

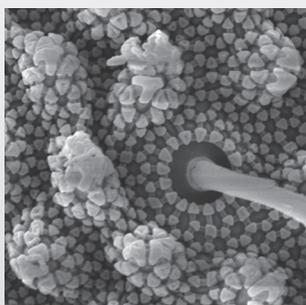
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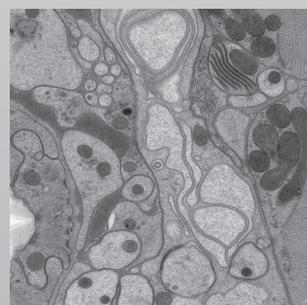
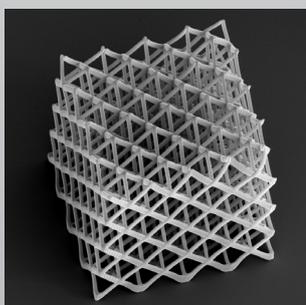


Application Note

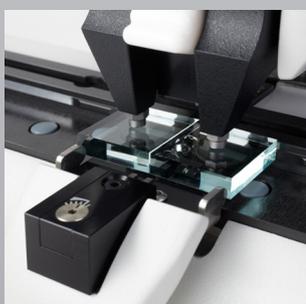
Cross Section of Glass Fibres Reinforced Polyamide

related instrument Leica EM TIC020, Leica EM TIC3X

Medical
Research



Industrial
Manufacturing



Natural
Resources



Cross Section of Glass Fibres Reinforced Polyamide

Market: Polymer industry, Research Institutes, Universities

PROBLEM

The fragile glass fibre gets broken during mechanical polishing. A lot of cracks and broken fibres influence the image analysis.

GOAL

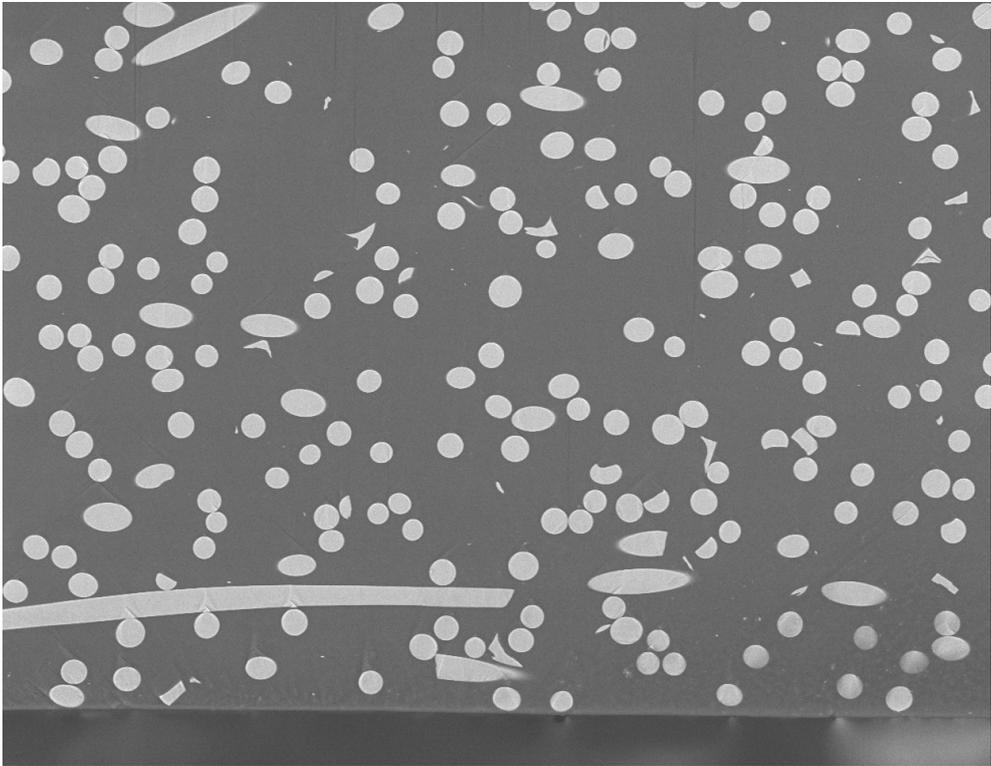
Cross section of glass fibre reinforced polyamide to make a high accuracy image analysis of the glass fibres.

Process description (benchmark values for this particular sample):

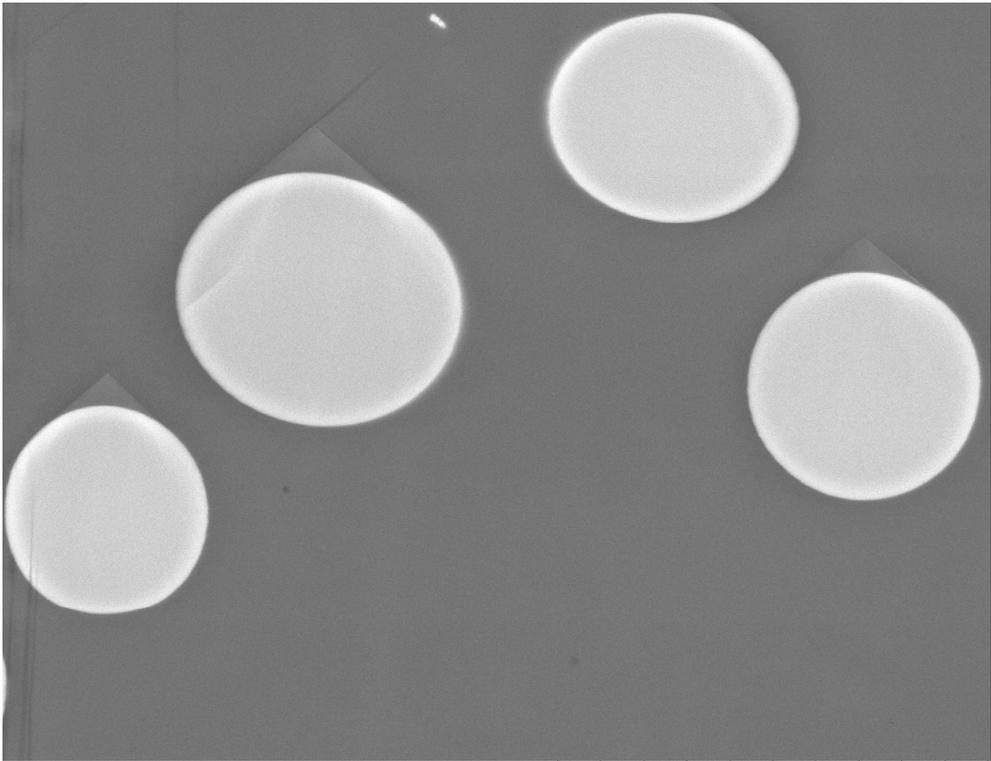
Parameter	
Acceleration voltage	6 kV
Gun current	2.3mA
Milling time	2.5 h
Cut depth	300 µm
Pre-preparation	EM TXP (6µm diamond)

RESULTS

No cracks are visible on single fibres in the cross section, which would occur by mechanical preparation. The image analysis can be done at a high accuracy level, as there are no cracks which would divide the glass fibre into surreal amount.



Probe10054 2008/11/27 09:32 L 200 um



Probe10059 2008/11/27 09:55 L 20 um

RELATED PRODUCTS



Leica EM TIC020



Leica EM TIC3X

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