

4-INS-353



INSTALLATION, OPERATION AND CARE MANUAL

REMEMBER TO COMPLETE THE ONLINE
WARRANTY REGISTRATION TO
RECEIVE YOUR FULL TWO YEAR WARRANTY.

WARRANTY

All Scientific equipment comes with a standard ONE year warranty, The 1 Year Extended Warranty is only valid for customers who have registered their warranty online at www.scientific.co.za within the first year after making their purchase.

MANUFACTURED
IN SOUTH AFRICA





ALL SCIENTIFIC EQUIPMENT COMES WITH A TWO
YEAR WARRANTY ON COMPONENTS AND
DEFECTIVE WORKMANSHIP - Ts & Cs APPLY.

REGISTER ONLINE TODAY

- Register your warranty on-line at www.scientific.co.za today and learn how to get the best out of your Scientific product.

NO WEB ACCESS?

- If you do not have access to the Web, register by completing this form and Email it to the Scientific head office in South Africa. Email: sales@scientific.co.za

ONLY COMPLETE IF YOU DO NOT HAVE WEB ACCESS

Company _____

Name _____

Surname _____

Telephone _____

Cellphone _____

Email Address _____

Country _____

Postal address _____

Scientific products purchased _____

Product Code (see box label) _____

Serial number (see back of machine) _____

INTENDED USE

- | | | |
|---------------------------------------|--|---|
| <input type="checkbox"/> Agriculture | <input type="checkbox"/> Genetics | <input type="checkbox"/> Pharmaceutical Physics |
| <input type="checkbox"/> Automotive | <input type="checkbox"/> Industrial | <input type="checkbox"/> Power Generation |
| <input type="checkbox"/> Biochemistry | <input type="checkbox"/> Medical | <input type="checkbox"/> Special Metals |
| <input type="checkbox"/> Botony | <input type="checkbox"/> Microbiology | <input type="checkbox"/> Sugar |
| <input type="checkbox"/> Chemistry | <input type="checkbox"/> Mining | <input type="checkbox"/> Water |
| <input type="checkbox"/> Cosmetics | <input type="checkbox"/> Nuclear | <input type="checkbox"/> Zoology |
| <input type="checkbox"/> Electronics | <input type="checkbox"/> Paper/Packaging | <input type="checkbox"/> Other (Specify): _____ |
| <input type="checkbox"/> Food | <input type="checkbox"/> Petrochemical | _____ |



ALL SCIENTIFIC EQUIPMENT COMES WITH A TWO
YEAR WARRANTY ON COMPONENTS AND
DEFECTIVE WORKMANSHIP - Ts & Cs APPLY.

LIMITED WARRANTY

The manufacturer guarantees that this unit is free from defect in materials and workmanship when it leaves the factory and undertakes to replace or repair the unit if it proves defective in normal use or during servicing for a period of 1(one) year. The date of original installation and is for the benefit of the original purchaser only. The liability under this warranty is limited to repairing the defective unit or any part of the unit provided it is sent carriage paid to an authorized dealer. All other Warranties ,expressed or implied , statutory or otherwise, including without limitations any implied Warranty of Merchantability or fitness for purpose are excluded .The Seller shall in no event be liable for direct,indirect or consequential damages in connection with the products.

This unit is at all times to be used according to the instruction manual and for its normal purpose.

This Warranty is not effective if damage occurs because of accident, carelessness,improper installation,lack of proper set-up,supervision when required or if the equipment is installed or operated in any manner contrary to the installation and operating instructions. In these cases,repairs will be made at a reasonable cost. Work performed by unauthorized personnel or unauthorized service agencies voids this Warranty.

INCUBATORS/GROWTH CHAMBERS



**INSTALLATION OPERATION AND CARE OF
150L /400L COOLED INCUBATOR
150L /400L SHAKING INCUBATOR
150L /400L GROWTH CHAMBER
MODELS: 353 R01/354 R01/355 R01/356 R02
357 R01/358 R02**

UNPACKING

Unpack the product and check for any damage incurred during transit. This should be reported to the responsible carrier, railway or postal authority, and a request for a damage report should be made.



THESE INSTRUCTIONS MUST BE FOLLOWED FOR US TO GUARANTEE OUR FULL SUPPORT OF YOUR CLAIM FOR PROTECTING AGAINST LOSS FROM CONCEALED DAMAGE. THE FORM FOR FILING SUCH A CLAIM WILL BE PROVIDED BY THE CARRIER.

GENERAL INSTALLATION AND OPERATION INSTRUCTIONS

1. Position the unit on a stable bench (Models 353,354,355 and 357). Models 356 and 358 are floor standing units on castors.
2. Ensure that there is at least 20 cm of open space at the rear side and front venting grids.
3. Do not set up the unit in the immediate vicinity of a heat source and do not expose to direct sunlight.
4. Wait at least one hour before operating the unit after transport or re-positioning. This will prevent damage to the compressor.

NOTES

NOTES

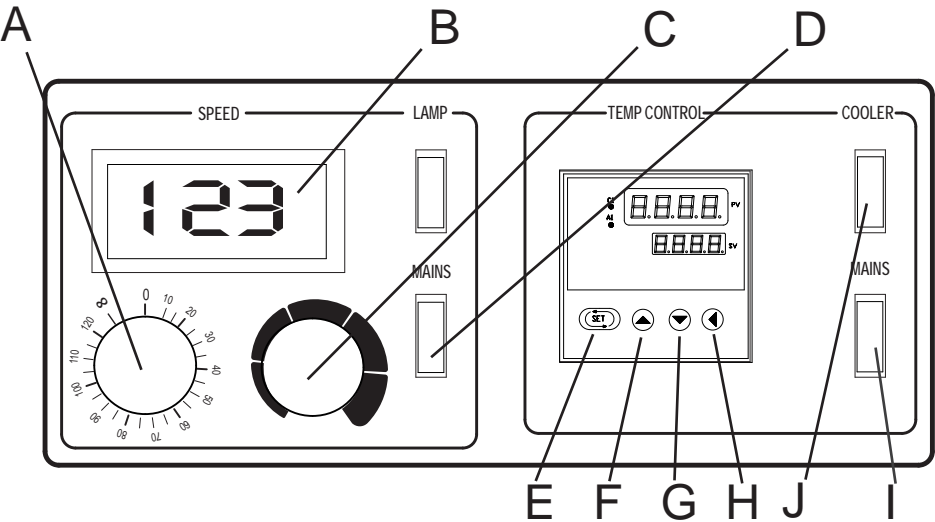
PRODUCT DESCRIPTION

The 150 litre incubator range is available in three models :

- Model 355 is a low temperature incubator with shaking platform, operating at temperatures between 0°C to 60°C.
- Model 354 is a low temperature incubator operating at temperatures between -10°C to 60°C.
- Model 356 is a low temperature incubator operating at temperatures between 0°C to 60°C.
- Model 353 is an incubator with shaking platform operating at temperatures between ambient + 10°C to 60°C.
- All units are controlled by PID electronic control with digital indication.
- All units are fitted with sturdy hinged doors with magnetic latching.
- Models 353 and 355 have viewing windows and are fitted with Shaking platforms with 25mm orbit.
- Shaking platforms are fitted with non slip rubber mats and adjustable clamping bars capable of securing a wide range of flasks. Chrome plated wire shelves are supplied making the units versatile for many applications.
- The interiors are constructed of polished Stainless steel with powder coated steel exterior body.
- Models 357 and 358 are fitted with lights and inner glass doors and are configured as Growth Chambers.

SPECIFIC INSTALLATION AND OPERATING INFORMATION

MODEL 353/355 Shaking Incubator 150I / 400I

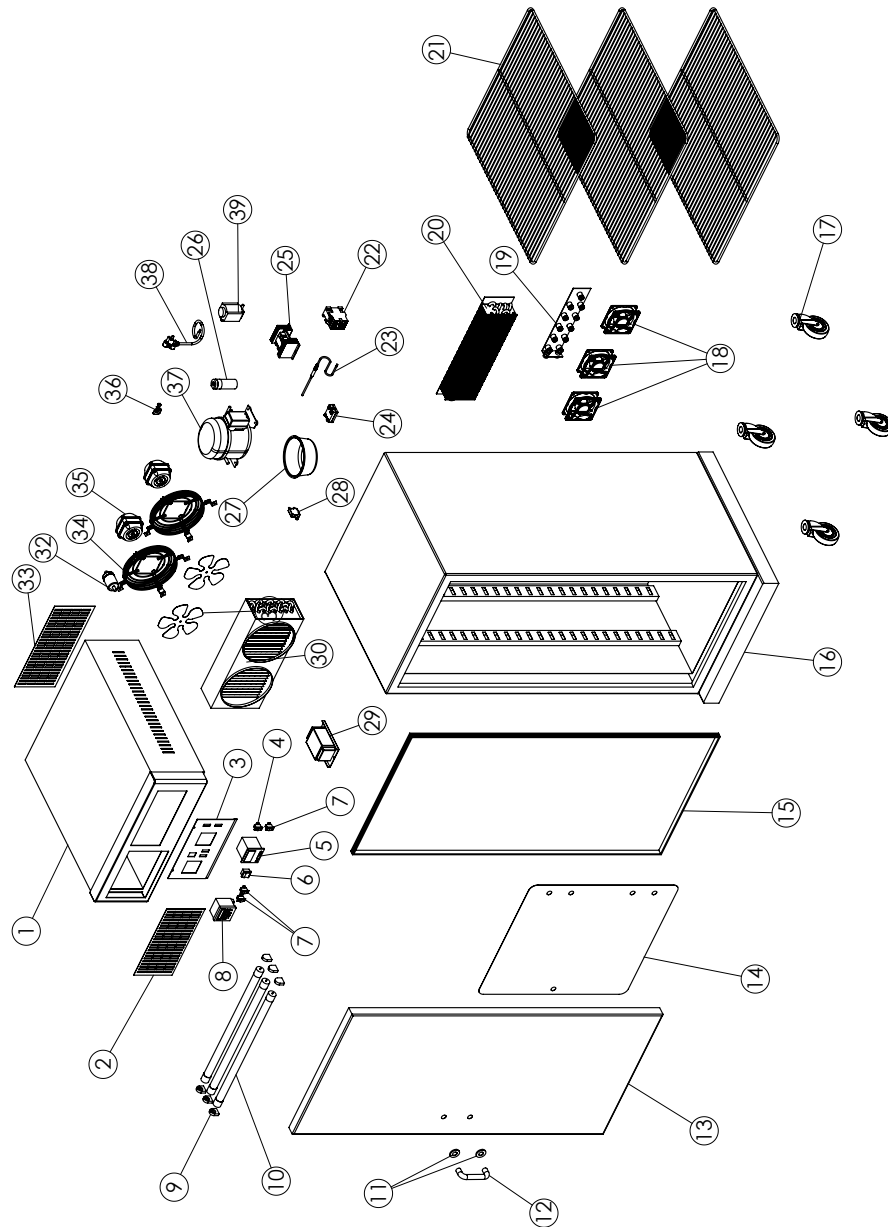


1. Select the cycle time required by turning knob "A" clockwise or alternatively turn knob counter clockwise to the ∞ (infinity) position. The infinity position will ensure that the shaker remains on continuously. Close the door.
2. Press the mains switch "D" to the on position. The switch will now illuminate, indicating there is power to the unit.
3. Select the rotation speed required by turning knob "C".The rotation speed will be indicated on the digital display "B".
4. To set the operating temperature, press mains switch "I" which will illuminate and the control display will be active, use button "H" on the controller to toggle between characters on the bottom display. The buttons "F" and "G" set the values higher or lower. Press 'SET' button "E" when the temperature value is correct. The upper display indicates the actual internal temperature.
5. The pilot light "J " indicates that the cooling system is running when equipped as in the Model 355.

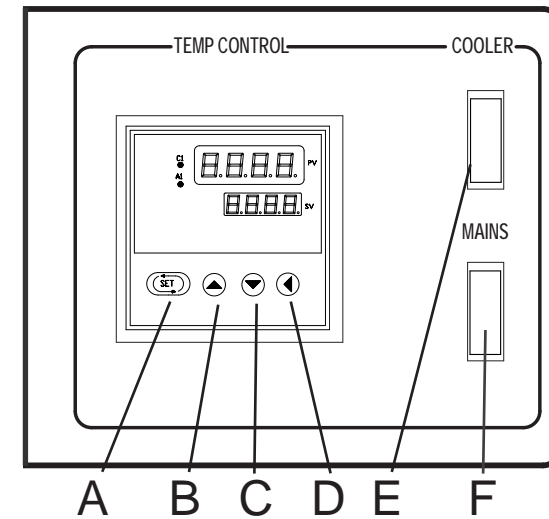
MODEL: 400L GROWTH CAMBER
MODEL CODE : 358 R02

Part No.	Description
1	TOP ENCLOSURE
2	CONDENSER ACCESS COVER
3	FACIA
4	PILOT LIGHT
5	TEMPERATURE CONTROLLER
6	SELECTOR SWITCH
7	ILLUMINATED ROCKER SWITCH
8	DIGITAL TIMER
9	LAMP HOLDER
10	15 WATT LAMP
11	DOOR HANDLE BUSH
12	DOOR HANDLE
13	DOOR
14	INNER GLASS DOOR
15	DOOR SEAL
16	OUTER ENCLOSURE
17	CASTORS
18	CIRCULATION FAN
19	HEATING ELEMENT
20	EVAPORATOR
21	SHELF
22	CONTACTOR
23	TEMPERATURE PROBE
24	SOLID STATE RELAY
25	HEAT SINK
26	CAPACITOR
27	EVAPORATION PAN
28	INLINE RESETABLE FUSE
29	ELECTRONIC BALLAST
30	CONDENSER
31	IMPELLOR
32	DRYER
33	TOP ENCLOSURE ACCESS PANEL
34	MOTOR GRID
35	FAN
36	CABLE GLAND
37	COMPRESSOR
38	POWER CORD
39	SOLONOID VALVE

EXPLODED DIAGRAM
MODEL: GROWTH CHAMBER
MODEL CODES: 358 R02

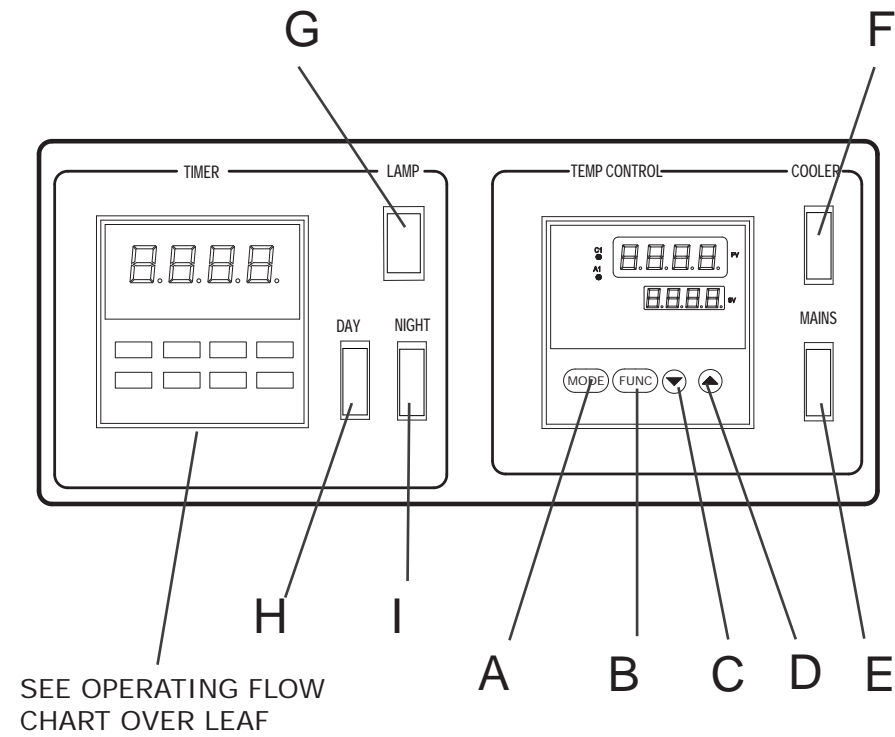


MODEL 354/356 Cooled Incubator 150I /400I



1. Press the mains switch "F" to the on position. The switch will now illuminate indicating there is power to the unit, and the controller display will be active.
2. To set the operating temperature, use button "D" on the controller to toggle between characters on the bottom display. The buttons "B" and "C" set the values higher or lower. Press 'SET' button "A" when the temperature value is correct. The upper display indicates the actual internal temperature.
3. The pilot light "E" indicates that the cooling system is running.

MODEL: 357 Growth Chamber 150I

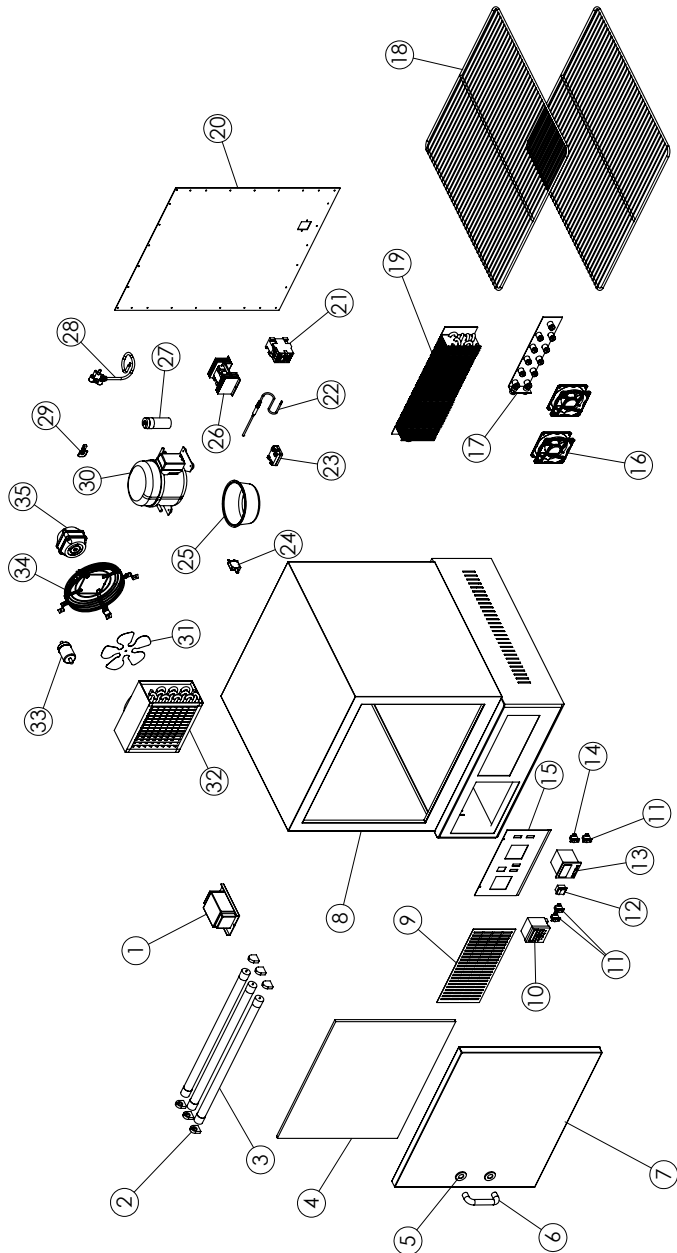


1. Press the mains switch "E" to the on position. The switch will now illuminate indicating there is power to the unit, and the controller display will be active.
2. To set the operating temperature, use 'FUNC' button "B" on the controller to toggle between characters on the bottom display. The buttons "C" and "D" set the values higher or lower. Press 'MODE' button "A" when the temperature value is correct. The upper display indicates the actual internal temperature. The unit will operate in the range 0°C to 60°C.
3. Light "F" indicates when compressor is running i.e cooling side is running and will only be lit when the temperature is under 35° C.
4. The lamp switch "G" has 3 settings in order to control the lux and be adjusted accordingly.
5. Light "H" AND "I" are purely indicators and will show which cycle either 'day' or 'night' is in progress.

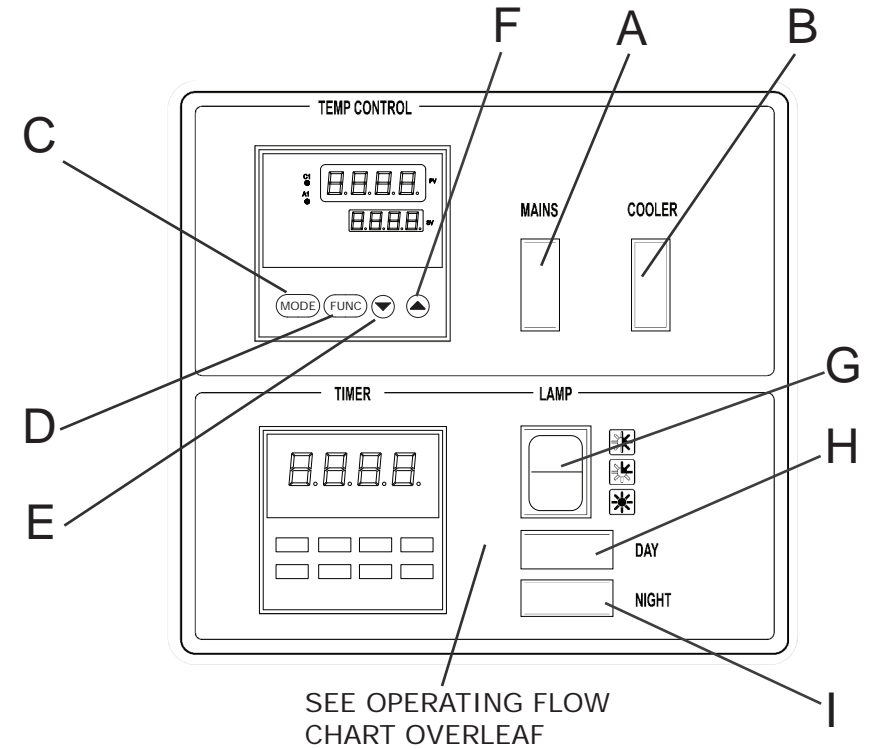
MODEL: 150L GROWTH CAMBER
MODEL CODE : 357 R01

Part No.	Description
1	ELECTRONIC BALLAST
2	LAMP HOLDER
3	15 WATT LAMP
4	INNER GLASS
5	DOOR HANDLE BUSH
6	DOOR HANDLE
7	DOOR
8	OUTER ENCLOSURE
9	CONDENSER ACCESS COVER
10	DIGITAL TIMER
11	ILLUMINATED ROCKER SWITCH
12	SELECTOR SWITCH
13	TEMPERATURE CONTROLLER
14	PILOT LIGHT
15	FACIA
16	CIRCULATION FAN
17	HEATING ELEMENT
18	SHELF
19	EVAPORATOR
20	BACK PANEL
21	CONTACTOR
22	TEMPERATURE PROBE
23	SOLID STATE RELAY
24	INLINE RESETABLE FUSE
25	EVAPORATION PAN
26	HEAT SINK
27	CAPACITOR
28	POWER CORD
29	CABLE GLAND
30	COMPRESSOR
31	IMPELLER
32	CONDENSER
33	DRYER
34	MOTOR GRID
35	FAN
36	SOLONOID VALVE

EXPLODED DIAGRAM
MODEL: GROWTH CHAMBER
MODEL CODES: 357 R01



MODEL: 358 Growth Chamber 400I

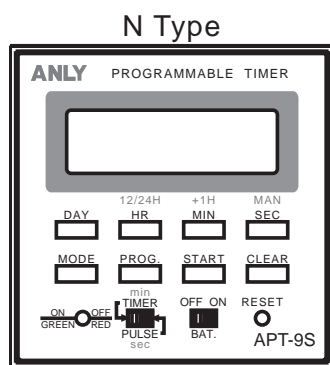


1. Ensure that the power plug of the unit is plugged into the mains power socket.
2. Press the mains switch "A" to the on position. The switch will now illuminate indicating there is power to the unit, and the controller display will be active.
3. To set the operating temperature, use 'FUNC' button "D" on the controller to toggle between characters on the bottom display. The buttons "E" and "F" set the values higher or lower. Press 'MODE' button "C" when the temperature value is correct. The upper display indicates the actual internal temperature. The unit will operate in the range 0°C to 60°C.
4. Light "B" indicates when compressor is running i.e cooling side is running and will only be lit when the temperature is under 35° C.
5. The lamp switch "G" has 3 settings in order to control the lux and can be adjusted accordingly.
6. Light "H" AND "I" are purely indicators and will show which cycle either 'day' or 'night' is in progress.

MODEL 357/358 Growth Chambers

- The controls of these growth chambers have been designed to simulate both day and night conditions and temperatures.

WEEKLY PROGRAMMABLE TIMER



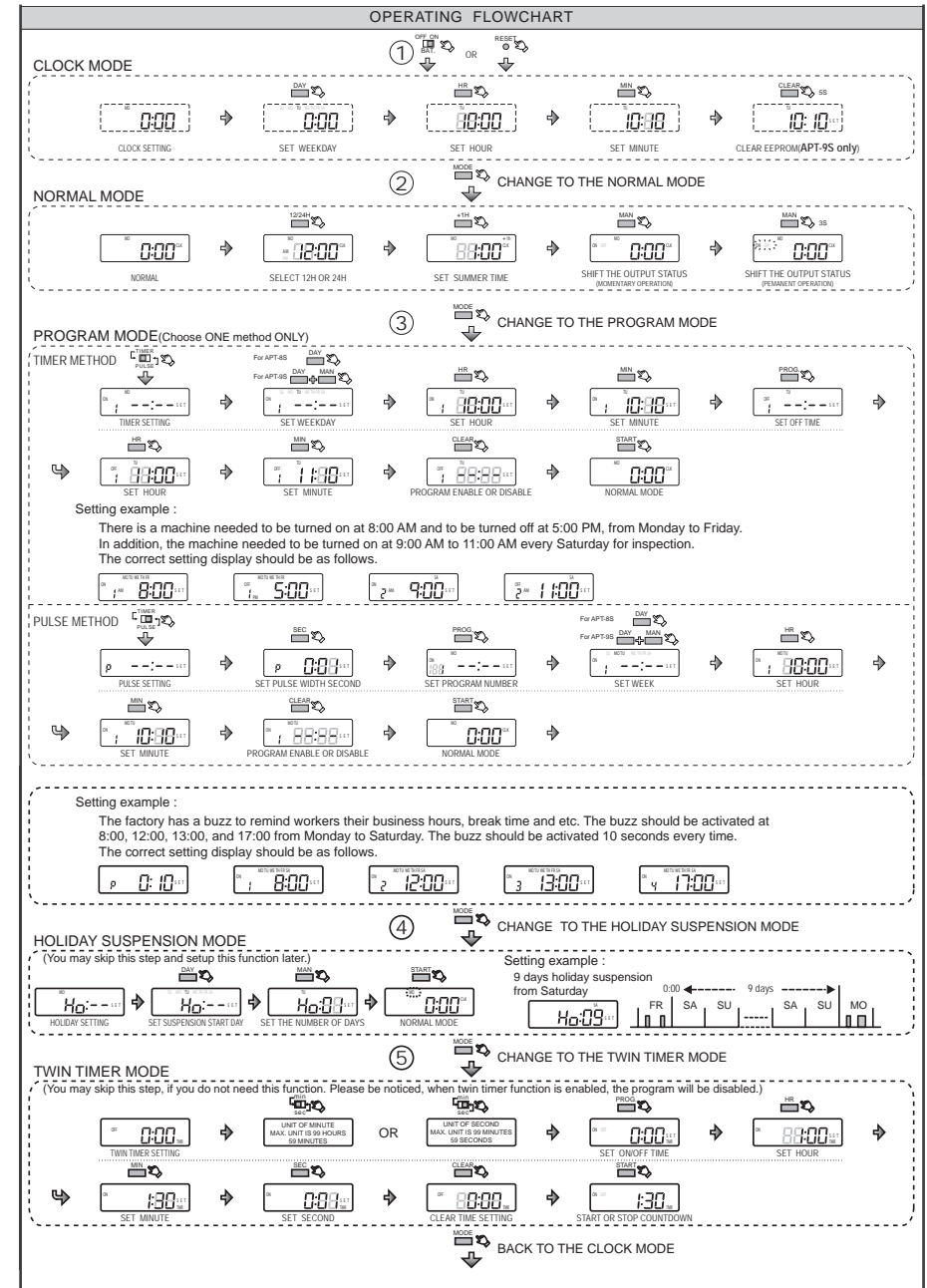
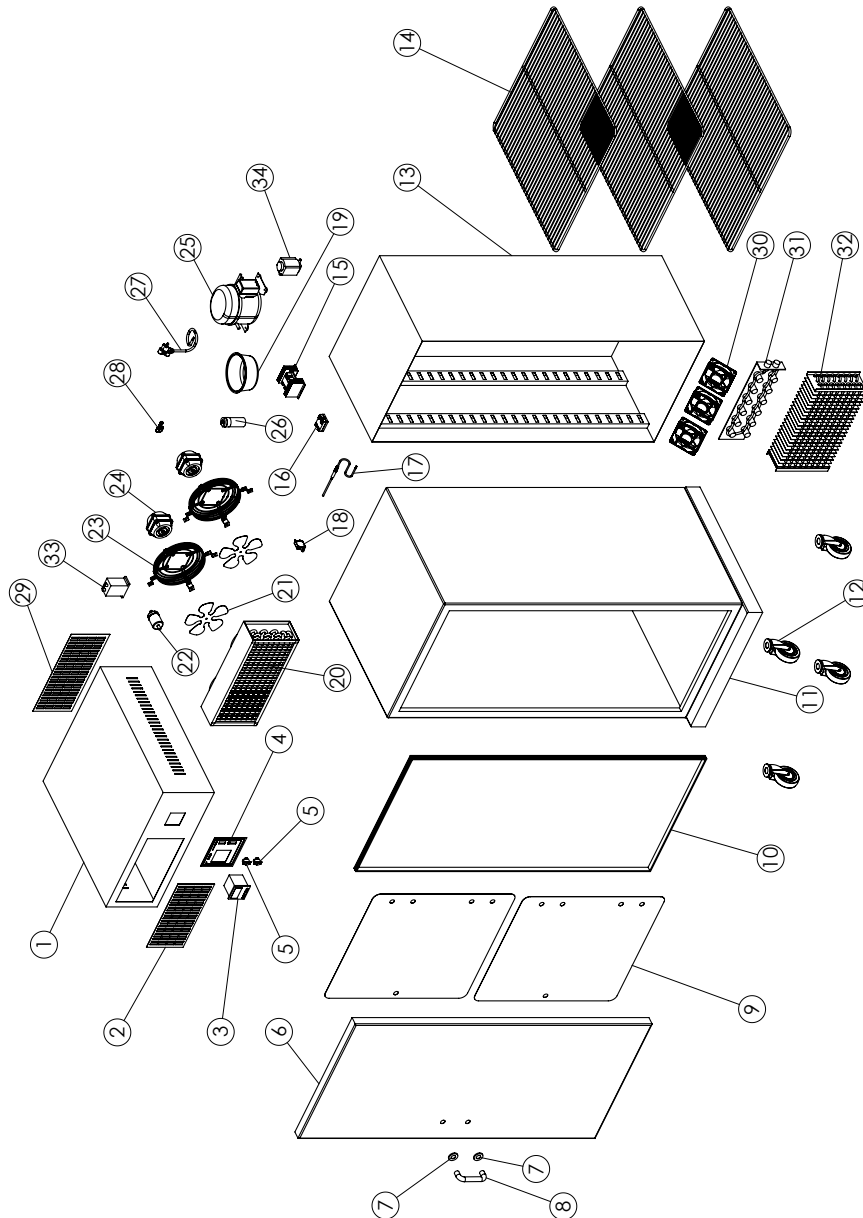
BUTTON and SWITCH FUNCTIONS

• DAY : Weekday setting	• +1H : Daylight-saving-time setting
• HR : Hour setting	• MAN : Mandatory contact enable or disable
• MIN : Minute setting	• RESET : Program reset
• SEC : Second setting	• TIMER : Timer mode
• MODE : Mode status selecting	• PULSE : Pluse mode
• PROG. : Program number setting	• min : Unit of minute (in TWIN TIMER)
• START : Normal mode setting	• sec : Unit of second (in TWIN TIMER)
• CLEAR : Clear setting	• ON : Power on (Battery on)
• 12/24H : 12H or 24H setting	• OFF : Power off (Battery off)

MODEL:400L COOLED INCUBATOR MODEL CODE : 356 R02

Part No.	Description
1	TOP ENCLOSURE
2	CONDENSER ACCESS COVER
3	TEMPERATURE CONTROLLER
4	FACIA
5	ILLUMINATED ROCKER SWITCH
6	356 DOOR
7	DOOR HANDLE BUSH
8	DOOR HANDLE
9	INNER GLASS DOOR
10	DOOR SEAL
11	OUTER ENCLOSURE
12	CASTORS
13	INNER ENCLOSURE
14	SHELF
15	HEAT SINK
16	SOLID STATE RELAY
17	TEMPERATURE PROBE
18	INLINE RESETABLE FUSE
19	EVAPORATION PAN
20	CONDENSER
21	IMPELLOR
22	DRYER
23	MOTOR GRID
24	FAN
25	COMPRESSOR
26	CAPACITOR
27	POWER CORD
28	CABLE GLAND
29	TOP ENCLOSURE ACCESS PANEL
30	INTERNAL FAN
31	HEATING ELEMENT
32	EVAPORATOR
33	DEFROST TIMER
34	SOLONOID VALVE

EXPLODED DIAGRAM
MODEL: 400L LOW TEMPERATURE INCUBATOR
MODEL CODES: 356 R02





WARNING

Electric Shock Hazard.

Keep water and other liquids from entering the inside of the equipment. Liquid inside the equipment could cause an electrical shock

Do not spray water or cleaning products. Liquid could contact the electrical components and cause a short circuit or an electrical shock. Do not use equipment if power cord is damaged or has been modified

SAFETY

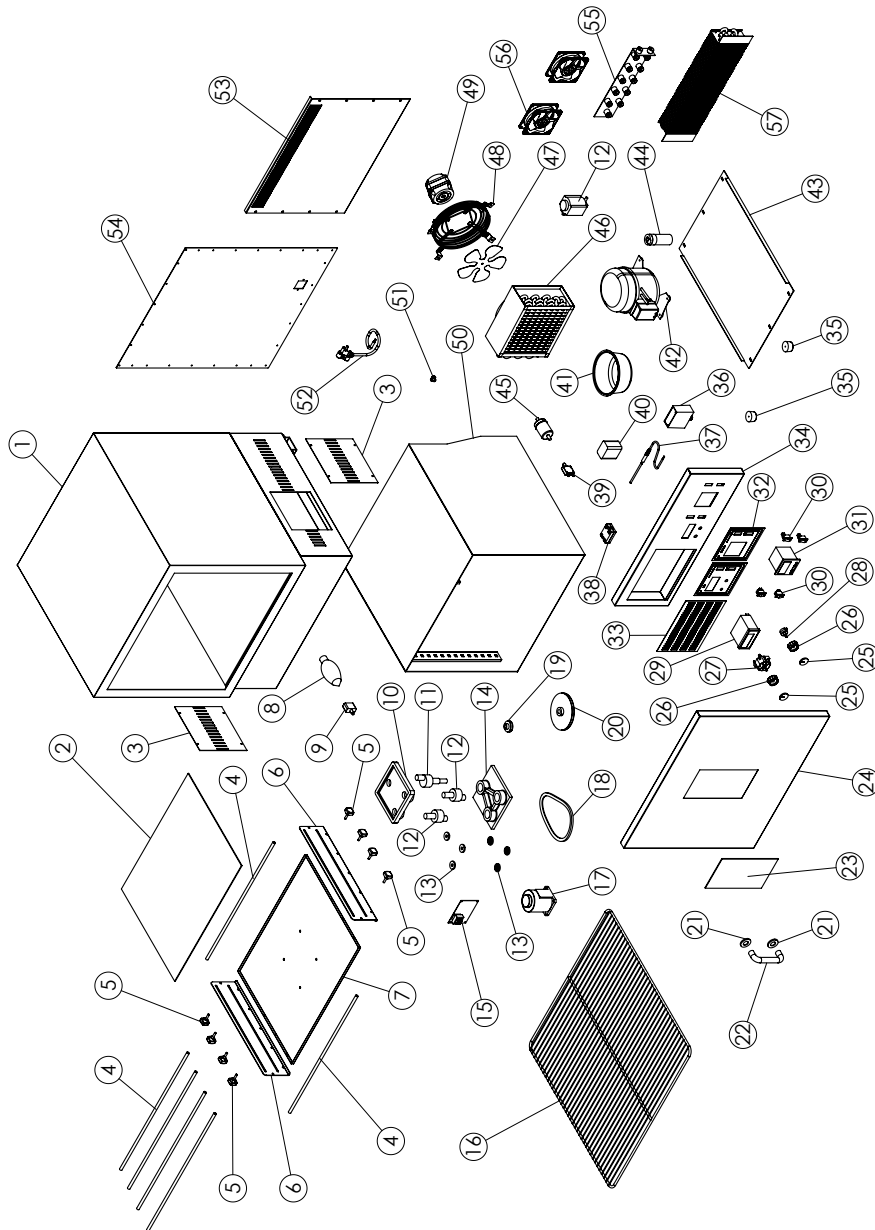
READ ALL INSTRUCTIONS BEFORE USE. FAILURE TO FOLLOW THESE PRECAUTIONS COULD RESULT IN INJURY TO YOURSELF AND OTHERS

1. When loading and unloading the shaker platforms, turn the speed control to a slow setting and switch off the mains switch.
2. Be aware of the range of movement of the platform and keep objects clear of the shaker before switching on.
3. Never leave the door open because the desired temperature cannot be reached and will result in over heating of the elements.
4. Uniformly load shelves and do not overload as this may cause damage to the incubator.
2. Use the appliances on an individual 15A mains outlet only. DO NOT OVERLOAD THE CIRCUIT.
3. This appliance is designed to operate on alternating current only (A.C). **DO NOT CONNECT TO DIRECT CURRENT (D.C)**
5. If the supply cord is damaged, it must be replaced with a new cord assemble available from the suppliers agent.
7. Supervision is necessary when the appliance is used in close proximity to children.
9. Do not operate if equipment has been damaged or is malfunctioning in any way.

MODEL:150L LOW TEMPERATURE SHAKING INCUBATOR MODEL CODE : 355 R01

Part No.	Description
1	OUTER ENCLOSURE
2	BLACK RUBBER MAT
3	SIDE COVER
4	SHAKER CROSS BAR
5	CROSS BAR LOCKING KNOB
6	SHAKER SIDE PANEL
7	SHAKER TRAY
8	INTERIOR LIGHT
9	DOOR SWITCH
10	TOP SHAKER CASTING
11	SHAKER CAM
12	SOLONOID VALVE
13	SHAKER BEARING
14	BOTTOM SHAKER CASTING
15	SPEED CONTROL PC BOARD
16	355 SHELF
17	SHAKER MOTOR
18	V BELT
19	SMALL PULLEY
20	LARGE PULLEY
21	DOOR KNOB WASHER
22	DOOR KNOB
23	DOOR VIEWING GLASS
24	DOOR 355
25	KNOB CAP
26	KNOB
27	2 HOUR TIMER
28	SPEED POTENTIOMETER
29	SHAKER SPEED INDICATOR
30	ILLUMINATED ROCKER SWITCH
31	TEMPERATURE CONTROLLER
32	FASCIA 355
33	FRONT COVER
34	CONTROL PANEL 355
35	ADJUSTABLE FOOT
36	TIMER DEFOST
37	TEMPERATURE PROBE
38	SOLID STATE RELAY
39	INLINE RESETABLE FUSE
40	RELAY
41	EVAPORATION PAN
42	COMPRESSOR
43	BOTTOM COVER
44	CAPACITOR
45	DRYER
46	EVAPORATOR
47	IMPELLOR
48	MOTOR GRID
49	FAN
50	INNER ENCLOSURE
51	CABLE GLAND
52	POWER CORD
53	INTERIOR REAR COVER
54	REAR COVER
55	HEATING ELEMENT
56	CIRCULATION FAN
57	EVAPORATOR

EXPLODED DIAGRAM
MODEL: 150 L LOW TEMPERATURE SHAKING INCUBATOR
MODEL CODES: 355 R01



ALWAYS ENSURE THAT THE UNIT IS DISCONNECTED FROM THE MAIN SUPPLY BEFORE CLEANING

CLEANING

1. This unit should not be cleaned with a water jet or immersed in water. Use only a damp cloth or sponge dipped in soapy water.
2. Wipe off the unit with a dry cloth and wait at least half an hour before re-connecting to the mains outlet.
3. To maintain the full cooling performance, clean the condenser occasionally: Remove the front panel via the two screws and clean.
4. Refrigeration gas type 134a is used in all models.

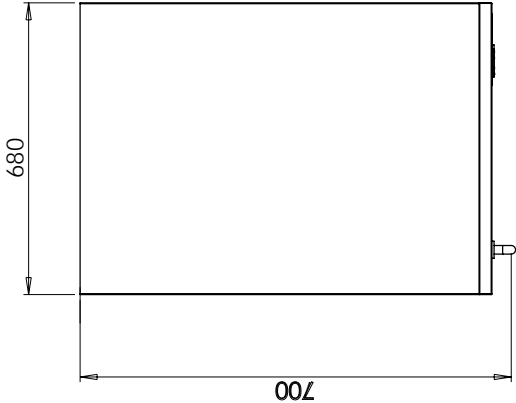
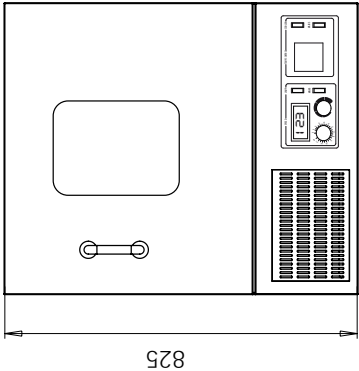
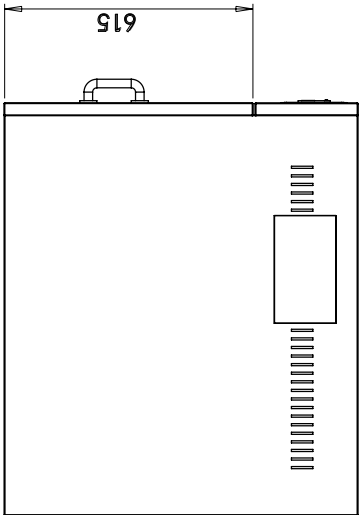


CLEAN THE STEEL PARTS WITH WATER AND SOAP. AVOID THE USE OF DETERGENTS CONTAINING ABRASIVE SUBSTANCES. ALWAYS RINSE WELL AND DRY CAREFULLY AFTER CLEANING. DO NOT USE PRODUCTS CONTAINING AGGRESSIVE CHEMICALS, ACIDS OR CHLORINE AS THIS WILL INVALIDATE THE WARRANTY



THIS APPLIANCE SHOULD NOT BE CLEANED WITH A WATER JET OR IMMERSed IN WATER. USE ONLY A DAMP CLOTH OR SPONGE DIPPED IN SOAPY WATER. DO NOT USE STEEL-WOOL WHICH WILL MARK THE FINISH.

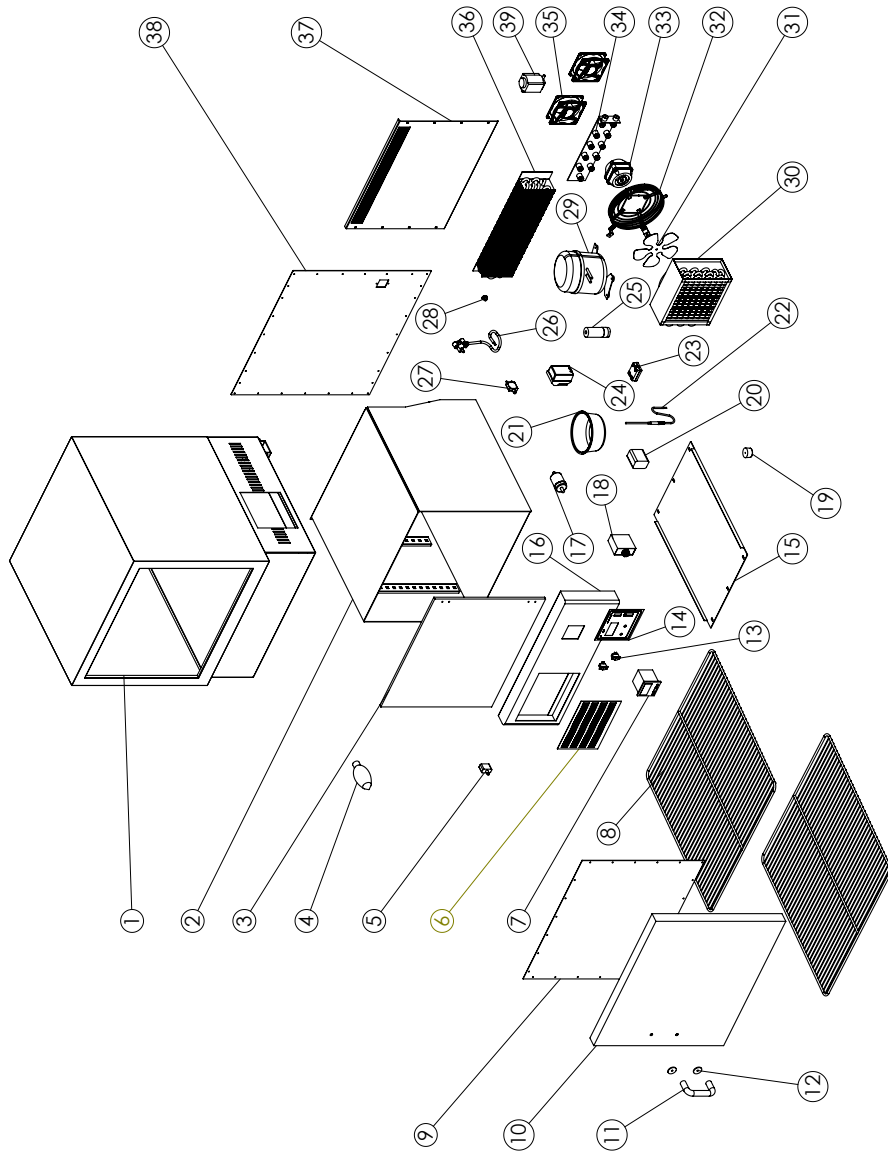
POSITIONING DIAGRAM
MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR
MODEL CODES: 353/355



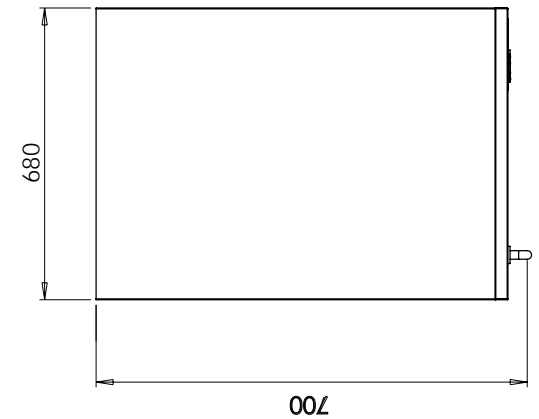
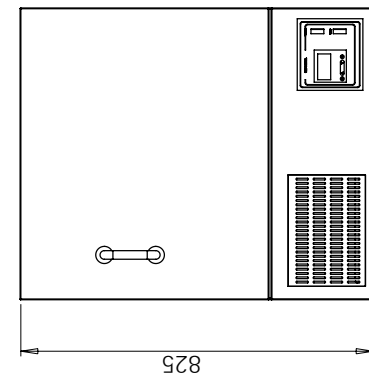
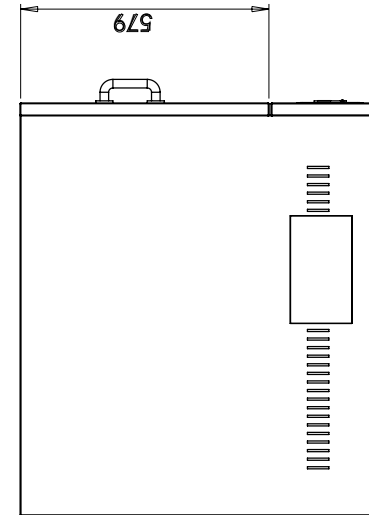
MODEL: 150L LOW TEMPERATURE INCUBATOR
MODEL CODE : 354 R01

Part No.	Description
1	OUTER ENCLOSURE
2	INNER ENCLOSURE
3	GLASS DOOR (OPTIONAL EXTRA)
4	INTERIOR LAMP
5	DOOR SWITCH
6	CONDENSER ACCESS COVER
7	TEMPERATURE CONTROLLER
8	354 SHELF
9	INNER DOOR LINER
10	POWDER COATED DOOR CARCASS ONLY
11	DOOR HANDLE
12	DOOR HANDLE BUSH
13	ILLUMINATED ROCKER SWITCH
14	FACIA
15	BOTTOM COVER
16	CONTROL PANEL COVER
17	DRYER
18	TIMER DEFROST
19	RUBBER FOOT
20	RELAY
21	EVAPORATION PAN
22	TEMPERATURE PROBE
23	SOLID STATE RELAY
24	JUNCTION BOX - FOR COMPRESSOR
25	CAPACITOR
26	POWER CORD
27	INLINE RESETABLE FUSE
28	CABLE GLAND
29	COMPRESSOR
30	CONDENSER
31	IMPELLOR
32	MOTOR GRID
33	FAN
34	HEATING ELEMENT
35	CIRCULATION FAN
36	EVAPORATOR
37	BAFFLE PLATE
38	BACK COVER
39	SOLONOID

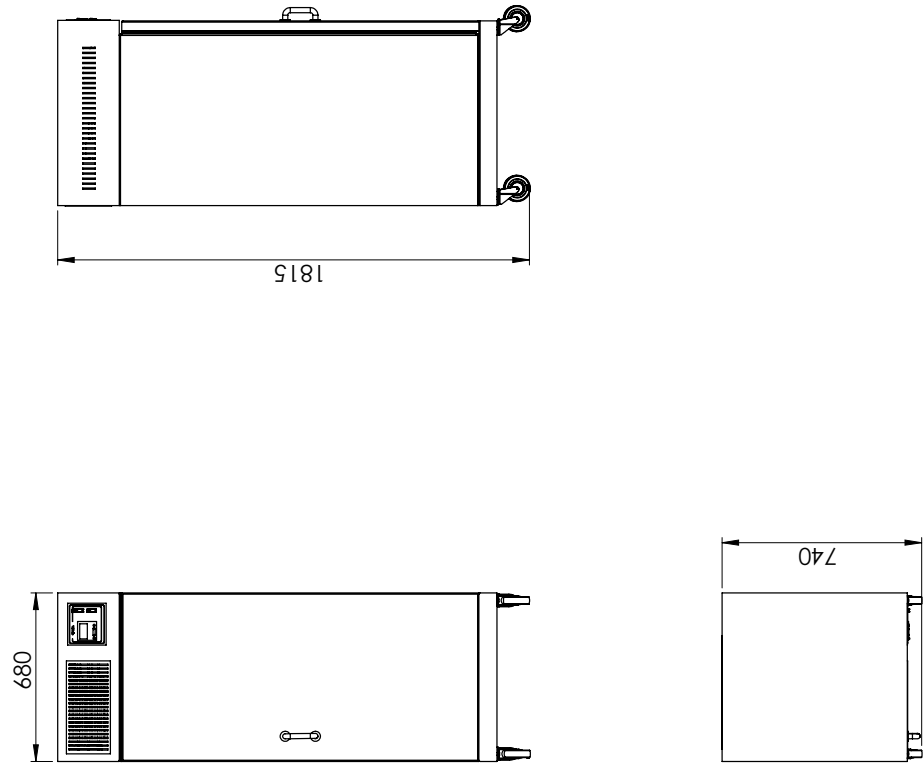
EXPLODED DIAGRAM
MODEL: 150L LOW TEMPERATURE INCUBATOR
MODEL CODES: 354 R01



POSITIONING DIAGRAM
MODEL: 150L LOW TEMPERATURE INCUBATOR
MODEL CODES: 354 /357



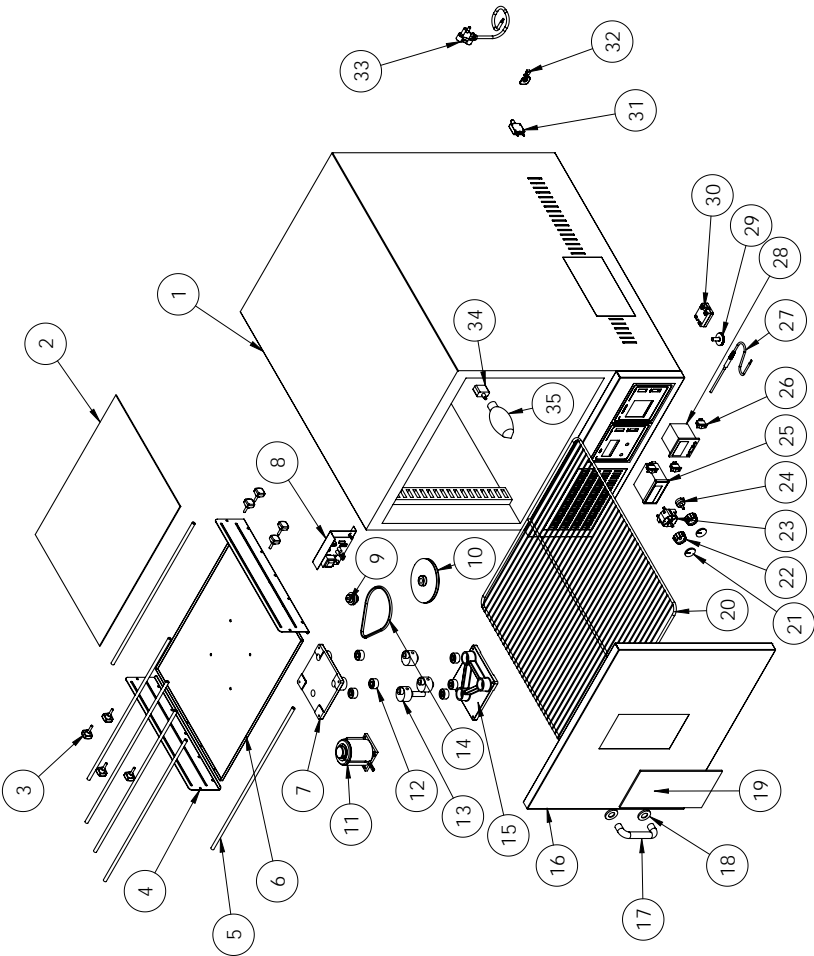
POSITIONING DIAGRAM
MODEL: 40L TEMPERATURE INCUBATOR
MODEL CODES: 356 /358



MODEL : 150L SHAKING INCUBATOR
MODEL CODE : 353 R01

Part No.	Description
1	353 BODY
2	BLACK RUBBER MAT
3	CROSS BAR LOCKING KNOB
4	SHAKER SIDE PANEL
5	SHAKER CROSS BAR
6	SHAKER TRAY
7	TOP SHAKER CASTING
8	SPEED CONTROL PC BOARD
9	SMALL PULLEY
10	LARGE PULLEY
11	SHAKER MOTOR
12	SHAKER BEARING
13	SHAKER CAM
14	"V" BELT
15	BOTTOM SHAKER CASTING
16	355 DOOR
17	DOOR KNOB
18	DOOR KNOB WASHERS
19	DOOR VIEWING GLASS
20	355 SHELF
21	KNOB CAP
22	KNOB
23	2 HOUR TIMER
24	SPEED POTENTIONMETER
25	SHAKER SPEED INDICATOR
26	ILLUMINATED ROCKER SWITCH
27	TEMPERATURE PROBE
28	TEMPERATURE CONTROLLER
29	ADJUSTABLE RUBBER FOOT
30	SOLID SATE RELAY
31	INLINE RESETABLE FUSE
32	CABLE GRIP
33	POWER CORD
34	DOOR SWITCH
35	INTERIOR LIGHT

EXPLODED DIAGRAM
MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR
MODEL CODES: 353 R01



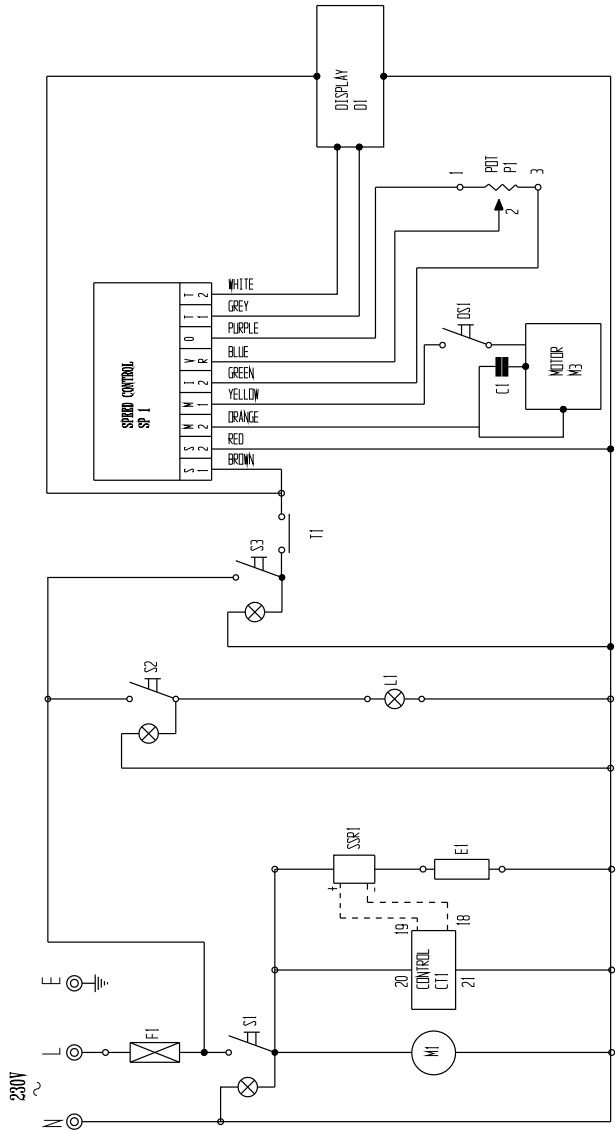
ELECTRICAL CONNECTION INFORMATION

MODEL	SHAKER PLATFORM	VOLTS (V/Hz)	POWER (WATTS)	SHELVES	CHAMBER SIZE (mm)
355	YES	230/50	1100	1	600x500x500
354	NO	230/50	1100	2	600x500x500
353	YES	230/50	1100	1	600x500x500
356	NO	230/50	1100	4	600x1350x500
357	NO	230/50	1220	2	600x500x500
358	NO	230/50	1430	4	600x1350x500



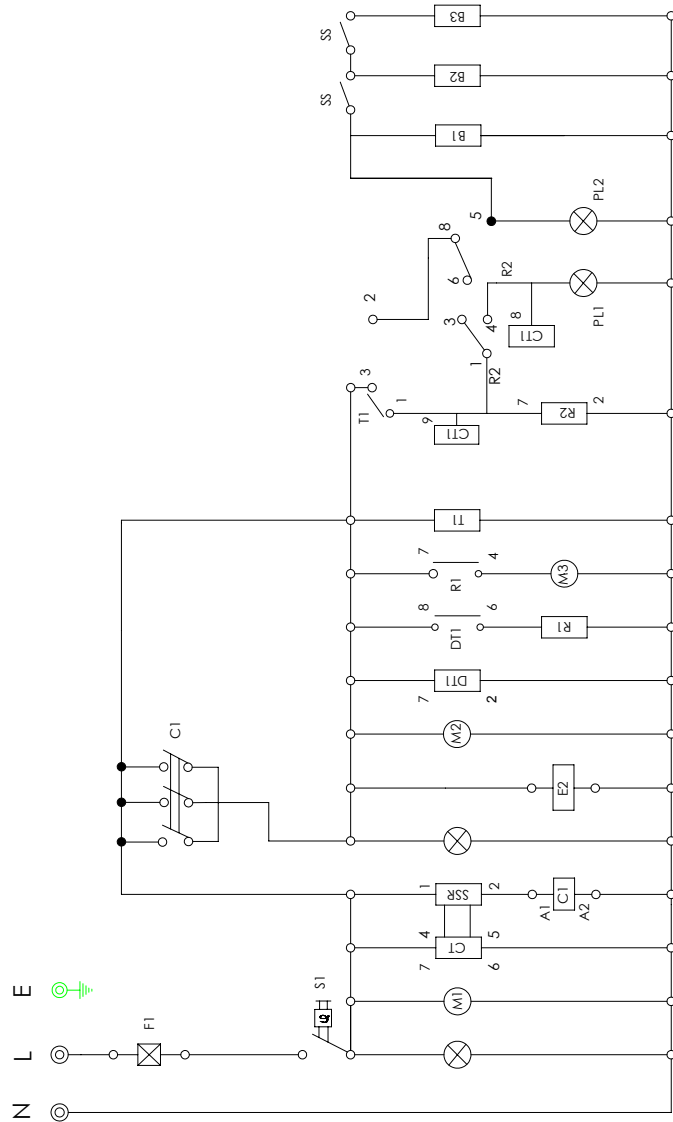
IT IS ESSENTIAL TO MAKE SURE THAT THE INCOMING VOLTAGE IS THE SAME AS THE RATED VOLTAGE OF THE UNIT AS FOUND ON THE SERIAL PLATE. THE SERIAL PLATE IS LOCATED AT THE REAR OF THE UNIT ADJACENT TO THE INCOMING CABLE ENTRY.

WIRING DIAGRAM
MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR
MODEL CODE: 353 R01



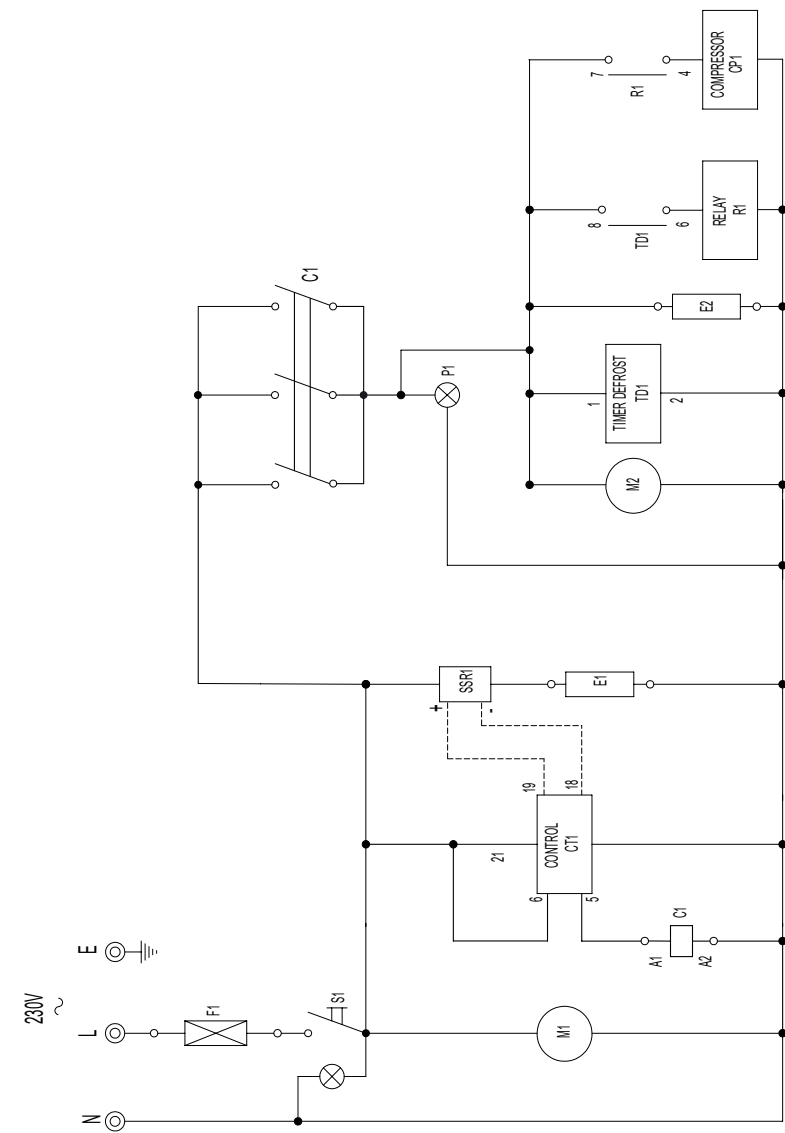
WIRING DIAGRAM LEGEND
MODEL: GROWTH CHAMBER
MODEL CODE: 357 R01/358 R01

LEGEND	DESCRIPTION	PART NUMBER
M1	EVAPORATOR FAN	1-FAN-354
M2	CONDENSER FAN	1-FAN-355
M3	COMPRESSOR	1-COMP-354
PL1	PILOT LIGHT NIGHT	1-18TRF
PL2	PILOT LIGHT DAY	1-18TRF
F1	INLINE FUSE 20AMP RESETABLE	1-RF-354
CT1	PROGRAM CONTROLLER	1-DC-CN40-PR
DT1	DEFROST TIMER	1-DT-354
T1	DAY/NIGHT TIMER	1-TIMER-357
R1	COOLING RELAY	1-8PIN-RELAY
R2	LIGHT RELAY	1-8PIN-RELAY
S1	MAINS SWITCH	1-17TAF
S2	COOLING SWITCH	1-17TAF
E1	ELEMENT 900W/230V	5-900W-354
E2	DOOR ELEMENT	
SS	LIGHT STAGE SWITCH	1-SEL-TSK0006
B1	BALLAST AND LIGHTS	1-BAL-357
B2	BALLAST AND LIGHTS	1-BAL-357
B3	BALLAST AND LIGHTS	1-BAL-357
C1	CONTACTOR	1-220V-CONT-32A
SL	SOLENOID	
M4/ M5 /M6	FAN MOTORS	1-FAN-BC0245
P1	PILOT LAMP COOLING	1-18TRF

WIRING DIAGRAM**MODEL: LOW TEMPERATURE INCUBATOR****MODEL CODE: 357 R01/358 R01****WIRING DIAGRAM LEGEND****MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR****MODEL CODE: 353 R01**

LEGEND	DESCRIPTION	PART NUMBER
F1	INLINE RESETABLE FUSE 20 AMP	1-RF-354
S1	MAINS SWITCH CONTROLLER	1-17TAF
L1	INTERIOR LIGHT	1-LH-355
M1	INTERIOR FAN	1-FAN-355
CT1	CONTROLLER	1-TCD-357
SSR1	SOLID STATE RELAY	1-SSR-40A
DS4	DOOR SWITCH	1-DS-355
E1	ELEMENT 900W/230V	5-900W-354
S2	LAMP SWITCH	1-17TAF
S3	SWITCH SPEED CONTROL	1-17TAF
SP1	SPEED CONTROL	1-SC-261
M3	SHAKING MOTOR	1-MOT-261
C1	CAPACITOR 1.5MF	1-CAP-1.5MF
P1	SPEED CONTROL POTENTIOMETER	1-SCP-261
D1	SPEED INDICATOR	1-SI-261
T1	TIMER	1-2HR-TIMER

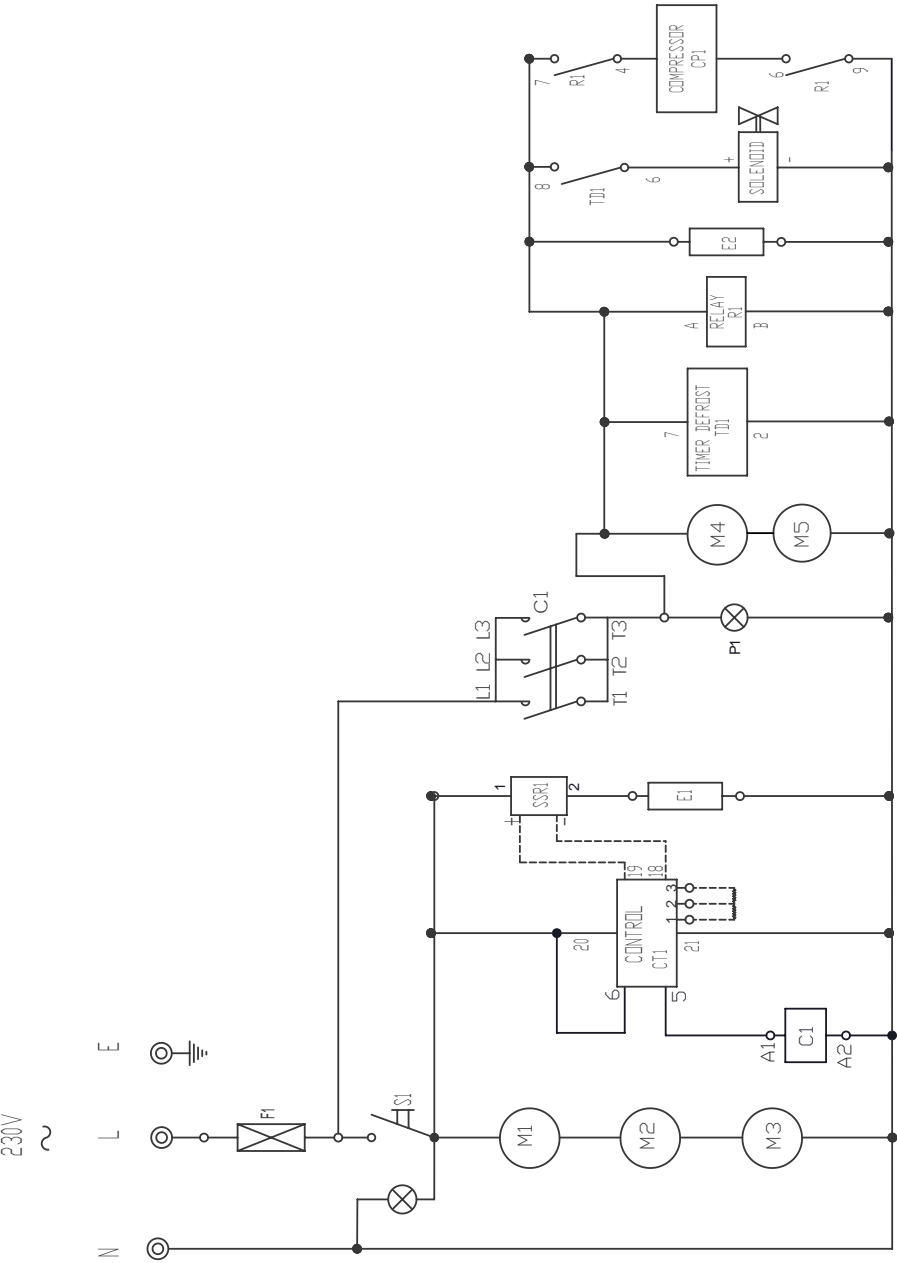
WIRING DIAGRAM
MODEL: LOW TEMPERATURE INCUBATOR
MODEL CODE: 354 R01



WIRING DIAGRAM LEGEND
MODEL: LOW TEMPERATURE INCUBATOR
MODEL CODE: 356 R02

LEGEND	DESCRIPTION	PART NUMBER
F1	INLINE RESETABLE FUSE 20 AMP	1-RF-354
S1	MAINS SWITCH CONTROLLER	1-17TAF
M1 / M2 / M3	INTERIOR FAN	1-FAN-355
CT1	CONTROLLER	1-TCD-357
SSR1	SOLID STATE RELAY	1-SSR-40A
E1	ELEMENT 900W/230V	5-900W-354
C1	CONTACTOR	1-220V-CONT-32A
TD1	TIMER DEFROST	1-DT-354
R1	RELAY	1-RL-354
CP1	COMPRESSOR ¼ HP	1-COMP-354
E2	TAPE ELEMENT	1-CAP-1.5MF
M4 / M5	COOLING FAN	
SOL	SOLENOID	

WIRING DIAGRAM
MODEL: LOW TEMPERATURE INCUBATOR
MODEL CODE: 356 R02



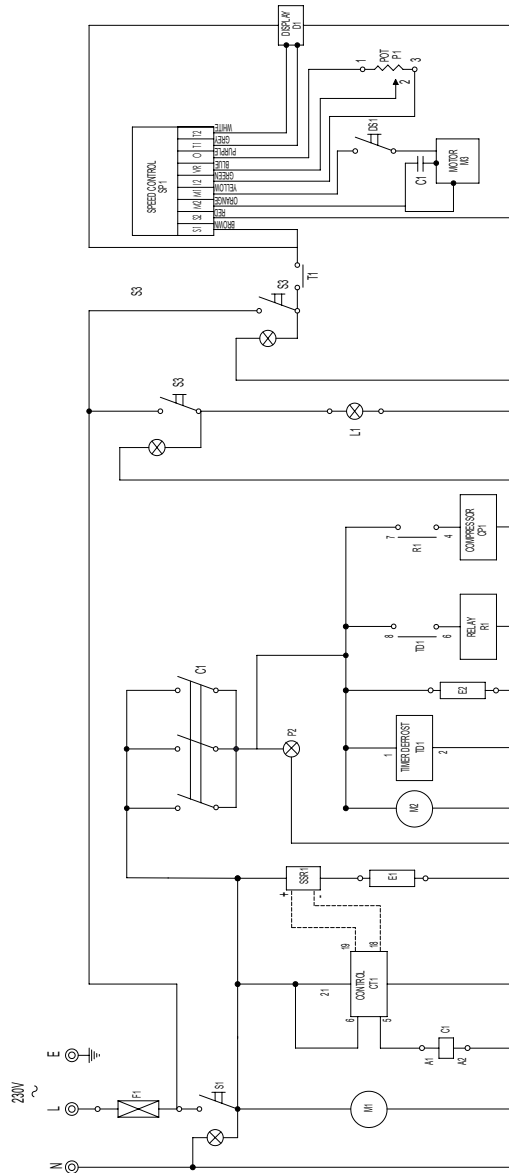
WIRING DIAGRAM LEGEND
MODEL: LOW TEMPERATURE INCUBATOR
MODEL CODE: 354 R01

LEGEND	DESCRIPTION	PART NUMBER
F1	INLINE RESETABLE FUSE 20 AMP	1-RF-354
S1	MAINS SWITCH CONTROLLER	1-17TAF
M1	INTERIOR FAN	1-FAN-355
CT1	CONTROLLER	1-TCD-357
SSR1	SOLID STATE RELAY	1-SSR-40A
E1	ELEMENT 900W/230V	5-900W-354
C1	CONTACTOR	1-220-CONT-32A
TD1	TIMER DEFROST	1-DT-354
R1	RELAY	1-RL-354
CP1	COMPRESSOR ¼ HP	1-COMP-354
E2	TAPE ELEMENT	1-CAP-1.5MF

WIRING DIAGRAM

MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR

MODEL CODE: 355 R01



WIRING DIAGRAM LEGEND

MODEL: 150L LOW TEMPERATURE SHAKING INCUBATOR

MODEL CODE: 355 R01

LEGEND	DESCRIPTION	PART NUMBER
F1	INLINE RESETABLE FUSE 20 AMP	1-RF-354
S1	MAINS SWITCH CONTROLLER	1-17TAF
L1	INTERIOR LIGHT	1-LH-355
M1	INTERIOR FAN	1-FAN-355
CT1	CONTROLLER	1-TCD-357
SSR1	SOLID STATE RELAY	1-SSR-40A
DS4	DOOR SWITCH	1-DS-355
E1	ELEMENT 900W/230V	5-900W-354
P1	LAMP SWITCH	1-17TAF
TD1	TIMER DEFROST	1-DT-354
R1	RELAY	1-RL-354
CP1	COMPRESSOR ¼ HP	1-COMP-354
E2	TAPE ELEMENT	1-CAP-1.5MF
SP1	SPEED CONTROL	1-SC-261
M3	SHAKING MOTOR	1-MOT0261
C1	CONTACTOR	1-220V-CONT-32A
C2	CAPACITOR 1.5MF	1-CAP-1.5MF
L1	INTERIOR LIGHT	1-ILH-355
D1	SPEED INDICATOR	1-SI-261
T1	TIMER	1-2HR-TIMER
P2	COOLING PILOT LIGHT	1-PL-GP