

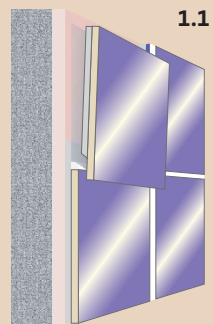
Tiling onto plaster

Plaster is a very common interior substrate that generally provides a good, flat surface for tiling. There

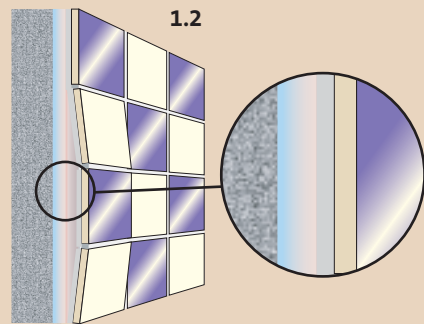
can be, however, certain problems associated with plaster and these need to be overcome with correct

preparation and application.

1 Plaster can only support relatively small/light tiles



1.1

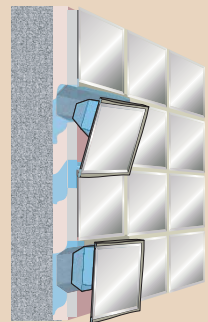
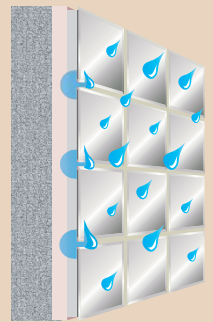


1.2

1.1 Plaster is a relatively weak material (in comparison to wood, brickwork, concrete etc). The maximum weight of tiling which can be supported by a dry, well-adhered plaster background, is 20 kg/m².

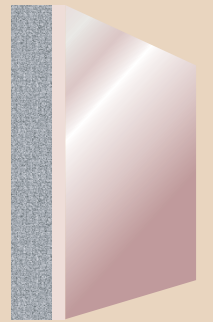
1.2 New plasterwork should have been completed at least 4 weeks prior to tiling commencing. Even if the surface appears to be dry in less than 4 weeks, the layers underneath will not be.

2 Plaster is water-sensitive



Plaster is water sensitive and is therefore not an ideal substrate in areas subject to wetting such as showers or wet rooms.

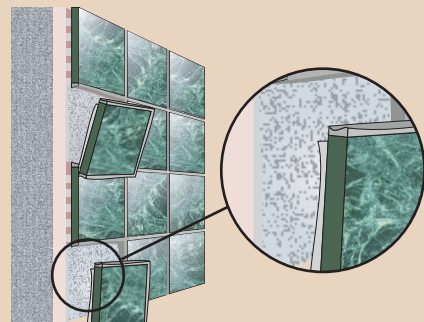
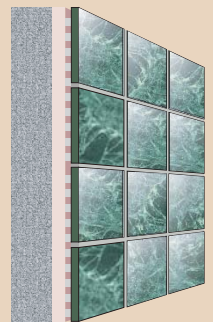
3 The finish quality can be very variable



Plaster finishes, when prepared for tiling, should be finished in accordance with the recommendations given in BS 5385-1:1995 section 3.4.

Very often the finished surface of plaster can be very variable, depending on the conditions and the plasterer. The surface can be very dusty or, if over-trowelled, it can be very dense and shiny.

4 Cement adhesives react with plaster



When plaster comes into contact with cement it forms a weak layer of ettringite that can cause the adhesive and plaster to not adhere to one another. Careful preparation is needed to stop this happening.

Correctly preparing the surface

Plaster finishes, when prepared for tiling, should be prepared as recommended in BS 5385-1:1995

section 3.4. Quite often though, the finished surface can be very shiny or dusty and this needs to be

prepared correctly prior to tiling, otherwise failures could occur.

Products required

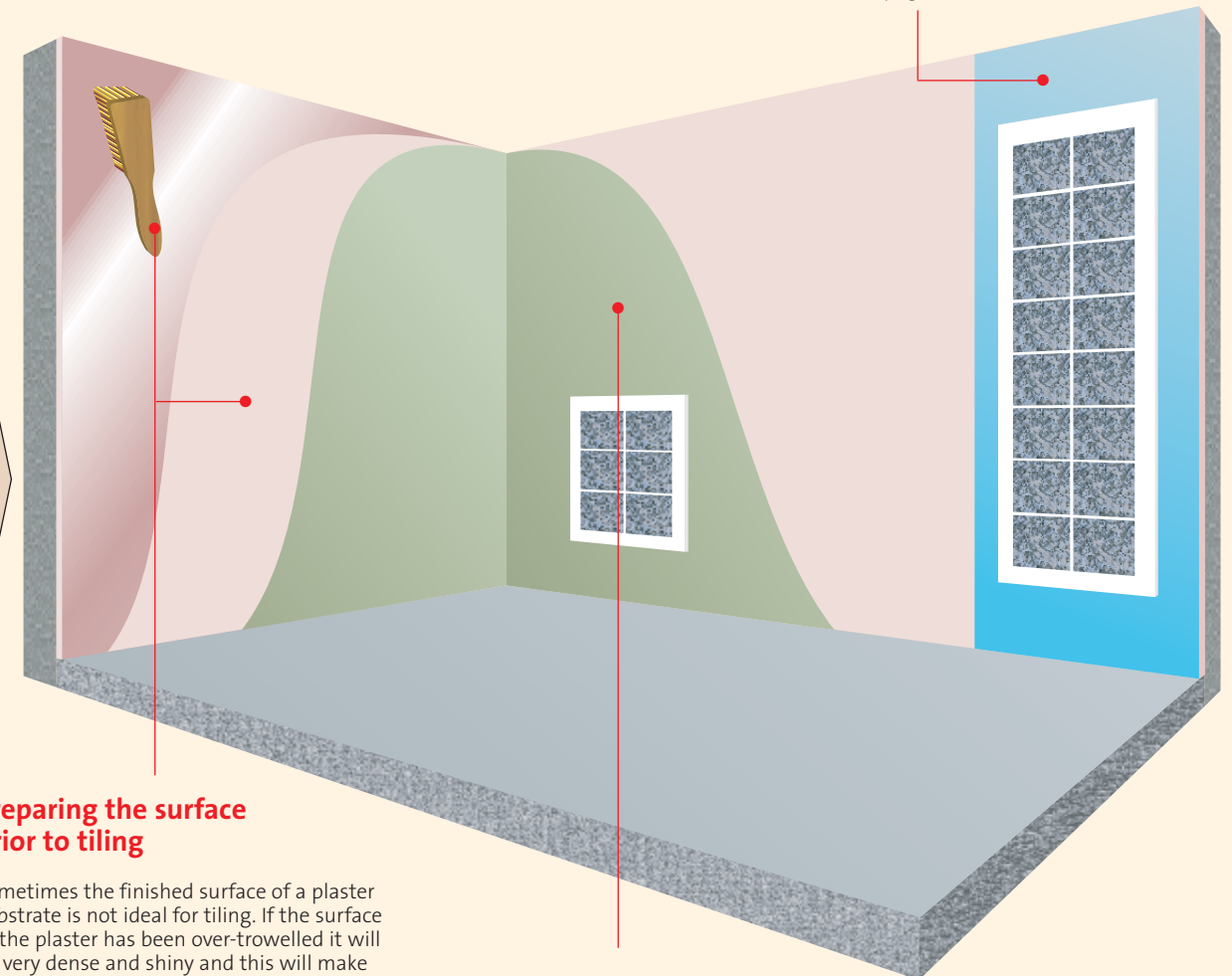
weber.sys protec
weber PR360 or **weber AD250**

Tile size and thickness

The maximum weight of tiling which can be supported by a dry, well-adhered plaster background is 20 kg/m². This is including the adhesive and grout. A good guideline is that tiles should be no thicker than 8 mm if they are ceramic, or 7 mm if natural stone. Where thicker/heavier tiles are to be used, plasterboard (up to 32 kg/m²) or tile backer (see manufacturer's recommendations) should be installed.

Protecting plaster substrates when subject to wetting

Plaster loses nearly all its cohesive strength when wet so needs to be protected in areas where it could be subject to wetting such as showers or wet rooms. An easy to use tanking system such as **weber.sys protec** will protect the plaster and provide a suitable substrate to tile onto. For more information, see pages 78 and 79.



Preparing the surface prior to tiling

Sometimes the finished surface of a plaster substrate is not ideal for tiling. If the surface of the plaster has been over-trowelled it will be very dense and shiny and this will make the bond with the adhesive very weak. It is recommended that the surface is abraded with a stiff wire brush and then all dust removed prior to tiling. If the surface of the plaster is dusty, it should be wiped with a damp cloth until all dust has been removed.

Using cement-based adhesive on plaster

If a cement-based adhesive is being used, the surface of the plaster must be sealed to stop the cement reacting with the plaster and forming a weak layer of ettringite which could cause tiles to de-bond. It is recommended that **weber PR360** or **weber AD250** is applied to the surface until the plaster stops absorbing.

