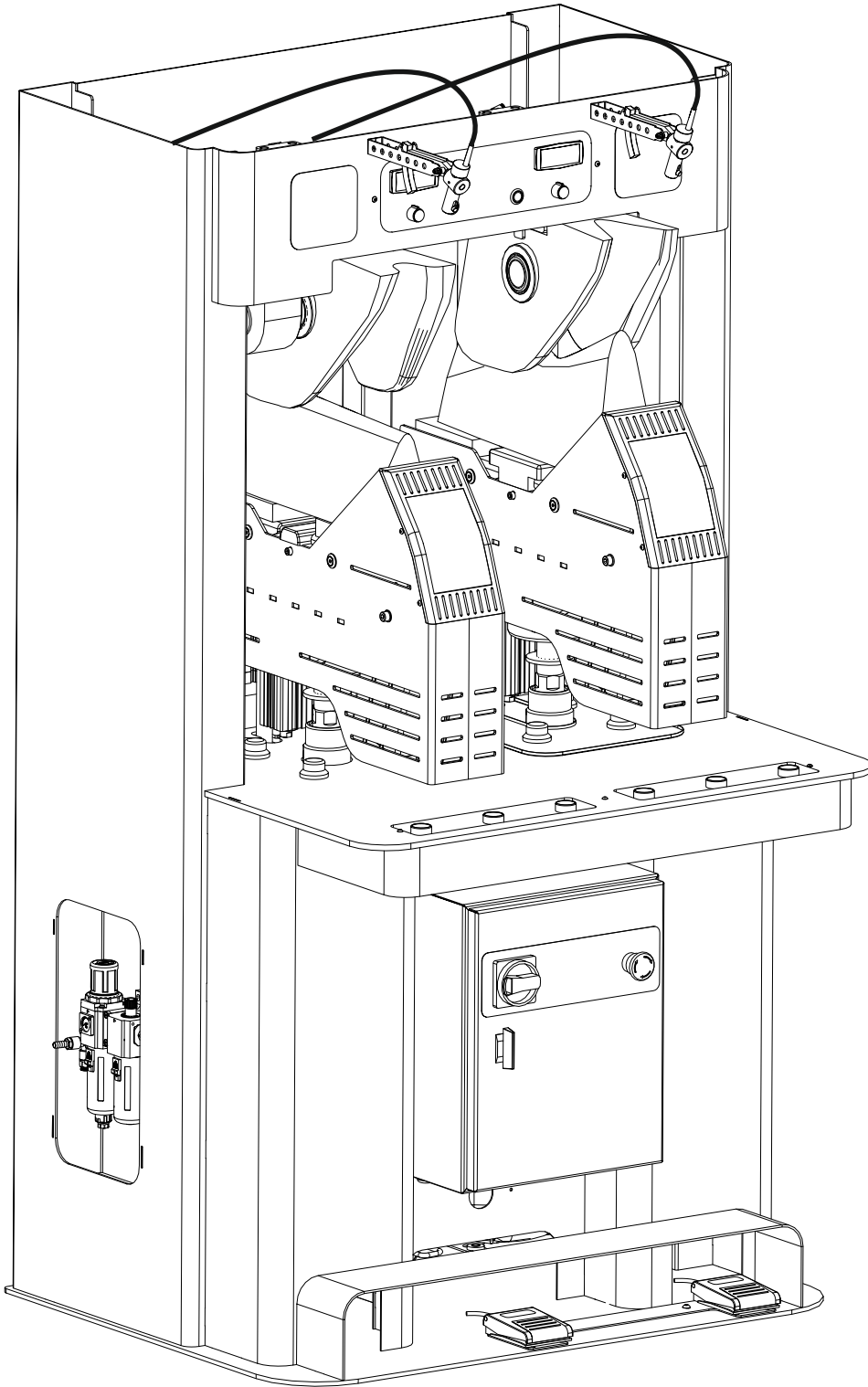


# OPERATOR'S MANUAL



**VC-19D**

VER. ASM-01217

Patented



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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.



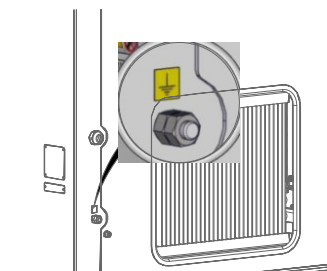
**WARNING**

**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.**



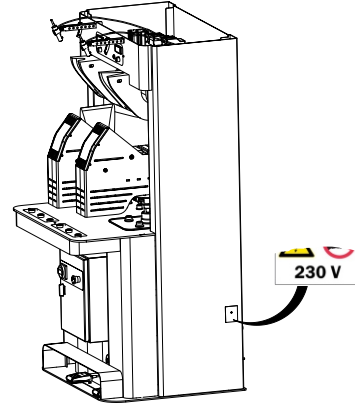
**WARNING**

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



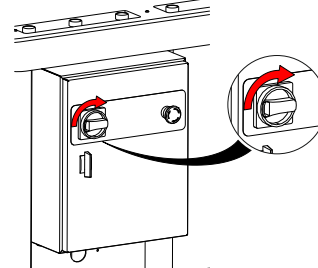
### Electric and pneumatic connections

1. Connect the machine (SINGLE PHASE 230V - 50Hz).
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.

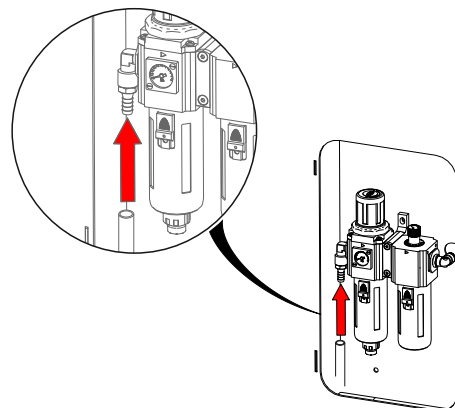


3. Check if the plug and socket have the same technical type. If not, use the suitable adapter after having consulted a certified electrician.

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

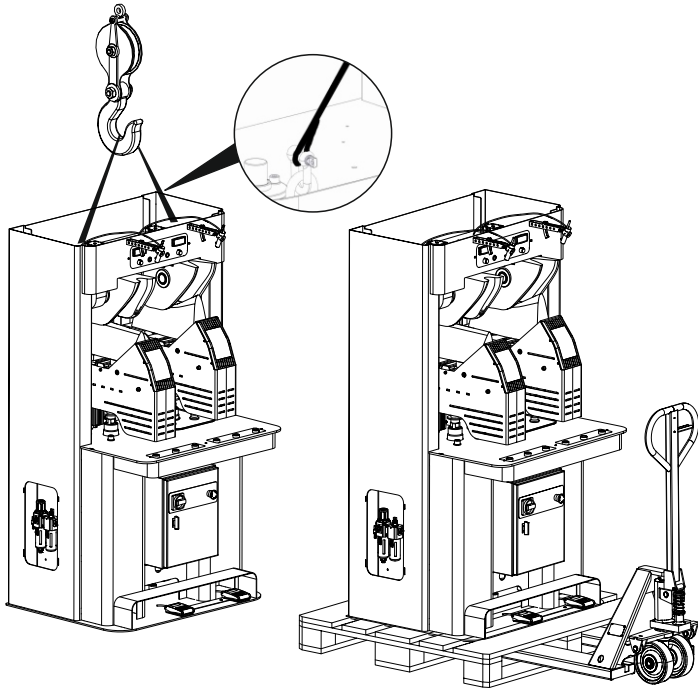


5. Connect the machine to air pressure 6 - 8bar.
6. Connect the proper pneumatic hose. Set the main pressure regulator, which is found, on the back part of the machine to 6 Bar.



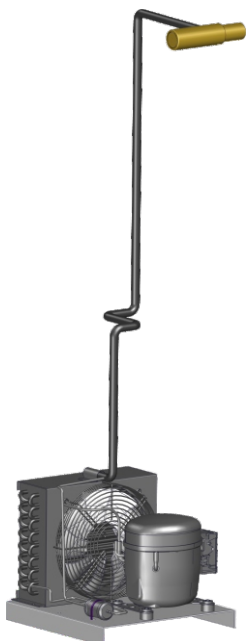
**Holding - Transportation**

1. Use the clevis's existed on the top of the machine with proper belts to lift the machine.
2. Pass the trans-pallet's forks under the pallet as shown in the Figure below.



**Maintenance of cooling unit**

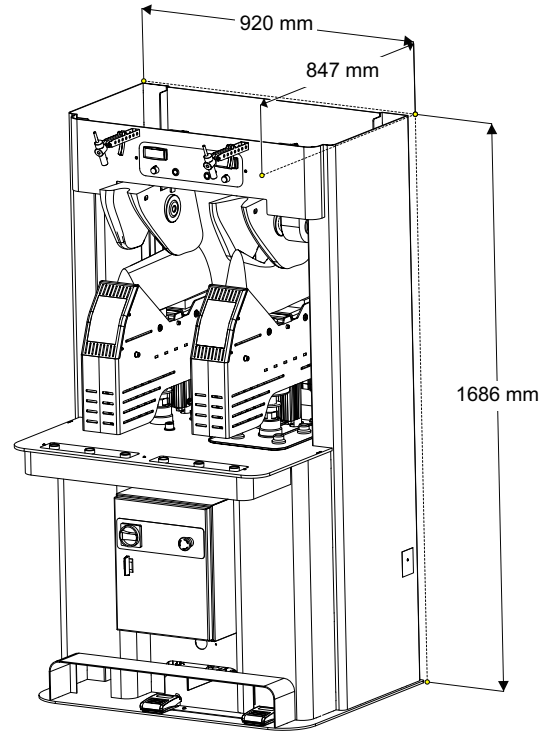
Clean the condenser (radiator) of the cooling unit once per month by using air pressure.



**COOLING UNIT SPECIFICATIONS**

Cooling gas type	R404A
Cooling gas qty	470gr
Compressor Power	1/2 Hp

**Technical data & Dimensioning**

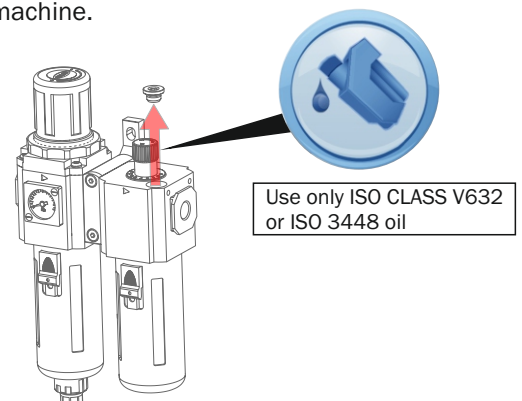


**Technical Data**

OPERATION	Electric - Pneumatic
PRESSURE	6 Bar
VOLTAGE	230V single phase 50Hz
CAPACITY	1200 pairs per 8 hours
POWER CONSUMPTION	1500 W
DIMENSIONS (mm)	920 X 847 X 1686
WEIGHT	385 Kgs

**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 ISO Class V632 or ISO 3448 oil. Once per week lubricate all moving parts of the machine.



**Panel Adjustments**

**1 Hot Station Temperature:** Set the temperature from 60 to 110 °C. Temperature is a basic factor for the crimping. Choose the higher temperature (according the material you use) for higher crimping result. (Suggested Temperature 110 °C).

To adjust thermoregulator press the DOWN arrow. When the digits start blinking use the UP and DOWN arrows to adjust the temperature.

Then you press instantly the **P** button.

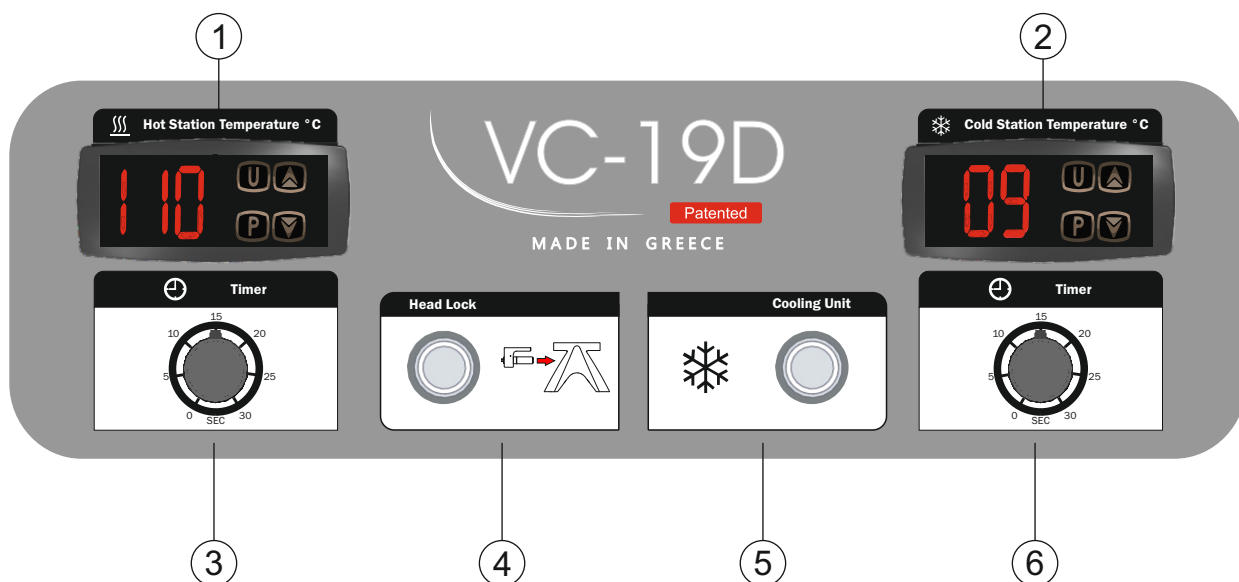
**3. Hot station Time:** Set the timer from 5 to 30 sec. By increasing the time a higher crimping is succeeded.

**5. Cooling unit ON/OFF.**

**2. Cold Station Temperature:** Set the temperature from 9 to 11 °C (find the suitable temperature for the minimum condensation).

**4. Head Lock:** Heads' lock ON/OFF.

**6. Cold station Time:** Set the timer from 5 to 30 sec. Less time at cold station will result in a more shallow angle.



**Operation**



**Step 1.** Place the vamp in the hot station mould as shown in Figure 1



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



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

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

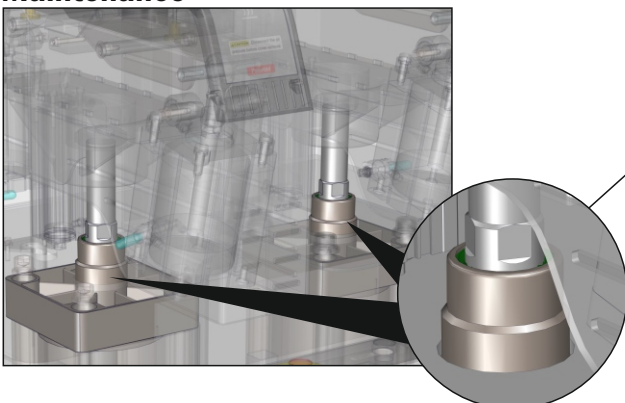


**Repeat the procedure in the hot and cold station in order to stabilize the materials**

**Tip:** Hot and cold is necessary either for leather or synthetic vamps and helps maximize and retain the final shape of the vamp and finally the shoe



**Maintenance**



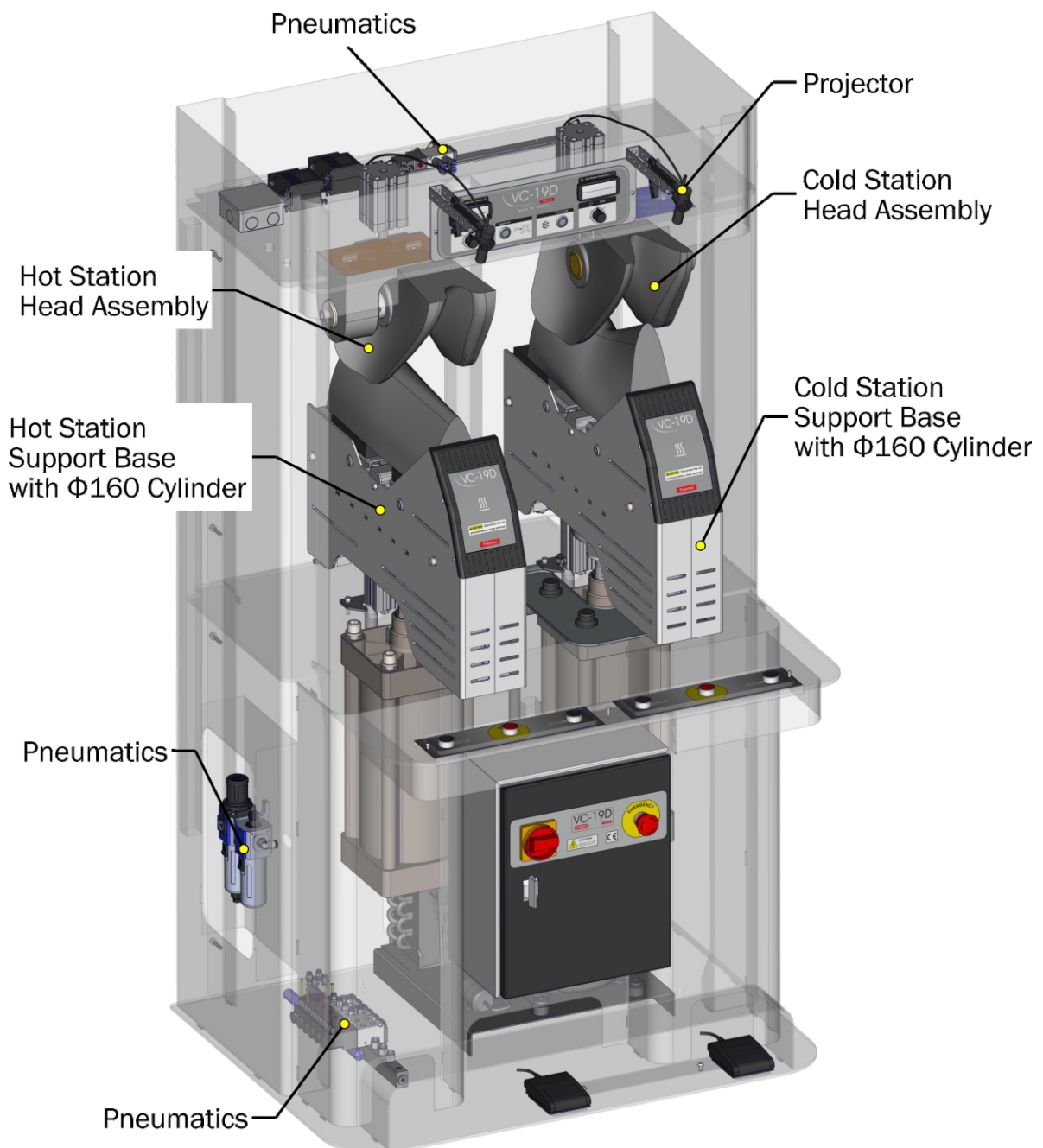
- Once a week lubricate the rod of the cylinders **ASM-00694** with oil type SAE 30.
- Once a week check the oil level of the air pressure lubricator P1 and add oil type ISO Class V632 or ISO 3448 or something similar.
- Once a month clean the radiator.

Every six months check the good operation of the lubricator.

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

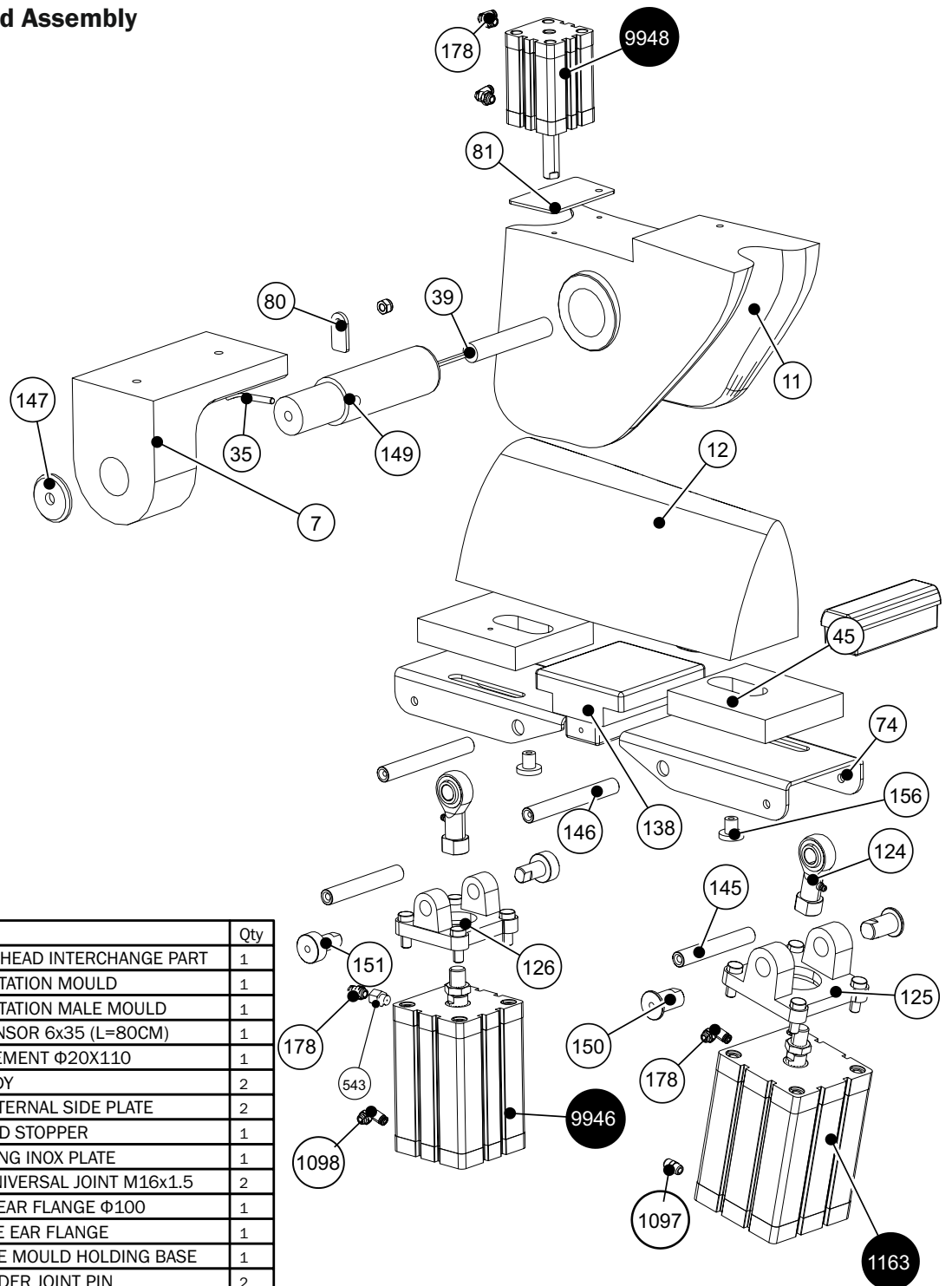
## ASSEMBLING VC-19D

- Hot Station Head Assembly (page 9)
- Hot Station Support Base with Main Cylinder (page 10)
- Cold Station Head Assembly (page 11)
- Cold Station Support Base with Main Cylinder (page 12)
- Bottom Valve Assembly (Page 13)
- Projector with rest of Pneumatics (Page 14)



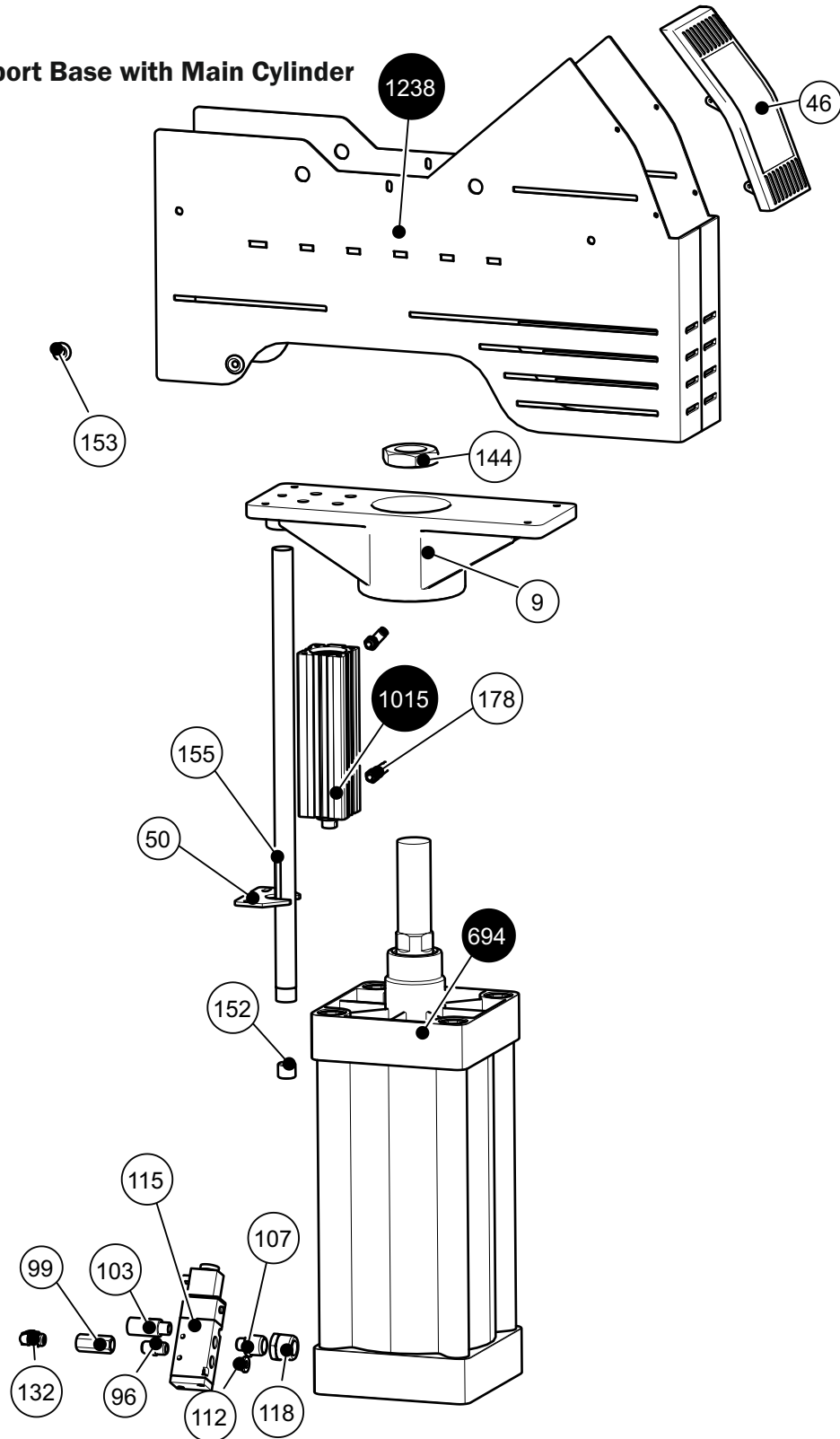


**VC-19D Hot Station Head Assembly**



BOM ID	PartNo	Description	Qty
7	CAS-00150	HOT MOULD HEAD INTERCHANGE PART	1
11	CAS-00154	VC-19 HOT STATION MOULD	1
12	CAS-00155	VC-19 HOT STATION MALE MOULD	1
35	ELE-00516	HEATING SENSOR 6x35 (L=80CM)	1
39	ELE-00660	HEATING ELEMENT $\Phi$ 20X110	1
45	GEN-00486	SLIDING BODY	2
74	LAS-01129	SUPPORT INTERNAL SIDE PLATE	2
80	LAS-01137	VC-19 MOULD STOPPER	1
81	LAS-01146	HEAD PUSHING INOX PLATE	1
124	PNE-01090	FISH-EYE, UNIVERSAL JOINT M16x1.5	2
125	PNE-01164	CB-DOUBLE EAR FLANGE $\Phi$ 100	1
126	PNE-01169	$\Phi$ 80 DOUBLE EAR FLANGE	1
138	CAS-00160	VC-19D MALE MOULD HOLDING BASE	1
145	REV-00530	VC-19 CYLINDER JOINT PIN	2
146	REV-00531	VC-19 ROTATING BASE PIN	2
147	REV-00535	VC-19 HOLDING WASHER $\Phi$ 50	1
149	REV-00538	VC-19 $\Phi$ 50 HOUSING SHAFT	1
150	REV-00541	$\Phi$ 20 PIN	2
151	REV-00542	VC-19 $\Phi$ 16 PIN	2
156	REV-00558	VC-19D SLIDING BODY GUIDE	2
178	PNE-09916	ELBOW MALE ADAPTOR 4-1/8"	5
543	REV-00453	RESTRICTOR, 1/8 (M) - 1/8 (F) - $\Phi$ 1.0	1
1097	PNE-01097	STRAIGHT MALE ADAPTOR 6-1/8"	1
1098	PNE-01098	ELBOW MALE ADAPTOR 6-1/8"	1
1163	PNE-01163	CYLINDER $\Phi$ 100x100	1
9946	PNE-09946	CYLINDER $\Phi$ 80x100	1
9948	PNE-09948	CYLINDER $\Phi$ 50X50	1

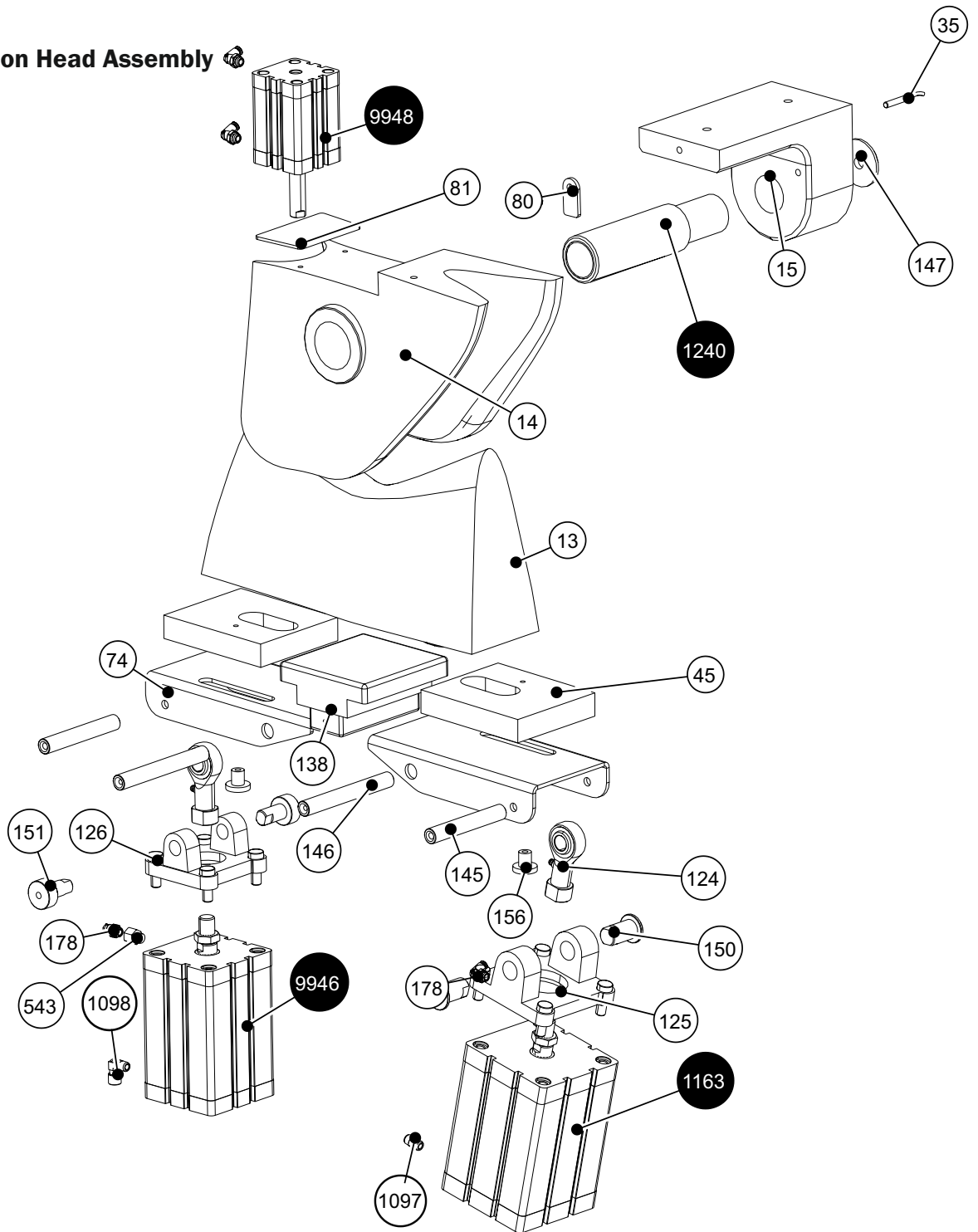
**VC-19D Hot Station Support Base with Main Cylinder**



BOM ID	PartNo	Description	Qty
9	CAS-00151	VC-19D SUPPORT MOULD BASE	1
46	GEN-00488	VC-19 MOULD SUPPORT COVER	1
50	LAS-00589	PISTON GUIDE, VC-2014	1
96	PNE-00059	NIPPLE, TAPER, 1/4 (M) - 1/4 (M)	1
99	PNE-00074	NON-RETURN VALVE, 1/4	1
103	PNE-00094	SILENCER, 1/4, PLASTIC, BLUE	1
107	PNE-00171	REDUCING NIPPLE 1/4-1/2	1
112	PNE-00213	CAP ALLEN, +OR 1/4	1
115	PNE-00725	SOLENOID VALVE 1/4 5/2 1P	1
118	PNE-00951	REDUCER, TAPER, 3/4-1/2	1

BOM ID	PartNo	Description	Qty
132	PNE-09925	ELBOW MALE ADAPTOR 8-1/4"	1
144	REV-00376	NUT, CUSTOM, M36X2.0	1
152	REV-00543	GUIDE INTERNAL THREADED WASHER	1
153	REV-00544	WASHER, CUSTOM, Φ20	4
155	REV-00557	GUIDE CYLINDER	1
178	PNE-09916	ELBOW MALE ADAPTOR 4-1/8"	2
694	ASM-00694	MAIN CYLINDER Φ160	1
1015	PNE-01015	CYLINDER Φ40	1
1238	ASM-01238	HOT STATION COVER	1

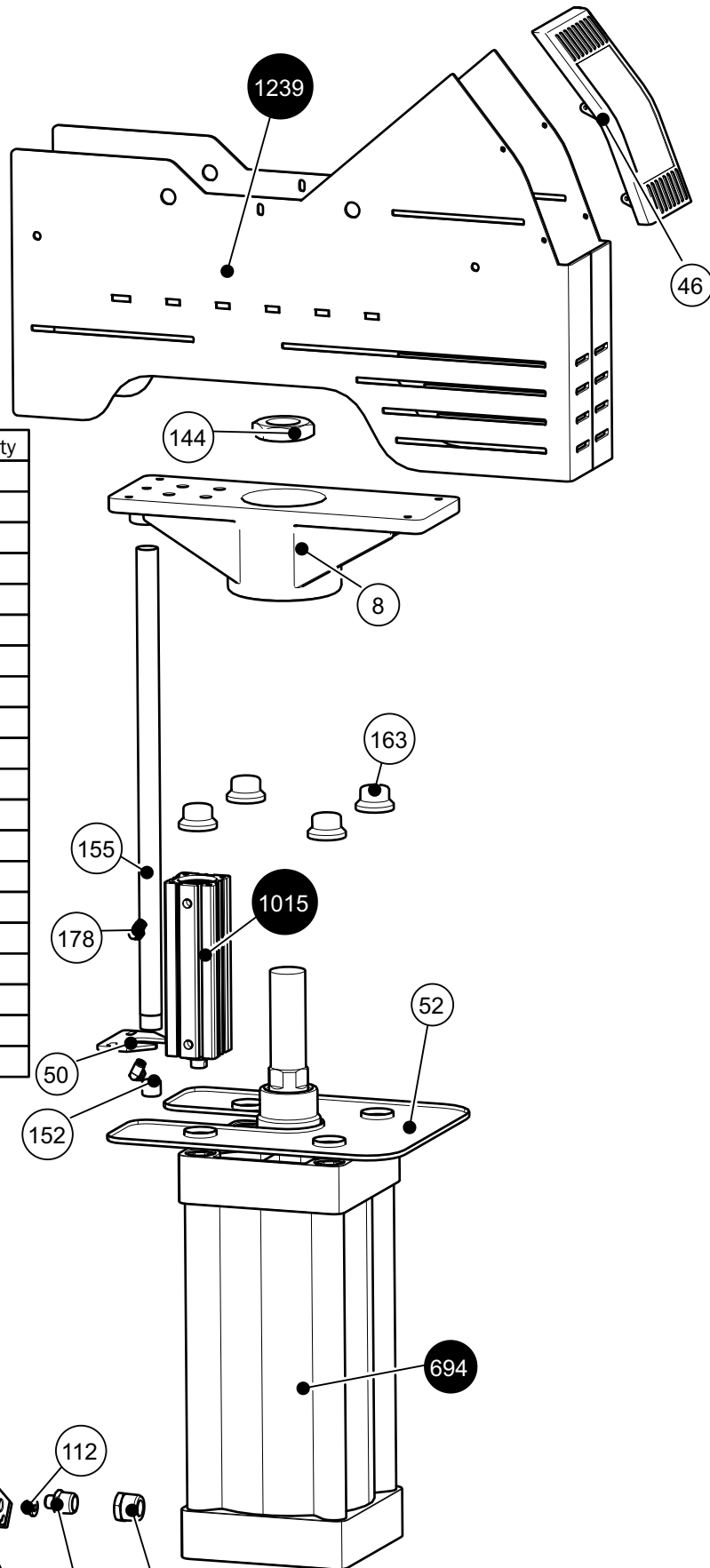
**VC-19D Cold Station Head Assembly**



BOM ID	PartNo	Description	Qty
13	CAS-00156	COLD STATION MALE MOULD	1
14	CAS-00158	COLD STATION MOULD, NORMAL	1
15	CAS-00159	COLD MOULD HEAD INTERCHANGE PART	1
35	ELE-00516	HEATING SENSOR 6x35 (L=80CM)	1
45	GEN-00486	SLIDING BODY	2
74	LAS-01129	SUPPORT INTERNAL SIDE PLATE	2
80	LAS-01137	MOULD STOPPER	1
81	LAS-01146	SHORT HEAD PUSHING INOX PLATE	1
124	PNE-01090	FISH-EYE, UNIVERSAL JOINT M16x1.5	2
125	PNE-01164	CB-DOUBLE EAR FLANGE Φ100	1
126	PNE-01169	Φ80 DOUBLE EAR FLANGE	1
138	CAS-00160	VC-19D MALE MOULD HOLDING BASE	1
145	REV-00530	CYLINDER JOINT PIN	2

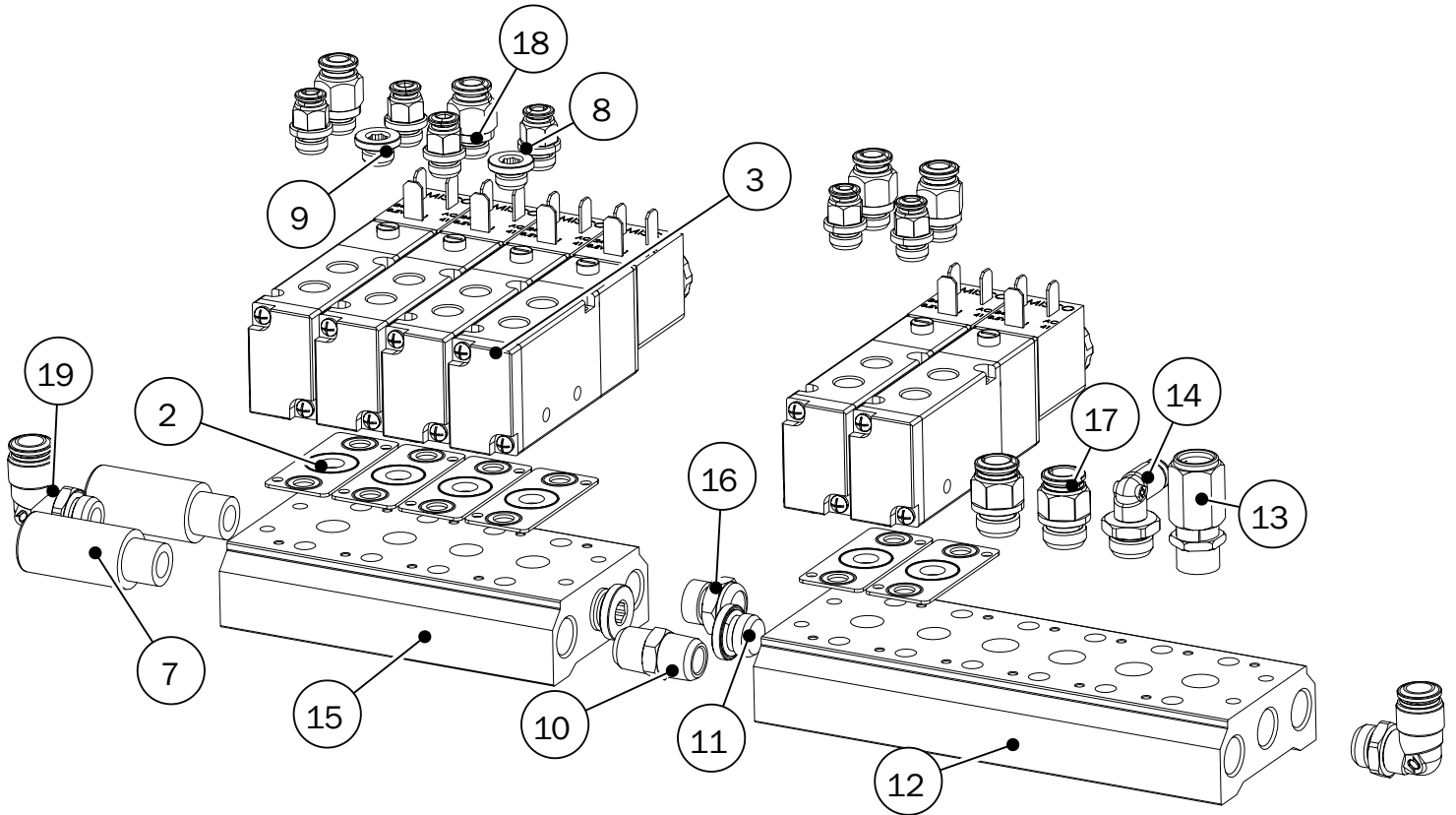
BOM ID	PartNo	Description	Qty
146	REV-00531	ROTATING BASE CONNECTION PIN	2
147	REV-00535	HOLDING WASHER Φ50	1
150	REV-00541	Φ20 PIN	2
151	REV-00542	Φ16 PIN	2
156	REV-00558	SLIDING BODY GUIDE	2
178	PNE-09916	ELBOW MALE ADAPTOR 4-1/8"	5
543	REV-00453	RESTRICTOR, 1/8 (M) - 1/8 (F) - Φ1.0	1
1097	PNE-01097	STRAIGHT MALE ADAPTOR 6-1/8"	1
1098	PNE-01098	ELBOW MALE ADAPTOR 6-1/8"	1
1163	PNE-01163	CYLINDER Φ100x100	1
1240	ASM-01240	EVAPORATOR INSERT	1
9946	PNE-09946	CYLINDER 80x100	1
9948	PNE-09948	CYLINDER Φ50X50	1

**VC-19D Cold Station Support Base with Main Cylinder**



BOM ID	PartNo	Description	Qty
8	CAS-00151	VC-19D SUPPORT MOULD BASE	1
46	GEN-00488	VC-19 MOULD SUPPORT COVER	1
50	LAS-00589	PISTON GUIDE	1
52	LAS-00822	VC-16 LIQUID HOLDER	1
96	PNE-00059	NIPPLE, TAPER, 1/4 (M) - 1/4 (M)	1
99	PNE-00074	NON-RETURN VALVE, 1/4	1
103	PNE-00094	SILENCER, 1/4, PLASTIC, BLUE	1
107	PNE-00171	REDUCING NIPPLE 1/4-1/2	1
112	PNE-00213	CAP ALLEN, +OR 1/4	1
115	PNE-00725	SOLENOID VALVE 1/4 5/2 1P	1
118	PNE-00951	REDUCER, TAPER, 3/4-1/2	1
132	PNE-09925	ELBOW MALE ADAPTOR 8-1/4"	1
144	REV-00376	NUT, CUSTOM, M36X2.0	1
152	REV-00543	GUIDE INTERNAL WASHER	1
155	REV-00557	GUIDE CYLINDER Ø22	1
163	RUB-00131	RUBBER CAP	4
178	PNE-09916	ELBOW MALE ADAPTOR 4-1/8"	2
694	ASM-00694	MAIN CYLINDER Ø160	1
1015	PNE-01015	CYLINDER Ø40	1
1239	ASM-01239	COLD STATION COVER	1

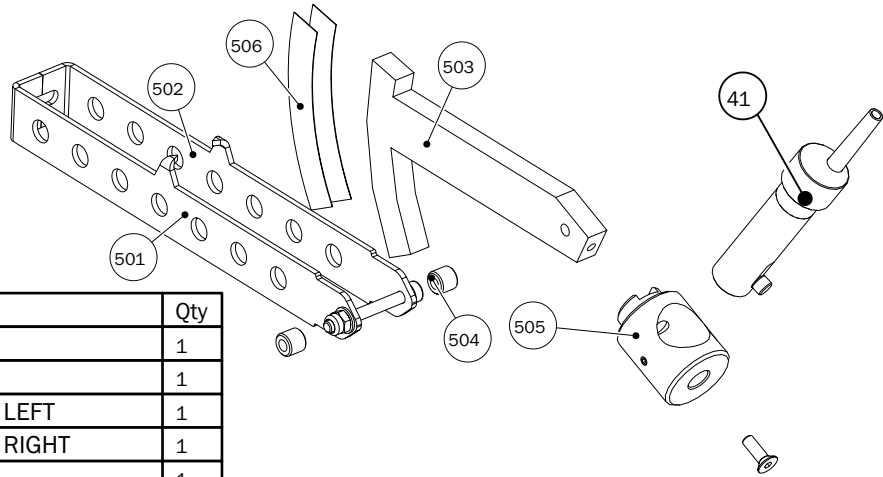
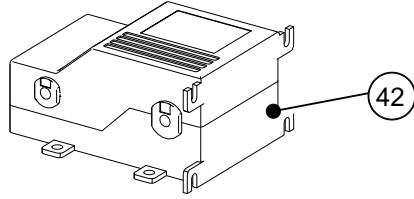
**VC-19D Bottom valve assembly**



BOM ID	PartNo	Description	Qty
2	GEN-00093	CAP	6
3	ASM-00461	VALVE 5/2 G1/8, 24V	6
7	PNE-00094	SILENCER, 1/4, PLASTIC, BLUE	2
8	PNE-09919	STRAIGHT MALE ADAPTOR 4-1/8"	6
9	PNE-00072	PLUG, MALE, PARALLEL, 1/8	2
10	PNE-00059	NIPPLE, TAPER, 1/4 (M) - 1/4 (M)	1
11	PNE-00213	CAP ALLEN, +OR 1/4	2
12	PNE-01040	MANIFOLD, 1/4, 6 STATIONS	1

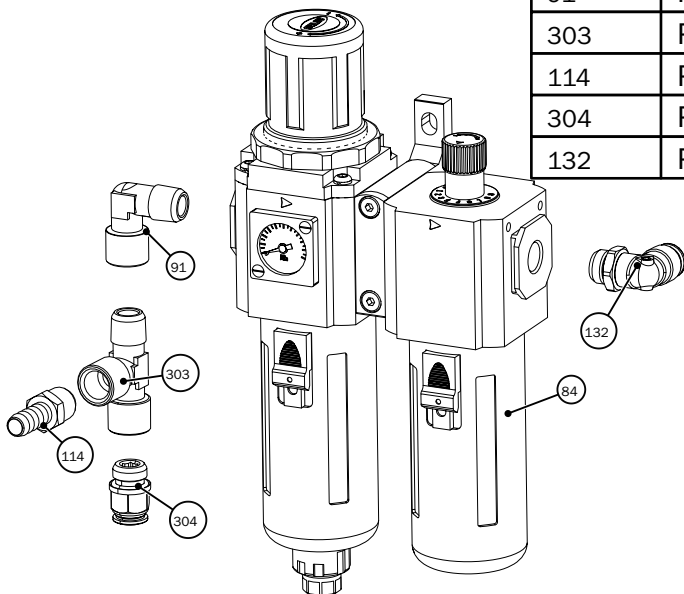
BOM ID	PartNo	Description	Qty
13	PNE-00608	SAFETY VALVE, 1/4, P.T. 6 bar	1
14	PNE-09923	ELBOW MALE ADAPTOR 4-1/4"	1
15	PNE-00082	MANIFOLD, 1/4, 4 STATIONS	1
16	PNE-00896	SILENCER 1/4	1
17	PNE-09921	STRAIGHT MALE ADAPTOR 8-1/4"	2
18	PNE-01097	STRAIGHT MALE ADAPTOR 6-1/8"	4
19	PNE-09925	ELBOW MALE ADAPTOR 8-1/4"	2

**VC-19D Projector**



BOM ID	PartNo	Description	Qty
41	ELE-00682	VC-19 LED POINTER	1
42	ELE-00674	LED PROJECTOR DRIVER	1
501	LAS-01158	VC-19D PROJECTOR BRACKET, LEFT	1
502	LAS-01159	VC-19D PROJECTOR BRACKET, RIGHT	1
503	LAS-01160	VC-19D PROJECTOR POINTER	1
504	REV-00571	VC-19D TOP PROJECTOR SYSTEM SPACER	2
505	REV-00572	VC-19D LED PROJECTOR HOLDER	1
506	STK-00181	VC-19D TOP PROJECTOR MEASURING TAPES	1

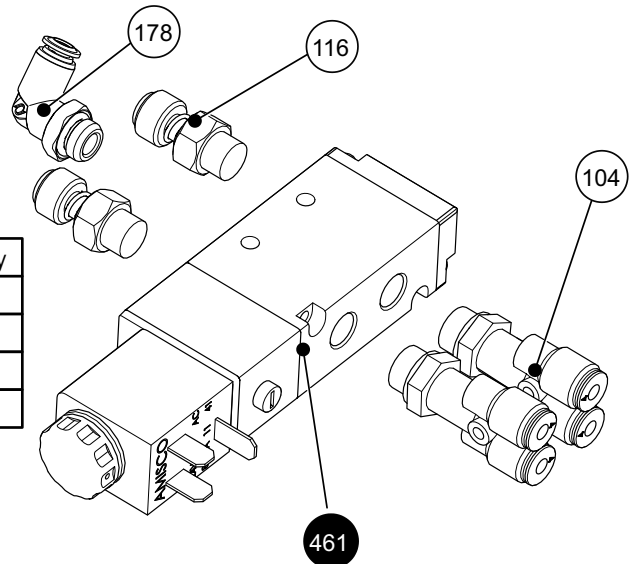
**VC-19D FRL with components**



BOM ID	PartNo	Description	Qty
84	PNE-00001	FRL G1/4 SIZE 300	1
91	PNE-00023	MALE-FEMALE ELBOW 1/4"	1
303	PNE-00204	OFF SET MALE TEE 4050 1/4	1
114	PNE-00619	MALE HOSE ADAPTER (TAPER) 9-1/4	1
304	PNE-09921	STRAIGHT MALE ADAPTOR 8-1/4"	1
132	PNE-09925	ELBOW MALE ADAPTOR 8-1/4"	1

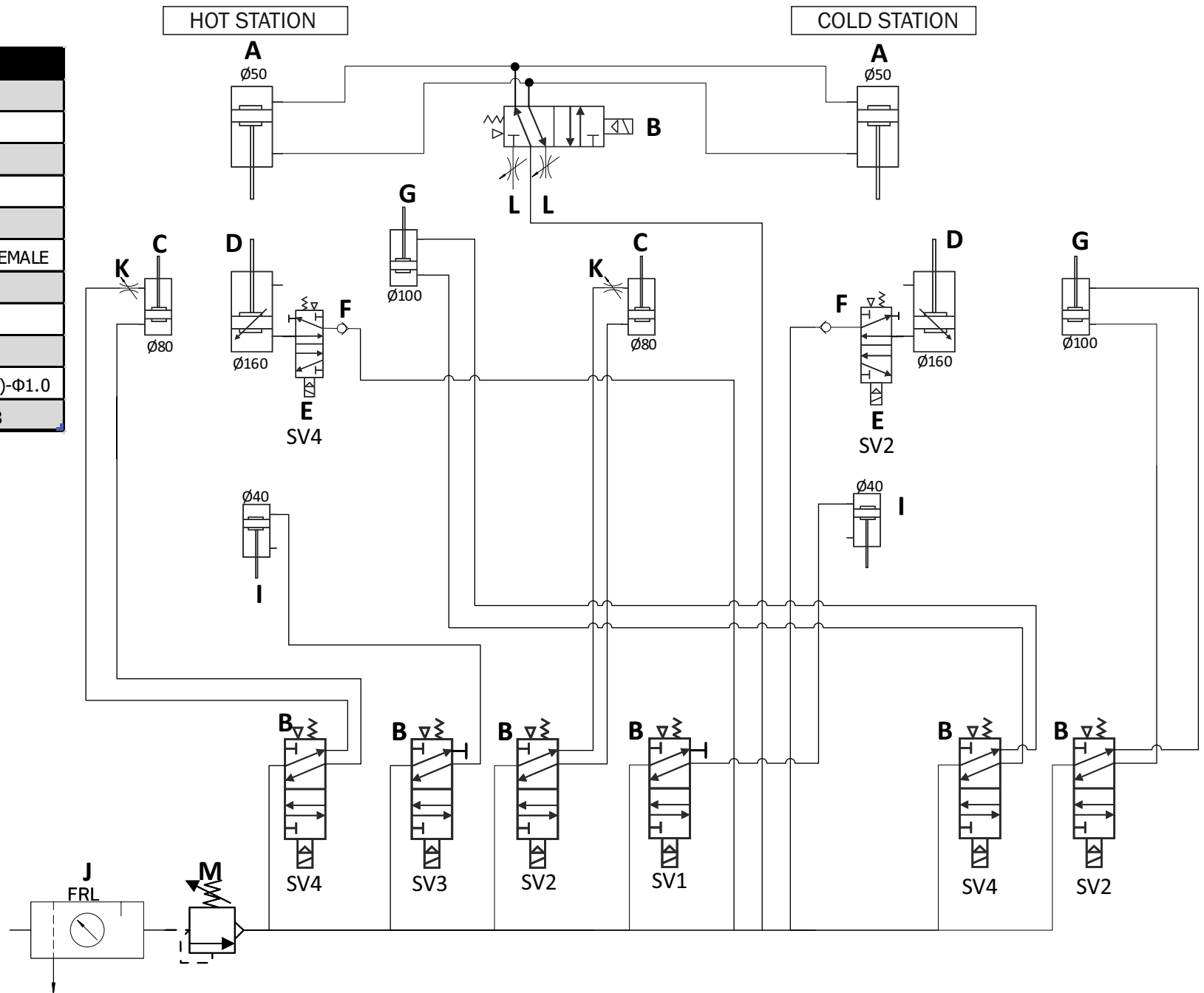
**VC-19D Top Valve with components**

BOM ID	PartNo	Description	Qty
104	PNE-00096	CONNECTOR, Y, MALE, 1/8 - Ø4	2
116	PNE-00741	SILENCER, SPRING REGULATOR, 1/8	2
178	PNE-09916	ELBOW MALE ADAPTOR 4-1/8"	1
461	ASM-00461	VALVE ELECTRIC PILOT 5/2 G1/8, 24V	1

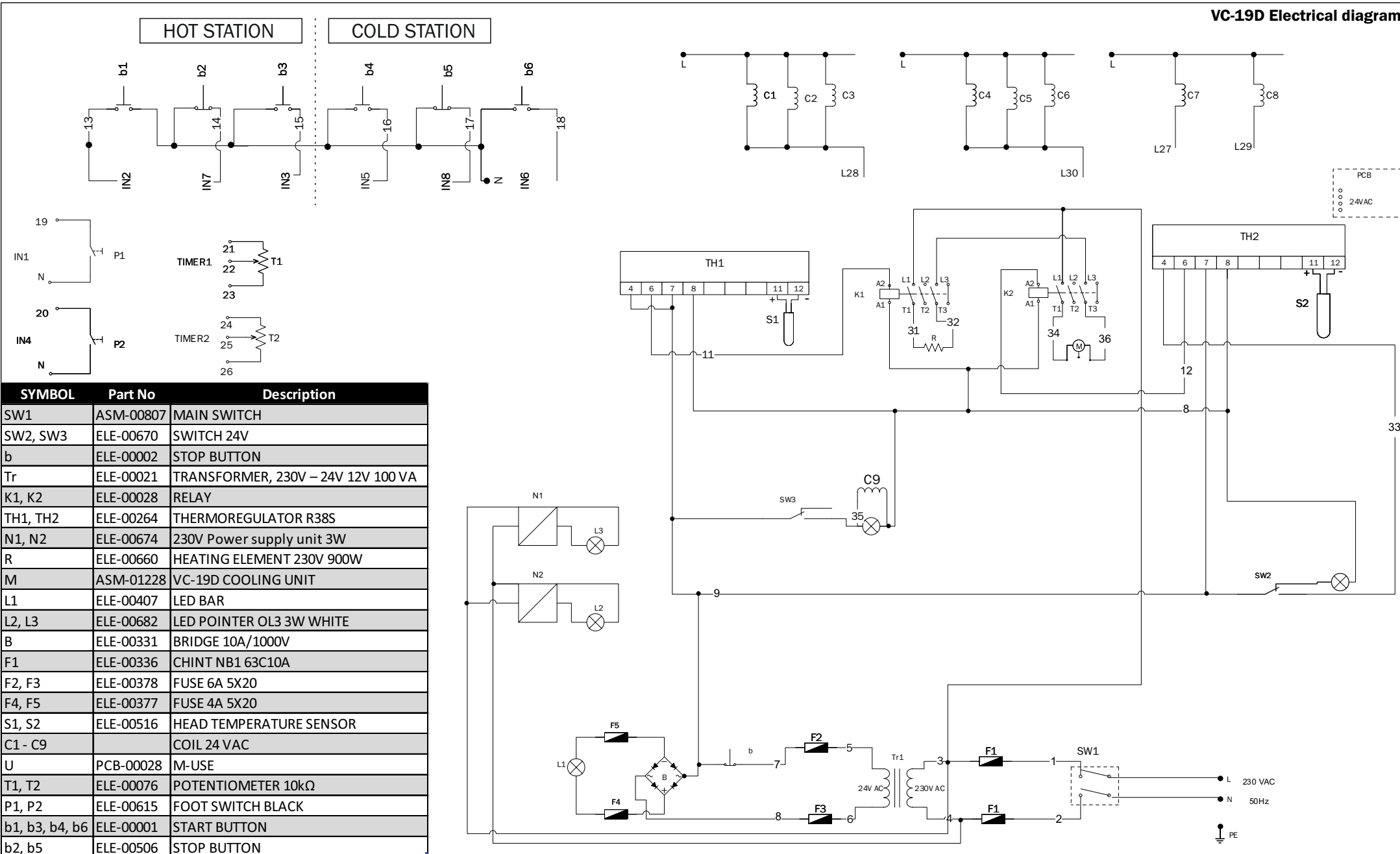


### VC-19D Pneumatic Diagram

	P/N	DESCRIPTION
A	PNE-09948	CYLINDER ACE $\Phi 50 \times 50$
B	ASM-00461	VALVE 5/2 1/8, 24V
C	PNE-09946	CYLINDER ACE 80x100
D	ASM-00694	CYLINDER SI 160x240
E	PNE-00725	VALVE 1/4 5/2 1P
F	PNE-00074	NON-RETURN VALVE, 1/4, FEMALE
G	PNE-01163	CYLINDER ACE $\Phi 100 \times 100$
I	PNE-01015	CYLINDER ACQ 40x120
J	PNE-00001	FRL G1/4 SIZE 300
K	REV-00453	RESTRICTOR, 1/8 (M)-1/8 (F)- $\Phi 1.0$
L	PNE-00741	SILENCER, REGULATOR, 1/8

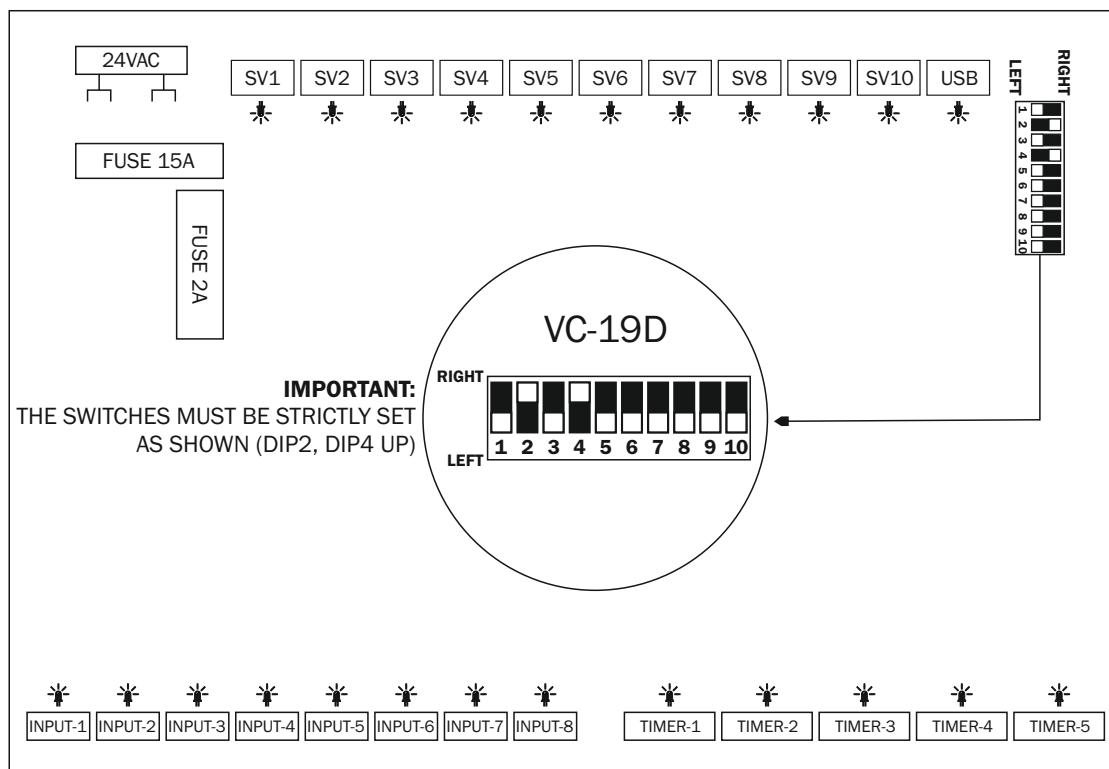


VC-19D Electrical diagram





**VC-19D Electronic Board Diagram**



PCB-00028 M-USE MAINBOARD ELECTRONIC PCB

INPUTS	
PEDAL1	INPUT1
PEDAL2	INPUT4
BUTTON b1	INPUT2
STOP b2	INPUT7
BUTTON b3	INPUT3
BUTTON b4	INPUT5
STOP b5	INPUT8
BUTTON b6	INPUT6

OUTPUTS	
SV1	HOT STATION CYLINDER ACQ $\Phi$ 40x120
SV2	HOT STATION CYLINDER ACE $\Phi$ 100x100
	HOT STATION CYLINDER SI $\Phi$ 160x240
SV3	COLD STATION CYLINDER ACQ $\Phi$ 40x120
SV4	COLD STATION CYLINDER ACE $\Phi$ 100x100
	COLD STATION CYLINDER ACE $\Phi$ 80x100
	COLD STATION CYLINDER SI $\Phi$ 160x240

