attention to incidental malfunctions. You always get correct information about the condition and working of your water purifier. The device is equipped with leaking protector that protects your kitchen against water damage in case of an incidental malfunction by closing the magnetic valve at feed water and giving an alarm sound.

The filter replacement can be made easily without any tool thanks to the cover that can be opened at ease and the filters equipped with quick connections.



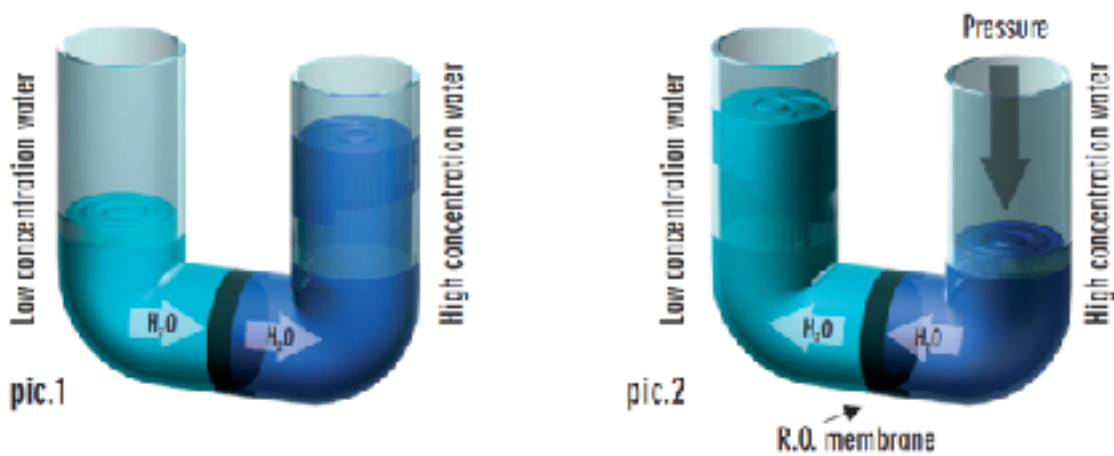
#### Mobile application

We developed a mobile application for the device which lets you have the most up-to-date information about your water purifier and the user's manual is easily available too. The application reminds you to the current filter replacement without keeping a record of it, so you always can be sure of your water purifier working the most effective way thanks to regular maintenance.

## What is Reverse Osmosis?

The easiest way of explaining Reverse Osmosis is by understanding what “normal” osmosis is. Osmosis is the “movement of a solvent” (Low Concentration Water) through a semipermeable membrane into a solution of higher solute concentration (high Concentration Water) that tends to equalize the concentrations of solute on the two sides of the membrane. (pic1)

The idea in reverse osmosis is to use the membrane to act like an extremely fine filter which can produce clean and pure water from virtually any source (wells, pipe water, rivers, lakes...) The contaminated water is placed on one side of membrane and pressure is applied to stop, and then reverse the osmotic process (pic2).



As shown in the picture below, R.O. membrane doesn't allow any particles smaller than 0,0001 microns to pass through it so only pure H<sub>2</sub>O gets on the other side of the membrane, removing all contaminants, bacteria, germs, viruses, dissolved solids and unwanted substances that can be found in feed water. What gets on other side is crystal clear, pure and tasty fresh water that is within your reach whenever you need.



## Technical information

### TECHNICAL DETAILS OF THE NEW THIN10 DIRECT FLOW RO-SYSTEM

THIN 10			
	MODEL		
SPECIFICATION	THIN10-III	THIN10-II	THIN10-I
Size	350x535x99 mm	350x535x99 mm	350x535x99 mm
Package size	435x55x160 mm	435x55x160 mm	435x55x160 mm
Weight	11 kg	10,1 kg	9,2 kg
Membranes	3x180 GPD	2x180 GPD	1x180 GPD
Membrane type	CSM 2012	CSM 2012	CSM 2012
1st prefilter	2" in-line GAC+KDF+ silver	2" in-line GAC+KDF+ silver	2" in-line GAC+KDF+ silver
2nd prefilter	2,5" 1µ in-line PP	2,5" 1µ in-line PP	2,5" 1µ in-line PP
Purified water capacity	1,6 l/min*	1,4 l/min*	0,95 l/min*
Recovery	60%	60%	50%
Soft start of pump	yes	yes	yes
Warning for filter replacement	yes	yes	yes
Quick fittings	yes	yes	yes
Automatic membrane flush	yes	yes	yes
Input pressure	2,4 bar	2,4 bar	2,4 bar
Max. contamination	2000 µS/cm <sup>2</sup>	2000 µS/cm <sup>2</sup>	2000 µS/cm <sup>2</sup>
Voltage supply	240 V/55 Hz	240 V/55 Hz	240 V/55 Hz
Operation supply	36 V/3,3 A	36 V/3,3 A	36 V/3,3 A
Max. temperature	10-45 °C	10-45 °C	10-45 °C
Fitting sizes	3/8"	3/8"	3/8"
App support	iOS, Android, Windows	iOS, Android, Windows	iOS, Android, Windows
Housing material	ABS Terluran 22	ABS Terluran 22	ABS Terluran 22
Weight of package	12,2 kg	11,3 kg	10,4 kg
Warning for leakage	yes	yes	yes



Accessories**	
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\*The measured data is valid according to the pressure, temperature and conductivity indicated in the spreadsheet.

\*\*The amount of the osmosis membranes varies according to the type of the device

## Components of the device

### Filters

The water is purified by the following filters

#### 1<sup>st</sup> filter

5  $\mu$  in-line PP filter, which removes sand, dirt, grit and sediment from your drinking water those are bigger than 5  $\mu$

#### 2<sup>nd</sup> filter

Granular activated carbon filter with silver and KDF55 which removes chlorine and chlorine derivatives and the significant part of organic contaminations from water, the silver and KDF55 increase the efficiency and give extra protection against viruses and germs.

#### 3<sup>rd</sup>, 4<sup>th</sup>, 5<sup>th</sup> filter

osmosis membrane which is the most important part of the device. Practically only water molecules can get through its 0.0001  $\mu$  sized pores so it removes 95% of all kind of contamination.

The by-pass valve installed in the device ensures the proper repatriation of the minerals. This should be set when installing the water purifier in the kitchen.

## Operation

Thin10 is a premium category water purifier designed for premium customers. For reliable operation and warranty validity, please contact the specialist for installation. Please contact your distributor for further information about the installation.

### Important notice

The water purifier could only be used with tap water at a temperature between 4 °C and 40 °C. For proper operation of osmosis membrane, it is necessary to keep it over 4 °C. If after all it would be chilled please do not subject to microwave nor direct heat. Frozen membrane could not operate properly, so it should be replaced as soon as possible. Please note that this kind of malfunction does not covered by warranty!

**BEFORE INSTALLATION PLEASE READ CAREFULLY THE FOLLOWINGS**



- Device should be installed on flat surface
- Device must be positioned in safe place where it cannot be knocked over because it could cause injury.
- Electricity (wall socket) must be available in radius of 1 meter of device installation place.
- To prevent melting or damage to the casing, do not place the device on very hot surfaces or near open flames.
- Do not keep the device at a temperature below 4 °C; frost will damage it.
- The wall outlet must be reachable always.
- Do not use the device outdoors.

#### Preventing Injury:

- Do not leave packing material near children
- The device must be out of the reach of children, because they are not aware of the risks involved with electrical and non-electrical devices

#### Power Supply

- Connect the device to a suitable outlet only.
- The voltage must match the one specified by the technical details of the device

#### Power Supply Cord:

- Never use the device with defective electric wire
- The defective wire must be replaced immediately.
- The defective wires and plugs must be replaced by an authorized service centre.
- Do not let the wire touch sharp edges, very hot objects and oily surfaces.





- Do not carry or pull the device by the wire.
- Do not pull the cable to remove the plug, and do not touch the plug with wet hands or feet.
- The wire should be hanging unhindered

#### Intended Use:

- This device is intended for household use only.
- Do not make technical changes on the device.
- The device must be used according to the instructions otherwise it can cause an accident.

## Maintenance

To function properly for a long time, your device requires regular maintenance and filter replacement.

It is recommended to replace the pre-filters at 12-month intervals. The timing of the filter replacement is signalled by the water purifier and it sends a notification via e-mail and mobile application.

The computer that controls the water purifier reminds you to the timing of the filter replacement using the following sounds:

- 3 weeks before the replacement is due: continuous beeping sound during one usage per every day
- 2 weeks before the replacement is due: continuous beeping sound during two usages per every day
- 1 week before the replacement is due: continuous beeping sound during three usages per every day
- From the date the replacement is due: a continuous beeping sound during every usage

Please have the filter replacement done by specialist especially when required by warranty. If the replacement of the filters is carried out by a specialist, you may be assured that original parts approved by the manufacturer are used especially considering the filters, so you will get the expected water quality.

### Frequency of filter replacement

Filter	Suggested frequency for replacement
5 µ filter	12 months
Granular activated carbon filter with KDF55 and silver	12 months
Osmosis membranes	24-36 months

### Most frequent malfunctions

Symptom	Cause of error	Your task
continuous beeping sound during 1 usage per day	filter replacement is due in 3 weeks	Please get in touch with your distributor to get a date for the filter replacement



continuous beeping sound during 2 usages per day	filter replacement is due in 2 weeks	Please get in touch with your distributor to get a date for the filter replacement
continuous beeping sound during 3 usages per day	filter replacement is due in 1 week	Please get in touch with your distributor to get a date for the filter replacement
Continuous beeping sound during every usage	filter replacement is due	Please get in touch with your distributor to get a date for the filter replacement
there is a continuous beeping sound and no water is coming from the clear water tap and the red LED on the front lights up	Water puffier stopped because leaking was detected	Please turn off the angle valve as soon as possible and switch off the device (turn the tumbler switch to "0" position) and then unplug the device and get in touch with your distributor.
Continuous beeping sound at a slow pace	inadequate power supply	Please switch off the device (turn the tumbler switch to "0" position) and then unplug the device and get in touch with your distributor.

If there is an error that does not appear in the list above, please contact your supplier.

## Warranty

As an expression of our confidence in our products, your drinking water system is warranted to the original end-user, when installed by your local maintenance service center

PERSONNEL by manufacturers specification, against defects in material and workmanship from the date of original installation, as follows:

- The entire R.O. device, excluding PreFilters and membranes

This warranty is voided if TDS is higher than 200 ppm and device is not maintained on schedule by maintenance service centre personnel.

Guarantee for water quality: warranty is voided if device is not maintained on schedule by maintenance service centre personnel.

This warranty is non-transferable and is limited to the original purchaser. This warranty gives you specific legal rights, and you may also have other rights which vary under local laws. If a part described above is found defective within the specified period, you should notify your dealer and arrange a time during normal business hours for the dealer to inspect the drinking water system on your or his premises.

Remedies.

Manufacturer's entire liability and your exclusive remedy for any breach of warranty shall be, at Manufacturer's option,



to:

(A) any part found defective within the terms of this warranty will be repaired or replaced by the dealer, provided that device is returned to the point of purchase or such other place as Manufacturer may direct, with a copy of sales receipt. You pay only freight from our factory and local dealer charges,

(B) if repair cannot be solved, the device will be replaced with another one.

These remedies are void if failure of device resulted by damage caused by fire, flood, freezing, misuse, neglect, alteration, unauthorized service personnel installation or operation contrary to our printed instructions, or using accessories or components which do not meet our specifications.

by law, we disclaim all implied warranties including, without limitation, warranties of merchantability and fitness for particular purpose and noninfringement of third-party rights with respect to the r.o. device.

no dealer, agent or employee is authorized to make any modification, extension, or addition to this warranty.

As manufacturer, we do not know the characteristics of your water supply or the purpose for which you are purchasing a R.O. system. Please understand that the quality of water supplies may vary seasonally or over a period, and that your water usage rate may vary as well. Water characteristics can also change considerably if your drinking water system is moved to a new location.

We do not take any responsibility for the resulting problems caused by the above-mentioned problems and we cannot accept any other claims.

Furthermore, we do not accept any complaints about the device if it is used with a water supply that not considered as drinking water.

our obligations under this warranty are limited to the repair or replacement of the failed parts of the r.o. device. in no event will manufacturer or its suppliers be liable for any costs of procurement of substitute products or services, lost profits, loss of information or data or any other special, direct, indirect, incidental, consequential, general, or other damages arising in any way out of the sale of, use of, or inability to use any product or service, even if we have been advised of the possibility of such damages.

Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation or exclusion may not apply to you. The above limitation will not apply in case of personal injury where and to the extent that applicable law requires such liability.

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