



# SURGERY

## Principles and Practice

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# **SURGERY**

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## Preface to the Second Edition

It is said that the child is father to the man. Similarly, with textbooks it may be true that success of a first edition patterns the development of the second. The success of the first edition of *Surgery—Principles and Practice* has exceeded our reasonable expectations. It is now up to the second edition to demonstrate its superiority over the first.

Before considering the features that are new to this edition let us summarize some of the distinctive characteristics which have proved to be useful and have been retained. Our six objectives remain as stated in the Preface to the First Edition. We have persisted in our policy of making the book basic yet practical. Again, the four editors have undertaken to write about half of the book and have assisted each other in revising their individual chapters. For the remaining chapters we have depended upon most of those individuals who worked on the first edition. The separate chapters, whether written by editors or by contributors, were gone over by two editors. Finally, all material was reviewed by the group of editors gathered round a table, discussing, analyzing and debating almost every sentence.

Features new to the second edition include Chapter 51, "History of Surgery," written by Drs. Peter D. Olch and Henry N. Harkins. It is hoped that this chapter will give a view of the background of modern surgery which will benefit student and practicing surgeon alike. The new Bibliographic Index will facilitate reference in the book to the many individual contributions to current surgical thought and technic. All of the original chapters have been brought up to date, and most of them have been drastically revised.

For this edition Dr. Henry N. Harkins assumed a major role in attending to certain logistic and production details, such as seeing that deadlines were met, but he was not in any other sense a chief editor. This is in conformity with our policy that the book be moderated in its concepts and content as a joint venture, but it is anticipated that the major responsibility will rotate with future

editions, and the order of listing the editors on the title page and spine reflects this.

Dr. Henry N. Harkins is grateful to Dr. Arno G. Motulsky, Professor of Medicine and Genetics, for suggestions regarding portions of the chapter on the Spleen; to Miss Jessie Phillips, Medical Artist, and her staff who did the art work on his chapters; to his associates on the full-time staff, Drs. David Dillard, Lloyd M. Nyhus and John K. Stevenson; to members of his resident staff who helped with the proof: Drs. Earl E. Cammock, Niles D. Chapman, Robert E. Condon, Robert M. Leyse, Karl J. May, Robert A. McAlexander, Roger E. Moe, Hubert M. Radke, Lawrence E. Savage, Richard D. Sloop, L. Stanton Stavney and Loren C. Winterscheid, and especially to his editorial secretary, Mrs. Mary Stamper, and to his chief administrative secretary, Mrs. Margrette Mackey, both of whom rendered conscientious and capable assistance which was of inestimable help.

Dr. Carl A. Moyer wishes to acknowledge the constant help of his secretary, Mrs. Carol H. Wichlan.

Dr. Jonathan E. Rhoads wishes to acknowledge the aid of Drs. Lawrence C. Blair, John P. Dodds, William G. B. Graham, John Helwig, Jr., Paul G. Koontz, Jr., and Robert J. Reed, III, who as fourth-year medical students helped with the manuscripts, the references and the illustrations and gave valuable advice regarding the method of presentation on the basis of their recent and current learning experience. Miss Edna Hill is credited with the drawings in his chapters and most of those in the chapters of Drs. Hampton and Fitts, Dr. Johnson and Dr. Newton. Mr. R. L. Chapman, Mr. Robert J. Lucas and Miss Mildred M. Stelling performed most of the photographic work for these chapters. He is grateful to Dr. Eugène P. Pendergrass, Dr. Philip J. Hodes and Dr. Lawrence A. Post for radiologic illustrations, particularly in the chapters on the Biliary Tract and the Pancreas. Dr. J. Russell Elkinton was helpful with illustrative material for the chapter on



Fluid and Electrolytes; Dr. H. T. Enterline supplied illustrative material from the laboratory of surgical pathology; and Dr. John W. Thomas provided bibliographic assistance and helped prepare the section on Iron Metabolism. He is indebted to Dr. N. Henry Moss for certain data used in the chapter on the Pancreas and to Dr. James H. Robinson for bibliographic assistance for the Second Edition. He is indebted also to a former secretary, Mrs. Jane R. Lohmeyer, and to Mrs. Florence C. Fedalen for help in typing the First Edition. He is most indebted to his present secretary,

Miss Jeanette B. Mager, who has carried the brunt of the preparation of his manuscripts for both editions and much of the organizational work for the book.

Finally, the Editors wish to acknowledge the helpful assistance of members of the staff of J. B. Lippincott Company, especially Mr. Stanley A. Gillet, Production Editor, Medical Department; Mr. Brooks Stewart, Medical Editor; and last, but not least, Mr. Walter Kahoe, Medical Director, whose sage counsel has been invaluable to us at all times.

**THE EDITORS**

# Preface to the First Edition

The original reason for the writing of this textbook of Surgery was the idea that there was need for a surgical textbook that included to a greater extent the physiologic, biochemical, pathologic and anatomic bases of surgical practice. Each of the editors shared this view. A number of avenues of approach were considered, namely: the revision of an outdated text, the collection of a number of monographs covering the major surgical specialties, and the compilation of an entirely new textbook. The last approach was finally adopted because of the belief that it was the simplest way of providing the medical student with a background knowledge of anatomy, pathology, physiology and biochemistry so as to enable him to develop acumen in the diagnosis of surgical lesions; facility in the preoperative, operative and postoperative care of patients; and an understanding of the principles, aims and methods of conduct of the more important operations. More of the thought leading to the production of this book is set forth in the first chapter entitled, "Surgical Philosophy."

Our objectives, in addition to those listed above, were:

1. The provision in one volume of an introduction to general surgery and the surgical specialties (gynecology, neurosurgery, orthopedics, pediatric surgery, thoracic surgery and urology), excepting only ophthalmology and otorhinolaryngology, believing they are better presented in separate treatises.

2. The writing of the text in such a way as to lead the student to realize that surgical practice is not standardized or perfected, with the hope that by so doing research would be stimulated and open mindedness fostered.

3. To emphasize that which is important in contemporary surgery, and more especially in the fields of cardiac, vascular and military surgery, even at the expense of omitting some of the rarer conditions and the finer points included in more compendious texts.

4. To emphasize the things that most doctors need to know about surgery rather than the more detailed points of technic that the

surgeon uses. However, because we feel that one cannot understand surgery without some exposition of the central act—the operation—the text contains descriptions of several of the more important procedures with emphasis on technical principles rather than on minute details.

5. To cover the physiologic bases of surgical practice in such a way that the surgical resident, while learning technic by actual observation and experience, will find the book a useful reference in matters of nonoperative care, fluid therapy, shock, blood transfusion, nutrition and so forth.

6. To place some emphasis on what surgery has to offer, therapeutically, based on the prognosis of various conditions with and without the exercise of existent operative procedures.

Although the result of such an effort always falls short of the aspirations which lead one to undertake the task, we hope that the objectives have been realized sufficiently to justify the expenditure of time and effort.

We have concentrated responsibility for the text in the hands of as few persons as we could, without sacrifice of firsthand knowledge of the subjects covered. Thus, the four editors have undertaken about one half of the book. For the remaining half, we have called upon individuals of special competence in their respective fields, but with a broad scientific point of view, who are at the same time individuals with a gift for exposition. In an effort to obtain a cross section of surgical thought in the United States, one editor was selected from the West Coast, one from the East Coast, and two from the central part of the United States. The selection of contributors will also show a broad geographic distribution. The average age of the editors, when the book was begun in 1953, was 45 and at its completion in 1956, 48. In an effort to give the book as much cohesion and uniformity as possible, each chapter has been gone over by several of the editors, and insofar as possible this has been done at joint meetings where free dis-

cussion of differences of opinion was possible.

It should be emphasized that every effort was made to make this book a common effort of the many individuals who contributed to it. Each of the editors has contributed more than the others in some particular direction. Dr. Allen has written the largest number of chapters. Dr. Harkins has made the most exhaustive study of the proofs. Dr. Moyer had the most to do with organizing the original group and arranged for the largest number of the contributors. Dr. Rhoads kept in touch with the publisher and interrupted the active lives of the other editors to hold meeting after meeting, some for a few hours, some for as long as 12 days. Therefore, the arrangement of the names of the editors in the frontispiece is an alphabetical one. Should this text undergo subsequent editions, the editors plan a rearrangement in the order of their names, for it is hoped that the text will not come to be known by the name of a specific individual. It is desirable that such a text be moderated and maintained as a joint venture, presenting fairly and as nearly as possible the current teachings and practices in the ever-changing field of surgery.

The fact that the book has been produced without an editor-in-chief has undoubtedly increased the burdens of the publisher. To Mr. Walter Kahoe, Medical Director of the J. B. Lippincott Company, our special thanks are due. We are also grateful to Ellis Bacon, formerly Vice President of the J. B. Lippincott Company, and to Stanley A. Gillet, Production Editor of the Medical Department, who has carried so great a load in the production of the book. We also wish to express appreciation to Mr. T. A. Phillips and to Dr. Morris Fishbein for early interest and discussions.

Dr. J. Garrott Allen wishes to acknowledge the tireless efforts, in particular, of Miss Reecie Hodgson for her assistance in the preparation and the typing of his portion of this textbook of surgery, and also to Miss Wendy Kemp, Miss Lola Tucker, and Mrs. Carol Kemp for their generous secretarial services when the load became too heavy. This author is indebted to Miss Gladys McHugh for her suggestions and resourcefulness in the layout of a number of illustrations which she prepared for his portion of the text.

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