how to

Insulate your fridge

You're unlikely ever to see a more straightforward DIY operation in Caravan Magazine than this. Yet the returns you'll get are amazing, as Matt Stubbs explains. In his case, there was an unexpected bonus, too. Read on...

Data panel

DIY fitting You'll never find an easier DIY

Why do it? If your fridge doesn't keep the food cool during hot weather, don't blame the fridge manufac turer - it's probably due to the fact that the fridge has not been installed correctly. An easy check is to place your hand on the worktop above the fridge; if the top is warm, then the cooling unit at the back of the fridge hasn't been sealed off from the rest of the caravan resulting in a heat build-up which in turn, adversely affects the fridge's cooling capability. The problem is not difficult

Tools Screwdriver, putty knife, needed blow lamp, Additional Roof insulation materials rockwool, W4 mastic tape

to overcome.

To find out if your fridge is working properly, place your hand on the working surface above it. If it is hot, the fridge is not working at maximum efficiency.



On newer caravans the fridge ventilator grilles are secured by a special locking screw.



On older caravans, the fridge ventilator grilles are secured to the outer walls by screws.



Turn the locking screw through 90 degrees to release the grille.



The grille can then be lifted out.

(Older grilles). Having removed the screws, heat the blade of a putty knife gently in a flame.

To give Electrolux its due, it does issue very clear installation instructions showing where the ventilator grilles should be installed relative to the fridge to ensure that the heat generated by the cooling process can be exhausted to the outside of the caravan as quickly as possible.

The instructions also refer to the need for a baffle, or heat deflector, to prevent a build-up of

Tester's opinion

fridge, what difference does Matt Stubbs think sealing off the cooling unit has made to its operation?

This is probably the easiest caravan DIY you'll ever come across. And it's also one of the most effective. Make no mistake about it, if the working surface above the fridge gets hot, the fridge isn't operating efficiently. Every year during the summer months we receive letters from caravanners complaining their fridges don't work properly.

The problem is almost always due to the way the caravan manufacturer has installed the fridge. But who gets the blame - it's the poor old fridge manufacturer, which is usually Electrolux.



The heated blade will make cutting through the mastic seal easier.



With the grills removed you'll be able to see the gaps between the back of the fridge and the surrounding unit.



Use bits of rockwool to fill all the gaps that you can see between the rear of the fridge and the surrounding unit.



Go inside the caravan and look inside the cupboard of the unit in which the fridge is fitted. If you see light, fill the gaps with rockwool.



There should be some kind of heat baffle at the top of the fridge to deflect the heat out through the grille. If there isn't you may have to make one from thin aluminium. Sit it on rockwool along the top of the fridge.



(Older grilles). Before refitting the grilles you must clean off all the old mastic. A piece of wood is ideal for removing most of the old mastic.



Remove the residual mastic with a rag dipped in Turps Substitute. Then thoroughly dry the whole area.



When cutting the new mastic tape, make sure the lengths are long enough to allow for overlaps where they meet — usually at the corners.



Once the grills have been refitted and secured by the screws, carefully trim off the excess mastic. Job done!

heat in the space between the top edge of the upper ventilator and the underside of the worktop.

Everyone knows that heat rises – just go into your loft on a hot summer day. Everyone, that is, except some caravan designers! Not only do they not insulate the cooling unit from the rest of the caravan properly, they make matters worse by positioning the upper ventilator grille too low, so that the heat rises past it to create

a hot spot in the space above the fridge. Coupled with this, they then omit to fit a baffle between the top of the fridge and the top edge of the ventilator. Without the baffle to deflect the heat out of the caravan there's no chance of the fridge doing its job properly.

It took me much less than a morning to complete this particular easy DIY project and I can report that I'm absolutely delighted with the way the fridge now works. We can even keep food taken from our house freezer frozen for several days – something that just wasn't possible before.

But there has been an added advantage, which didn't figure in my original plan. Sealing off the cooling unit has completely eliminated the draughts that used to whip through the cutlery drawer and cupboard in the kitchen unit when the wind was blowing in the wrong direction.