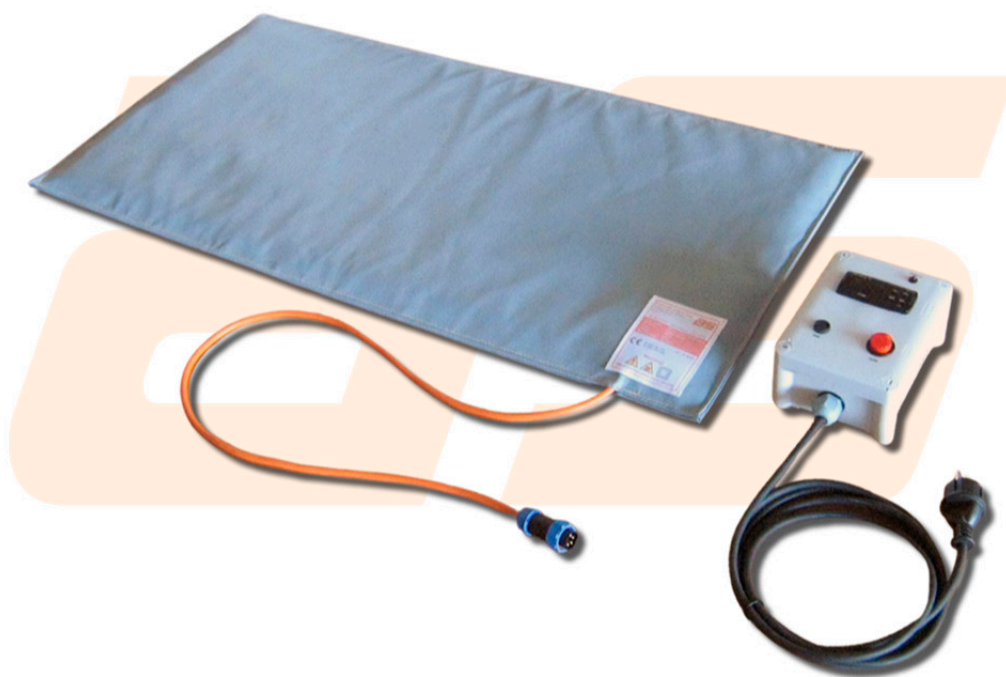


## BFV-CC HEATING BLANKETS

Industrial heating blankets for curing and hardening



Installation manual

BFV-CC standar heating blankets



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## Security instructions

### Important

- Read and make sure you understand this manual before installing the heating blanket.
- Not understanding this manual correctly can cause serious accidents, injuries, and structural damage.

### General points

No modifications or alterations can be made to the heating blanket without authorisation from the manufacturer, in the event of this, the guarantee will be invalidated.

National standards and safety regulations must be observed.

### Fundamental safety instructions



Anyone involved with the operation, maintenance and repair of the heating jacket should read and be aware of the contents of the instruction manual.

The heating jacket should only be operated by trained personnel.



The mains supply connection has to be in accordance with the corresponding regulations. For safety reasons the equipment must be only operated, if a Residual Current protective Device (RCD) with a release current of 30 mA is connected upstream. This must be checked by a qualified electrician.

**According to the BGV A3 regulation, electrical resources must be checked periodically.**



Repairs on the electrical components in the heating jackets must be carried out by an electrician or trained personnel under the supervision of an electrician.



The heating jacket should only be used when it is in full working order under the supervision of the operator.



The heating jacket should not be used in damp or wet conditions and should not be exposed to aggressive chemicals. Do not use any other heating appliances in addition to the heating jacket.

### Requirements

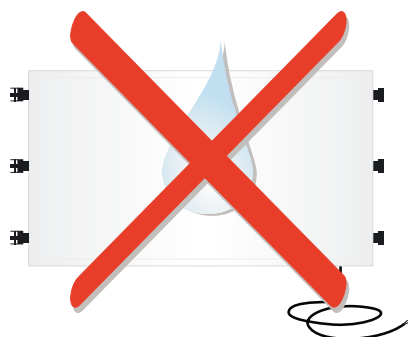
- Electrical terminations must be carried out by qualified persons.
- No special tools or protective equipment are required to handle this product (specific applications or surfaces may require protective equipment).
- Installation temperature range: -60°F to 131°F (-51°C to 55°C).
- A clearance of 3" (7.5 cm) is required during installation and operation.
- Voltage and frequency must be within +/-10% of the value specified on the product label.
- The heater must be mounted on a grounded surface or a grounded conductive screen must be placed between the heater and the surface.

## Security instructions

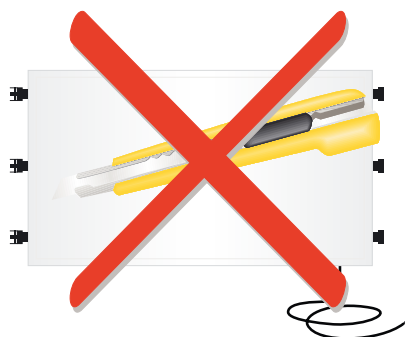
### Important safety Instructions

The user who has not read or understand all the steps in these instructions is not qualified to use this product.

- Check for suspected damage to the heater like rips, punctures, etc.
- Never immerse the heater into liquids.
- Keep sharp metal objects away from the drum heater.
- Avoid volatile fuels near the heater when it is running.



**Do not dip into liquids**



**Do not expose to sharps**



**Avoid volatile fuels**

- Do not use the heater with tears or breaks in the surface.
- If the heater is damaged or malfunctions, do not repair the heating blanket, contact the manufacturer.
- Do not crush the heater or subject it to severe stress, neither the power input cable (mains cable).
- When the heater is not in use, unplug from mains.
- Before removing the heater, wait until it is cold.
- Use the heater for its specific purpose, do not use it for other applications..
- Do not overlap the blanket when the drum heater dimensions are larger than the container.

### The end user must meet the following requirements

- Only qualified personnel are authorized to handle and connect the electrical wiring.
- All electrical wiring must follow the electrical applicable regulations.
- The final installation and wiring must comply with current regulations.
- The end user is responsible for providing a secure network and, if necessary, give it the necessary mechanisms for maximum safety (thermostats, icp, breaker, etc.).

## Before installing

### Surface Preparation

Always install your heater on a clean even surface for optimum performance and extended service life.

Debris and residue on the surface can not only damage your heater but may also reduce the effectiveness of the heater by reducing the heat transfer between the surface and the heater.

- Remove or avoid contact with sharp edges including rough corners, weld spatter, exposed bolts, etc.
- Remove or avoid contact with rust, stickers, or other coverings.
- Remove oil, moisture, gel and other liquids

### Instructions

1. Check the heating blanket prior to each installation (see page 3).
2. Inspect the surface to be heated for any sharp edges, dirt, oil, etc.
3. Ensure that there is no combustible material within 12" (30cm) of the surface to be heated.
4. The device must only be switched on, for safety reasons, when a 30mA differential switch has been inserted.
5. Make sure the heater has good contact with the surface to be heated. If there are air gaps, the heating blanket cannot properly transfer heat to the surface and the heating blanket may overheat.

### CAUTION



Do not wrap the heating blanket around itself or allow it to sit on top of another heater.

## Security instructions

### Thermostats

If your curing heating blanket is equipped with the **DP16A/321** digital programmable thermostat or the **ET056** electronic thermostat, please read the instructions and recommendations below:



All electrical wiring operations must be performed by qualified personnel and in accordance with all applicable local ordinances and standards.

### CAUTION



The heating blanket must **NOT** be operated without being connected to a temperature control device

1. If your heating blanket does not have its own temperature control device, you must connect it to an external control device. The heater should **NOT** be operated without some form of temperature control.

### WARNING



- Your heater is designed to operate at a specific voltage of  $\pm 10\%$ . See label on heater for operating voltage and wattage information. Not using the heater set to the specified values could cause overheating of the heating blanket, heating of the surface or personal injury. Also note that lower than stated voltage may cause insufficient heating.
- All electrical connections must be made by qualified personnel and in accordance with all applicable ordinances and standards.

2. Make sure the heater is protected by an appropriate circuit breaker or fuse.

3. The use of a ground fault circuit interrupter (GFCI) is strongly recommended and may be required by local electrical ordinance.

4. Plug the provided plug into the power receptacle of the **DP16A/321** digital programmable thermostat or compatible temperature control device.

5. Consult the instructions for your temperature controller to determine the correct plug. If your heater does not have a plug, one can be added.

## Security instructions

### If your heater does not have a plug

- Two wires (of the same color) must be connected to the power supply (or temperature control device) directly through a cable gland or to a connector that mates with a receptacle connected to the power supply. To find out which plug types are compatible, see the **Elementos Calefactores AS** product catalogue.
- The **Elementos Calefactores AS** heating blankets are non-polarized, allowing the wire to be connected to neutral or hot.

### EMERGENCY PROCEDURES



Please read and understand these procedures before using this heating blanket.

In case of emergency, disconnect the power supply to the heating blanket.

### Electric shock

- Do not touch the injured person while in contact with the electrical current.
- Call your local emergency services if the injured person is severely burned, disoriented, has difficulty breathing, has an abnormal heart rhythm, is in cardiac arrest, has muscle pain and twitching, convulsions, or is unconscious.

### Minor burns

- Hold the burned area under cool running water for 10 to 15 minutes.
- Remove rings or other tight fittings from the burned area.

### Severe burns

- Call the local emergency service.
- Protect the person from further harm.
- Remove rings or other tight fittings from the burned area.
- Control breathing and perform first aid procedures if necessary.

### Fire

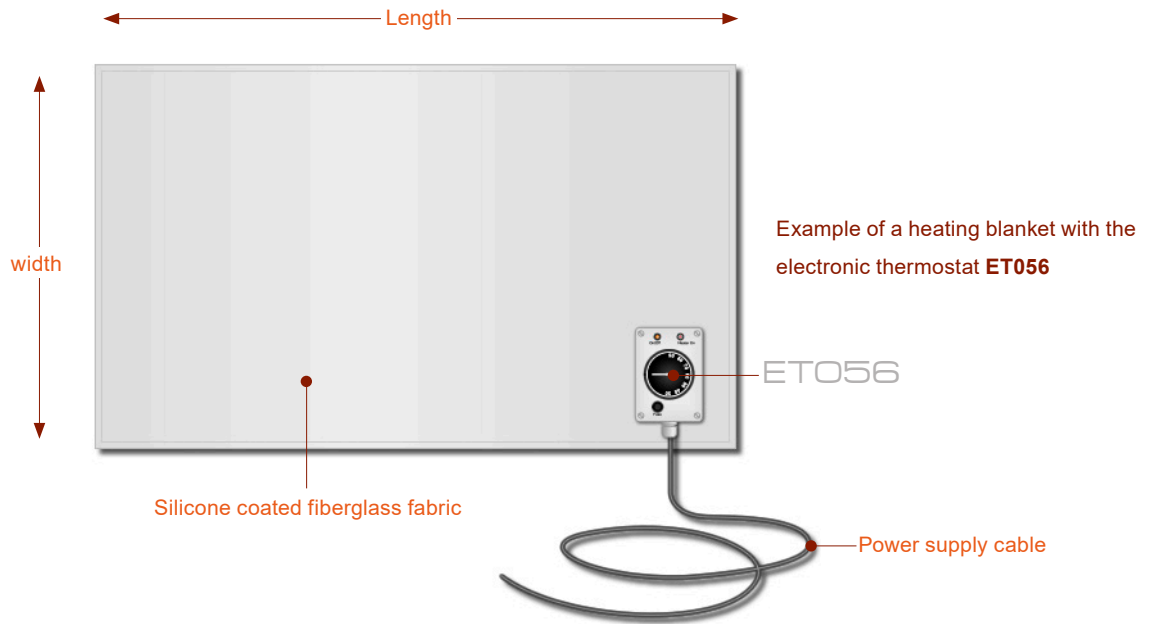
- Call the local emergency service.
- If it is safe, use a fire extinguisher to put out the fire; Otherwise, evacuate to a safe distance and wait for help to arrive.
- This heater is made of material that does not produce a flame, but can be ignited near combustible materials.

## Heating blankets BFV-CC/ET056

### BFV-CC/ET056

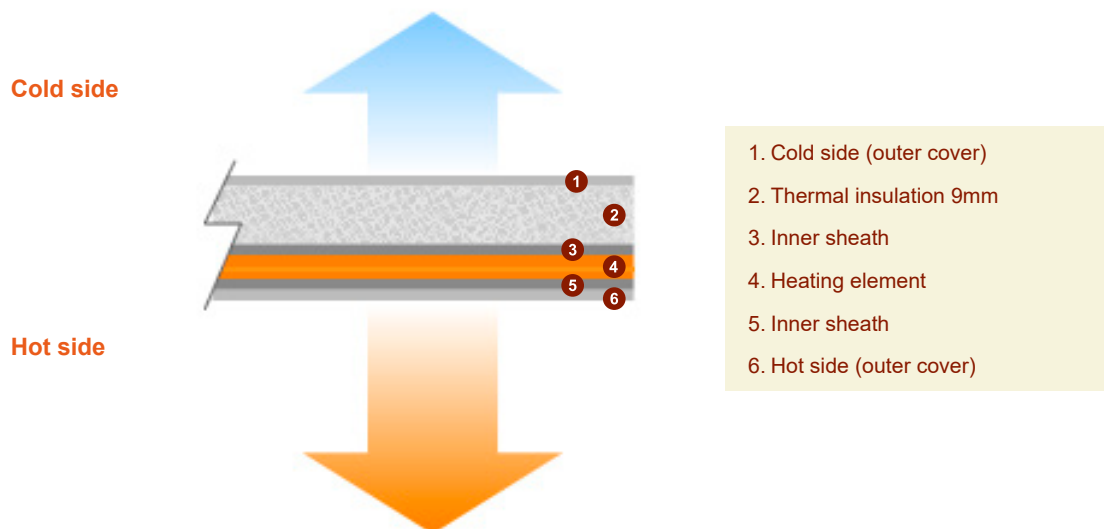
The **BFV-CC/ET056** range of heating blankets for curing and hardening are available in different sizes, different powers and can be supplied at 110 or 230 volts.

### BFV-CC



### Efficacy and safety

The heating blanket heats only on one side, the one we call the hot side. The opposite side of the blanket stays cool because it incorporates a 9mm layer of thermal insulation. This measure preserves the integrity of workers and reduces heat loss.





## Heating blankets BFV-CC/ET056

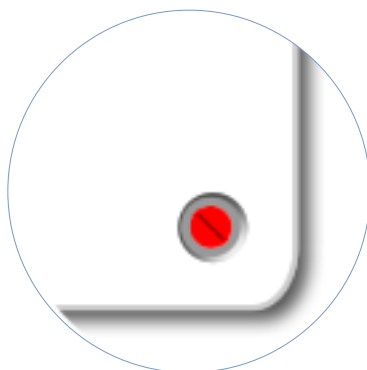
### ET056

Adjustable electronic thermostat 30-90° C.

### ET056



Reference	ET056
IP protection:	IP-65
Temperature range:	30/90° C
Voltage:	110 / 230 V
Maximum load current:	15 A at 230 V
Differential On/Off:	1° C
Sensor:	NTC (-20/110°C) Integrada en la manta
Electrical protection:	15 A - fuse
Power cord:	Conductor 3 x 1,5 mm <sup>2</sup> H07RN-F



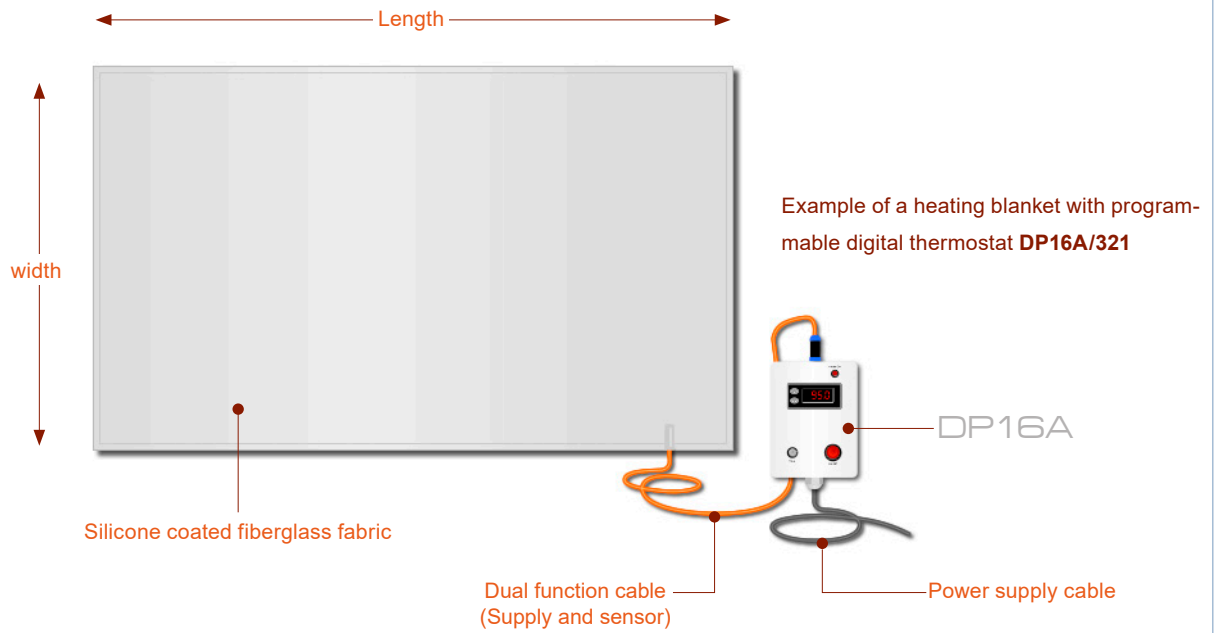
• **Attention:** Removing the seal from the screws invalidates the guarantee.

## Heating blankets BFV-CC/DP16A

### BFV-CC/DP16A

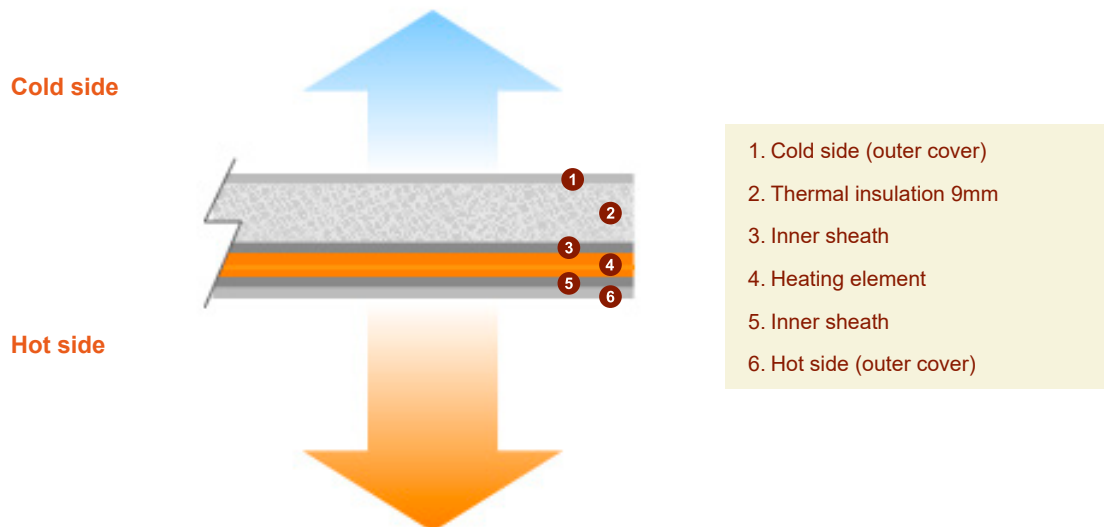
The **BFV-CC/DP16A** range of curing and hardening heating blankets are available in different sizes, different wattages and can be supplied at 110 or 230 volts.

### BFV-CC



### Efficacy and safety

The heating blanket heats only on one side, the one we call the hot side. The opposite side of the blanket stays cool because it incorporates a 9mm layer of thermal insulation. This measure preserves the integrity of workers and reduces heat loss.



## Heating blankets BFV-CC/DP16A

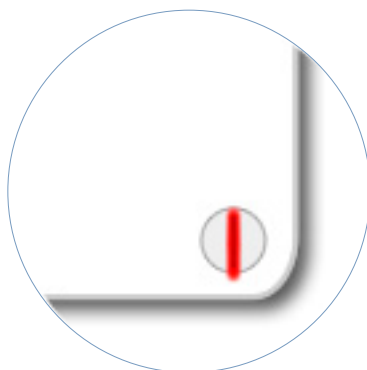
### DP16A/321

Standard programmable digital thermostat to control and regulate the temperature of heating blankets for curing and hardening.

### DP16A/321



Reference	DP16A / 321
Case size (L x W x H):	155 x 110 x 74 mm
Box without window:	IP-65
Temperature range:	-40 / 140° C
Supply voltage:	230 V AC
Maximum power:	3.500 W
Sensor input:	PTC1000 via a 5-pin plug
Heater outlet:	5-pin connector - IP68
Power cable:	2,5 meters - 3 x 1,5mm <sup>2</sup> H07RNF
Electrical protection:	16 A - fuse



• **Attention:** Removing the seal from the screws invalidates the guarantee.

## Installation of the heating blanket BFV-CC

### Installation/operation instructions

Installation instructions for the heating blankets of the **BFV-CC** range.

It is important to read and fully understand this manual before putting the heating blanket into operation.

These instructions are specifically for all models of heating mantles for curing synthetic resins and curing mortars.

### Step 1

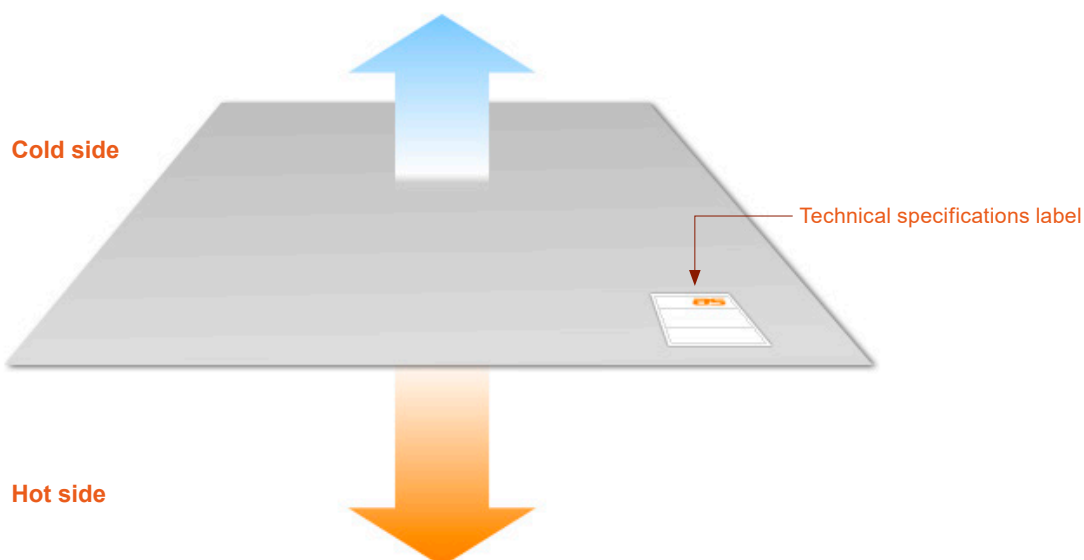
- 1.1. Unpack the heating blanket. Make sure no accessories are missing.
- 1.2. Do a visual inspection of the heating blanket. Do not use the heating blanket if it shows any tears or is damaged.
- 1.3. Inspection and installation is preferable to be carried out by qualified personnel.

### Step 2

- 2.1. Place the heating blanket in the area that you intend to heat.

The label side of the blanket should be on top. This is the cold face.

The opposite side, the one without the label, is the hot side. When the heating blanket is in operation, avoid touching this face to avoid accidents.



## Installation of the heating blanket BFV-CC

### Step 3

Set the thermostat to the temperature required by the surface you want to heat.

### ET056

If the heating blanket incorporates the electronic thermostat **ET056**.

### Operation

#### Orange led labeled “On/Off”:

- When connecting the heating blanket to the mains, the orange led of the thermostat will light up.  
To increase the temperature, you need to turn the knob clockwise and select the desired temperature.

#### Red led labeled “Heater On”:

- If the room temperature is higher than 30° C, the red Led labeled “Heater On” will remain off.  
When we turn the knob clockwise, increasing the temperature of the electric blanket, the red led will light up.
- If the room temperature is below 30°C, the red led will automatically turn on.



ET056

## Installation of the heating blanket BFV-CC

### DP16A

Heating blankets with the digital programmable thermostat **DP16A**.

### Functioning

#### 5 pin connector

The **DP16A** digital thermostat incorporates a five-pin connector, which with a single cable allows us to achieve two objectives:

- Supply power to the heating blanket
- Control the temperature of the the heating blanket.

DP16A



5-pin connector (plug) - IP68



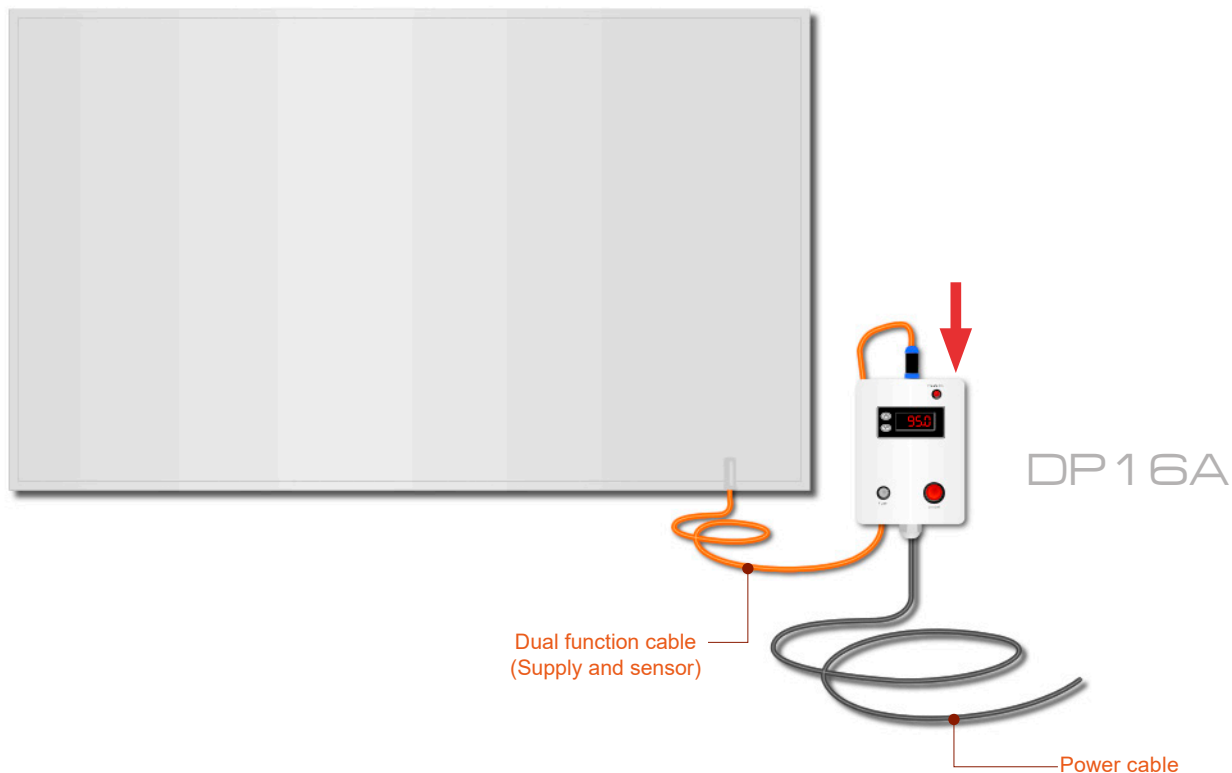
5-pin connector (jack) - IP68



- Both connectors have a white dot that show us the correct way to make the connection.

## Installation of the heating blanket BFV-CC

Connect the cable (electrical supply and temperature sensor) of the heating blanket, to the **DP16A** digital thermostat.



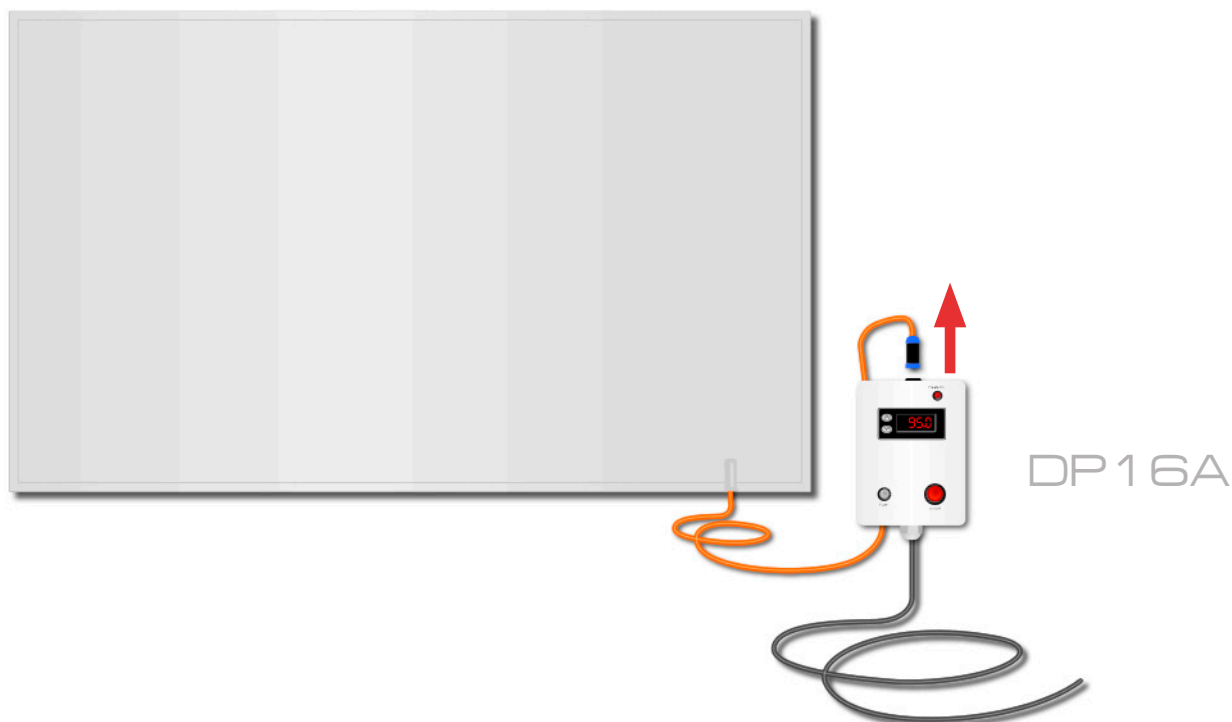
\* Before powering up and using the **DP16A** unit, please read the user manual included with the thermostat.

## Installation of the heating blanket BFV-CC

### Storage

The heating blanket and the thermostat will not be stored until the temperature of the heating blanket drops to match room temperature.

1. Disconnect the heater from the thermostat.



2. Fold the blanket and store it together with the thermostat inside the storage bag or carrying pipe.
3. Do not insert sharp tools or items into the storage bag or carrying pipe.

### Maintenance and conservation

Before cleaning the heating blanket, unplug it from the power supply.

Pass a damp cloth on the surface of the blanket.

Do not use solvents or bleach and never immerse it in any type of liquid.

### Waste management



Following the Electrical and Electronic Equipment Act, owners of old equipment are required by law to take old electrical and electronic equipment to a waste collection point.  
Help protect the environment; do not throw your old equipment in the household trash.



## Troubleshooting

### Troubleshooting

Please, read this manual before you contact **Elementos Calefactores AS**, or your local distributor.

This guide is designed to answer frequently asked questions. If you can not identify the problem or need additional assistance, please contact **Elementos Calefactores AS** through the following data::

Telf. 00 34 93 486 36 82

Fax: 00 34 93 486 38 14

E-mail: [as@elementoscalefactores.com](mailto:as@elementoscalefactores.com)

### Troubleshooting solutions guide

#### The heating blanket does not heat:

1. Check that the heating blanket is connected to the correct supply voltage. Details can be found on the label on the power cord or in the heating blanket data sheet.
2. Unplug the heating blanket:
  - For heating blankets that include the **ET056** thermostat, set it to 30° C, turn it On and select the desired working temperature again.
  - For heating blankets that include a **DP16A** programmable digital thermostat or similar, turn off the digital thermostat, turn it on again and check the SET-POINT temperature.
3. Check that the heating blanket is not connected to a magneto-thermal switch with a lower amperage than that required by the heating blanket.
4. Check the power cable of the heating blanket and make sure that it is not damaged.

### Important

**BFV-CC** heating blankets for curing synthetic resins and hardening mortars are designed for a specific use.

Using it for another purpose can affect its effectiveness, cause structural damage and even harm the personnel handling the heating blankets.

Improper use or manipulation of the heating blankets, as well as its components and/or accessories, may invalidate the guarantee.



## Request for heating blankets on demand

### Request form

If you can not find the heating blanket that meets your specifications, we can also manufacture custom models.

Send us your specifications:

- **Email:** [as@elementoscalefactores.com](mailto:as@elementoscalefactores.com)
- **Fax:** 00 34 93 486 38 14

### Contact data

Name | Last name: ..... Company:.....  
 Telephone:..... Email:.....  
 Address:..... PC: .....  
 City: ..... Country: .....

### Project details

Location (city): .....  
 To be used indoors, outdoors, both: .....

### Type of fastener

Velcro: .....  
 Nylon straps with plastic buckles: .....  
 Springs: .....  
 Other (specify):.....

### Temperature and controll device

**ET056:** Electronic regulator 30/90° C.....  
**DP16A:** Digital programmable thermostat -20 a +140° C.....  
 Other: ..... Specify:.....  
 .....  
 .....

## Our other heating blankets



**BFV-IBC:** Heating blankets for IBC tanks of 1.000 L.  
Learn more: <https://www.elementoscalefactores.com/aplicaciones-en/ibc-tank-heaters.htm>



**BFV:** Drum-heaters for 25, 50, 100 and 200 L. drums.  
Learn more: <https://www.elementoscalefactores.com/aplicaciones-en/drum-heaters-200L.htm>



**BFV-AT:** Heating blankets for High Voltage cables.  
Learn more: <https://www.elementoscalefactores.com/aplicaciones-en/heating-blanket-HV-cables.htm>



**BFV-EM:** Heating bands for electric motors.  
Learn more: <https://www.elementoscalefactores.com/aplicaciones-es/calentadores-motores.htm>

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## ECAS GROUP

- **Main website** •

[www.elementoscalefactores.com](http://www.elementoscalefactores.com)

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[www.electriceatingstore.com](http://www.electriceatingstore.com)

