Stokes Stokes Appliance Parts Domestic Commercial Industrial

Thermostats & Controls Product Review





Robertshaw Energy Regulators and Thermostats

Robertshaw has been well known for producing reliable domestic and commercial appliance controls for many years. In particular Robertshaw has been renowned for producing excellent quality cooking controls for Ovens, Stoves, Grills and many other cooking appliances. The reliability and success of these products are evident in the continued use of appliances, fitted with Robertshaw controls, many years after there manufacture.

Naturally, appliances may need spare controls from time to time. Robertshaw continue to have specifically designed replacement controls available to the aftermarket even if original models have been made obsolete. The following pages include details on available replacement control kits, as well as cross references and advice of models that are no longer replaceable.

Energy Regulators

Robertshaw *Energy Regulators* are more commonly known as *Simmerstats*. They are generally used on electric cooking ranges, cooktops and grills to control an element. The *M-Series* energy regulators are the current models available in universal kits and some limited direct replacements. They also replace the *INFINITE* and *T-Series* models, which are no longer available. Following are some tables describing the models available and lists of energy regulators that can be replaced by the M-Series Models.

The M-Series Energy Regulator





Replacement Energy Regulators

Part	Description	Specifications
Number		
M323-14	Energy Regulator, Single Element, Double Pole. Detents Low at 45 Deg CW. Direct Replacement Solid Shaft 6mm Diam X 22mm	240VAC, 15Amp
	Long.	
M553-14	Energy Regulator, Single Element, with Phase Break. Detents Low at 45 Deg CW. Universal Shaft 3/16", 6mm or 1/4" Diam X 20mm or 22mm Long.	240VAC, 15Amp
M583-14	Energy Regulator, Single Element, with Isolated Pilot. Detents Low at 45 Deg CW. Universal Shaft 3/16", 6mm or 1/4" Diam X 20mm or 22mm Long.	240VAC, 15Amp
M823-14	Energy Regulator, Dual Element, with Phase Break. Detents Low at 30 Deg CW & CCW. Universal Shaft 3/16", 6mm or 1/4" Diam X 20mm or 22mm Long.	240VAC, 15Amp
M3V-102K	Energy Regulator, Single Element, with Phase Break. Detents Low at 75 Deg CW. Universal Shaft 3/16", 6mm or 1/4" Diam X 20mm or 22mm Long.	240VAC, 15Amp
MD3-110K	Energy Regulator, Dual Element, with Phase Break. Detents Low at 30 Deg CW & Hi at 30 Deg CCW. Universal Shaft 3/16", 6mm or 1/4" Diam X 20mm or 22mm Long	240VAC, 15Amp
MS4-217K	Energy Regulator, Single Element, with Isolated Pilot. Detents Low at 45 Deg CW. Direct Replacement Solid Shaft 6mm Diam X 22mm Long.	240VAC, 15Amp
MP-101	Energy Regulator SPSC with Pilot	240VAC, 15Amp

Energy Regulators Cross Reference

Use Part	In Place of Part Numbers
Number	
M323-14	MPA 101, INF32314, INF-311-00, INF-313-02, INF-321-00, INF-321-01, INF-323-02,
	INF-323-03, INF-322-04, INF-323-06, INF-323-07, INF-323-09, INF-323-11, INF-323-12,
	INF-323-16
M553-14	MP 104, M3V-700, INF55314, INF-511-00, INF-513-02, INF-512-03, INF-513-04,
	INF-513-06, INF-513-07, INF-512-08, INF-513-09, INF-521-00, INF-523-02, INF-523-03,
	INF-523-04, INF-522-05, INF-523-06, INF-523-07, INF-522-08, INF-523-10, INF-523-11,
	INF-521-13, INF-543-02, INF-551-00, INF-554-01, INF-553-02, INF-553-03, INF-553-04,
	INF-552-05, INF-553-07, INF-552-08, INF-553-09, INF-552-11, INF-553-12, INF-553-13,
	INF-553-15, INF-551-16, INF-552-17, INF-571-00, INF-573-03, INF-573-04, INF-572-05,
	INF-572-06, INF-573-07, INF-572-08, INF-573-09, T1 201, T1 202, T1 203, T1 205, T1
	208, T3V 700, T3 201, T3 203, T3 205, T4 201, T4 204, T4 205, T4 208, T5 201, T5 202,
	T5 203, T5 204, T5 205, T5 210, T5 215, T6 201, T6 205, T6 207, TP 201, TP 202, TP 205
M583-14	MS 101, INF58314, MSV,600, INF-581-00, INF-582-01, INF-582-02, INF-583-03, INF-
	584-04, TS1 201, TS1 202, TS1 204, TS1 205, TS1 206, TS4 201, TS4 204, TS4 205, TSV
	600



Energy Regulators Cross Reference (cont')

Use Part	In Place of Part Numbers
Number	
M823-14	MDP 102, MDP 105, MD3V-800, INF82314, INF-813-02, INF-813-03, INF-812-04, INF-
	812-05, INF-821-00, INF-824-01, INF-823-02, INF-823-03, INF-823-04, INF-822-05, INF-
	822-06, INF-823-07, INF-822-08, INF-823-14, INF-823-09, INF-823-11, INF-823-12, INF-
	823-15, INF-823-16, INF-822-18, INF-823-19, TD2 101, TD3 101, TD3 102, TD3 103,
	TD3 201, TD3 203, TD3 205, TD5 101, TD5 202, TD5 203, TD5 204, TD5 205, TD5 207,
	TD6 101, TD6 102, TD6 103, TD6 203, TD6 205, TD6 207, TDP 101, TDP 102, TDP 103,
	TDP 104, TDP 201, TDP 202, TDP 205 TD5-210
M3V-102K	T1 102, T1 103, T1 104, T2 102, T3 101, T3 102, T3V 102, T3 108, T4 101, T4 102, T4
	105, T4 106, T5 101, T5 102, T6 101, T6 102, TP 101, TP 106
MD3-110K	MDP 110
MS4-217K	TS4 217
MP-101	MP-101EA, MP101EA, MP-101C, MP101KS, MP101-ETC, T5-10MP101KS, MP-101EAC

Notes:

- T-Series and INFINITE Series are no longer available. Please use M-Series replacements as listed above.
- INF900, INFL, TL and TDL models are no longer available and have no possible replacements.
- Any T-Series or INF part numbers not listed above are no longer available and have no possible replacements.
- M-Series models can also replace Australian Controls Models KV and MH. Consult your local distributor for cross-reference details.
- M-Series part numbers not listed above require a direct replacement.
- All Universal Shaft models in the above table are supplied as *UniKits*. These include Neutral Lead, Instruction Sheet, Mounting Nut, Shaft Adaptors and Terminal Connectors. Solid Shaft models include Instruction Sheet and Mounting Nut. Instruction sheets include wiring information..

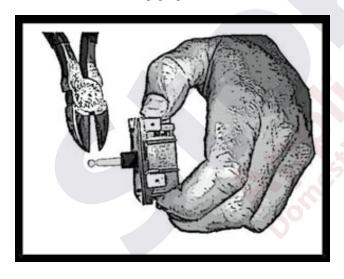


Important Notes on Energy Regulator Replacement

If the Energy Regulator being replaced has an earth wire attached to it, this earth wire may have been used to earth the panel it is mounted to. This M series control has no earth terminal requirement, but the panel may still need to be earthed. In this case the earth wire must be attached directly to the panel the control was mounted to.

Replacement of controls should only be carried out by a qualified electrician or service technician.

If the control in this kit has a square steel shaft the following instructions apply:

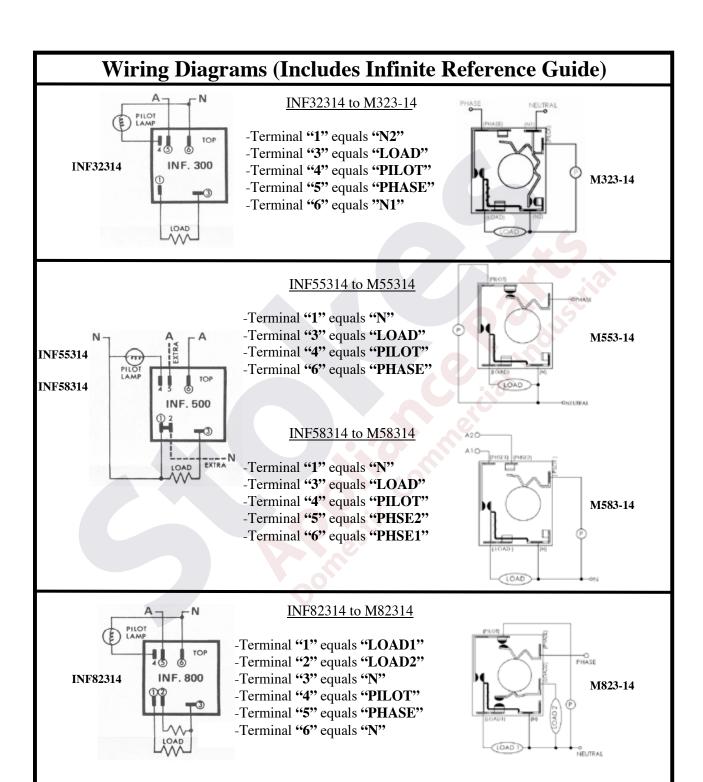


There are 3 standard shaft diameters, 3/16, ¼ inch and 6mm. All are accounted for in this Kit. The square steel shaft with no adaptor fitted will replace 3/16 shafts. The adaptors depicted below fit over the shaft to convert it to 6mm or ¼ inch.

There are two standard shaft lengths, the older 1-inch and the current 22mm. Both are accounted for. The shaft is 1 inch long, if 22mm is required then cut the shaft at the notched position as shown in the diagram above for 22mm.

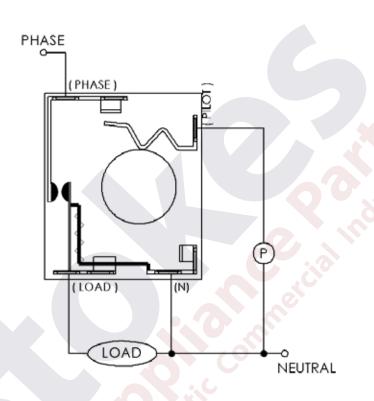


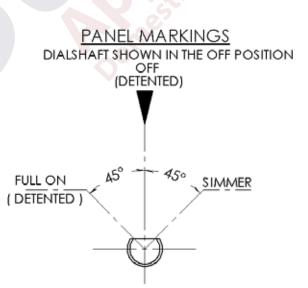






MP-101 WIRING DIAGRAM







Thermostats

Robertshaw EA Series thermostats are used for both domestic and commercial cooking and heating to control an electric element. EA3 models are generally used for domestic ovens and come in a single contact version. The EA3 models are available as universal kits only. EA5 models are used for commercial cooking and heating applications, generally for cooking appliances, and are available as direct replacements. Following are some tables describing the models available and lists of thermostats that can be replaced by these models.

Robertshaw Replacement Thermostats

Part	Description	Specifications
Number		
EA17700K	Thermostat, Fryer, Single Contact, 95 - 205 deg C (310°.dial arc),	0.2Amps 250VAC
	1/4" Diam X 20mm Shaft, 900mm Nickel Plated Capillary	
EA3-447-08	Thermostat, Oven, Single Contact, 70 - 290 deg C (270°.dial arc),	240VAC 30Amp
	Universal Shaft 3/16", 6mm or 1/4" Diam, 2250mm Capillary	0
EA5-406-7	Thermostat, Oven, Single Contact, 70 - 290 deg C (310°.dial arc),	240VAC 30Amp
	1/4" Diam X 20mm Shaft, 1800mm Capillary	
EA5-497-2	Thermostat, Oven, Single Contact, 70 - 290 deg C (310°.dial arc),	240VAC 30Amp
	1/4" Diam X 20mm Shaft, 2250mm Nickel Plated Capillary	
EA5-607-0	Thermostat, Bain Marie, Single Contact, 15 – 120 deg C (310°.dial	240VAC 30Amp
	arc), 1/4" Diam X 20mm Shaft, 1800mm Nickel Plated Capillary	
EA5-701-4	Thermostat, Fryer, Single Contact, 95 - 205 deg C (310°.dial arc),	240VAC 30Amp
	1/4" Diam X 20mm Shaft, 900mm Nickel Plated Capillary	_

Robertshaw Thermostat Cross Reference

Use Part	In Place of Part Numbers
Number	
EA17700K	EA177007
EA3-447-08	EA33002, EA33010, EA33037, EA33045, EA33053, EA33061, EA3307A, EA33088,
	EA33096, EA33109, EA33117, EA33125, EA33133, EA33141, EA3315, EA3316,
	EA34005, EA34013, EA34021, EA3403A, EA34152, EA34160, EA34179, EA34187,
	EA34208, EA34216, EA34224, EA34232, EA34240, EA34259, EA34267, EA34275,
	EA34283, EA34291, EA34304, EA34312, EA34320, EA34339, EA34347, EA34355,
	EA34363, EA34371, EA34380, EA34398, EA34400, EA34419, EA34427, EA34435,
	EA34443, EA3446A, EA34486, EA34507, EA34523, EA34558, EA34574, EA34582,
	EA34611, EA34638, EA34654, EA34662, EA34670, EA34689, EA34697, EA34700,
	EA34718, EA34734, EA34742, EA3475A, EA34806, EA34822, EA34830, EA34478
EA5-406-7	EA54075, EA52037, EA54980, EA54067
EA5-497-2	EA54008, EA54016, EA54024, EA54032, EA54040, EA54059, EA54083, EA54091,
	EA54104, EA54112, EA54120, EA54139, EA54147, EA5415, EA54200, EA54243,
	EA54261, EA54278, EA54307, EA54462, EA54921, EA54930, EA54948, EA54956,
	EA59001, EA59046, EA59087, EA59095, EA59116, EA59124, EA54972



Robertshaw Thermostat Cross Reference (cont')

Use Part	In Place of Part Numbers
Number	
EA5-607-0	EA36000, EA36035, EA36043, EA36051, EA36060, EA36078, EA36086, EA36094,
	EA3610, EA36123, EA36131, EA36158, EA36166, EA36174, EA36182, EA3619,
	EA36206, EA36502, EA56011, EA56020, EA56038, EA56062, EA56070, EA56100,
	EA56118, EA56142, EA56194, EA57153, EA58500, EA56070
	FOR CONSIDERATION ONLY: EA55019, EA35008, EA35016, EA35024, EA35032,
	EA35040, EA35059, EA3506, EA35075, EA35083, EA35091, EA55019, EA55027,
	EA55035, EA5506A, EA55116, EA55131, EA59052
EA5-701-4	EA37003, EA37046, EA37062, EA37070, EA37089, EA37097, EA57014, EA57022,
	EA57034, EA57040, EA57057, EA57129, EA57137, EA57145, EA57153, EA57161,
	EA57170, EA57188, EA57014

Notes

- EA Series part numbers not listed above are no longer available and have no possible replacements.
- EA3AD, EA3A, EA3B, EA3D, EA3CB, EA59, EA99, EB3 and B10 series are no longer available and have no replacements. EA3 can replace EB3 with wiring modification. (See Page 10 of this bulletin)
- EA3 models can also replace Australians Control Model G1. Consult your local distributor for cross-reference details.
- All Universal Shaft models in the above table are supplied as *UniKits*. These include Instruction Sheet, Mounting Screws or Nut and Shaft Adaptors. Solid Shaft models include Instruction Sheet and Mounting Nut. Instruction sheets include wiring and calibration information.



EA-SERIES THERMOSTAT CALIBRATION

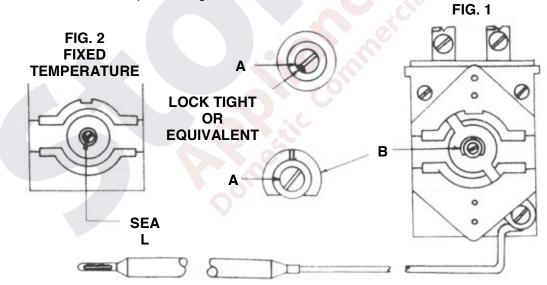
Each thermostat is calibrated at the factory, however if correction is necessary this procedure is to be followed.

FIG. 1 VARIABLE TEMPERATURE

- Use a potentiometer or a good grade thermometer to determine temperature at the location where temperature is required.
- Turn dial of thermostat to a medium temperature setting.
- Allow enough time for temperature to stabilise or until several temperature readings are identical.
- · Remove dial from shaft "B".
- Turn screw "A" clockwise to decrease or counterclockwise to increase. (These instructions cover all temperature ranges. Examples of approximate values of ¼ turn of screw "A" for some temperature ranges are given below.).
- · Replace dial and reset to original medium temperature setting of step 2.

FIG. 2 FIXED TEMPERATURE

- Follow procedure as outlined for Fig. 1 except omit steps 2, 4 & 6.
- Seal must be broken to turn screw "A".
- Reseal screw "A" with quick setting cement after recalibration.



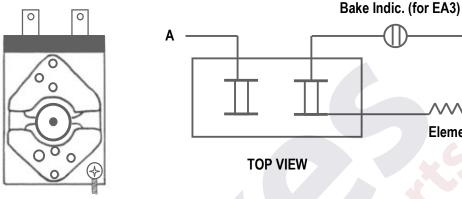
VALUE OF 1/4 TURN OF SCREW "A"

TEMPERATURE RANGE	60°-290°C	90°-205°C	26°-205°C	30°-230°C	15º-120°C	10º-32ºC	0°-45°C	120°-445°C
APPROX. TEMP CHANGE	19.5°C	10°C	6.7°C	19°C	9.5°C	3.3°C	5.6°C	19.5°C
TEMPERATURE RANGE	30º-60°C							
APPROX. TEMP CHANGE	5.5°C							



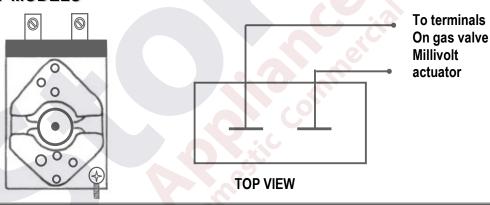
EA-SERIES THERMOSTAT WIRING

EA3 & EA5 MODELS



Note: EA3 has spade terminals as shown - EA5 has screw terminals

EA17 MODELS



WARNING:

- ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 AND IS TO BE INSTALLED BY A LICENSED ELECTRICIAN.
- ELECTRICALLY ISOLATE THERMOSTAT FROM MAIN SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK.

AVAILABLE MODELS

Model	Temperature Range	Replaces
EA17700	95-205 degC	EA177007
EA3-447-08	70-290 degC	EA34478
EA5-406-7	70-290 degC	EA54067
EA5-497-2	70-290 degC	EA54972
EA5-607-0	15-120 degC	EA56070
EA5-701-4	95-205 degC	EA57014

N

Element



Using an EA Thermostat to replace EB

Guidelines for qualified electricians

EB and EA5 are heating thermostats whose contacts open on temp rise.

Please match temperature range from the table

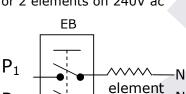
EB3 Series	EA Replacement	Temp Range
EB35257	EA5-497-2	70-290°C
EB35054	EA5-701-4	95-205°C
EB35070	EA5-607-0	15-120°C
DPST	SPST	
20A 240VAC	30A 240VAC	

USE EA5W2010 FOR EXTRA POLE CONTACTOR/RELAY

B

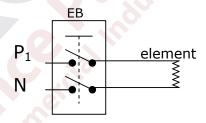
A DPST The EB3 is used to switch 2 phases of 240V ac or 2 elements on 240V ac

 P_2

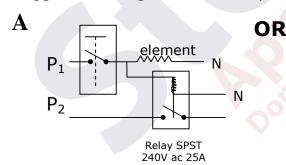


OR

DPST on 1 Phase. The EB3 is used to isolate both active and neutral links to element.

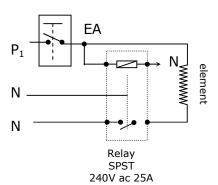


Suggested Wiring Circuits for Replacing EB with EA



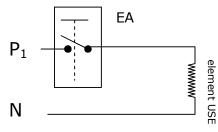
B

1 Phase isolate active & neutral requiring relay



USE EA5W2010 FOR EXTRA POLE CONTACTOR/RELAY

 ${f C}$ 1 Phase switch only active without relay



USE EA5W2010 FOR EXTRA POLE CONTACTOR/RELAY

Note: Do not use the EA5 to drive the relay coil only. The load from the coil is so small that you will begin to get poor continuity at the contacts after a short period of operation.



Accessories

Accessories for Robertshaw Energy Regulators and Thermostats are still available for current models. These include dials, bezels, nut mounting kits and stuffing boxes. The following table summarises the available accessories.

Part	Description	Suitable Use
Number		
Dial Kits		
102K	Black Dial – LO – OFF – HI	M323-14, M553-14, M583-14, MS4-217
104K	Black Dial – LO – OFF – LO	M823-14
105K	Black Dial – Plane with White Dot	All M-Series and EA-Series
102K	Black Dial – 1 – 10	All EA-Series, M32314, M55314, M58314, MS4-217
P2638	Black Dial – 70 – 290 °C	EA3447, EA5406, EA5497
P2662	Black Dial – 15 – 120 °C	EA5607
P2670	Black Dial – 95 – 205 °C	EA17700, EA5701
P2793	Black Dial – 95 – 205 °C No Off	EA17700 (Gas Appliances)
Bezels		
9420-01	Bezel 55mm	All M-Series and EA-Series
Stuffing boxes		
5329	Stuffing Box 3/8" Kit	
Mounting Kit	S	7,0
101	Palnut Adaptor Kit	All EA-Series



Unit 2, 170 Rooks Road, NUNAWADING ,VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444

E-mail: sales@stokesap.com.au

Introducing Robertshaw's range of water heating thermostats "ST" Hot Water Thermostats

This new design thermostat (Black Body) will be introduced to replace the discontinued range of "EWT" Thermostats (Grey Body). These ST type thermostats are more compact in size, responds quicker to temperature changes and still fits existing mounting clamps.

** Important Note ** When fitting the new ST (black body) thermostats from the discontinued EWT (grey body) units, some changes to the wiring will be needed. The new ST thermostats do NOT have identical wiring to the EWT series. Refer to the new wiring diagrams below, also new diagrams will be in all packaging and available on request.



ST1201 50°-70°C (Drk Green Dial)



ST1205 60°-80°C (Pink Dial)



ST2201 50°-70°C (Drk Green Dial)



50°-80°C (Drk Blue Dial)



ST1006 60°-90°C (Purple Dial)



ST 1301 50° - 80° C(Red Dial)



ST 2207 60° C (White Dial)



ST 1208 70° C (Dark Green Dial)



Picture showing reverse side of the new ST thermostat and Bi-Metal disks

VARNING:

1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN.

2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK



Unit 2, 170 Rooks Road, NUNAWADING, VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444 E-mail: sales@stokesap.com.au

ST Series Water Heating Thermostats Stokes Part No: ST1201 Surface Thermostat 50°C - 70°C



ST1201

Replaces:

W1M2/70

EWT1L2-513

EWT1L2-513N

EWT1L2-513L

EWT1L2-540

EWT1L2-523

ST1204133

Stamped ST1201133



Old EWT series (Grey Body)

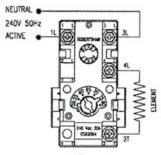


Fig.2 EWT1L2

Old EWT Wiring Diagram

Differential 4°-12°C

WARNING:

AN ELECTRIC SHOCK

1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN. 2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN



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E-mail: sales@stokesap.com.au

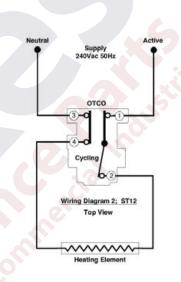
ST Series Water Heating Thermostats

Stokes Part No: ST1205

Surface Thermostat 60°C - 80°C (Bottom)



Pink Dial



ST1205

Replaces:

W1M2/80

EWT1L2-80KS

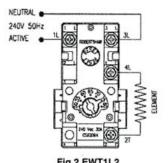
EWT1L2-501

EWT1L2-501N

EWT1L2-5018

Stamped ST1205113

Old EWT series (Grey Body)



Old EWT Wiring Diagram

Differential 4°-12°C

WARNING:

1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN.

2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK



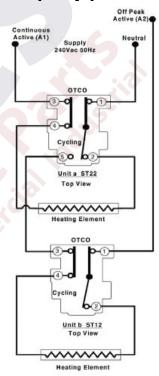
Unit 2, 170 Rooks Road, NUNAWADING, VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444

E-mail: sales@stokesap.com.au

ST Series Water Heating Thermostats Stokes Part No: ST2201 Surface Thermostat 50°C - 70°C (Top)



Dark Green Dial



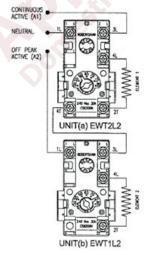
ST2201

Replaces: **W2M2** EWT2L2-80KS

EWT2L2-601

Stamped ST2201133

Differential 4°-12°C



Old EWT Wiring Diagram

WARNING: 1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN.

2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK

NON-SIMULTANEOUS 2 ELEMENT, OFF PEAK

Note ST22 to be connected in this configuration only and it's set temp shall be lower than ST12



Old EWT series (Grey Body)



Unit 2, 170 Rooks Road, NUNAWADING ,VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444 E-mail: sales@stokesap.com.au

ST Series Water Heating Thermostats

Stokes Part No: ST2207
Surface Thermostat 60°C (Fixed)

ST2207

Replaces

EWT2L2-602

EWT2L2-602N

EWT2L2-60

EWT2L2-60D

EWT2L2-60K

EWT2L2-60KE

EWT2L2-60KS

W2M2602

W2M26029

W2M26053K

W2M26053KE

W2M26053KS

051315

ST2207233





Unit 2, 170 Rooks Road, NUNAWADING ,VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444 E-mail: sales@stokesap.com.au

ST Series Water Heating Thermostats

Stokes Part No: ST1208
Surface Thermostat 70°C (Fixed)

ST1208

Replaces ST1208133PK



Dark Green Dial



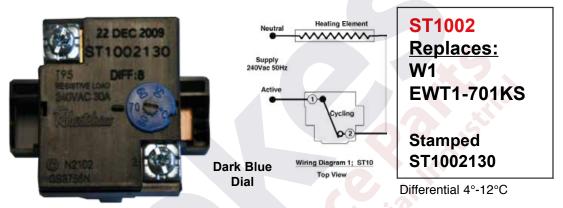
AN ELECTRIC SHOCK

Stokes Appliance Parts (Head Office)

Unit 2, 170 Rooks Road, NUNAWADING, VIC 3131, AUSTRALIA Phone: 03 9872 7474 Fax: 03 9872 7444 E-mail: sales@stokesap.com.au

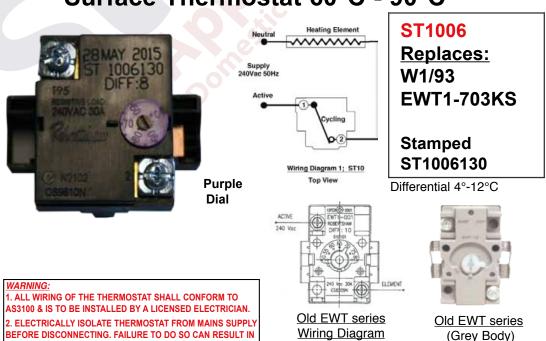
ST Series Water Heating Thermostats

Stokes Part No: ST1002 Surface Thermostat 50°C - 80°C



ST Series Water Heating Thermostats

Stokes Part No: ST1006 Surface Thermostat 60°C - 90°C





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ST Series Water Heating Thermostats

Stokes Part No: ST1301

Solar Water Heating Thermostat 50°C - 80°C

Auto ECO + Additional Safety design "One shot fuse" Now used in the majority of new Solar hot water systems.

ST1301

Replaces

WIM200

EWT12S-200K

EWT1L2S-200

EWT1L2S-202

EWT1L2S-203

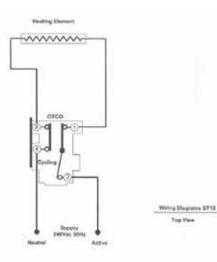
EWT1L2S-205

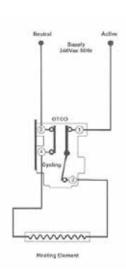
EWT1L2S-206

EWT1L2S-206W



1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN. 2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK







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ST Series Water Heating Thermostats

The Robertshaw ST Series Electric Water Heating Thermostats have replaced the EWT1, EWT1L2, EWT2L2, EWT1L2S, W1, W1M2, W2M2, SH and SA Series Thermostats. The models of controls available in the Aftermarket have been planned such that similar Robertshaw specifications are interchangeable. Additionally, where Off-Peak dual element controlled water heater thermostats require replacement, the ST can be mixed with EWT & WM Series.

IMPORTANT! You must fit the correct model thermostat. Refer to the guide below for the correct model replacement.

Cross-Reference Guide

Model	Replaces	Comments
ST10	Robertshaw-W1 & EWT1 Series	Thermostat only. No OTC Included
ST12	Robertshaw W1M2 & EWT1L2 Series	Thermostat & Manual Reset OTC. Used for mains pressure electric water heaters
ST22	Robertshaw W2M2 & EWT2L2 Series	Thermostat & Manual Reset OTC. Used for top element of dual element mains pressure electric water heaters
ST13	Robertshaw - EWT1L2S, SH & SA Series - Edward Energy - EWT1L2S-202 & SH202 - Solahart - EWT1L2S-203 & SA203 (may require adapter, available from Solahart) - Beasley - EWT1L2S-205 & SA203	Thermostat Cycling & One Shot OTC (no reset). Used on electric boosted solar water heaters.

Note: OTC = Over Temperature Cut -Out



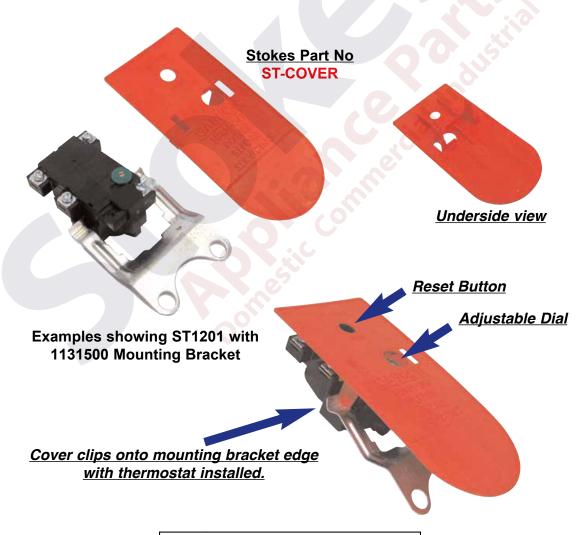
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ST Series Water Heating Thermostats Stokes Part No: ST-COVER

Protective Cover

suits ST type Thermostats

Clips onto inside edge of mounting bracket after Thermostat is installed.



<u>WARNING:</u>

1. ALL WIRING OF THE THERMOSTAT SHALL CONFORM TO AS3100 & IS TO BE INSTALLED BY A LICENSED ELECTRICIAN. 2. ELECTRICALLY ISOLATE THERMOSTAT FROM MAINS SUPPLY BEFORE DISCONNECTING. FAILURE TO DO SO CAN RESULT IN AN ELECTRIC SHOCK





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Series W17013 W17013K			Invensvs	Manufacturer	Current ST	Stokes
W17013 W17013K	Series	Print	Print		OEM Model	Part Number
W17013K	EWT1-701	No	EWT1-701	OEM	ST1002130	ST1002
	EWT1-701K	No	EWT1-701	AfterMarket Kit	ST1002130	ST1002
W17013KE	EWT1-701KE	ON	EWT1-701	AfterMarket Kit	ST1002130	ST1002
W17013KS	EWT1-701KS	oN	EWT1-701	Stokes Appliance Parts Kit	ST1002130	ST1002
W1703A	EWT1-703	No	EWT1-703	OEM	ST1006130	ST1006
W1703AK	EWT1-703K	ON	EWT1-703	AfterMarket Kit	ST1006130	ST1006
W1703AKE	EWT1-703KE	No	EWT1-703	AfterMarket Kit	ST1006130	ST1006
W1703AKS	EWT1-703KS	ON	EWT1-703	Stokes Appliance Parts Kit	ST1006130	ST1006
W1704	EWT1-704	ON	EWT1-704	Rheem NZ		No Replacement
	EWT1-706	No	EWT1-706	Quickbar	ST1006130	ST1006
W1709	EWT1-709	No	EWT1-709	Beasley Industries	ST1002130	ST1002
W1711	EWT1-711	No	EWT1-711	Sachs		No Replacement
W1712	EWT1-712	No	EWT1-712	Export	ST1001130	ST1002
W1C-64	EWT1C-64	No	EWT1C-64	Export	ST1006130	ST1006
	EWT1-715	oN	EWT1-715	Rheem NZ	ST1001130	ST1002
	EWT1-716	oN	EWT1-716	Sachs	ST1002130	ST1002
W1M2501	EWT1L2-501	051314	EWT1L2-501	Rheem	ST1205113	ST1205
	EWT1L2-501N	051314	EWT1L2-501	Rheem	ST1205113	ST1205
W1M25018	EWT1L2-5018	oN	EWT1L2-5018	OEM	ST1205113	ST1205
W1M25069						ST1205
W1M25069K	EWT1L2-80K	oN	EWT1L2-5018	AfterMarket Kit	ST1205113	ST1205
W1M25069KE	EWT1L2-80KE	No	EWT1L2-5018	AfterMarket Kit	ST1205113	ST1205
W1M25069KS	EWT1L2-80KS	No	EWT1L2-5018	Stokes Appliance Parts Kit	ST1205113	ST1205
W1M2508	EWT1L2-508	051311	EWT1L2-508	Rheem	ST1203133	ST1201
W1M25085	EWT1L2-5085	No	EWT1L2-5085	OEM	ST1201133	ST1201
W1M25034						
W1M25034K	EWT1L2-70K	No	EWT1L2-5085	AfterMarket Kit	ST1201133	ST1201
W1M25034KE	EWT1L2-70KE	No	EWT1L2-5085	AfterMarket Kit	ST1201133	ST1201
W1M25034KS	EWT1L2-70KS	oN	EWT1L2-5085	Stokes Appliance Parts Kit	ST1201133	ST1201
W1M2503	EWT1L2-503	051312	EWT1L2-503	Rheem	ST1204113	ST1205
W1M2513	EWT1L2-513	051313	EWT1L2-513	Rheem	ST1204113	ST1205
W1M25130	EWT1L2-513N	051313	EWT1L2-513	Rheem and Vulcan	ST1204113	ST1205
	EWT1L2-513K	No	EWT1L2-513K	OEM	ST1204113	ST1205
	EWT1L2-513W2L	051313	EWT1L2-513	Solahart	ST1204113	ST1205
W1M2516						No Replacement
W1M25165						No Replacement
W1M2518	EWT1L2-518	No	EWT1L2-518	OEM	ST1205134	ST1205
	EWT1L2-518D	dux0106	EWT1L2-518D	Dux	ST1205134	ST1205
W1M2518B1L	EWT1L2-518B1L	No	EWT1L2-518	Obsolete		ST1205
W1M2519	No EWT version			Obsolete		No Replacement
W1M2519K	No EWT version			Obsolete		No Replacement





Stokes

Appliance Parts
Domestic Commercial Industrial

Stokes Appliance Parts (Head Office)

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ST1201	ST1201	No Replacement	No Replacement	No Replacement	ST1201	ST1201	ST1201	No Replacement	ST1201	ST1201	ST1201	ST1201	ST1201	ST1201	Refer to OEM	Refer to OEM	Refer to OEM	ST1201	ST2207	ST2207	ST2207	ST2207	ST2207	ST2207	ST2207	ST2201	ST2201	ST2201	ST2201	ST2201	ST2207	ST1301	ST1301	ST1301	ST1301	ST1301	ST1301	Refer to OEM	Refer to OEM	Refer to OEM	No Replacement
ST1204113	ST1205134				ST1204133	ST1204133	ST1204133		ST1204113	ST1201133	ST1204113	ST1203133	ST1203133	ST1203133	ST1204133R	ST1204133R	ST1204133R	ST1207154	ST2207233	ST2207233	ST2207233	ST2207233	ST2207233	ST2207233	ST2207233	ST2201133	ST2201133	ST2201133	ST2201133	ST2201133	ST2207233	ST1301133	ST1301133	ST1301133	ST1301133	ST1301133	ST1301133	ST2307233	ST2307233	ST0200033	
Rheem NZ	Export	Rheem	Rheem	AfterMarket Kit	Dux	Dux	Dux	New Zealand	Shuaikang Group	Hotstream China - Rheem	Aquamax	Rheem	Rheem	Rheem NZ	Rheem	Rheem	Rheem NZ	Dux 50L Titan	Rheem	Rheem	OEM	Dux	AfterMarket Kit	AfterMarket Kit	Stokes Appliance Parts Kit	OEM	AfterMarket Kit	AfterMarket Kit	Stokes Appliance Parts Kit	Tsai Shian International	Rheem NZ	AfterMarket Kit	Edwards	Solahart/Rheem	Beasley Industries	OEM	AfterMarket Kit	OEM	Dux	OEM	Rheem NZ
EWT1L2-520	EWT1L2-521	EWT1L2-522	EWT1L2-522	EWT1L2-522K	EWT1L2-523	EWT1L2-523B	EWT1L2-523N	EWT1L2-529	EWT1L2-530	EWT1L2-535	EWT1L2-538	EWT1L2-540	EWT1L2-540N	EWT1L2-540NZ	EWT1L2-543	EWT1L2-543N	EWT1L2-543NZ	EWT1L2-560	EWT2L2-602	EWT2L2-602	EWT2L2-60	EWT2L2-60D	EWT2L2-60	EWT2L2-60	EWT2L2-60	EWT2L2-601	EWT2L2-601	EWT2L2-601	EWT2L2-601	EWT2L2-603	EWT2L2-620	EWT1L2S-200	EWT1L2S-202	EWT1L2S-203	EWT1L2S-205	EWT1L2S-206	EWT1L2S-206	EWT2L2S-801	EWT2L2S-806	EWT0L2-301	EWT1A1-204
No	No	052806	052806	No	dux0461	dux0463	dua0108	No	SK 530	051346	No	051350	051350	051350	051354	051354	051354	dux0111	051315	051315	No	dux0107	No	No	No	No	No	No	No	No	311077	No	No	No	No	No	No	No	No	No	No
EWT1L2-520	EWT1L2-521	EWT1L2-522	EWT1L2-522N	EWT1L2-522K	EWT1L2-523	EWT1L2-523B1L	EWT1L2-523N	EWT1L2-529	EWT1L2-530	EWT1L2-535	EWT1L2-538	EWT1L2-540	EWT1L2-540N	EWT1L2-540NZ	EWT1L2-543	EWT1L2-543N	EWT1L2-543NZ	EWT1L2-560	EWT2L2-602	EWT2L2-602N	EWT2L2-60	EWT2L2-60D	EWT2L2-60K	EWT2L2-60KE	EWT2L2-60KS	EWT2L2-601	EWT2L2-80K	EWT2L2-80KE	EWT2L2-80KS	EWT2L2-603	EWT2L2-620	EWT1L2S-200K	EWT1L2S-202	EWT1L2S-203	EWT1L2S-205	EWT1L2S-206	EWT1L2S-206W	EWT2L2S-801	EWT2L2S-806	EWT0L2-301	EWT1A1-204
W1M2520		W1M2522	W1M2522N		W1M2523														W2M2602	W2M2602	W2M26029		W2M26053K	W2M26053KE	W2M26053KS	W2M2601	W2M26010K	W2M26010KE	W2M26010KS				SH202	SA203							





Now there is an easy way to select a digital controller!!

Heating/Cooling or Refrigeration?

Heating / Cooling Temperature Controls can be separated into two specific specifications.

Low Temperature Control for Heating/Cooling 0 to 100°C
Stokes IC902AC240 (240VAC Power Supply (includes probe)
Stokes IC902ACDC12 (12-24 V AC/DC Power Supply (includes probe)



High Temperature Control for Heating/Cooling up to 600°C

Stokes IC915AC240 (240VAC Power Supply (includes probe) Stokes IC915ACDC12 (12-24 V AC/DC Power Supply (includes probe)



Refrigeration Controls can be separated into two specific specifications.

Medium Temperature Control for Cool-rooms -50 to 110oC Stokes ID961AC240 (240VAC Power Supply (includes probe) Stokes ID961ACDC12 (12V DC Power Supply (includes probe)



Low Temperature Control for Freezers at around -18 °C to -2 °C. Stokes ID974AC240 (240VAC Power Supply (includes 2 probes) Stokes ID974ACDC12 (12V DC Power Supply (includes 2 probes) Low Temperature Systems will normally have a probe to measure Cabinet Temperature

Low Temperature Systems will normally have a probe to measure Cabinet Temperature and a second probe to measure Evaporator Temperature for both Time/Temperature Defrost



(Probes available separately)

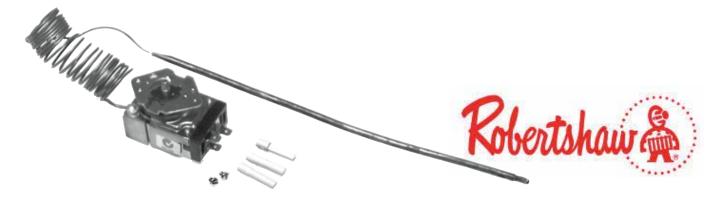
Since 1980 Eliwell has supplied the Industry worldwide with quality Temperature Controllers based on the pioneering 32 X 74mm Front Panel format. Eliwell has developed these Controllers for common applications requiring control of heating and cooling.



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lotes	Note







Thermostats & Controls Product Review





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