

COOLING UNIT

CS 600W / CS 600WA

INSTRUCTION MANUAL

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1 WARNINGS

It is important that instruction booklet be kept with the appliance for future reference. The following warnings are provided in the interests of overall safety. You must read them carefully before installing or using the appliance.

- When unpacking the appliance, check that is not damaged. If in doubt, do not use it and contact the service centre.
- This appliance is designed to be used by qualified persons. Other people must not be allowed operate with that.
- Any electrical work required to install this appliance must be carried out by a qualified electrician.
- After having installed the machine, check that it is not standing on its electrical supply cable.
- Do not overload the appliance. Follow the instruction in this instruction booklet.

2 INTRODUCTION

CS 600W / CS 600WA are cooling units for cooling MIG/MAG, TIG or plasma cut torches. The appliances can be used for cooling resistance welding appliances too.

CS 600WA is equipped with electronic that automatically switches the pump off if there is no electromagnetic field detected (no welding had been performed) . CS 600W is not equipped with this function.

3 DESCRIPTION

3.1 MAIN PARTS

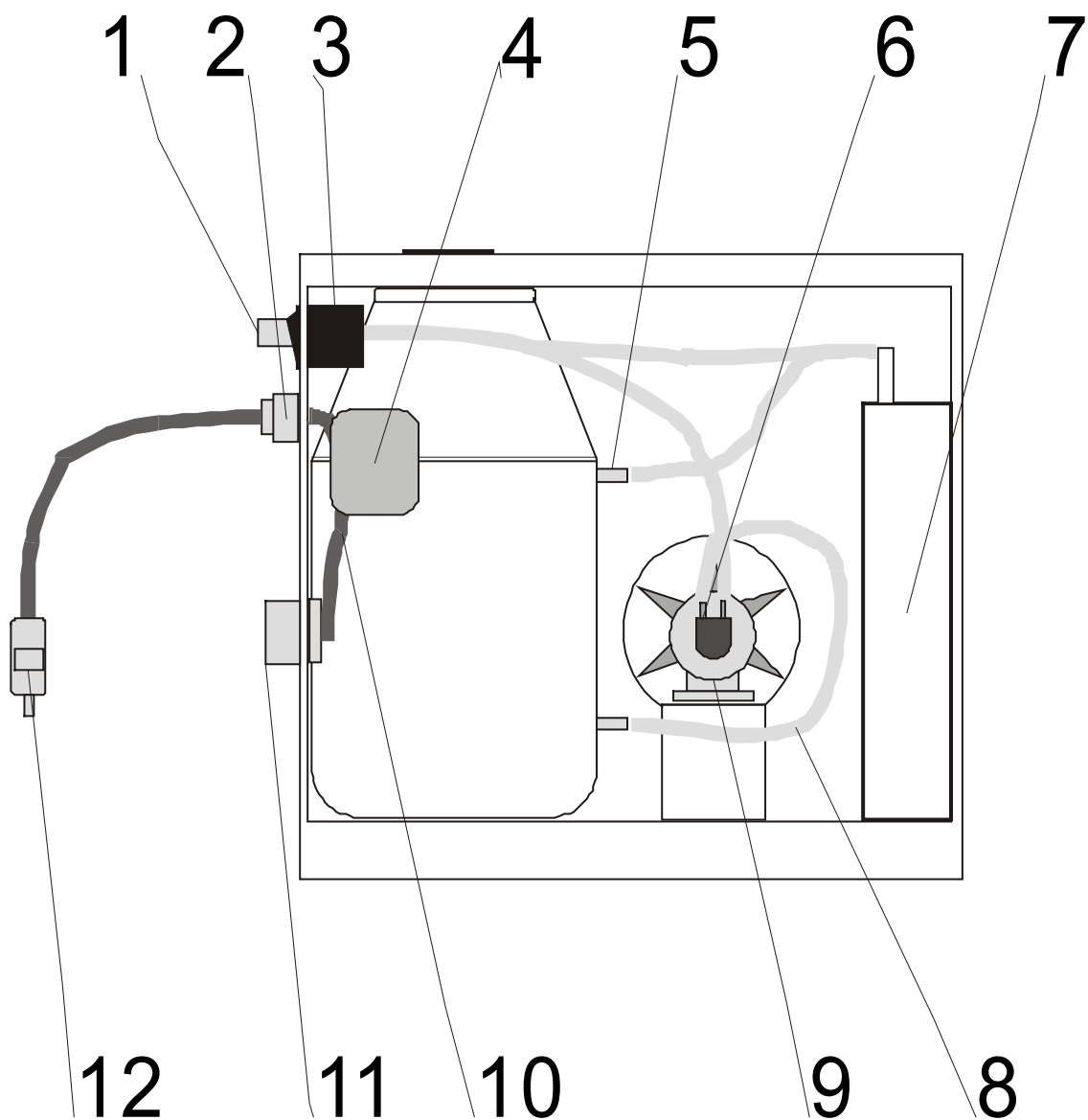


Fig 1: Main parts

pos.	Description	Note
1	Quick connectors	
2	Cable outlet 13,5mm	WA
3	Main switch P-C1553AB	
3	Mode switch P-C5503	WA
4	PCB ID 1.0	WA
5	Tank connector	
6	Pump connector	
7	Heat exchanger	
8	Water hoses	
9	Pump with propeller	
10	Connecting cable	WA
11	Panel socket 35	WA
12	Cable plug 35	WA

3.2 TECHNICAL DATA

COOLING UNITS 600W- 600WA	
Tank	max 4,5 l
Max. pressure	0,35MPa Q=0l/min
Max. flow	10l/min p=0MPa
Cooling power	1100W Q=2l/min, liquid temperature 60 °C, surrounding temperature 20°C
Cooling liquid	BTC-15 (TIG) or anti freezing liquid for

	aluminium motors (MIG/MAG)
Input	300VA
Mains	230V/50Hz

4 CONDITIONS OF USE

Please read **1 WARNINGS**

Cooling units CS 600W must be protected from:

- humidity and rain
- taking impurities into the cooling circuit
- freezing the cooling fluid
- running the pump without the cooling fluid
- Starting the machine without the torch being connected into the circuit
- mechanical damage

NOTE

The Connecting cable (Fig. , pos 10) is designed to be connected into machines up to 350A (DC=60%). In case of connecting into stronger machines it would be necessary to change this Connection cable to stronger one (minimum 70 mm²)

5 SETTING UP

1. Place the cooling unit into sufficient place near the welding machine.
2. Check the level of the cooling liquid. The level should be between the red and blue signs (see the front panel of the cooling unit). In case there is not enough of cooling liquid, fill it. For MIG torches it is possible to use mixture of pure water and anti freezing liquid for aluminium motors (2:1), for TIG torches use original cooling liquids recommended by torch manufacturer.

3. Connect the blue signed water quick connector into the blue signed water connector on the cooling unit (Fig. 1, pos. 1).
 4. Analogically do it with the red signed water connectors.
 5. By means of the main switch switch the machine ON (I) (Fig 1. pos 3). In case of CS 600WA set the desired mode by the right part of the switch (Fig 1. pos 3).
- M- manual, pump runs permanently (LED is on)
 - A- automatic, the pump is running just in case that welding is performed and for a certain time after finishing welding (ca 4-6 min).

5.1 CONNECTING THE COOLING UNIT AND THE POWER SOURCE IN AUTOMATIC MODE (ONLY CS 600 WA)

1. The Cable plug 35 (Fig. 1, pos 12) connect into the earthing connecting socket on the power source (welding machine, plasma cut ...)
2. Earthing cable of the power source connect into the Panel socket 35 (Fig. 1, pos 11)

5.2 MAINTENANCE

We have designed this machine so as to reduce the amount of maintenance required to a minimum. Despite this, to keep the machine in perfect working order, you will need to arrange for a small amount of basic maintenance.

NOTE Only trained personnel are permitted to work inside the machine.

BEFORE OPENING THE MACHINE, CUT OFF ITS ELECTRICAL POWER BY REMOVING THE PLUG FROM THE MAINS SUPPLY SOCKET.

Every six months, open the machine and clean it inside, using compressed dehumidified air.

CAUTION. DO NOT USE COMPRESSED AIR AT TOO HIGH A

PRESSURE. YOU COULD DAMAGE THE ELECTRONIC COMPONENTS.

With the same frequency, check the water quick connectors.

6 TROUBLE SHOOTING

If there all cooling liquid is lost air gets into the cooling circuit. In this case:

1. Switch the cooling unit off.
2. fill the tank with a proper cooling liquid. (For MIG torches it is possible to use mixture of pure water and anti freezing liquid for aluminium motors (2:1), for TIG torches use original cooling liquids recommended by torch manufacturer.)
3. Disconnect red signed water quick connector of the torch from the water quick connector of the cooling unit (Fig. 1, pos. 1)
4. Switch the cooling unit ON for a short time
5. When the pump starts pumping the cooling liquid, switch the cooling unit off and put back the torch connector.

7 THE WARRANTY POLICY STATEMENT

The cooling units are guaranteed 12 months from date of invoice.

Defects caused by natural wear or accidental damage (wrong assembly, defective maintenance, abnormal use ...) or by modification of the product, which has not been accepted in writing by the manufacturer, are not included in the guarantee.

Guarantee covers free of charge replacement of parts, which have been admittedly defective (transport included).

Labour executed by the distributor is entirely at their cost. However, if you request, labour can be performed free of charge by ALFA IN, in its factory. In this case, transport to and from ALFA IN will be at the distributor's costs.

8 DECLARATION OF CONFORMITY

We ALFA IN a.s. hereby state that the cooling units of types

CS 600 W, CS 600 WA

are in compliance with the directives

- 89/336/CEE
- 92/31/CEE
- 93/68/CEE

and the following standards apply:

- EN 60204-1

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