

OPERATOR'S MANUAL

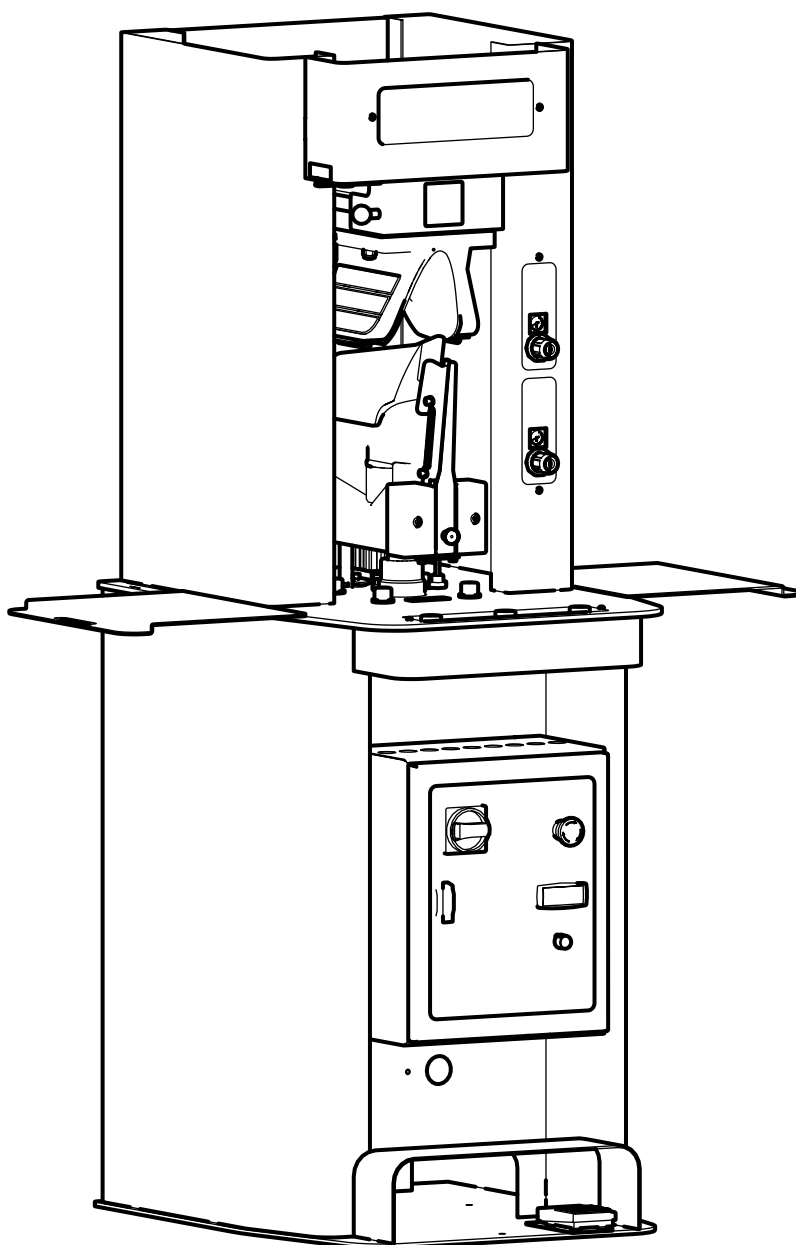


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Introduction

The purpose of this manual is to inform the owner of this machine for its operation, its maintenance and for all the safety regulations.

Please read carefully all the instructions and follow them in order to use the machine properly in the production and avoid any case of injuries.

Our company does not have any responsibility for any changes happened on the machine by the owner, or actions which are different to what this manual refers.

SAFETY REGULATIONS

This machine is intended for professional use only.



WARNING!

Only one operator may work on the machine at a time.



WARNING!

Read and follow carefully all the relative instructions to avoid serious injury.

Only qualified and authorized personnel must use the machine.

- Operators are expressly forbidden to use the machine under the influence of alcohol or drugs capable of affecting physical and mental capacity.
- Keep unauthorized persons away from the work area.
- Make sure that the machine has been installed in compliance with the established legislation and standards.
- Always keep this user manual in a place where it can be readily consulted when working on the machine. Consult it whenever you are in need of information or explanation.
- Do not remove or deface the safety, danger, warning or instruction signs. Replace any missing or illegible Danger, Warning or instructions signs.
- Never use the machine if you notice any damaged electric wires.
- Never install the machine outdoors or in any place with a lot of moisture.

WARNING

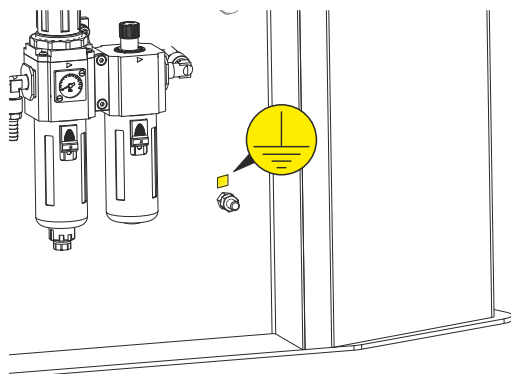


Use only original spare parts, which can be supplied by the manufacturer or the local agent. Otherwise, your machine will not be a CE product.

WARNING



The machine frame must be earthed using the outside connection point marked according to the CE norms.

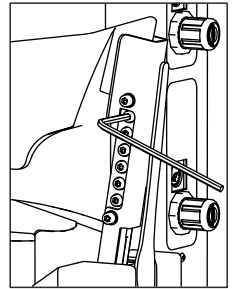


Note: Before operate the machine tight softly all the screws of the inflatable TUBOLAR (Air bag).

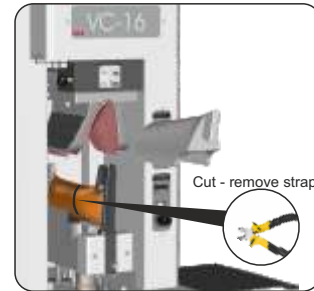


Warning

Too much tightening will destroy the TUBOLAR.

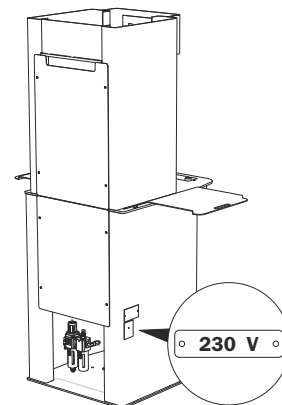


Note: Before connecting the machine to air pressure, cut the tubular transportation securing strap.



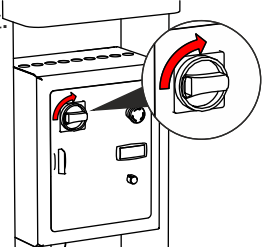
Electric and pneumatic connections

1. Connect the machine (SINGLE PHASE 230V - 50/60Hz).
2. Before plugging in the machine, check that the main supply voltage is the same as that indicated on the label situated on the back side of the machine.



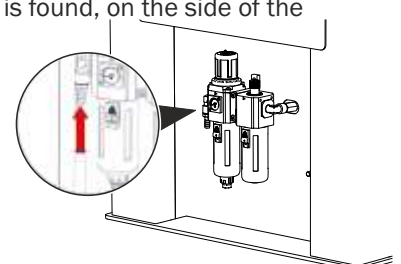
3. Check if the plug and socket have the same technical type. If not, use the suitable adapter after having consulted a certified electrician.

4. To disconnect the machine, turn the main switch off and remove the plug from the outlet.

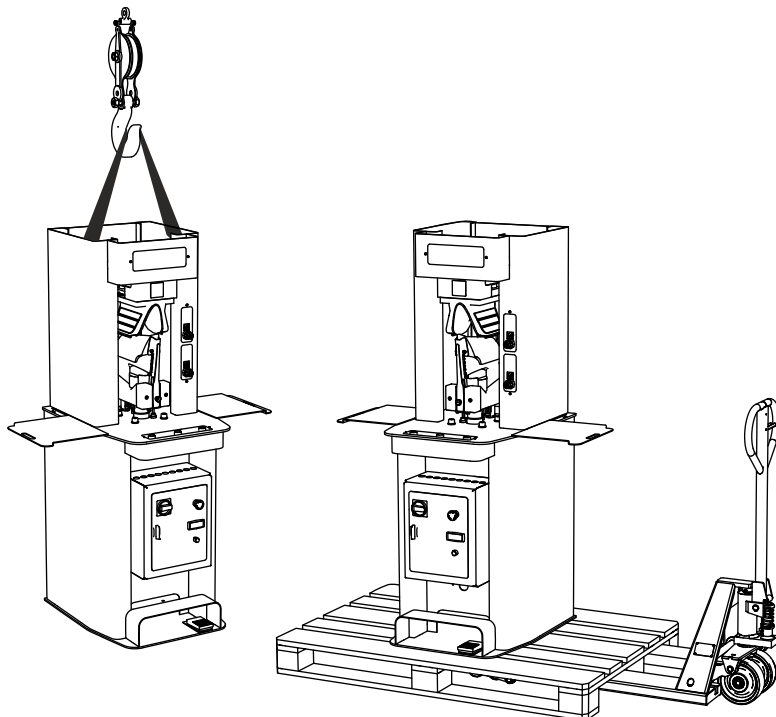


5. Connect the machine to air pressure 6 - 8bar.

6. Connect the proper pneumatic hose. Set the main pressure regulator, which is found, on the side of the machine to 6 Bar.

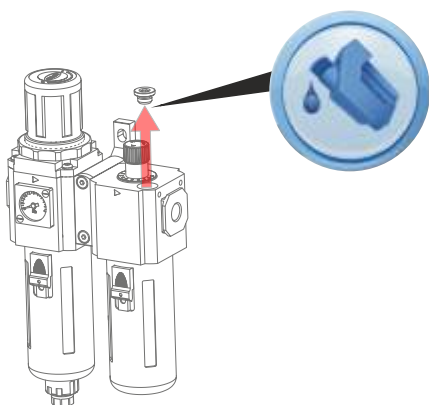


Holding - transportation

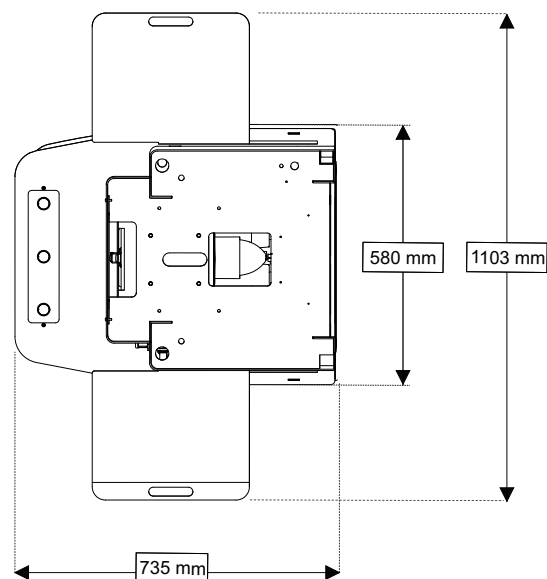
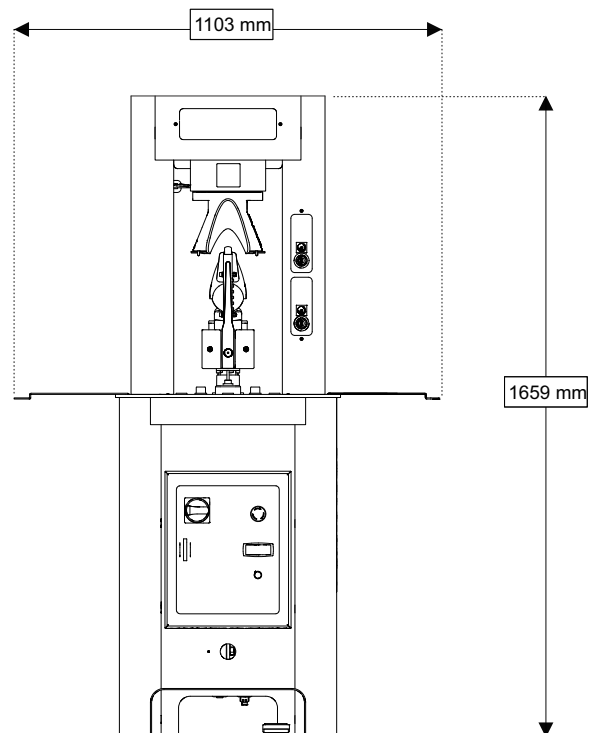


Lubrication

Keep the FRL (air-filter-regulator & lubricator) always filled with oil. We note that with 8 hours of work per day, the lubricator oil is consumed within 20-25 days approximately. If this does not occur, adjust the oil flow using the adjuster on upper part of lubricator. We recommend the use of pneumatic oil. Once per week lubricate all moving parts of the machine.

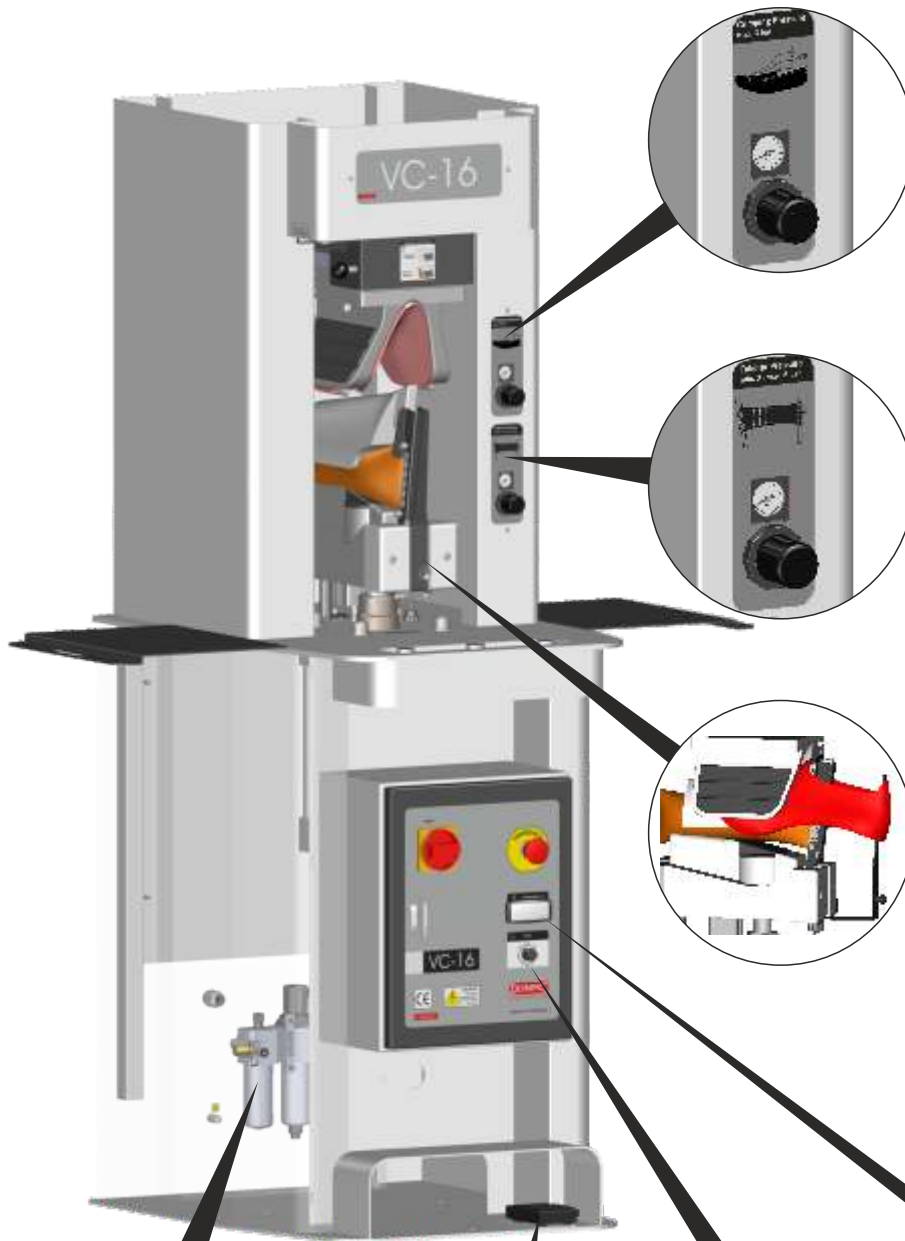


Technical Data & Dimensioning



Technical Data	VC-16
OPERATION	Electric-Pneumatic
PRESSURE	6 Bar
VOLTAGE	230V single phase 50Hz
POWER CONSUMPTION	1000 W
CAPACITY	150 pairs per hour
DIMENSIONS (mm)	735 X 1103 X 1659
DIMENSIONS (mm) - with tables folded	735 X 580 X 1659
WEIGHT	187Kgs

CONTROL SETTINGS



Crimping pressure:

The crimping is on the analogy of the pressure. By increasing the pressure, higher crimping is achieved. By decreasing the pressure lower crimping is achieved. (Suggested pressure 3-6 bar).

Tubular pressure:

Set from 3 to 6 bar. By decreasing the ironing pressure an extra flexibility is added to the mould in order a better ironing to be achieved to boot uppers. (Suggested pressure 3-6 bar).



WARNING!

Do not reduce the ironing pressure lower than 3 bar because you reduce dramatically the TUBULAR lifetime.

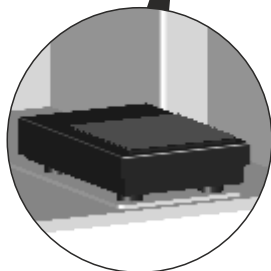
Position Guide:

Adjust the guide to the desirable position, according to the A-F Scale



Filter regulator :

Max. 6 bar



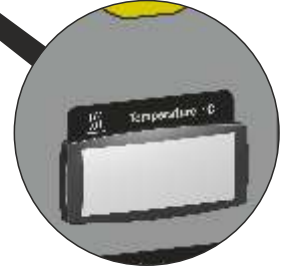
Foot Switch

Press and release to place the upper on the desired position



Time:

Set the timer from 5 to 30 sec. By increasing the time a higher crimping is succeeded. (Suggested Time 6 sec).



Temperature:

Set the temperature from 90 to 160°C. Temperature is a basic factor for the crimping. Choose the higher temperature (according the material you use) for higher crimping. (Suggested Temperature 120°C).

OPERATION



Step 1. Place the upper as shown in the Figure 1



Step 2. Press the pedal to hold the upper (Figure 2). Before continuing the procedure be sure that the upper is in the right crimping position.

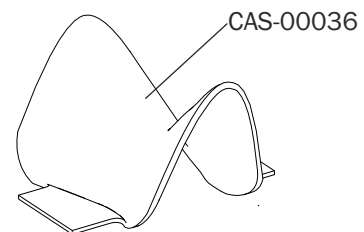
For correct placing release the pedal, correct the place of the upper and press it again.



Step 3. Press the START buttons at the same time and release the pedal to complete the procedure. The machine will revert to its initial position after the end of the setting time.

Attention!

If there is an emergency press the EMERGENCY button to cancel the procedure. To operate again the machine, rotate the button according to the arrow's direction.



- If you use sensitive materials that cannot afford high temperatures use the silicon head jacket to protect them.
- The Silicon head jacket must also be used when you have decoratives on the uppers. **Otherwise the Teflon covering of the mould (CAS-00007) will be destroyed and you will have marks on your uppers.**

Maintenance



- Once a week lubricate the rod of the cylinder ASM-00850 with oil type SAE 30
- Once a week check the oil level of the air pressure lubricator P1 and add oil type TELUS 32 (SHELL) or something similar.
- Once a week add a few drops of oil at the back part of the machine after you have taken off the red cap.

Every six months check the good operation of the lubricator.

Note: The lubricator must drip one drop every 20 operation cycles.

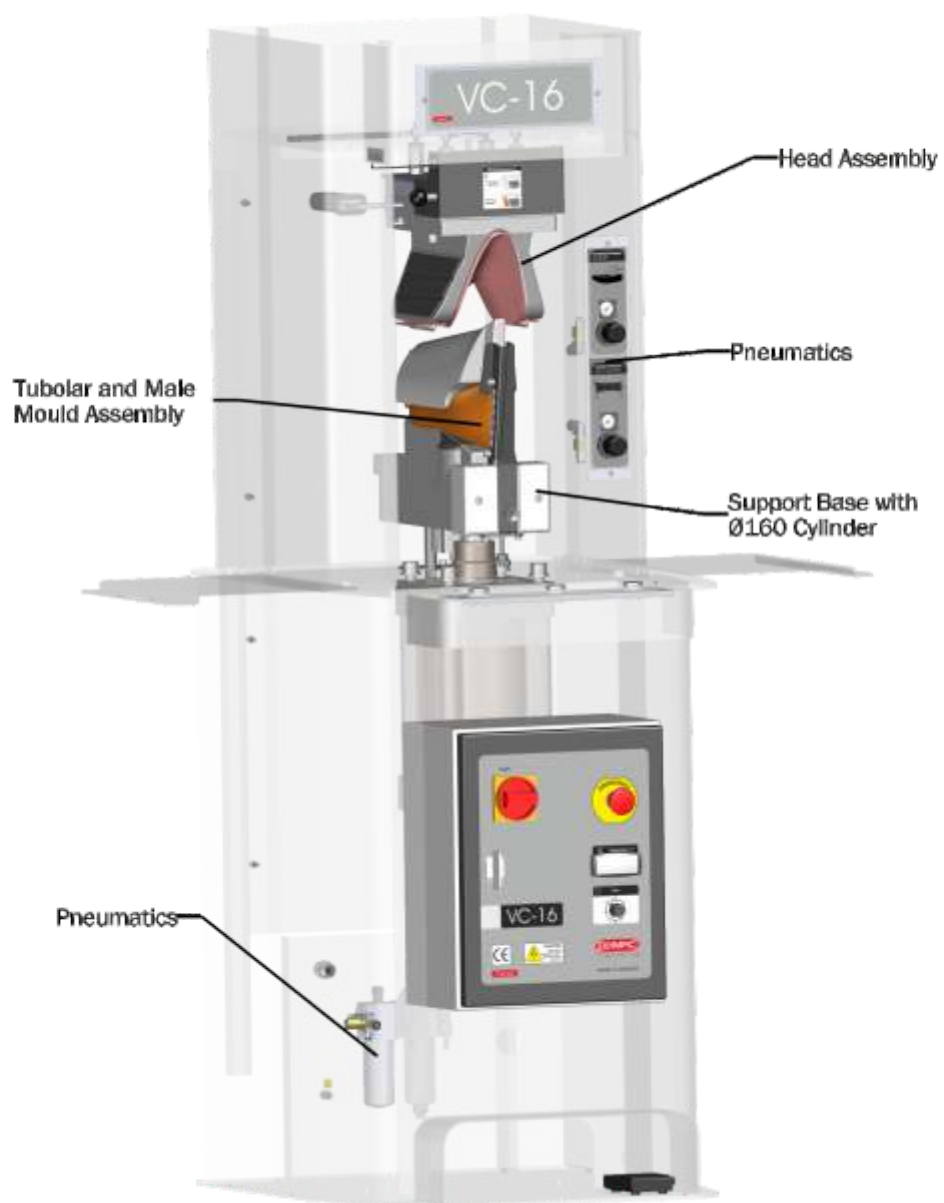
ASSEMBLING VC-16

VC-16 Head & Jacket Assembly (Page 9)

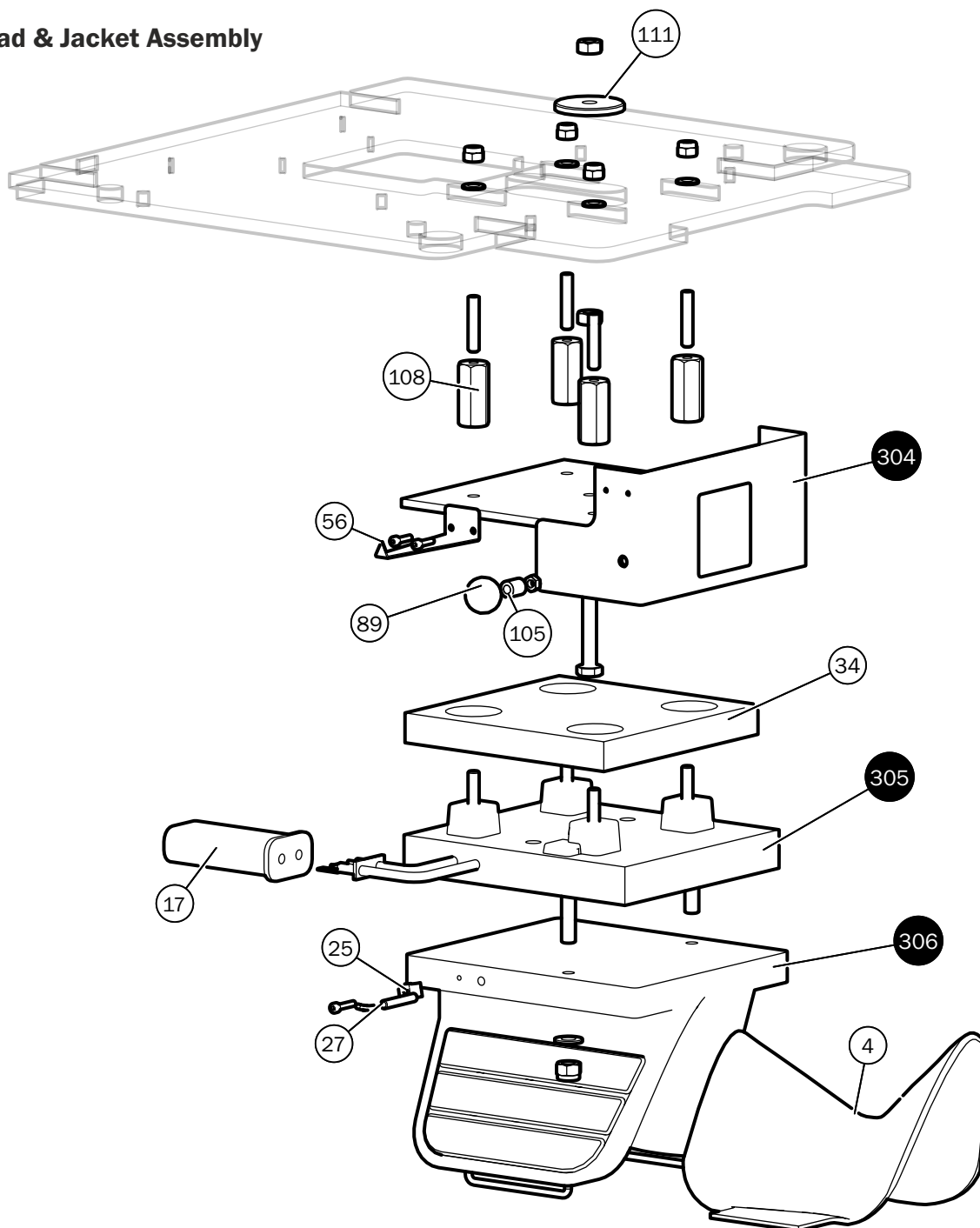
VC-16 Tubular & Male Mould Assembly (Page 10)

VC-16 Support Base & Ø160 Cylinder Assembly (Page 11)

VC-16 Side Tables Assembly (on demand) (Page 12)

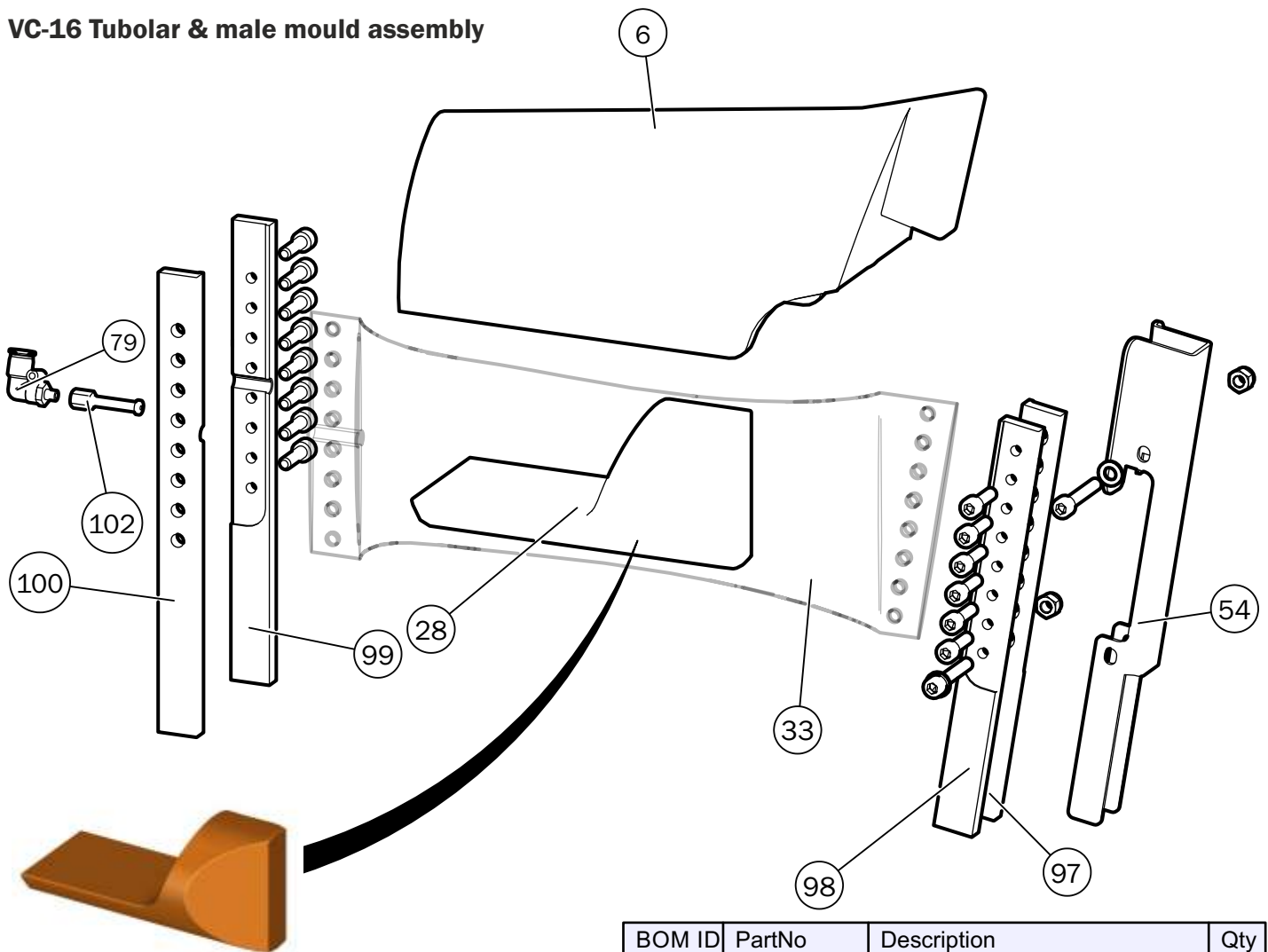


VC-16 Head & Jacket Assembly



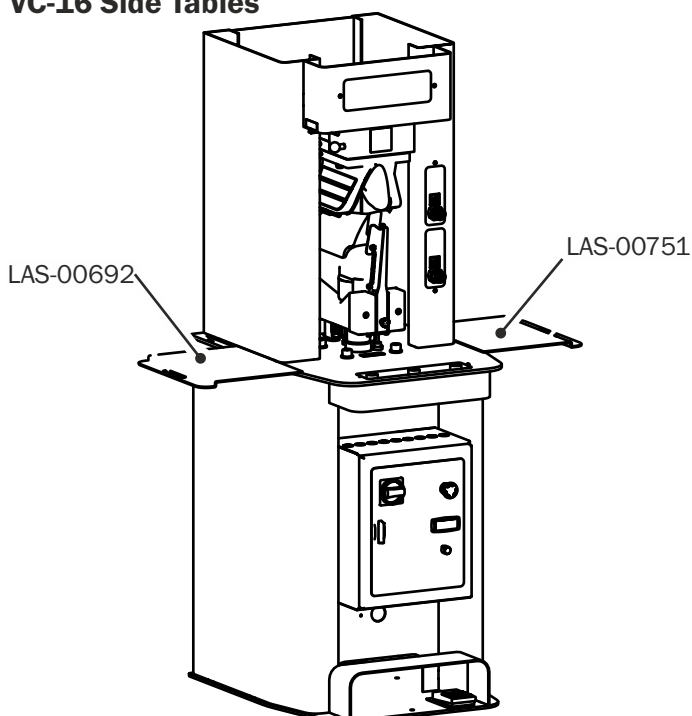
BOM ID	PartNo	Description	Qty
4	CAS-00036.	VITON HEAD JACKET	1
17	ELE-00016	ELECTRIC ELEMENT ISOLATOR	1
25	ELE-00398	METAL MOUNTING Φ5	1
27	ELE-00519	HEATING SENSOR 6x40 (L=370CM)	1
34	GEN-00404	INSULATOR	1
56	LAS-00774	POINTER	1
89	PNE-00690	BALL Φ26	1
105	REV-00319	SPACER	1
108	REV-00388	SPACER	4
111	REV-00394	WASHER	1
304	ASM-00914	PLATE WITH COVER	1
305	ASM-00896	ΑΝΤΙΣΤΑΣΗ ΖΕΣΤΗΣ ΚΕΦΑΛΗΣ VC-16	1
306	ASM-00854	CASTED HEAD WITH ISOLATOR	1

VC-16 Tubular & male mould assembly

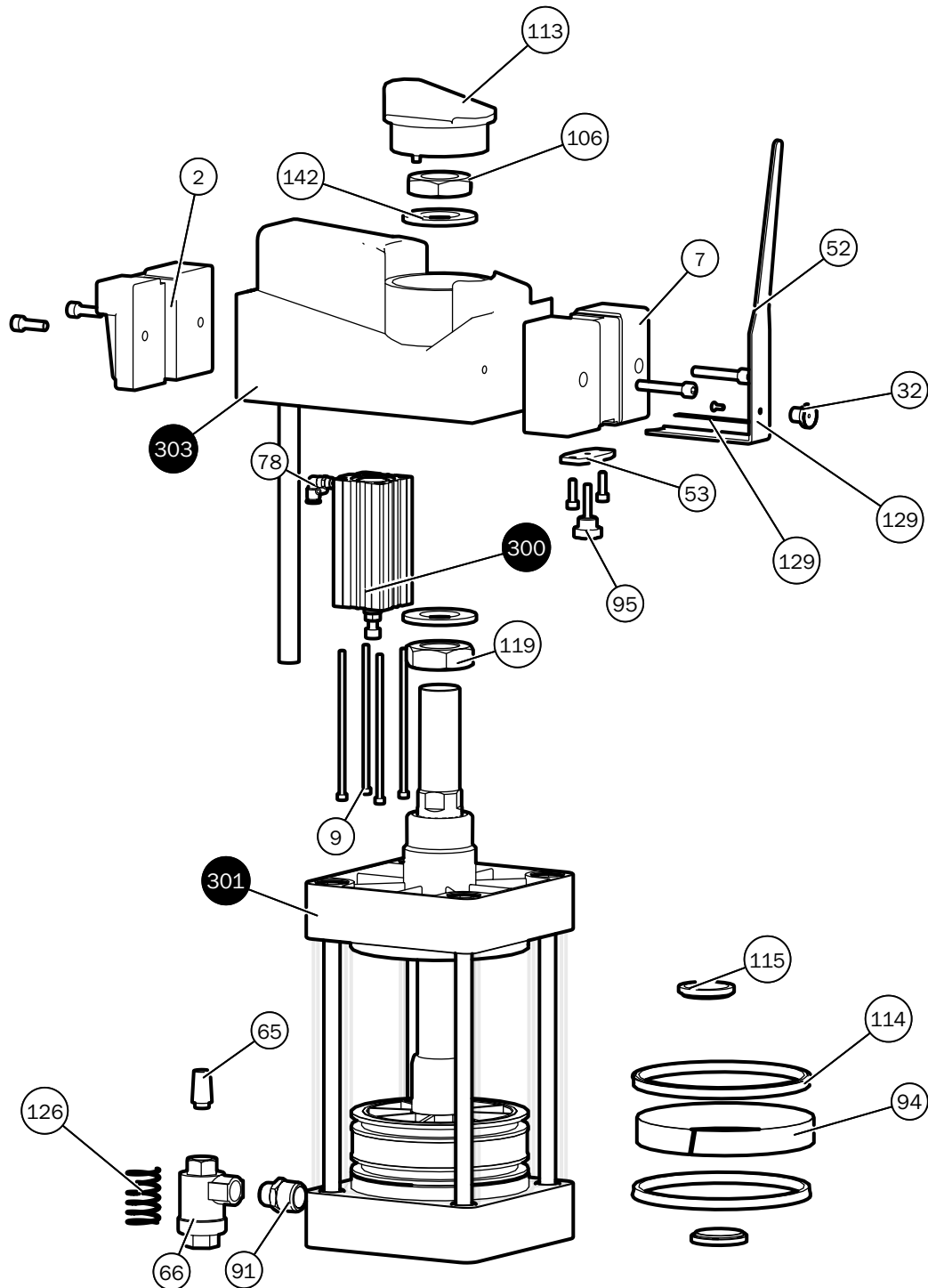


BOM ID	PartNo	Description	Qty
6	CAS-00124	VC-16 SILICON MALE MOULD	1
28	GEN-00003	VC-16 VULCOLAN STUFFING	1
33	GEN-00403	TUBULAR BODY - VC16 SERIES	1
54	LAS-00713	HOLDING FLANGE	1
79	PNE-00030	FITTING, ANGLE, M5 - Φ4	1
97	REV-00007	RIGHT FRONT GUIDE	1
98	REV-00008	LEFT FRONT GUIDE	1
99	REV-00009	RIGHT REAR GUIDE	1
100	REV-00010	LEFT REAR GUIDE	1
102	REV-00098	TUBULAR VC-16 M5 FITTING	1

VC-16 Side Tables



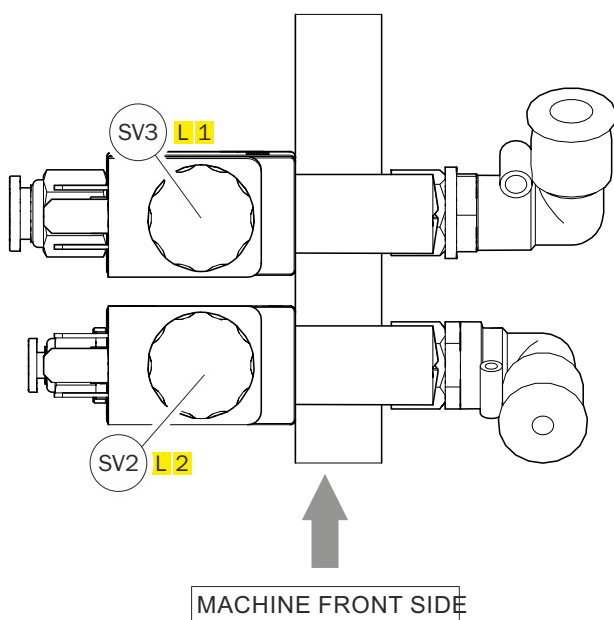
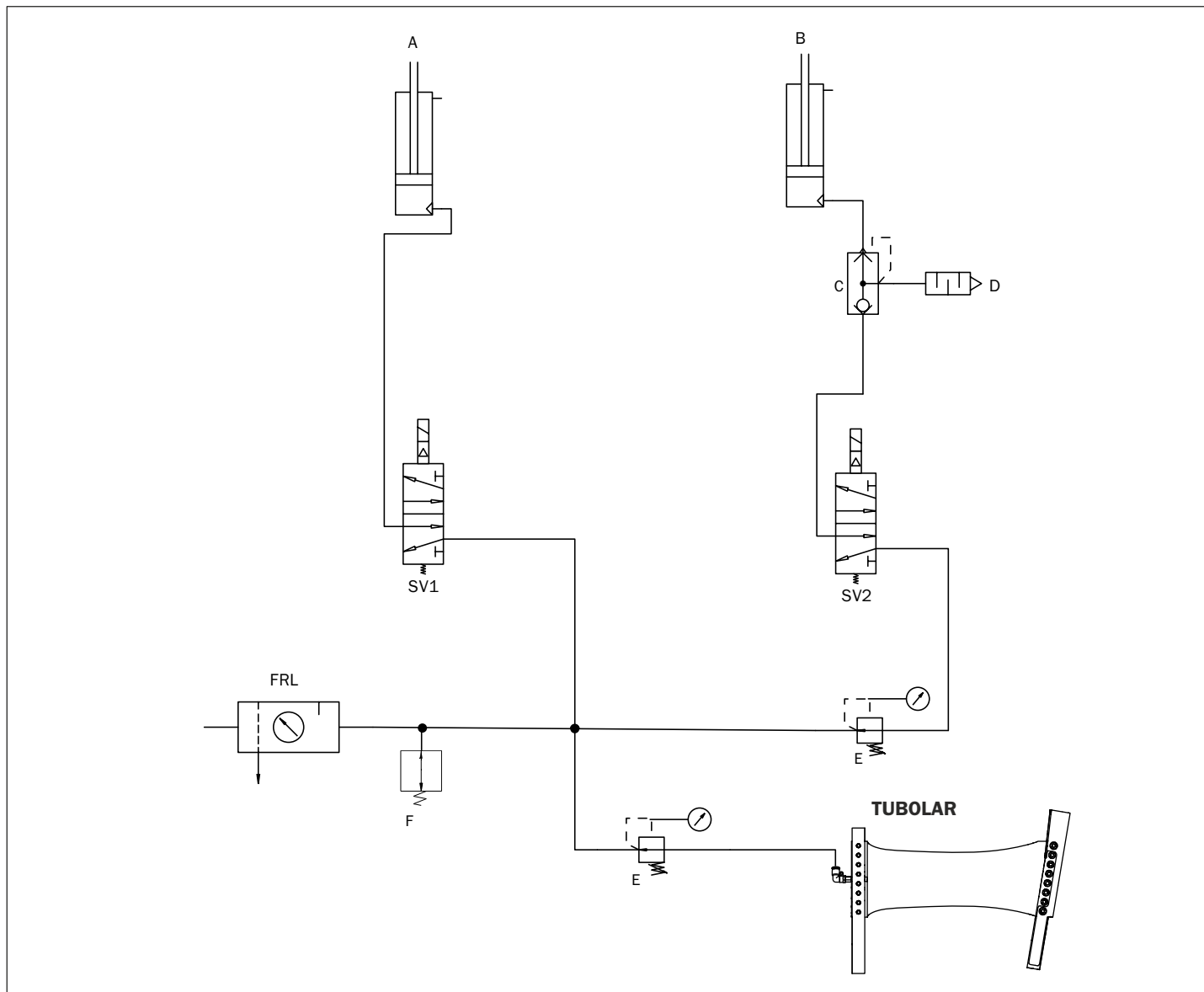
VC-16 Support Base & Ø160 Cylinder Assembly



BOM ID	PartNo	Description	Qty
2	CAS-00003	GUIDE BLOCK	1
7	CAS-00125	CASTED CAP	1
9		SCREW DIN912 M5x130	4
32	GEN-00393	KNURLED KNOB	1
52	LAS-00710	UPPER GUIDE	1
53	LAS-00711	HOLDING PLATE	1
65	PNE-00002	SILENCER, BRASS, CONIC, 1/2	1
66	PNE-00003	QUICK EXHAUST VALVE 1/2"	1
78	PNE-09916	FITTING, ELBOW, 1/8 - Φ4	1
91	PNE-00948	NIPPLE, CONIC, REDUCING, 1/2 - 3/4	1
94	PNE-00985	INTERNAL RING, 159x157x10.4	1
95	PNE-01082	LOBE KNOB, MALE, 7-LOBE, Φ25, M6x30	1

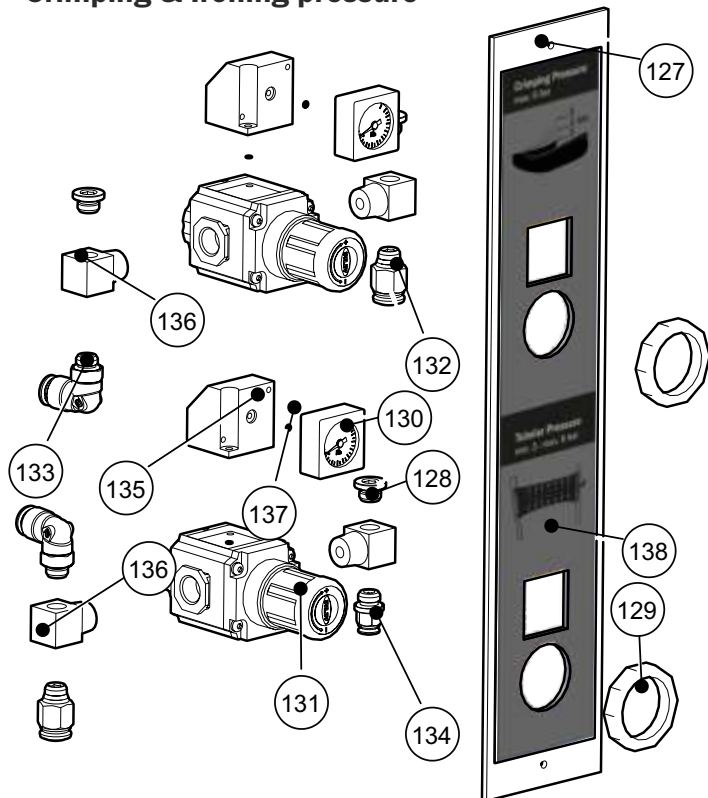
BOM ID	PartNo	Description	Qty
106	REV-00376	NUT, CUSTOM, M36x2.0	1
113	RUB-00094	VC-2014 RUBBER CAP	1
114	RUB-00104	PISTON SEAL FOR Φ160	2
115	RUB-00105	CAP SEAL FOR PISTON Φ160	2
119		NUT M36x2	1
126	SPR-00005	QUICK EXHAUST VALVE'S SPRING	1
129	STK-00057	STICKER, TPA-11, SCALE A-F	1
142	FAS-01040	WASHER DIN 125 - A 36	2
300	PNE-00968	CYLINDER 40x75	1
301	ASM-00694	CYLINDER Φ160x240 FOR SUPPORT BASE MOVEMENT	1
303	ASM-00527	SUPPORT BASE CASTED ASSY	1

VC-16 Pneumatic Diagram



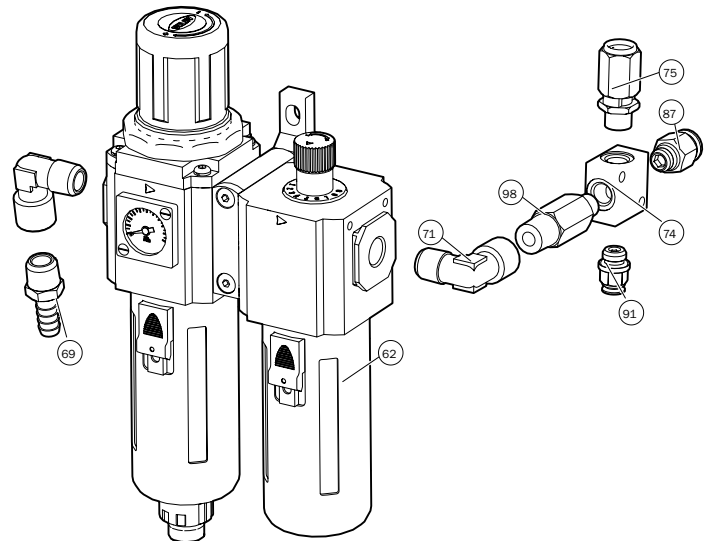
SYMBOL	P/N	DESCRIPTION
A	PNE-00968	CYLINDER ACQ 40X75
B	PNE-00969	CYLINDER SI 160x240
C	ASM-00849	QUICK EXHAUST VALVE 1/2 ASSY
D	PNE-00002	SILENCER, 1/2
E	ASM-00846	CRIMPING PRESSURE ADJUSTMENT
F	PNE-00092	SAFETY VALVE, 1/8
H	ASM-00846	IRONING PRESSURE ADJUSTMENT
SV1	ASM-00461	VALVES 5/2 1/8 WITH COIL
SV2	ASM-00461	VALVES 5/2 1/8 WITH COIL

Crimping & Ironing pressure



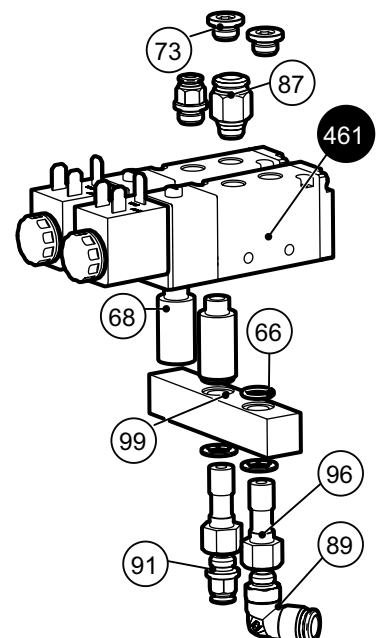
BOM ID	PartNo	Description	Qty
127	LAS-00781	PLATE	1
128	PNE-00072	PLUG, MALE, PARALLEL, 1/8	3
129	PNE-00543B	PLASTIC NUT	2
130	PNE-00543C	REGULATOR GAUGE	2
131	PNE-00543D	PRESSURE REGULATOR 1/4 BODY	2
132	PNE-01001	FITTING, STRAIGHT, 1/8-Φ8	2
133	PNE-01064	ADAPTOR, ELBOW MALE, 1/8-Φ8	2
134	PNE-09919	STRAIGHT MALE ADAPTOR 4-1/8"	1
135	REV-00380	BASE	2
136	REV-00389	FITTING, CUSTOM, 1/4 TAPER	4
137	RUB-00126	ORING, NBR, 2,9x1,78	4
138	STK-00133	STICKER, BUTTONS, VC-16 SERIES	1

FRL with fittings



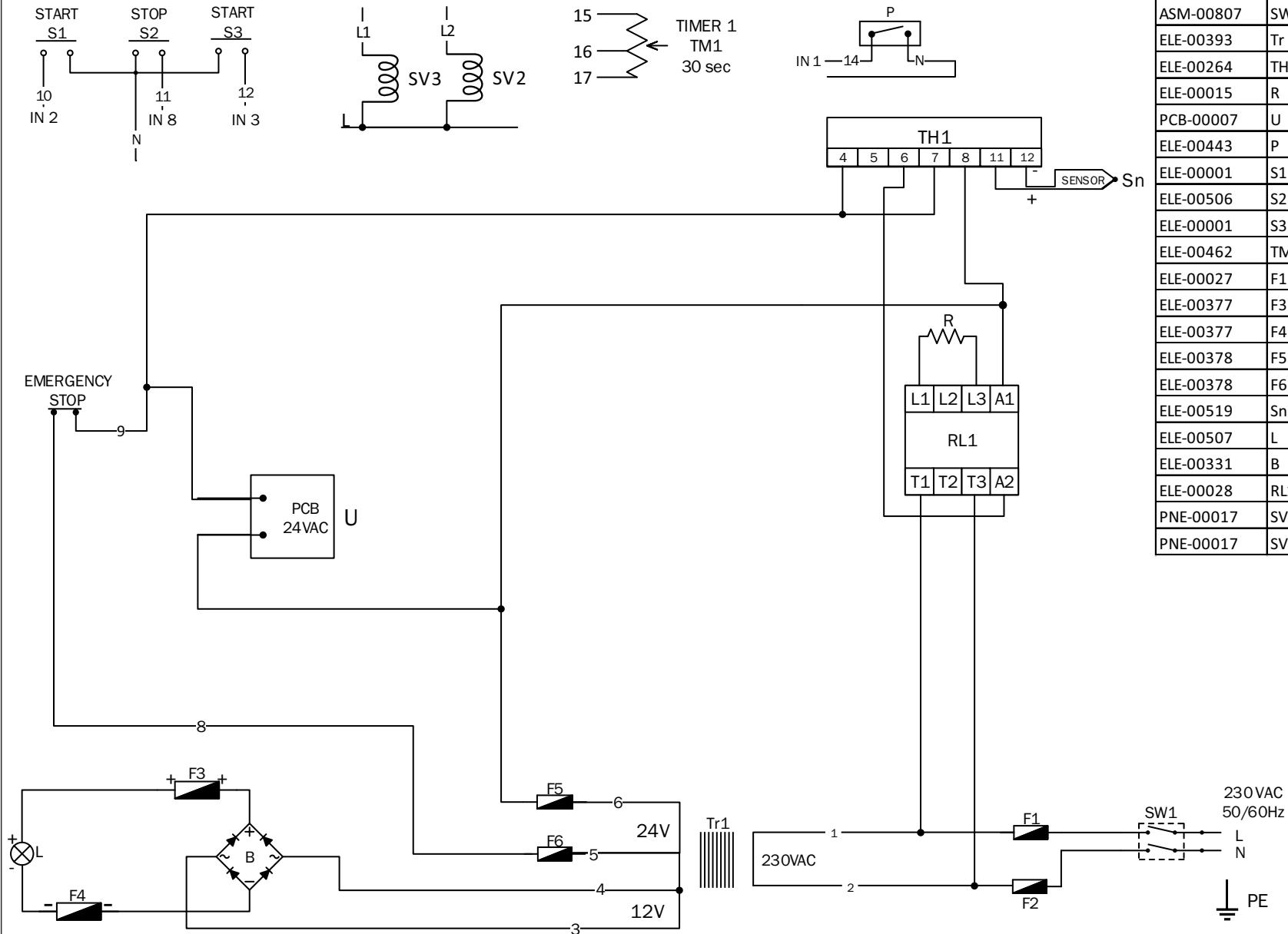
BOM ID	PartNo	Description	Qty
62	PNE-00001	FRL G1/4 SIZE 300	1
69	PNE-00020	HOSE ADAPTER, RG, MALE, TAPER, 1/4 - Ø8	1
71	PNE-00023	MALE-FEMALE ELBOW 1/4"	2
74	PNE-00093	ALUMINIUM TEE, Rx, 1/8, NO MID HOLE	1
75	PNE-00114	SAFETY VALVE, 1/8, P.T. 6bar	1
87	PNE-01001	FITTING, STRAIGHT, 1/8-Φ8, FOR AIR UNIT	1
91	PNE-09919	STRAIGHT MALE ADAPTOR (PARALLEL) 4-1/8"	1
98	REV-00099	EXTENSION, TAPER 1/4 TO PARALLEL 1/8	1

Valves assembly



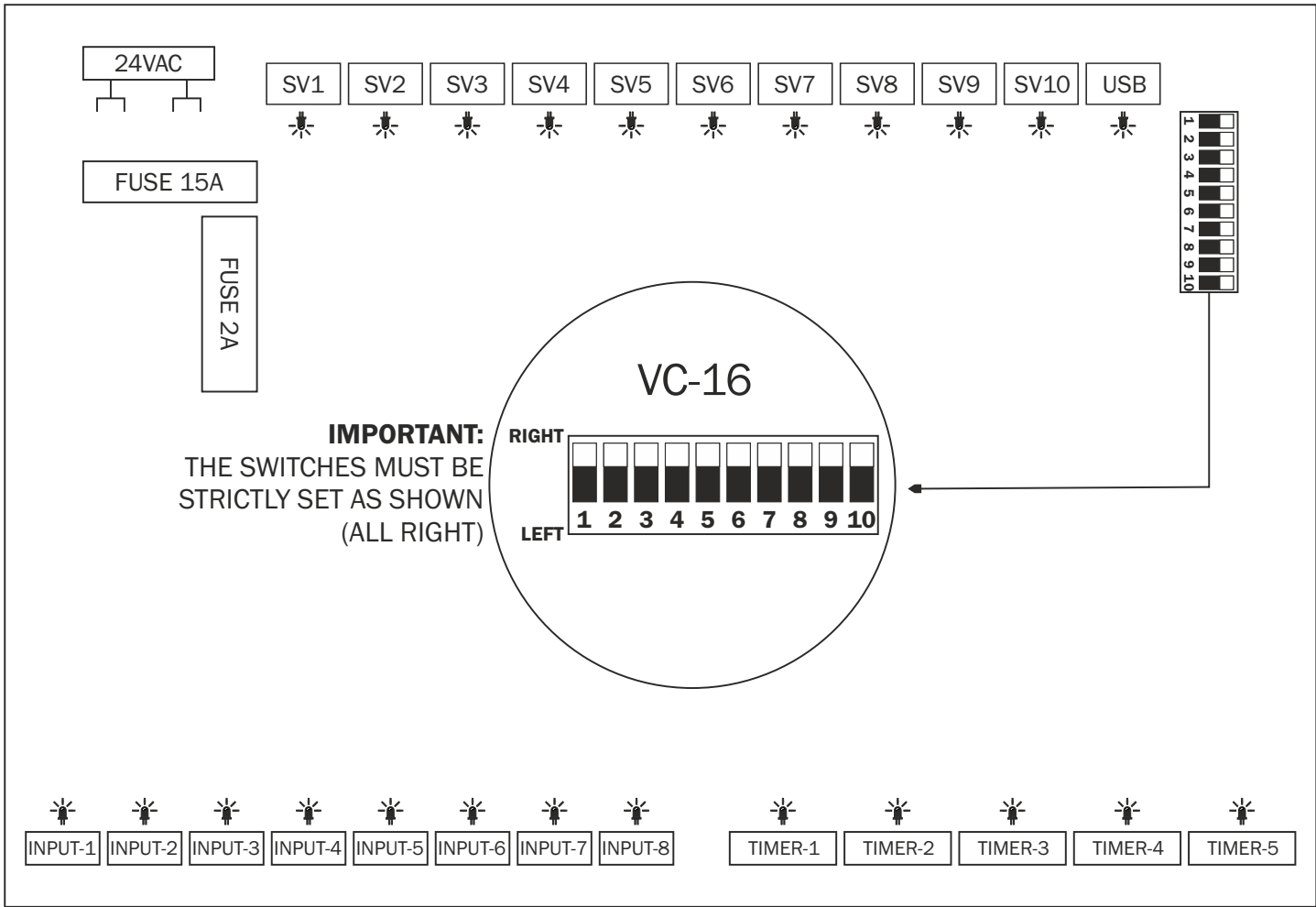
BOM ID	PartNo	Description	Qty
66	PNE-00012C	ORING	2
68	PNE-00018	SILENCER, 1/8, PLASTIC, BLUE	2
73	PNE-00072	PLUG, MALE, PARALLEL, 1/8	2
87	PNE-01001	FITTING, STRAIGHT, 1/8-Φ8	1
89	PNE-01064	ADAPTOR, ELBOW MALE, 1/8-Φ8	3
91	PNE-09919	STRAIGHT MALE ADAPTOR 4-1/8"	2
96	REV-00041	FITTING, CUSTOM, 1/8	2
99	REV-00101	2-POSITION G1/8 VALVE BASE	1
461	ASM-00461	VALVE 5/2 G1/8, 24V	2

VC-16 Electric Diagram



Part No	Diagram indication	Description
ASM-00807	SW1	GENERAL SWITCH
ELE-00393	Tr	TRANSFORMER, 230V, 12V - 24V, 100VA
ELE-00264	TH1	THERMOREGULATOR R38S
ELE-00015	R	ELEMENT 230V - 800W
PCB-00007	U	M-USE MAIN BOARD ELECTRONIC PCB
ELE-00443	P	FOOT SWITCH
ELE-00001	S1	START BUTTON CHINT BA2
ELE-00506	S2	BUTTON, Ø22, RED
ELE-00001	S3	START BUTTON CHINT BA2
ELE-00462	TM	POTENTIOMETER 10K LINE
ELE-00027	F1	AUTOMATIC FUSE 2P 10A
ELE-00377	F3	FUSE 4A 5X20
ELE-00377	F4	FUSE 4A 5X20
ELE-00378	F5	FUSE 6A 5X20
ELE-00378	F6	FUSE 6A 5X20
ELE-00519	Sn	HEATING SENSOR 6x35 (L=370CM)
ELE-00507	L	LED BAR 30cm
ELE-00331	B	BRIDGE 10A/1000V KBPC HY
ELE-00028	RL1	RELAY, MINI, CHINT NC6-0901
PNE-00017	SV2	COIL Ø9/24V AC 5W
PNE-00017	SV3	COIL Ø9/24V AC 5W

VC-16 Electronic Board Diagram



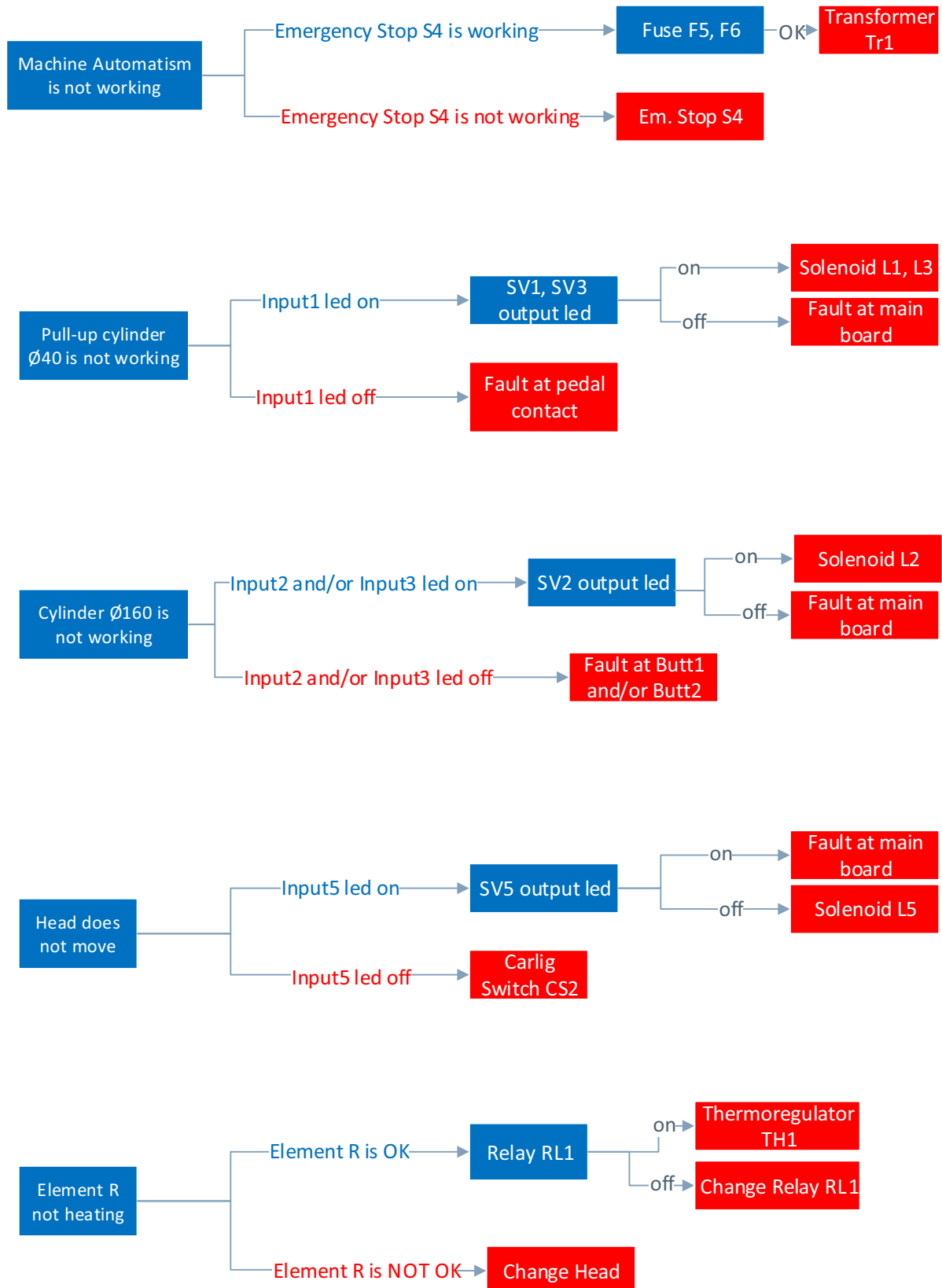
PCB-00007: M-USE MAINBOARD ELECTRONIC PCB

INPUTS	
PEDAL	INPUT1
BUTTON S1	INPUT2
BUTTON S3	INPUT3
STOP S2	INPUT8

OUTPUTS	
SV 1	CYLINDERS ACQ 40x20
SV 2	CYLINDER ACQ 160x240
SV 3	<N/A>
SV 4	<N/A>

Troubleshooting

VC-16 Troubleshooting



Inflatable tubular stuffing replacement instructions

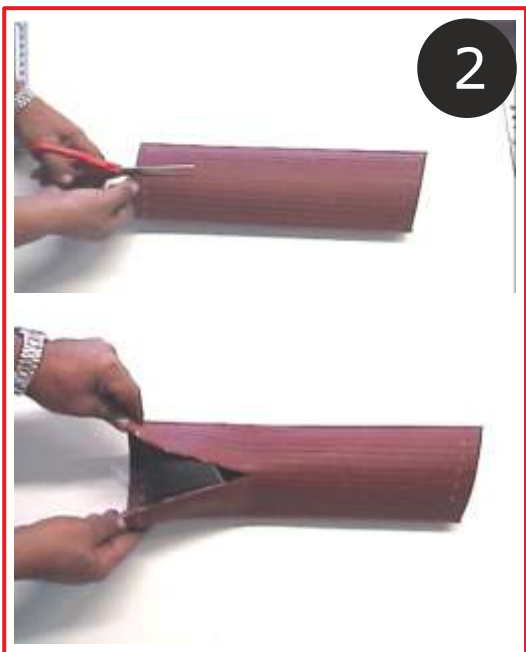


1

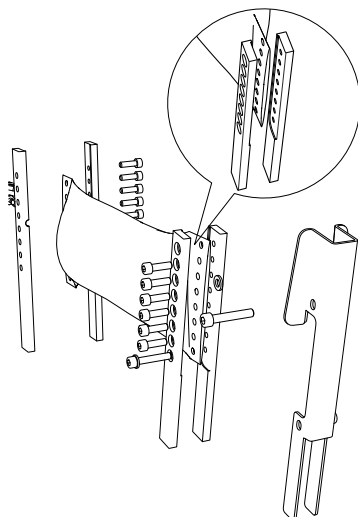


Disassemble the metal plates from the inflatable tubular (Fig. 1).

2



Snip off along the old inflatable tubular and remove the rubber stuffing which is inside (Fig.2)



ATTENTION:
As shown in the details, all four (4) guides, must be mounted in the way that their "teeth" must press the tubular, in their respective positions.

3



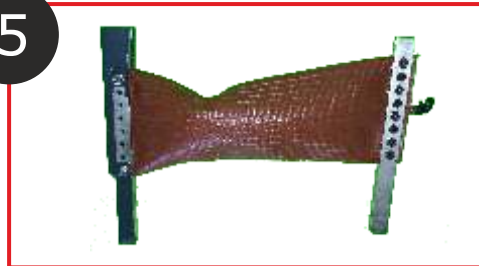
Push the rubber stuffing inside (Fig. 3)

4

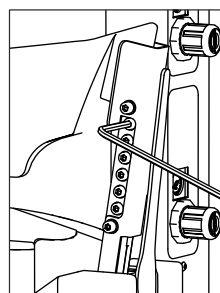


Set the 2 plates on the rubber's side without tighten completely the screws and push the rubber, from the other side, with an object to lean against the plates (Fig. 4)

5



Set the other two plates by setting also the air supply fitting and tighten all the screws (Fig. 5).



Note:
After one or two working days tighten softly all the screws of the inflatable TUBOLAR (Air bag).

Warning
Too much tightening will destroy the TUBOLAR.

Notes

This image shows a full page of blank graph paper. The grid consists of thin, light gray horizontal and vertical lines that intersect to form small squares across the entire surface. There are no margins, text, or other markings on the paper.

Notes

This image shows a full page of blank graph paper. The grid consists of small, equal-sized squares formed by thin, light gray lines. The grid covers the entire area of the page, leaving no margins or other markings. There are 20 columns and 20 rows of squares, creating a total of 400 square units.

