



A PARTNERSHIP BETWEEN



Postgraduate Certificate in Engineering – Course Detail

CHEMMAT 740

Advanced Polymer Materials

Microstructure and morphology of semi-crystalline and amorphous polymers, including alloys and thermoplastic elastomers. The study of structure/property/processing inter-relationships for plastics materials. Coverage includes characterisation of plastics materials, especially spectroscopic, thermal and rheological analysis. Mechanical testing.

CHEMMAT 741

Processing of Plastics

In-depth coverage of advanced processing techniques including associated rheology and heat transfer considerations. The course includes the study of additives, degradation processes and the prevention of degradation, formulation of products and the mixing of materials.

CHEMMAT 742

Plastics Materials Design

Material properties and selection. Tool design, including fabrication techniques. Environmental issues including lifecycle considerations.

CHEMMAT 743

Selected Topics in Plastics Processing:

Modular course covering specialised topics and applications. Topics typically include biopolymers, silicones, film blowing, rotational moulding and thermoforming.