

Book Selection

Edited by RICHARD EGGLESE and MIKE PIDD

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Expert Systems for Business

BARRY G. SILVERMAN (Editor)

Addison Wesley, Wokingham, 1987. 446 pp. £22.95

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Expert systems represent a practical application of artificial intelligence techniques. Expert systems incorporate knowledge of a specific application area with an inference capability to produce decisions (that should be justified). While much progress has been made in this exciting area, particularly as medical diagnostic tools, in the business environment they are still at a developmental/demonstrator stage. Many commentators, however, have promised management a future of their successful implementation for business.

Silverman's edited volume is a timely discussion of applications in a variety of functional areas, including accounting, executive and financial decision-making, factory supervision, inventory management, general management, operations management, procurement, project management and resource allocation. As with any edited volume, there is an unevenness in quality and coverage, but this editor must be congratulated on the constructive critical evaluation of this topic that most authors present.

The book is structured around three distinct, albeit inter-related, avenues:

- applying expert systems to a variety of business problems;
- embedding state-of-the-art expert systems technology in familiar office-automation products;
- conducting long-term research toward next-generation technology.

In practice, the specification, development and implementation of a successful expert system for business has been constrained generally because management cannot describe and define their particular problem of interest in sufficient detail to operationalize it. Unfortunately, brief chapters in an edited volume cannot explore this fundamental practical issue (which is also a stimulating issue). A further criticism of the book is that, as an expert system replaces management in part of the decision-making process, it is surprising that no account is taken of the organizational structure and informal networks that have proved to be important in determining the success and failure of earlier management information systems and decision support systems.

Enthusiasts for expert systems may feel betrayed slightly by this review, but there remains the unanswered question of what expert systems can really do for business managers. Expert systems have proven capabilities for problems with finite possibilities, but this is not represented by the increasingly complex business environment of global markets, modified regulation and intensifying competition that management must operate in.

JOHN BEAUMONT

Developing Business Systems Applications—A Managerial Approach

CHRIS EDWARDS and NIGEL BRYANT

Prentice-Hall, Englewood Cliffs, N.J., 1987. 183 pp. £9.95

ISBN 0 13 204223 1

This book is designed with smaller computers and their usage in mind, but in reality it provides sound precepts equally applicable to a much wider range of the genre; the authors have been

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