

## Data Structured Software Maintenance

"Higgins is one of the pioneers in the field of data structured program maintenance. He has done a good job of explaining the basics of data structured program design according to the Warnier/Orr methodology, and has given good tips and examples for maintaining large programs."

—Girish Parikh, Author and Lecturer

"In *Data Structured Software Maintenance*, Higgins offers a realistic assessment of the problem of software maintenance, and he avoids a lot of seemingly easy answers. I recommend the book to anyone who maintains software."

—Stephen M. McMenam, Principal  
The Atlantic Systems Guild

"In one sense, this is the first adult guide to the life cycle of software design. . . . Higgins' style is crisp and lively, and his examples clear and down-to-earth. He is also one of those enviable people who is equally clear on paper as in person."

—Nicholas Zvegintzov, from the foreword

"I enjoyed *Data Structured Software Maintenance* and in my opinion it's a good book. . . . Dave Higgins' solutions seem to be practical at the level of programming. The book is COBOL-oriented but the readers using other languages can find analogous solutions to solve their problems. The programming example is very good because it is very simple. Some could say that it is too simple at the logical level, but we must not forget that no one book can cover an entire topic even if it is well defined. This book will be useful above all for programmers and I hope that it will help them to obtain good results."

—Jean-Dominique Warnier

Author and Originator of  
the Data Structured Approach to Software Design

### About the Author



Dave Higgins is a senior partner of The Ken Orr Institute based in Topeka, Kansas. Together with Ken Orr and the late Jean-Dominique Warnier, Dave was one of the principal architects of the Data Structured Software Development methodology, more widely known as the Warnier/Orr approach.

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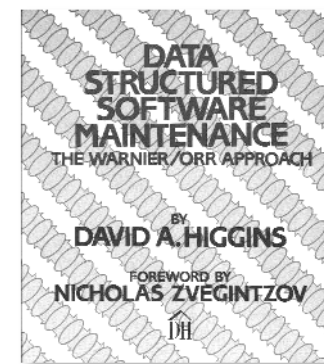
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# Data Structured Software Maintenance

The Warnier/Orr Approach

by David A. Higgins

foreword by Nicholas Zvegintzov



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Improve Your  
Software Maintenance Strategy

*Data Structured Software Maintenance* proposes a long-term solution to the problem of program maintenance, the largest single expense of data processing departments today. Traditional maintenance procedures cause programs to become unmaintainable over time because of the cumulative effect of changes to the system.

In this book, David A. Higgins argues against the practice of patching a program and redesigning just the part that needs repair or enhancement. Instead, readers are encouraged to use a structured method like the Warnier/Orr approach to redesign and document the existing programs so that they are easier to maintain over the long term.

The Warnier/Orr data structured methodology addresses more than just the coding style or the control structures of a program, and it can be applied even to programs that weren't developed with the method. The ultimate goal of *Data Structured Software Maintenance* is to have a good design for each program and to have the program closely match the design.

Other topics include a definition of good, maintainable programs, logical and physical design, repair and modification of traditional programs, maintenance of large programs, and installation of the Warnier/Orr method into an organization. Numerous examples and more than one hundred figures illustrate the text.

Read more about this book at  
<http://www.dorsethouse.com/books/dssm.html>