

## Thick Replicating Material

## AGG254F

---

This material is cellulose acetate sheet of a thickness of 125 micron. It is soluble in acetone. It will normally be used to replicate rough surfaces when the thin replicating material (AGG255) will tear on separation from the surface.

A piece of the replica material of a size suitable to cover the area to be replicated is cut from the sheet. A few drops of acetone are dropped on to the area of interest and the replica film immediately applied (allowing surface tension forces to pull it down - no pressure is required). Make sure, however, that no air bubbles are trapped during this procedure or the area will not be faithfully replicated. The film should be allowed to dry for about 10 minutes. It will normally separate very easily from a relatively smooth surface, but may need teasing from a very rough surface.

If it is to be used as the basis for a replica for electron microscopy, it can be stretched between two pieces of cellulose tape structure side outwards, wrapped round a microscope slide, and placed in a vacuum coating unit for oblique shadowing with palladium-gold alloy (or platinum) and backing by a carbon evaporation.

The required area is cut out from the film, and laid, carbon side up, on to microscope grids which may be washed under a burette full of acetone, or cleaned by reflux washing in our reflux washing equipment.

If the replica is to be examined under an optical microscope, the structure surface should be coated with a thick layer of silver by evaporation, when the topography can readily be studied.