

Modern Technology of Plastic & Polymer Processing Industries

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The Indian plastic and polymer industry has taken great strides. In the last few decades, the industry has grown to the status of a leading sector in the country with a sizable base. The material is gaining notable importance in different spheres of activity and the per capita consumption is increasing at a fast pace. Continuous advancements and developments in polymer technology, processing machineries, expertise and cost effective manufacturing is fast replacing the typical materials in different segments with plastics. Plastics play a very important role in our daily lives. Throughout the world the demand for plastic, particularly plastic packaging, continues to rapidly grow. Polymer processing industry deals with the manufacture and production of polymer and synthetic substances for example acrylic plastics: poly (methyl methacrylate), poly vinyl chloride (PVC), polyamides, polyesters, cellulose plastics etc. Plastic is incredibly versatile and can be made from different ingredients, moulded into any shape, and put to a huge range of uses across industry and the rest of society. Polymer Energy system is an award winning, innovative, proprietary process to convert waste plastics into renewable energy. Polymers are the most rapidly growing sector of the materials industry. No wonder polymers are found in everything from compact discs to high tech aerospace applications. On the basis of value added, Indian share of plastic products industry is about 0.5% of national GDP. This book majorly deals with properties and applications of engineering, the strength of thermoplastic composites, and the application of thermoplastic structural composites, applications of differential scanning, calorimetry and polymer characterization, polymer degradation and stabilization, advances in photo degradation and stabilization of polyurethanes and so on. This book also consists of raw material suppliers for plastic and plastic products, manufacturers of plastic processing machinery, plastics processing machinery and equipment (foreign), machinery and equipment for plastic converting, extruders and extrusion lines, injection moulding machines and so on. This book offers, in standardized and readily accessible information on the synthesis, structure, properties and applications of the most important polymeric materials. It has been designed as a text giving a balanced coverage of the science and technology of polymers finding major applications plastics. This book is very useful for industrialists, consultants, research scholars and institutes.

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