

The background of the book cover features a repeating pattern of overlapping spheres. Most are a vibrant green, but one sphere in the upper right quadrant is a contrasting bright red.

Operations Management

Strategic Context and Managerial Analysis

Terry Hill



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Operations Management

Strategic context and managerial analysis

TERRY HILL



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Other publications by Terry Hill:

Small Business: Production/Operations Management (Macmillan, 1987)

Manufacturing Strategy: the Strategic Management of the Manufacturing Function Second Edition (Macmillan, 1993)

The Essence of Operations Management (Prentice Hall, 1993)

The Strategy Quest (AMD Publishing, 1998: Albedo, Dousland, Devon, UK, PL20 6NE)

Manufacturing Strategy: Text and Cases Second Edition (Macmillan, 2000)

Manufacturing Strategy: Text and Cases Third Edition (Irwin/McGraw Hill, 2000)

Preface to the Third Edition

The area of operations management (OM) is often misunderstood by both students of business and managers within firms. This misunderstanding is generated partly by the way the subject is presented and taught, and partly by the way the function is perceived and explained by operations managers to their fellow executives.

However, part of the problem also lies in the changing field of study. Originally, the conceptual orientation and emphasis within OM was towards the management of the area. Later, specialist developments introduced techniques that made useful, sometimes fundamental, contributions to help manage operations. From this developed a strong, often overriding, impetus to teach and develop OM as a body of techniques involving detailed analysis and tactical considerations, but often not discriminating between the usefulness or relevance of one approach or technique to another. Furthermore, this emphasis towards the quantitative perspective as a way to resolve and present OM issues also increasingly included explanations and mathematical derivations of the formulae and solutions proposed.

The outcomes were significant. In the academic world OM became uninteresting and apparently lacked business relevance. Demand fell and growth in faculty resources, research and teaching did not match the general expansion experienced in business education at the undergraduate, postgraduate and post-experience levels. Within the manufacturing and service sectors of the economy the role became devalued. Consequently, the critical perspectives of this large and substantial function were not clearly recognized and were often inadequately presented. Typical results were unbalanced corporate argument, inappropriate allocation of key management resources to operations and a failure to attract the necessary management talent into the area by matching task, responsibilities and contribution with appropriate status, influence and reward.

From the increasingly competitive nature of markets in the last 15 to 20 years of the old millennium has re-emerged the key role of operations in bringing about growth and profitability of organizations. Fast and on-time delivery, providing products and services right first time and the need to cut costs were increasingly important factors in most markets. How well operations was managed to bring these about became a key corporate issue. As a function responsible for 60–70 per cent of costs, assets and people (while also typically contributing much to the way organizations compete), the emphasis swung in terms of what was key in operations from a bias towards techniques to one that stressed and highlighted the effective management of this large business function. This book is designed to contribute to this focus and perspective. It is orien-

tated towards a managerial perspective of operations and is set within the context of its significant contribution to the overall success of an organization.

PEDAGOGICAL FEATURES

Operations Management: Strategic Context and Managerial Analysis includes a number of features that help the learning process:

Diagram providing an overview of the book opposite the first page of each chapter. This diagram overviews the whole book by positioning each chapter throughout the operations role of transforming inputs, such as materials and information, into the service and product outputs a company sells. The particular chapter you are reading will be identified as well as the chapters that have been covered so far. This will help you position the chapter you are reading and also provide an overview of the topics already addressed.

Chapter overviews at the start of each chapter provide an outline of the topics to be covered and so help guide the reader through the material that follows.

Case examples are appropriately provided to help illustrate the concepts, issues and developments introduced in each chapter. Most include questions to help further their usefulness by asking the reader to consider relevant issues and reflect on a case example's message.

Exhibits are provided throughout all chapters. These present some of the concepts, issues, perspectives and approaches that are introduced within a chapter, in the form of graphs and tables, to further illustrate the points involved.

Cartoons provide additional emphasis. The picture and format is not only intended to bring a smile but also to reinforce the point in question.

Concepts and practice characterize the field of management and the applied approach within the book emphasizes the link between concepts and approach and the reality of putting these ideas into practice.

Chapter summary and discussion questions are included at the end of each chapter. The former provides a short recapitulation on the key issues addressed in a chapter, while the discussion questions are intended to help test a reader's understanding of core concepts and to facilitate classroom and group discussion.

Further reading lists are given as suitable references for additional reading to give pointers to help extend a reader's understanding of the key concepts contained in a chapter.

Case studies at the end of the book narrative cover the range of topics within the book. These are intended to form the basis of class discussion as part of the approach to learning using the case method.

Data disc is included with all copies of the book. This contains the exhibits for all cases at the end of the book that include data. The form in which it is provided will facilitate students and managers to analyse the numbers as a key part of analysing these case studies.

Index at the end of the book is included to help the reader search out relevant information and make this book a valuable resource for both studying and managing the field of operations.

Website. Lecturers' resource material is available at <http://www.macmillan-business.co.uk>.

THE PLAN OF THE BOOK

The book is divided into six major parts. These reflect the different, broader perspectives within the OM field and are explained below.

Part One: Operations management – day-to-day and strategic roles

The two chapters within this part directly relate to the title. Chapter 1 introduces the operations management task and highlights the key issues involved, while Chapter 2 explains how to develop a functional strategy in operations and sets this within the corporate strategy of a business.

Part Two: Product, service and process development

With the scene set, the next area to be addressed concerns developing products, services and processes. As operations transforms inputs into outputs the fundamental nature of product/service development and the delivery system involved are examined in detail.

Part Three: Managing and controlling the operations system

The core of the book, certainly in terms of the number of chapters (it totals 7 of the 15 chapters in the book itself) is in this section. A glance at the chapter list shows the heavyweight substance of these areas – capacity management, technology developments, the day-to-day control and scheduling of operations, management and control of inventory, managing the supply chain, the need for process reliability and maintaining the delivery system. These represent the central tasks of managing the internal functions in operations besides the supply-chain management issues that result from the make-or-buy decisions that companies take.

Part Four: Improving operations

Operations management's role does not end at managing the dimensions and issues involved. It also includes the essential task of improving the operations function and the two chapters in this section introduce this key part of an operations manager's role.

Part Five: Managing people

The key dimension of people management is highlighted throughout the book. This section brings these several items together and underpins them with the concepts that relate to this key task.

Part Six: Case studies

This section includes over 20 case studies that cover the topics presented in the book. As explained in the pedagogical comments above, they are intended to form the basis of class discussion as part of the approach to learning using the case method.

By providing a conceptual view of the issues of the OM task and discriminating between the useful and less useful by the coverage given to topics, it is hoped to serve the needs of those who are or who intend to take on the OM role and those whose roles will relate to this function in a range of businesses. The book, therefore, is designed to provide for its readers in the following ways:

1. As part of a course of study, with explanations and further application through class discussion and the use of appropriate case studies.
2. For managers who can apply the knowledge, concepts and ideas to their own situation to increase their understanding of how to improve their contribution to the overall business performance.

To all those who use this book, I trust you will find it helpful. It is vital that operations takes its full part in the running of companies and that the concepts and issues involved form part of the more complete understanding of business.

Good luck!

TERRY HILL

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The Ambassador Hotel, Kuala Lumpur for Exhibit 3.10.

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