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Sustainability in Manufacturing Enterprises

Concepts, Analyses and Assessments
for Industry 4.0



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Preface

Nowadays it is not easy to define sustainability/sustainable development (S/SD) in manufacturing enterprises exactly as it is a relatively new concept for manufacturing enterprises. Sustainability is regarded as “Industry 4.0,” representing an issue relevant to modern-day living and doing business. The main objective of this book, “*Sustainability in Manufacturing Enterprises—Concepts, Analyses and Assessment for Industry 4.0*,” is to support manufacturing enterprises as they move towards sustainability and/or sustainable development. What follows, therefore, is it presents advanced analyses to assess S/SD in manufacturing enterprises. The ideas in the book are primarily based on the author’s research previously published in several international journals.

This book should be considered an introduction to S/SD in manufacturing enterprises. Its major goal is to provide a conceptual framework and methodologies for analyzing and assessing S/SD at all levels of manufacturing in regard to the sustainability pillars of economy, society, and environment. It is hoped that this material will enable readers to understand these concepts, analyze sustainability issues, and assess sustainability indexes individually and can be aggregated at micro- and macro-levels by creating appropriate sustainability models. However, this book does not only target industrialists and academics but also will appeal to undergraduate and graduate students in majors associated with industrial, mechanical, and manufacturing engineering, and operations management.

Any errors and omissions in the book is the author’s responsibility.

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