

# Aquatherm Heat Exchanger

Aquatherm can be used with any of the distillation units. The hot water coming out of the Condenser outlet is usually left to the Sink thereby wasting precious water. With the use of AQUATHERM, the hot water is cooled using the Cooling coils, Fan and pumped back to the Condenser inlet thereby saving water.

#### Advantages

Aquatherm can be table mounted and occupies less space. Power consumption is minimum.

15 litres of water is all it takes to run any Distillation Unit (Single or Double).



### Vitsil Water Softener

The newly designed water softener works on lon Exchange principle and is used along with Quartz or Glass distillers. The water softener prevents accumulation of sludge (i.e. deposits of Calcium and Magnesium salts) which renders hardness to water. The Tap water / Borewell water is fed at the inlet, and softened water is drawn at the outlet. The softened water is fed into the Boiler of the distillation unit. The unit can be recharged again with a saturated solution of Sodium Chloride The unit delivers approximately 2000 ltrs. of soft water for one cycle of regeneration.

During regeneration 20 ltrs. of sodium chloride solution is passed through the water softener slowly for a period of 1 hr.

We undertake to manufacture any quartz glass apparatus to your design and specification

## **SRINIVASA PRODUCTS**

Mftrs. Of 'VITSIL' QUARTZ MONO AND BI-DISTILLERS

45, SSI Area, 3<sup>rd</sup> Cross, Rajajinagar Bangalore - 560010 Phone: 91-80-23304126 / 23304364 Telefax : 91-80-23304364 Email: vitsil@rediffmail.com / srinivasaproducts@yahoo.co.in Website: www.srinivasaproducts.com

## **ECONOMY WATER STILLS**

## SINGLE AND DOUBLE DISTILLATION UNITS



VITSIL Glass Distillation Units continue to be the most effective, economic method of producing ultra pure water for laboratory use.

By contrast De-ioniser are only effective in removing those substances which are ionized. Further the resins contribute organic impurities to water and an ideal environment for bacterial growth in course of time.

These distillation units are designed to produce a distillate of consistent purity. The unit consists of horizontal Borosilicate Boilers, Condensers and Quartz heater. All parts are replaceable.

#### Innovative Design

The newly developed Quartz heater is advantageous than Chromium plated heaters used by other manufacturers. Chromium plated heaters react with Acids during cleaning process.

Quartz heaters do not react with acids or water during cleaning or at elevated temperature unlike metallic ones. Quartz heaters are easy to assemble and dismantle, unlike metallic ones which are bulky.

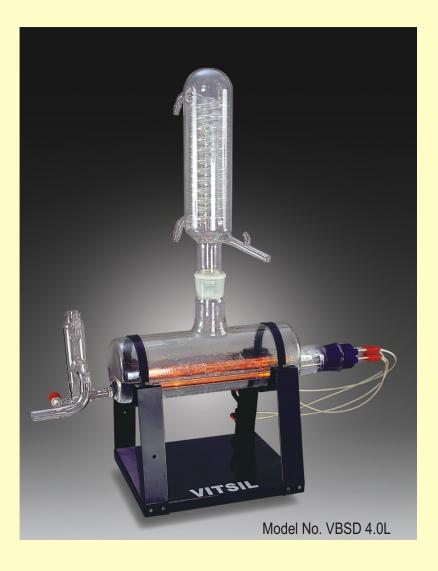
#### Advantages

Compact, simple to use.

Economical and ideal for colleges and general laboratory use.

Powder coated stand for rust free operation.

Provision for easy cleaning of Boiler.



## **Spares**

Cat No.	VBSD 1.5 LTR
BB34	Borosilicate Boiler B -34 size
BC34	Borosilicate Condenser B -34 size
QH 1.5	Quartz Heater 1.5 Kw

Cat No.	VBSD 4.0 LTR
BB45	Borosilicate Boiler B -45 size
BC45	Borosilicate Condenser B -45 size
QH 3.0	Quartz Heater 3.0 Kw

## **Specifications**

#### Single Distillation

MODEL No.	VBSD 1.5L	VBSD 4.0 L
Dist. Water Output cap. (Approx)	1.5 lt/hr.	4 lt/hr
Electrical requirements	230-250 volts single phase 1.5 kw Quartz heater	230-250 volts single phase 3 kw Quartz heater
Cooling water consumption	50 lt/hr.	60 lt/hr.
Biological Activity	Pyrogen Free	Pyrogen Free
рН	6 - 7	6 - 7
Conductivity S/cm	<3x 10 <sup>-6</sup>	<3x 10 <sup>-6</sup>
Distillate Temp.	65-75 <sup>0</sup> C	65-75 <sup>0</sup> C

#### Double Distillation

MODEL No.	VBDD 1.5L	VBDD 4.0 L
Dist. Water Output cap. (Approx)	1.5 lt/hr.	4 lt/hr
Electrical requirements	230-250 volts single phase2 x 1.5 kw Quartz heater	230-250 volts single phase 2 x 3 kw Quartz heater
Cooling water consumption	100 lt/hr.	150 lt/hr.
Biological Activity	Pyrogen Free	Pyrogen Free
рН	6.9 - 7	6.9 - 7
Conductivity S/cm	<1x 10 <sup>-6</sup>	<1x 10 <sup>-6</sup>
Distillate Temp.	65-75 <sup>0</sup> C	65-75 <sup>0</sup> C

Note: Distilled water is free from metal ions and bacteria. Hence it is difficult to measure pH and conductivity values. Use of soft water is recommended to prevent scaling in the boiler and to improve quality of distillate.



#### Accessories

Distillation Apparatus Power Supply (DAPS): The Unit provides for Automatic working of distillation unit by switching off the heaters in case water level falls below the heating coil, there by safeguarding the heaters. The unit resumes distillation when water level is restored. The Sensor probe works on 12V and hence is very safe. The unit also comes with Buzzer.

Dual Cut Off: Apart from the above features, the dual cut off switches off the heater even when there is no cooling water supply to the Condenser.