INSTALLING LARGE FORMAT OUTDOOR TILES USING ADJUSTABLE SUPPORT PEDESTALS
Portico from Tile Mountain brings together a slew of durable, 20mm thick slab tiles designed for outdoor use under one brand. Created for those seeking to instil a consistent design language from interiors to exteriors, Portico includes an extensive selection of products spanning sand-based flagstone effect right through to plank-like tiles authentically replicating aged timber.

The premium large format tiles included under the Portico umbrella means that your interior style can be extended to outdoor areas with ease and that creating an outdoor area dripping with contemporary style has never been simpler. All of the products contained within the Portico range are constructed from durable porcelain and come in large format variants as standard, meaning that not only will they withstand the elements and require very little post-installation maintenance.
What are Adjustable Paving Supports?

Adjustable Support Pedestals are a system that enables the laying of large format outdoor tiles and paving slabs without the need for grout and adhesive.

Adjustable Support Pedestals are what is known as a ‘suspended system’, meaning that no mechanical fixings are involved and the weight of the tiles or slabs hold everything in place (thus negating the need for permanent fixing with adhesives).

The pedestals are designed with a telescopic stem which is wound up and down to achieve a completely flat upper paving surface. Changes to height can be made whilst the slab is in place, saving a great deal of time and labour.

Benefits of using Adjustable Support Pedestals to install large format outdoor tiles include the creation of a void beneath outdoor tiles which allows rainwater to run between and under the slabs. This ensures that there is no standing water left on the surface, improving health & safety by making surface less slippery.

In addition, the cavity that is created by the tiles being suspended allows pipes, cabling ducts, and drainage channels to be accommodated and tucked away out of sight. A further advantage of using this suspended system is that tiles and slabs can easily be reconfigured or removed completely as they are not permanently fixed with adhesive and grout.

Ideal for roof terraces, patios, and verandas, Adjustable Support Pedestals allow slab tiles to be fitted up to the threshold level on roof decks or terraces without any risk of flooding. The 2.2mm positioning lugs create a gap between each slab tile which allows rainwater to pass between and beneath them. The lugs also provide a clear paving line, so the slab tiles can be laid in a straight line extremely quickly and easily.

Constructed from injection moulded polypropylene, Adjustable Support Pedestals have weight tolerance of 400kg per unit and the strength and consistency have been tested in the laboratory at temperature ranges from +75° Celsius to -40° Celsius. Structural movement is not an issue as the slab tiles are not grouted together, so no cracks will appear.
Ahead of starting any tiling project, it’s important to ensure that you have the right tools and materials to complete the job effectively. Below is a list of items that you should have before even beginning to think about installing outdoor tiles using Adjustable Support Pedestals:

**MATERIALS**
- Outdoor slab tiles
  - With appropriate slip rating
- Screed (if required)
  - We recommend Mapei

**PROTECTIVE KIT**
- Kneepads
- Dust mask
- Latex grip safety gloves
- Safety goggles or glasses

**TOOLS**
- Tile Cutter
- Tile Marker/Pencil
- Spirit Level
- Soft Bristle Brush
ASSEMBLING ADJUSTABLE SUPPORT PEDESTAL UNITS:

The robust pedestals / supports are manufactured from injection moulded polypropylene and can tolerate loads of 400kg per unit. They are also have a very large tolerance to temperature change and will not crack in freezing temperatures. The baseplates are manufactured with diagonal arms spreading out across the face of them, ensuring that the weight is spread to the maximum possible area and does not concentrate on the core.

1. The large baseplate holds the stem and nut fixing in the central collar. Slot the headpiece into the square indent pressed into the stem (the height of the pedestal is shown on the inside of the indent) to create the pedestal unit.

2. Place the four complete pedestal units in position and lay the slab tile on top of the head piece. With the slab in situ, use your fingers to twist the nut fixing on the stem up and down to adjust the height. There is no need to constantly remove and replace the slab.

3. If height adjustment becomes very tight, installers can use a special tool to help twist the nut fixing on the stem.
1. Ensure that your concrete base has been left to cure for at least 6 weeks before beginning to install tiles.

2. Once the concrete base has been installed and left to cure for a minimum of six weeks, Mapei Topcem Pronto can be used to form a screed to allow the creation of falls (a slight gradient that will help standing water to drain away) if required.

3. Apply the screed to the concrete base as directed by the manufacturer’s instructions. The screed can be bonded at around 10-40mm in thickness using Mapei Planicrete.

4. If the screed needs to be bonded at a greater depth than 40mm, Mapei Eporip can be used as the bonding material instead.

5. Leave the screed to set for at least 24 hours.

6. Using a soft bristle brush, remove any dust or construction material remnants from the surface that the ASPs will be placed upon.

7. If necessary, you can lay a waterproof membrane over the concrete surface that will house the Adjustable Support Pedestals.
1. Before beginning to set out the Adjustable Support Pedestals, dry lay your slab tiles so as to ensure that you have the correct number of tiles and to work out any cuts that may be required.

2. Starting from one edge of the area to be tiled, dry lay a line of slab tiles ensuring that the edge is straight.

3. The pedestal headpieces are designed with four positioning lugs set out in a cross formation. Position the corners of four separate slabs onto each headpiece and then ensure they are butted up to the lugs to give a straight, uniform paving line.

4. Once laid down, use a spirit level to ensure the consecutive slab tiles form a continuous even surface. The height can be adjusted by twisting the one on the stem of the pedestal unit up and down until the desired height is reached.

5. Repeat this process until your surface area is completely covered and the 2.2mm gap forms a straight line between the rows of tiles on all sides.
Paving directly up to the wall and around corners is easy thanks to the 150mm diameter baseplate.

Base plates with a smaller diameter are available which means when the area is paved tight up against the wall or parapet the slabs are not left overhanging the headpiece. This means less risk of the slab at the edge moving, providing greater stability

By either breaking off two of the positioning lugs or purchasing special two lugged headpieces, users can place two edges (rather than four) of the paving slab onto the headpiece and then butt the slabs right up to the wall or edge.

The two slabs up against the wall are sufficiently supported and the weight is still being drawn down through the centre of the baseplate and onto the deck in a consistent manner. This creates a neat finish and adequately supports the slabs.
TRIMMING ADJUSTABLE SUPPORT PEDESTAL BASEPLATES

The base plates are manufactured with a series of guidelines, in case users wish to trim them. This may be required when paving up to the wall or around existing pipework or details.

1. Locate the lines marked ‘Trim’ on the baseplate.

2. Use an electric or handsaw to cut the bases back to the trim line, making the baseplate smaller.

3. Please take care not to cut the baseplates any further than the level of the trim line as this will affect the stability of the pedestal.