

Rubine™

ITALIA

REDEFINE THE WAY OF LIFE



WATER HEATER / PEMANAS AIR

USER MANUAL / PANDUAN PENGGUNA

MODEL / MODEL

TRENTO DIGITAL (TRD651D / TRD650N)

Please read this manual thoroughly and understand the content before use.
Sila baca panduan ini dengan teliti dan memahami isi kandungannya sebelum penggunaan.



SAFETY PRECAUTION LANGKAH-LANGKAH KESELAMATAN

1. Do not install reverse INLET & OUTLET and Stop Valve of heater.
Jangan memasang "INLET & OUTLET" dan Injap Hentian pemanas dalam keadaan Songsang.
2. Do not install the heater where there is consistent spray directly over the unit.
Jangan memasang pemanas air dimana terdapat semburan konsisten terus ke atas unit.
3. Do not connect the OUTLET to any tap or fitting that is not recommended by the manufacturer.
Jangan sambungkan "OUTLET" pada mana-mana paip atau pemasangan yang tidak disyorkan oleh pengeluar.
4. Do not block the heater OUTLET in any way.
Jangan menghalang "OUTLET" pemanas dalam apa jua cara.
5. Do not attempt to repair the heater without qualified technician.
Jangan cuba untuk membaiki pemanas tanpa juruteknik yang berkelayakan.
6. This appliance is not intended for use by person (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been supervised or given instruction concerning use of the appliance by a person responsible for their safety.
Perkakas ini tidak digalakkan untuk digunakan oleh orang (termasuk kanak-kanak) kurang upaya dari segi fizikal, deria atau mental, atau kurang berpengalaman atau pengetahuan, kecuali mereka diawasi atau diberi arahan mengenai penggunaan perkakas ini oleh orang yang bertanggungjawab keatas keselamatan mereka.
7. Children should be supervised to ensure that they do not play with the appliance.
Kanak-kanak hendaklah diselia untuk memastikan mereka tidak bermain dengan perkakas ini.
8. Engage qualified electrician for installation.
Gunakan juruelektrik yang berkelayakan untuk pemasangan.
9. Test water temperature with hand before using the shower.
Uji suhu air dengan menggunakan tangan sebelum menggunakan pemanas air.
10. Check the RCCB once a month (please refer to the Test Run of Heater) and consult professional for repair if there is any malfunction.
Pastikan RCCB diperiksa setiap bulan (sila rujuk Pengujian Pemanas) dan hubungi juruteknik untuk sebarang pembaikan.
11. Metallic / chrome flexible hose and conductive control valve shall not be used.
Saluran getah logam / krom dan injap kawalan konduktif tidak boleh digunakan.

14. Use only new hoses to connect the appliance to the water supply. The old hose-sets should not be reused.

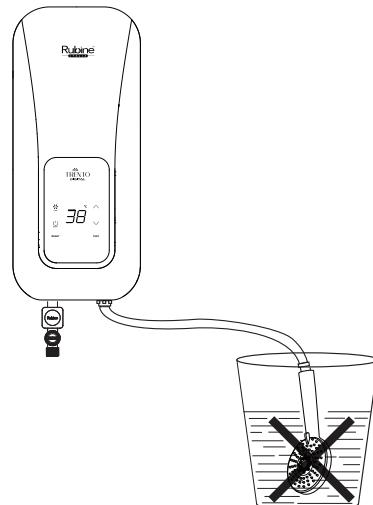
Gunakan hos yang baru untuk menyambungkan perkakas kepada bekalan air. Hos yang lama tidak boleh digunakan semula.

15. This appliance is not to be used for portable water supply.

Alat ini tidak boleh digunakan untuk bekalan air mudah alih.

16. Do not leave the hand shower idle in the pail. (refer below)

Jangan meninggalkan alat pancuran terbiar di dalam baldi. (rujuk dibawah)



WARNING!

Metallic / chromed hose and conductive control valve shall not be used.

Plug, socket and undersize cable shall not be used.

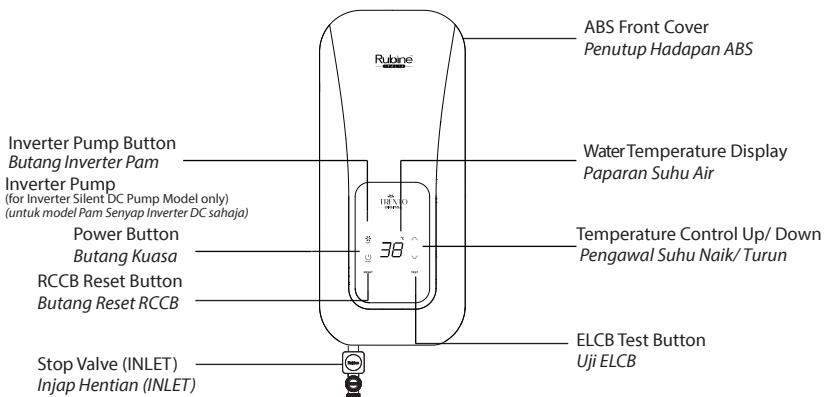
The user is advised to test RCB at least once a month.

1. WATER HEATER PARTS IDENTIFICATION

PENGENALAN BAHAGIAN – BAHAGIAN PEMANAS AIR

EXTERNAL PARTS IDENTIFICATION

PENGENALAN BAHAGIAN LUAR



INTERNAL PARTS IDENTIFICATION

PENGENALAN BAHAGIAN DALAM

Electrical cable (Recommended conductor size: 4.0mm² not included)

Kabel elektrik (saiz konduktor yang disyorkan 4.0mm² tidak termasuk)

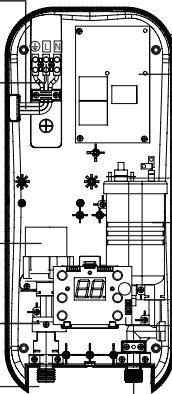
Terminal Block
Blok Terminal

Cable Entry
Kemasukan Kabel

Inverter Pump
(for Inverter Silent DC Pump Model only)
Pam Inverter
(untuk model Pam Senyap Inverter DC sahaja)

Flow Sensor Assembly
Pemasangan Sensor Aliran

Water INLET Connection
Penyambungan Air "INLET"



ABS Heater Base

Tapak Pemanas ABS

ELCB Control Board

Papan Kawalan ELCB

Thermal Cut Out

Pemotongan Haba

Heater Tank

Tangki Pemanas

Triac

Triac

Digital Touch Sensor PCB

(Power, Pump, heater, Test & Reset)

PCB "Sensor Sentuh Digital"

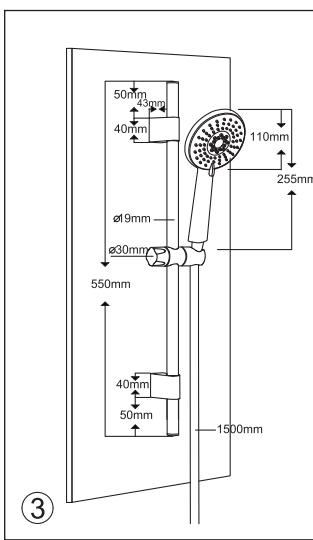
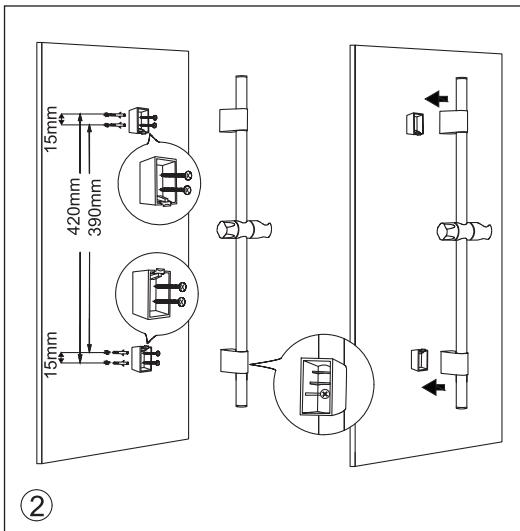
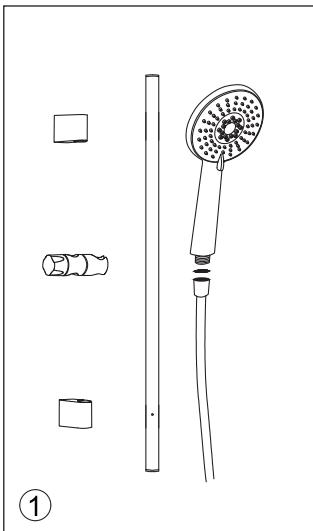
(Kuasa, Pam, Suhu, Uji dan Tetapan Semula)

Water OUTLET Connection

Penyambungan Air "OUTLET"

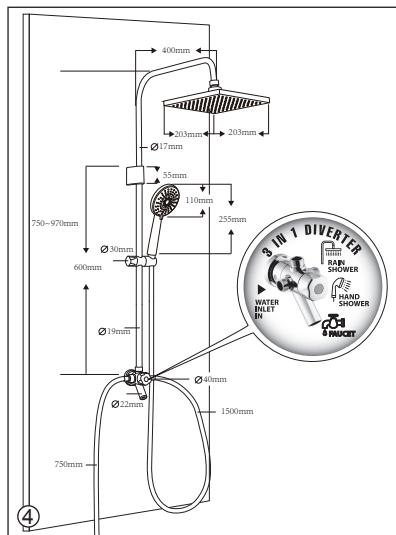
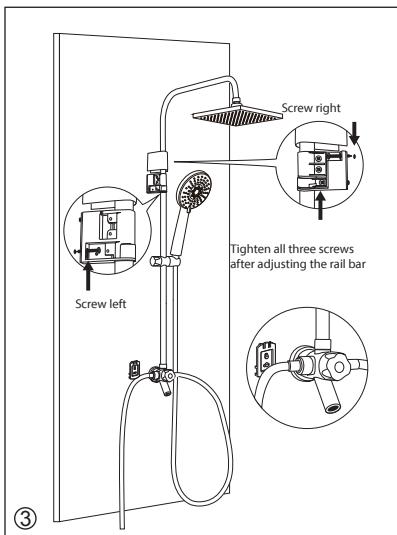
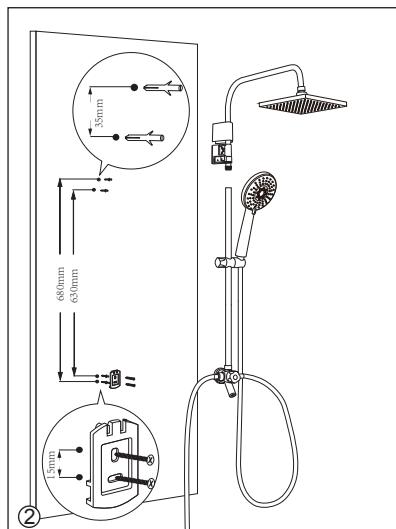
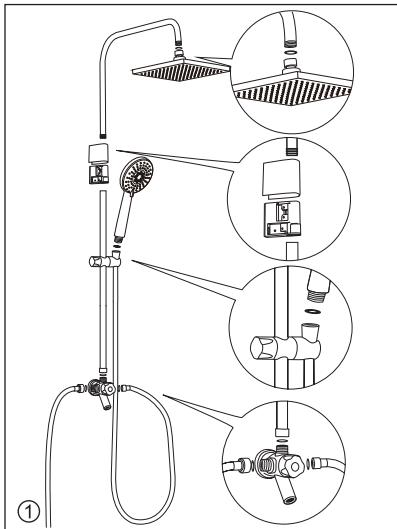
SHOWER SET ACCESSORIES IDENTIFICATION
PENGENALAN AKSESORI PANCURAN

1. BLACK ACCESSORIES
AKSESORI HITAM



2. RAIN SHOWER SET - 3 IN 1 DIVERTER (For selected model only)

SET PANCURAN MANDIAN HUJAN



MULTIPLE USAGE OF FAUCET

3-in-1 Diverter

For selected models only



Easy access of warm
and normal temperature
water outlet



Warm water for
hand wash clothes



Warm shower for
baby bathtub



Warm shower for your
pet made easy with
faucet instead of hand-held
shower head.

2. GENERAL INFORMATION

MAKLUMAT UMUM

INSTALLATION PEMASANGAN



**CAUTION:
AWAS:**

**THIS APPLIANCE MUST BE EARTHED
PERKAKASINI MESTI DIBUMIKAN**

1. All the plumbing work should be completed before proceeding to electrical wiring connection. (Table 1)
Semua pemasangan paip perlu diselesaikan sebelum memulakan kerja-kerja penyambungan wayar elektrik. (Jadual 1)
2. Installation must be carried out by qualified electrician with close reference to this manual and in compliance with the local regulations.
Pemasangan mestilah dilakukan oleh juruteknik yang berkelayakan dengan merujuk kepada panduan ini dan mengikut akta-akta tempatan.
3. The unit works at minimum water flow rate of 2 litre/min, which then would trigger the built-in pump (only for pump model), boosting a stronger shower spray.
Unit ini berfungsi pada kadar aliran air minima 2 liter/min, yang mengaktifkan pam dan kemudiannya meningkat pancuran semburan.
4. The built-in electronic Residual Current Circuit Breaker (RCCB) would cut-off the power supply to heater in the event of current leakage of as low as 15mA.
"Residual Current Circuit Breaker (RCCB)" akan memutuskan bekalan kuasa sekiranya berlaku kebocoran arus serendah 15mA.
5. The Thermal Cut-Off would automatically shut off the power supply shall there is any abnormal rise of showering temperature.
Pemotongan haba akan berfungsi secara automatik dengan memutuskan bekalan kuasa jika terdapat kenaikan suhu yang tidak normal.
6. The unit only operates when there is sufficient water flow to trigger the flow switch.
Unit hanya akan beroperasi apabila terdapat aliran air yang cukup untuk mengaktifkan suis aliran.

7. Electrical loading Table 1:
Pendawaian elektrik Jadual 1:

| Voltage (Vac) | Power (kW) | Amperes (A) | Recommended Conductor Size (csa) | | | Fuse/ MCB(A) | ON/OFF Switch (A) |
|------------------|---------------|----------------|----------------------------------|------------------|-------------------|-----------------|----------------------|
| | | | mm ² | Conduit Cable | Flexible Cable | | |
| 220 - 50/60Hz | 3.5 | 16.0 | 2.5 | 7/0.67mm | 50/0.25 | 20 | 20 |
| | 4.5 | 20.5 | 2.5 | 7/0.67mm | 56/0.30 | 25 | 25 |
| | 5.5 | 25.0 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 6.0 | 27.3 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 6.5 | 29.6 | 4.0 | 7/0.85mm | 84/0.30 | 32 | 32 |
| | 7.5 | 34.1 | 6.0 | 7/1.04mm | 84/0.30 | 40 | 40 |
| | 8.0 | 36.4 | 6.0 | 7/1.04mm | 84/0.30 | 40 | 40 |
| | 3.5 | 15.2 | 2.5 | 7/0.67mm | 50/0.25 | 20 | 20 |
| 230 - 50/60Hz | 5.5 | 24.0 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 6.6 | 28.7 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 8.8 | 38.3 | 6.0 | 7/1.04mm | 84/0.30 | 40 | 40 |
| | 3.6 | 15.0 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| 240 - 50/60Hz | 3.8 | 15.8 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 4.25 | 17.7 | 4.0 | 7/0.85mm | 56/0.30 | 32 | 32 |
| | 7.7 | 32.1 | 6.0 | 7/1.04mm | 84/0.30 | 40 | 40 |
| | 9.0 | 37.5 | 6.0 | 7/1.04mm | 84/0.30 | 40 | 40 |

8. Instantaneous water heater shall be equipped with a 2-pole control switch and own residual current device.

Pemanas air segera hendaklah dilengkapi dengan kawalan suis 2-kutub dan memiliki peranti arus berbaki.

9. Water heaters exceeding 3kW shall be permanently connected to a 20A/30A rated circuit breaker/fuse with an isolator switch and residual current device.

Pemanas air yang melebihi 3kW hendaklah disambung secara tetap pada 20A/30A nilai arus pemutus litar/fius dengan suis pengasing dan peranti arus berbaki.

3. INSTALLATION PROCEDURES

TATACARA PEMASANGAN

1. INLET and OUTLET connection of the heater unit should not be reversed, with stop valve installed on INLET. (Diagram 1)
Sambungan unit pemanas "INLET" dan "OUTLET" tidak boleh songsang dan injap hentian mestilah dipasang pada "INLET".

2. It is recommended that the unit should be mounted 1.5m above the floor to bottom of the heater. (Diagram 1)
Pemasangan unit digalakkan mempunyai jarak 1.5m antara lantai dengan bahagian bawah pemanas. (Rajah 1)

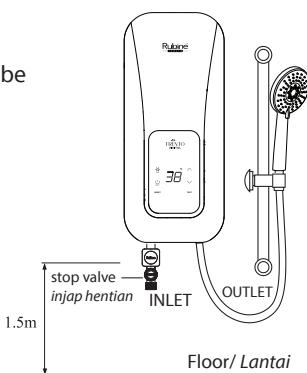


Diagram 1
Rajah 1

3. Mounting position

Penetapan tapak pemanas

- Remove screw at the bottom of the heater
Keluarkan skru dari bawah pemanas
- Lift the plastic cover upward (Refer Diagram 2)
Buka penutup plastik pemanas dari bahagian bawah. (Rujuk Rajah 2)
- Mark mounting position on the wall for all 4 screws
Tandakan posisi semua 4 skru pada dinding
- Drill the holes with 5.0mm diameter drill bit (Refer Diagram 3)
Gerudi lubang dengan menggunakan bit gerudi berdiameter 5.0mm (Rujuk Rajah 3)
- Install the unit to the wall with plug
Pasang unit pada dinding bersama plug

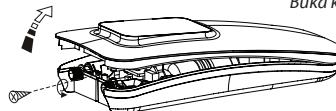
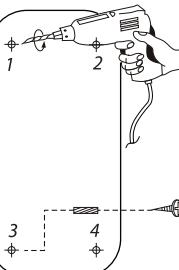


Diagram 2
Rajah 2

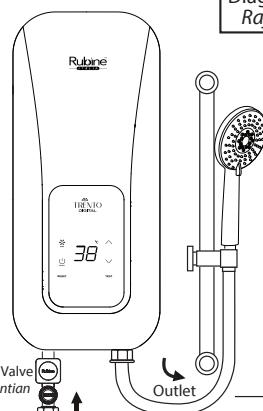


WARNING !

To prevent vibration, all 4 screws must be fully tightened.
Untuk mengelakkan getaran, semua 4 skru hendaklah diketatkan sepenuhnya.

4. Installation of Heater INLET and OUTLET

*connection. (Diagram 4)
Pemasangan "INLET" dan "OUTLET" pemanas. (Rajah 4)*



Correct installation
Pemasangan yang betul

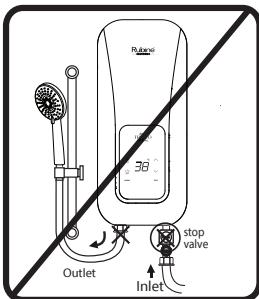
Connect the stop valve to INLET
Pasangkan injap hentian pada bahagian "INLET"



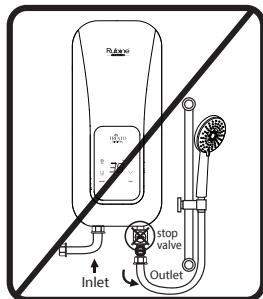
Incoming water
Air masuk

Diagram 4
Rajah 4

Connect flexible hose to heater OUTLET.
Pasangkan hos fleksibel pada bahagian "OUTLET".



X inlet - outlet reverse
(wrong installation)
*inlet - outlet songsang
(pemasangan yang salah)*



X stop valve reverse
(wrong installation)
*stop valve reverse
(pemasangan yang salah)*

WARNING !

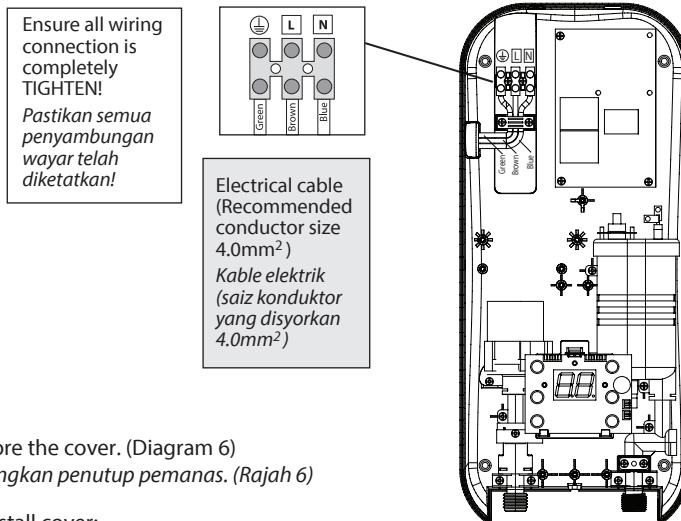
Wrong installation will caused damage to heating element.
Pemasangan yang salah boleh mengakibatkan kerosakan pada elemen pemanas.

5. Electrical Connection
Penyambungan elektrik

IMPORTANT NOTE !
NOTA PENTING !

SWITCH OFF THE MAIN SUPPLY BEFORE ELECTRICAL WORK
PADAMKAN SUIS UTAMA SEBELUM MELAKUKAN KERJA-KERJA
PENDAWAIAN ELEKTRIK

- Insert electrical cable through the rubber grommet as (Diagram 5).
Masukkan kabel elektrik melalui grommet getah seperti yang ditunjukkan pada (Rajah 5).
- Connect the cable to the terminal block and fully tighten as below :
Sambungkan kabel ke blok terminal dan ketatkan sepenuhnya seperti berikut:



- Restore the cover. (Diagram 6)
Pasangkan penutup pemanas. (Rajah 6)

To install cover:

Pemasangan penutup:

- Place bottom part into position & fit in nicely.
Posisikan penutup & ketatkan bahagian bawah dahulu.
- Press firmly the top part until "click" to secure the cover.
Tekan bahagian atas penutup sehingga bunyi "klik".
- Install screw at bottom to lock in position.
Selepas penutup dipasang dengan ketat, pasangkan skru di bahagian bawah.

Diagram 5
Rajah 5

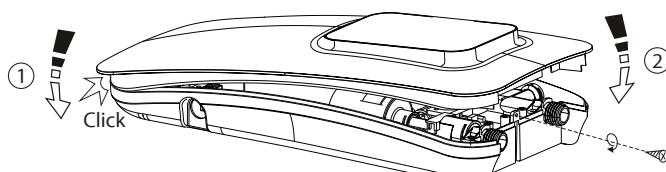
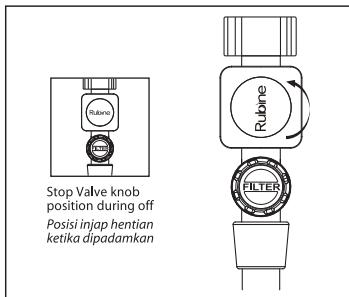
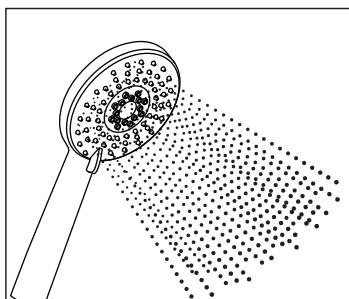


Diagram 6
Rajah 6

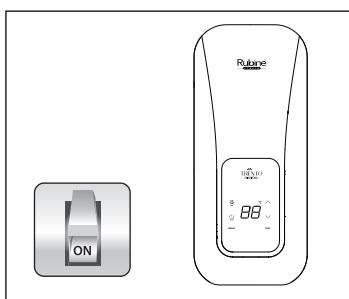
4. OPERATION PROCEDURES / TEST RUN OF HEATER TATACARA OPERASI / PENGUJIAN PEMANAS



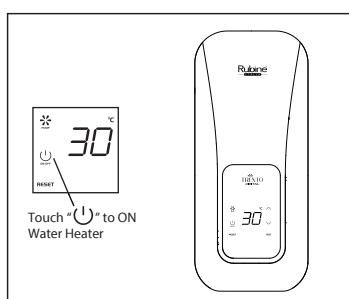
- 1 Turn on stop valve (anti - clockwise).
Hidupkan injap hentian (arah lawan jam).



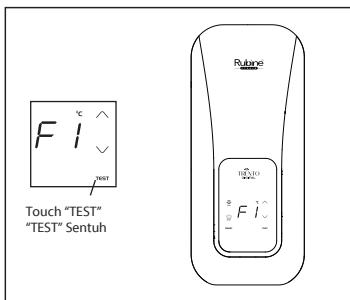
- 2 Make sure water flow starts after stop valve had been turned on.
Pastikan pancuran air bermula selepas injap hentian dihidupkan.



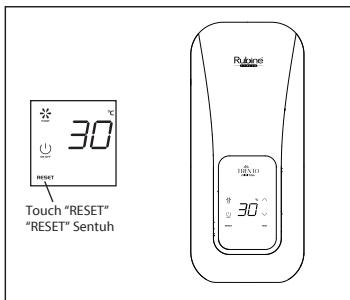
- 3 Switch on the main power supply, the Screen panel "88" would light up.
Hidupkan bekalan kuasa utama, "88" panel skrin akan menyala.



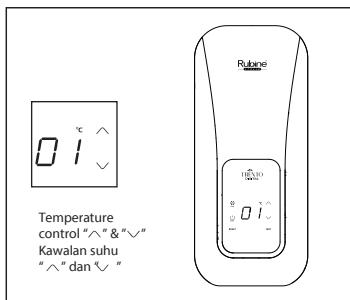
- 4 Touch "U" to ON the POWER and would showing Water Temperature.
Sentuh "U" pada kuasa dan menunjukkan suhu air.



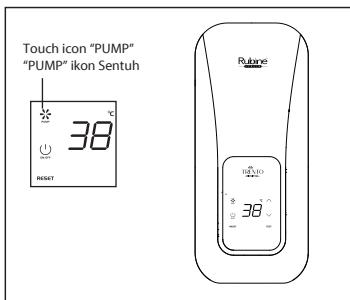
- 5 To initiate the RCCB test, touch the "TEST" icon. The unit should trip, and the "F I" starts blinking.
Lakukan Ujian RCCB dengan menyentuhkan ikon "TEST". Beklan Kuasa akan di putuskan "F I" akan mula berkelip-kelip.



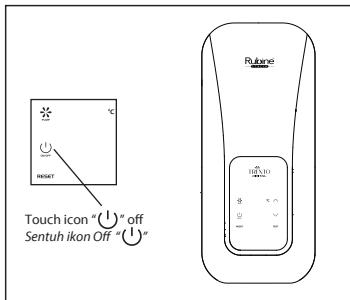
- 6 Touch Icon "RESET" to resume power connection.
Sentuh Ikon "RESET" untuk penyambungan kuasa semula.



- 7 The heater is now ready for use. Temperature will be increased accordingly by touching the icon "^", and "v" to decrease it.
 The heater is deactivated at 00, with 01 representing the minimum temperature and 08 indicating the maximum temperature.
Pemanas kini sedia digunakan. Suhu air akan dinaikkan dengan menyentuh ikon "^", dan "v" untuk menurunkannya. Pemanas air dinyahaktifkan pada 00, 01 mewakili suhu minimum dan 08 adalah suhu maksimum.



- 8 Touch icon "PUMP" for boosting a stronger shower spray. Pump On would show "on" and Pump off would show "oF". (only for DC pump model)
Sentuh ikon "PUMP" untuk meningkat pancuran semburan. Pam On akan tunjuk "on" dan pam off akan tunjuk "oF". (Untuk model pam DC sahaja)



- 9 Switch off the heater and main power supply when not in use.

Padamkan suis pemanas dan bekalan kuasa apabila tidak menggunakannya.

LED DISPLAY (REFERENCE CODES) PAPARAN DIPIMPIN (KOD RUJUKAN)

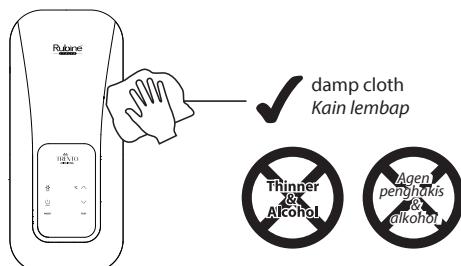
- B8** Machine startup / Permulaan mesin
- No water supply / Tiada air masuk
- F0** No Earth line / Wayar bumi tak sambung
- F1** RCCB test / Ujian RCCB
- F2** Thermo sensor error / Penderia suhu kesilapan
- F3** Thermo sensor short / Penderia suhu rosak
- F4** Thermostat trip / Termostat putus
 - . Standby mode / Mod siap sedia

On Pump on / Pam buka

Of / Pam tutup

*For Pump model only / model pam sahaja

5. GENERAL MAINTENANCE PENYELENGGARAN AM



CLEAN FILTER REGULARLY (DIAGRAM 7 & 8)
BERSIHKAN PENAPIS SECARA TERAP (RAJAH 7 & 8)

- a) Remove the filter mesh from the stop valve (for filter type only) by turning the knob filter anticlockwise and pulling out the knob (Diagram 7). Flush it with water to remove any trapped sediments. Install the knob filter back to its original position.
- a) Keluarkan penapis daripada injap henti (untuk jenis penapis sahaja) dengan memusingkan tombol penapis lawan arah jam dan menarik keluar tombol (Rajah 7). Cuci dengan air untuk mengeluarkan sebarang mendapan yang terperangkap. Pasangkan penapis tombol kembali ke pada kedudukan asalnya.
- b) Clear the shower head's holes by using a soft brush from time to time (Diagram 8). Recommended to clean it once a week. Be careful not to damage the holes of the shower head during cleaning.
- b) Bersihkan lubang kepala pancuran dengan berus lembut dari masa ke masa (Rajah 8). Disyorkan untuk membersihkannya sekali seminggu. Berhati-hati agar tidak merosakkan lubang kepala pancuran mandian semasa pembersihan.

stop
valve
injap
hentian

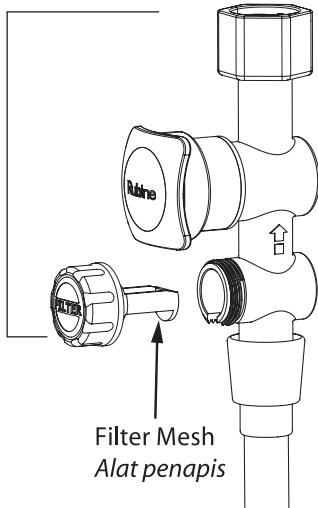


Diagram 7
Rajah 7

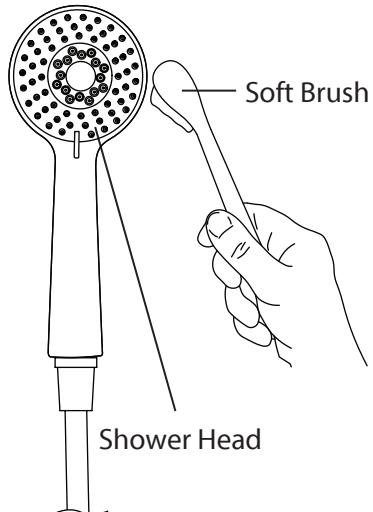


Diagram 8
Rajah 8

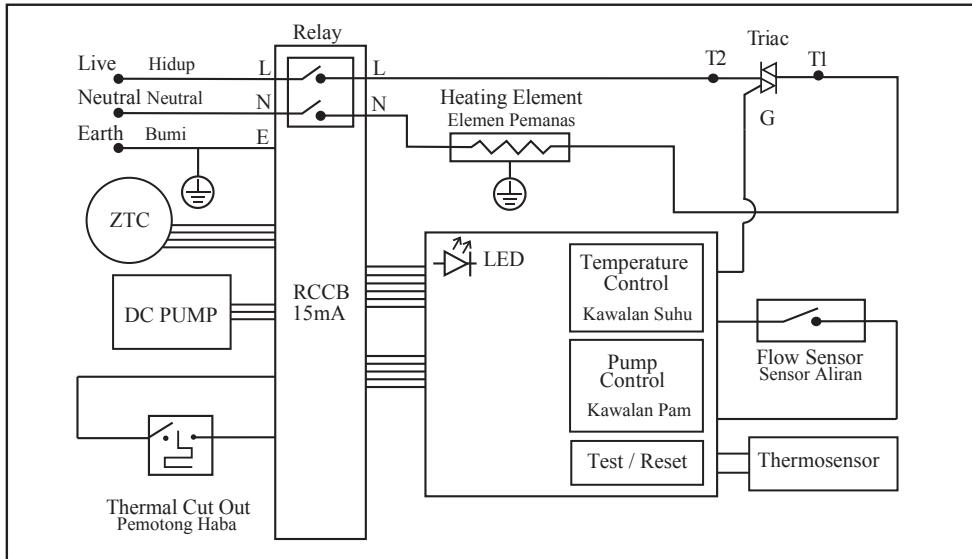
! CLEAN FILTER
MESH REGULARLY
ALAT PENAPIS MESTI
KERAP DIBERSIHKAN

6. TECHNICAL SPECIFICATIONS *SPESIFIKASI TEKNIKAL*

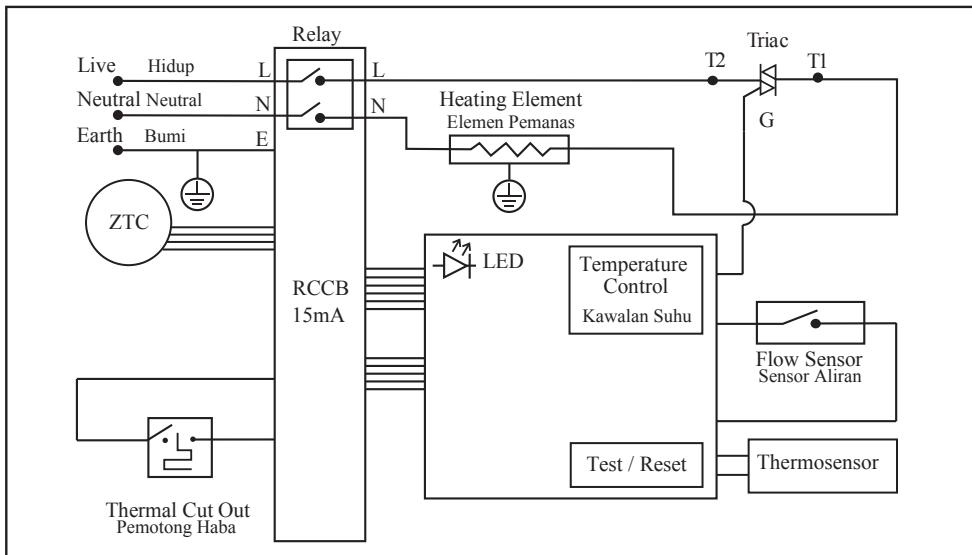
| | |
|--|--|
| Electrical loading / Muatan elektrik | 4.25kW 240V 50/60Hz |
| Other loading / Muatan lain | Please refer Electrical loading table <i>Rujuk jadual pendawaian elektrik</i> |
| RCCB sensitivity / Sensitiviti RCCB | 15 mA |
| Operating condition / Keadaan berfungsi | Open system (Open outlet) / Sistem terbuka |
| Water connection / Sambungan air | Ø15mm (1/2" BSP) |
| Degree of protection / Tahap perlindungan | IP25 |
| Min water flow rate / Kadar aliran air min | 2 litre/ min |
| Min water pressure / Tekanan air min | 20kPa (0.2 bar / 2.9psi) |
| Max water pressure / Tekanan air max | 400kPa (4 bar / 58psi) |
| Heater dimension (mm) / Ukuran pemanas | 440 (H) x 196 (W) x 78 (D) |
| Heater nett weight / Berat bersih pemanas | Non pump / <i>Tanpa pam</i> : 1.4kg Inverter Silent DC Pump / <i>Pam Senyap Inverter DC</i> : 1.7kg |

7. SCHEMATIC WIRING DIAGRAM RAJAH PENDAWAIAN SKEMATIK

INVERTER SILENT DC PUMP (TRD631D) PAM SENYAP INVERTER DC



NON-PUMP (TRD630N) TANPA PAM



Our Warranty



on Internal Parts
pada Bahagian Dalaman



on Heating Element
pada Unsur Pemanas



on Inverter DC Silent Pump
pada pam Senyap Inverter DC



on Anti-tank Leakage
pada Pencegahan Tangki Bocor

6 mths Warranty Extension

Online Registration

1. Log on to www.rubine.com.my
2. Click on 'Support', followed by 'Product Warranty Registration' to proceed. You're required to sign up as a member.
3. You'll receive a notification of warranty registration confirmation via email.
4. Please keep your online warranty certificate for reference / future warranty claim.

Pendaftaran Di Laman Web

1. Layari www.rubine.com.my
2. Klik pada 'Support', diikuti dengan 'Product Warranty Registration'. Anda dikehendaki mendaftar sebagai ahli Rubine.
3. Anda akan menerima e-mel sijil pengesahan dengan data pendaftaran jaminan.
4. Pastikan anda simpan e-mel sijil pengesahan untuk tuntutan jaminan.

Customer Care

AFTER - SALES SERVICE:

Tel : 03-6279 8899

Email : ftcrm@fiamma.com.my

OPERATION HOURS:

09:00am – 05:00pm

(Monday – Friday, except public holiday)

This specification is subject to change without prior notice,
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