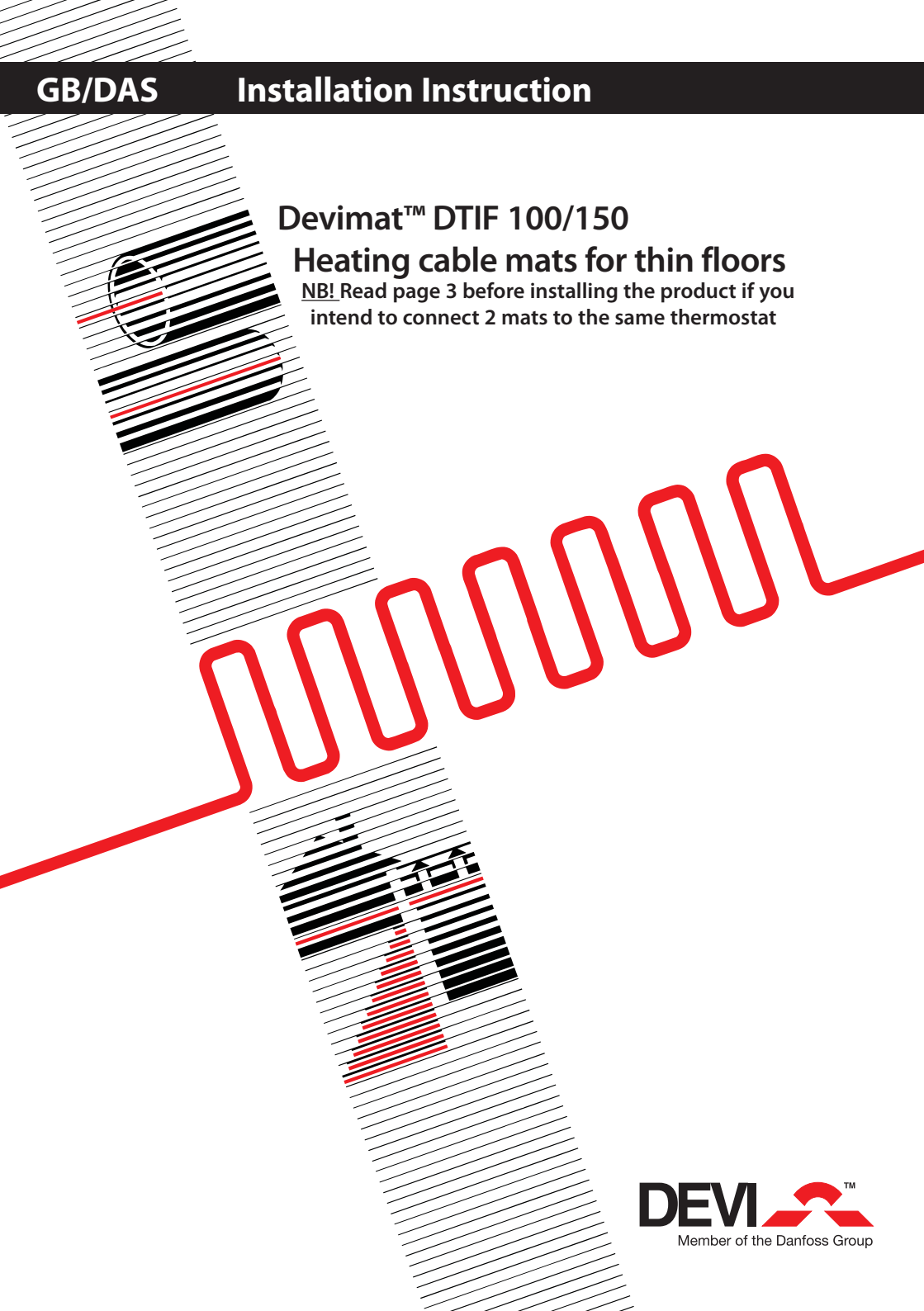


Devimat™ DTIF 100/150

Heating cable mats for thin floors

NB! Read page 3 before installing the product if you intend to connect 2 mats to the same thermostat



Devimat™ 100/150

Devimat™ heating cable mats are primarily used when renovating existing floors where a low floor construction height is required. Devimat™ is only 4 mm thick, plus the thickness of the floor surface.

Devimat™ 100 provides an output of 100 W/m² per mat. If your requirements

exceed the m² output of 100 W/m² e.g. in the case of badly insulated stone floors or old concrete floors in basements, you may wish to use Devimat™ 150 mats which have an output of 150 W/m².

The required output should be determined by an authorised electrician.

Areas of use

Devimat™ 100 W/m² can be installed in wooden floors, plaster or concrete floors.

Devimat™ 150 W/m² must only be installed on a concrete surface or similar.

NB!

**Must be installed in accordance with local building regulations.
Must be connected by an authorised electrician.**

Devimat™ specifications

| | |
|-------------------|---|
| Heating cable mat | DTIF |
| Type | 2-conductor |
| Voltage | 230 Volt |
| Output | 100 or 150 W/m ² |
| Covers | W = 500 mm L = See table T = approx. 4 mm |
| Wire insulation | FEP |
| Casing | PVDF 90°C |
| Max. temperature | 90°C |
| Bending radius | Min. 30 mm |

Connection

Phase - Black
Neutral - Blue
Earth - Shield



Typical insulation values

| | |
|---|--------------------------|
| Thin floor with tiles, vinyl | 0.035 m ² K/W |
| Thick floor with vinyl or similar | 0.040 m ² K/W |
| Floor with parquet, cork or carpet | 0.125 m ² K/W |
| Heavy-duty fibreboard and wall-to-wall carpet | 0.175 m ² K/W |
| Wooden floor on battens | 0.375 m ² K/W |

The insulation value of floors in which Devimat™ DTIF has been installed must not exceed approx. 0.125 m² K/W.

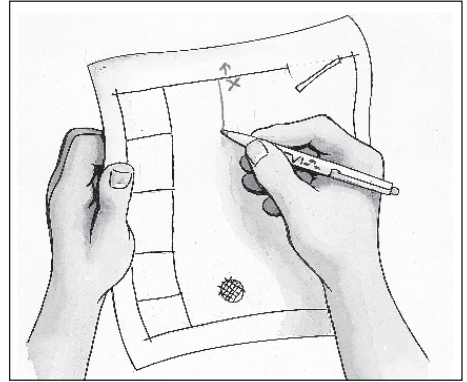
General Installation Guidelines

The following guidelines must be observed when installing Devimat™.



Preparation

1. All traces of old floor covering must be removed so that the concrete surface or the floorboards are visible.
2. Clean the surface and remove any loose particles.
3. The floor must be securely anchored to prevent it from shifting. Floor plaster is recommended for wooden floors to prevent the formation of cracks in joints and clinkers. The floor must be smooth in order to prevent any damage to the heating mat.
4. The floor must be primed.
5. Any gaps in the floor around outflow pipes, floor drains and doorsills, or near the outer edges where the floor screed may penetrate, must be filled.
6. You are advised to draw up an installation plan before laying out the mats. Use page 10 in this manual to draw up a plan.
7. Remember to indicate the sensor tube, connection tails and the connection to the cold cable.

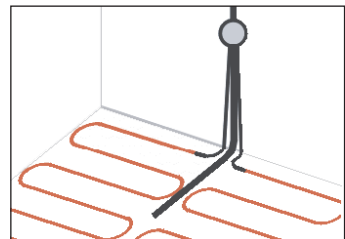


NB!

Please consult the manufacturer for information on suitable temperatures if using Devimat 100 under wooden floors the concrete layer must not be less than 5 mm on top of the cable.

Please note when using 2 mats!

The sensor must be positioned between the two mats as illustrated – this is important as it must be able to detect the temperature of both mats.



Installing the Devimat™

The heating cable mat should not be installed at room temperatures below 5°C.

The heating mat must be installed in accordance with the installation instructions.

Roll out the mat on the primed floor with the adhesive side on the bottom and the heating cable on the top.

Only press the mat onto the sub-floor when you are 100% sure it is placed correctly.

If you use a paint on moisture barrier be extra care full removing the mat if it is pressed to the sub-floor.

Distribute the heating mat evenly across the floor surface, avoiding areas where the mat may be squeezed or damaged by screws, e.g. from the toilet. The heating mat should lie flush against the surface and be securely fastened to avoid any movement of the mat when the floor screed is laid.

If the heating cable mat is rolled out towards the opposite wall, the mat will need to be cut before being rolled back.

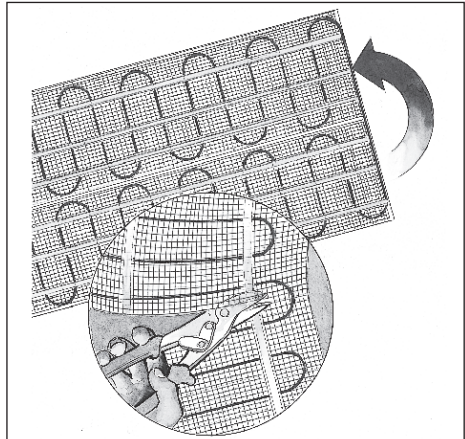
To do so, cut the mat material carefully without damaging the heating wire. Next, flip the mat over and roll it back parallel to the first length of mat, etc.

DO NOT CUT THE CABLE ONLY THE MESH.

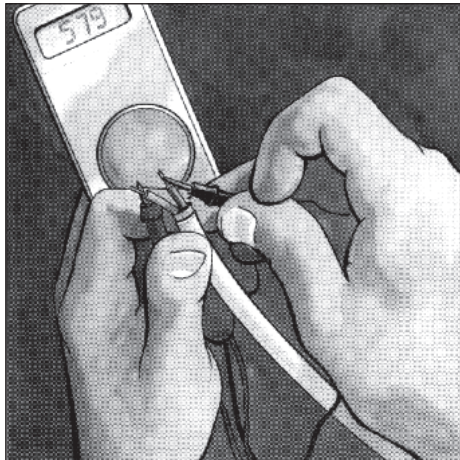
NB!

The heating mat must not be shortened or exposed to mechanical stress.

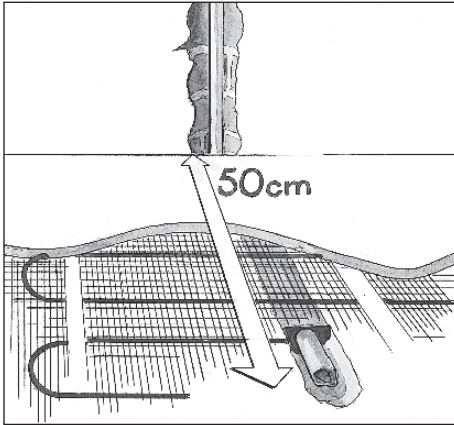
The heating mat must not be fitted below objects that can produce heat, e.g. tumble driers. Please observe care when installing the mat and laying the screed in order to prevent damage to the heating cable mat.



When turning the heating mat just cut the mesh. Do not cut the cable.



Test the heating mat in accordance with the table on page 9 (resistance) before the screed is poured.

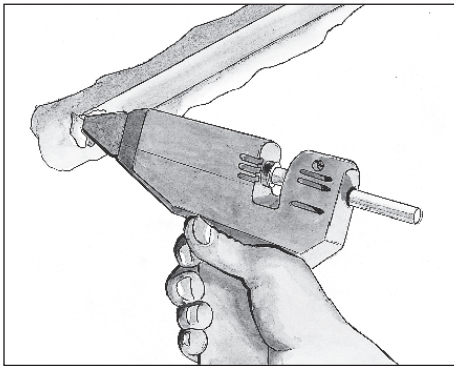


The flex tubing for the thermostat's sensor should be positioned so that the sensor is located between the heating conductors on a clear patch of floor. A thermostat should always control the heated area.

NB! Do not fit under cupboards, bathtubs, or similar.

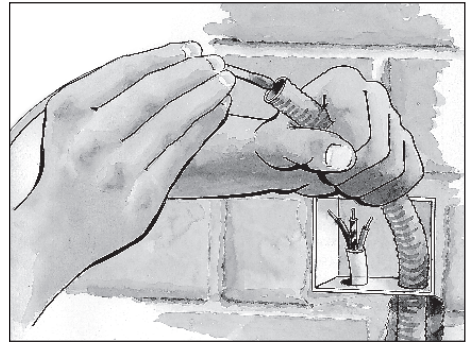
NB! Please see text and illustration page 3 if installing two mats on the same surface.

The flex tubing may be countersunk into the floor to reduce the floor construction height.



Seal the flex tubing at the end so that the screed cannot penetrate the tube.

The sensor cable and the cold cable for the heating mat should be connected to the thermostat box or directly to the thermostat located elsewhere in a convenient position, e.g. near your electric meter.



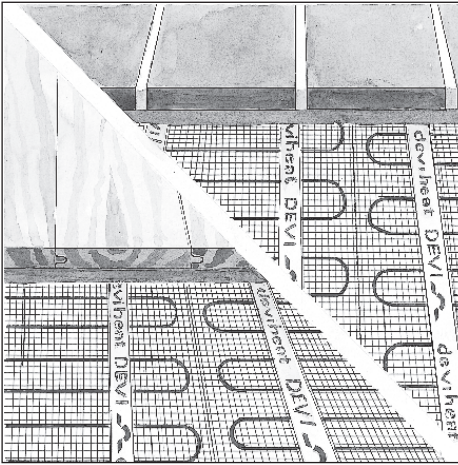
Test the ohm value of the heating mat before applying the screed.

When covering the mat with screed, please follow the manufacturer's recommendations as regards the drying time of the screed.

Humidity seals and floor coverings such as vinyl and wooden floors require all moisture in the screed, depending on the thickness, to have been eliminated fully in accordance with the drying times recommended by the manufacturer.

The under floor heating must not be used until the screed has dried out fully, usually around 28 days.



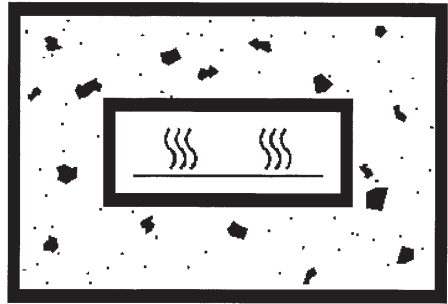


The mat should be tested as specified earlier before the floor covering is laid.

The installation should be equipped with a circuit breaker.

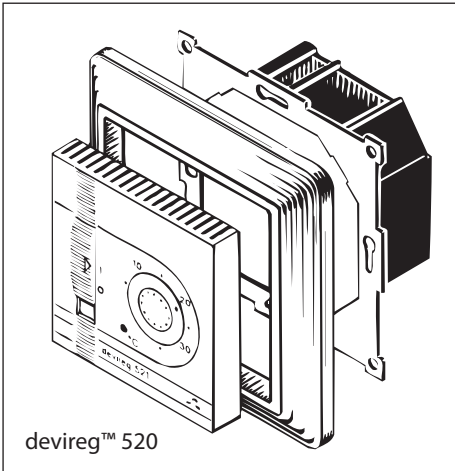


The heating cable mat is designed for under floor heating purposes only.



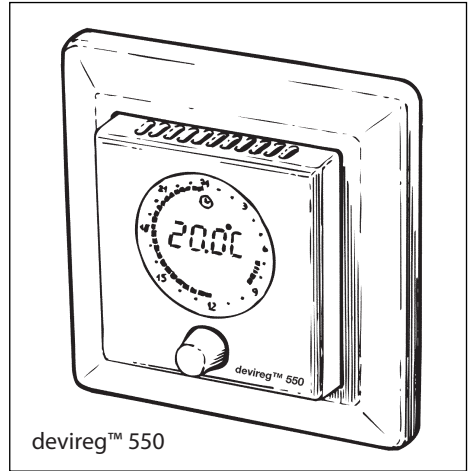
The heating mat must be embedded.

Controlling the heating mat



devireg™ 520

Devimat™ 100/150 may be controlled by means of devireg™ 520 which is flush mounted. The thermostat keeps the floor at a constant temperature by means of the floor sensor, which should be placed between two loops or mat sections.

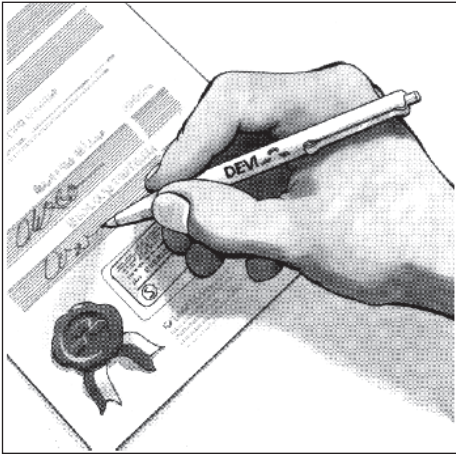


devireg™ 550

Devimat™ 100/150 may be controlled by means of devireg™ 550, an intelligent thermostat with digital display and built-in timer for lowering the temperature at night. Please contact your supplier for further information.

IMPORTANT

Please consult the manufacturer for information on suitable temperatures if using Devimat™ 100/150 under wooden floors, laminate floors or vinyl.



The underfloor heating system is now ready to use.

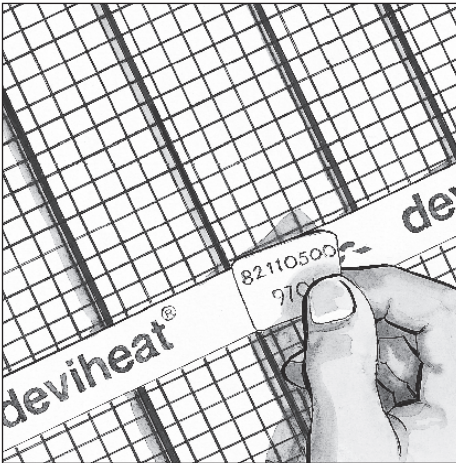
Increase the floor temperature gradually and adjust it until it reaches what you feel is a comfortable level depending on the type of room and your personal preferences.

The authorised electrician who installed and connected the product should complete the guarantee certificate.

The label from the heating mat should be placed in the designated space on the guarantee certificate.

The guarantee certificate should remain in the possession of the customer.

The guarantee is subject to the guarantee conditions listed on page 11.

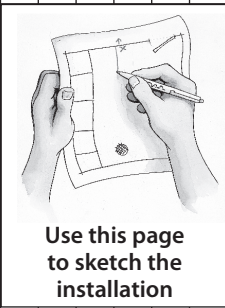


Devimat™ 100, 100 w/m² , 230 V

| Length | Area to be heated | Output | Total ohm |
|--------|--------------------|--------|-----------|
| 2 m | 1 m ² | 100 W | 529 |
| 3 m | 1,5 m ² | 150 W | 352 |
| 4 m | 2 m ² | 200 W | 264 |
| 5 m | 2,5 m ² | 250 W | 211 |
| 6 m | 3 m ² | 300 W | 176 |
| 7 m | 3,5 m ² | 350 W | 151 |
| 8 m | 4 m ² | 400 W | 132 |
| 10 m | 5 m ² | 500 W | 105 |
| 12 m | 6 m ² | 600 W | 88,1 |
| 14 m | 7 m ² | 700 W | 75,5 |
| 16 m | 8 m ² | 800 W | 66,1 |
| 18 m | 9 m ² | 900 W | 58,7 |
| 20 m | 10 m ² | 1000 W | 52,4 |
| 24 m | 12 m ² | 1200 W | 44,1 |

Devimat™ 150, 150 w/m² , 230 V

| Length | Area to be heated | Output | Total ohm |
|--------|--------------------|--------|-----------|
| 2 m | 1 m ² | 150 W | 352 |
| 3 m | 1,5 m ² | 225 W | 235 |
| 4 m | 2 m ² | 300 W | 176 |
| 5 m | 2,5 m ² | 375 W | 141 |
| 6 m | 3 m ² | 450 W | 117 |
| 7 m | 3,5 m ² | 525 W | 100 |
| 8 m | 4 m ² | 600 W | 88,1 |
| 10 m | 5 m ² | 750 W | 70,5 |
| 12 m | 6 m ² | 900 W | 58,7 |
| 14 m | 7 m ² | 1050 W | 50,3 |
| 16 m | 8 m ² | 1200 W | 44,0 |
| 18 m | 9 m ² | 1350 W | 39,1 |
| 20 m | 10 m ² | 1500 W | 35,2 |
| 24 m | 12 m ² | 1800 W | 29,3 |



**Use this page
to sketch the
installation**

The DEVI Warranty:

You have purchased a deviheat™ system which we are sure will serve to improve the comfort and economy of your home.

deviheat™ provides a complete heating solution with deviflex™ heating cables or Devimat™ heating mats, devireg™ thermostats and devifast™ fixing strips.

Should you, against all expectations, experience a problem with your deviheat™ system, you will find that DEVI, whose products are manufactured in Denmark and sold throughout the European Union, is subject to the standard regulations pertaining to product liability as specified in EU directive 85/374/CEE as well as all applicable legislation in the individual countries on the following conditions:

DEVI offers a 10-year guarantee on all deviflex™ heating cables and Devimat™ heating mats, and a 2-year guarantee against material defects and production defects in connection with any other DEVI products.

The guarantee shall be valid only if the GUARANTEE CERTIFICATE is completed -correctly and in accordance with the instructions, and provided the fault is inspected by or submitted to DEVI or an authorised DEVI dealer.

Please note that the GUARANTEE CERTIFICATE must be completed in Norwegian, and that the ISO code for Norway, NO, should be printed in the top left-hand corner on the front of the Installation Guidelines.

DEVI shall undertake any repair free of charge or supply the customer with a new unit. Repairs shall be carried out at no further cost to the customer. In the case of faulty devireg™ thermostats, DEVI reserves the right to repair the unit free of charge and without any unreasonable delays for the customer.

The DEVI Guarantee shall not cover installations that have been carried out by non-authorised electricians, faults which arise as a result of misuse by other suppliers, damage caused by third parties, incorrect installations or consequential damage. All work will be invoiced in full if DEVI is required to inspect or repair faults that have arisen as a result of any of the above. The DEVI Guarantee shall not extend to equipment which has not been paid in full.

DEVI will, at all times, provide a rapid, effective and honest response to all queries and reasonable demands from our customers.

The above guarantee covers product liability only, while purchases are subject to Norwegian legislation.

Warranty Certificate

The DEVI Warranty is granted to:

Name:

Telephone:

Address:

Zip code:

Please Observe!

In order to obtain The DEVI Warranty, the following must be carefully filled in.

See other conditions on the overleaf

Mat layed by:

Laying date:

Connected by:

Inst. date:

Mat length:

Watt:

Art. number:

Installed in:

- Concrete floor
 Wooden floor

- Tiles
 Vinyl

- Vinyl

Suppliers Stamp

DEVI A/S
Ulvehavevej 61
DK-7100 Vejle
Tel. +45 76 42 47 00
Fax +45 76 42 47 03

