

Using the 1:35 Scale Spanish Barrel Roof Tiles Mould

<p>1. The tools we used to make the tiles. *Soft plastic spatchula. *Small paint brush with cut down bristles. *A pair of tweezers with long thin tips (these are essential).</p>	
<p>2. Wash the mould to remove any talcum powder (new moulds have been dusted with talcum powder).</p>	
<p>3. Mix your plaster (we used terracotta casting powder with iron). It is important to use a hard casting plaster with an absolute minimum of 7000psi compressive strength. If you do not the tiles will break when removing them from the mould. Do not be tempted to make the plaster mix really thin as it will weaken the plaster.</p>	
<p>4. Add a squirt of Dishwasher Rinse Aid to a bowl of water.</p> <p>Submerge the mould into the rinse aid solution and bend it so that the solution wets the bottom of the tile cavities (rinse aid lowers the surface tension of water, making it easier for the plaster to flow into the bottom corners).</p>	
<p>5. Tap the moulds to remove the excess rinse aid solution. If you do not the excess water could dilute the plaster making it weaker.</p> <p>Do not let the mould dry completely.</p>	

6. To fill the mould with plaster:
*dip the small paint brush into the plaster.
*Bend the mould.
*Quickly work the plaster into the tile cavities one row at a time.

This is a messy job so you may want to wear some form of protective gloves.



7. As mentioned before this is a messy job so clean the spilt plaster from your work surface so that the mould sits flat (*this is important because if there is any plaster under the ends of the mould they will be lift up, causing the tile cavities to close up making the tile thinner and weaker*).

The tile cavities in the mould will not be completely full of plaster at this stage.



8. *Cover the surface of the mould with 1 or 2 millimetres of plaster.
*Squeeze the mould from the end and sides to push the bubbles out.
*Blow on the bubbles to pop them.
*Release the sides so that the plaster is sucked back in.



9. It is unlikely you will manage to release the mould without sucking some air back into the top part of the tile cavities.



10. Cover the mould with some more plaster (if required) and vigorously tap each side of the mould until you have removed all the bubbles.

Be careful not to get plaster under the mould as it really does need to be lying flat when left to dry.



11. Normally at this stage you would wait for a while, so that the plaster thickens slightly, before smoothing off the surface.

With this mould however it is important to gently smooth the surface off virtually straight away. This is because the mould rubber is very soft and may flex causing cracks in the tiles before the plaster has even had chance to fully set.



12. Let the plaster set for about 1.5 hours (terracotta casting powder) before attempting to remove the tiles from the mould. The amount of time you will have to wait will depend on the make of plaster and drying conditions.

13. When the plaster has had sufficient time to harden (if the first tile breaks wait a bit longer and try again).

Bend the mould and gently insert the tweezers as far down the tile cavity as possible. Then gently pull the tile out of the mould.

Remove the tiles from the middle of the mould first to minimise the chance of breaking them with your other fingers.

It is important that the tweezers blades are perfectly parallel to the tile. If they are not the tile will break.



14. By the third attempt we were removing 75 out of the 80 tiles without them breaking.

If you are unable to get anywhere near this amount of unbroken tiles you may be doing something wrong or the plaster you are using is not hard enough.

We removed 79 out of the 80 this time. We did chip one with the tweezers as they were not parallel to the tile and not inserted deep enough.

If you remove all 80 congratulations.

Please be warned: Some people find removing the tiles harder than others.

