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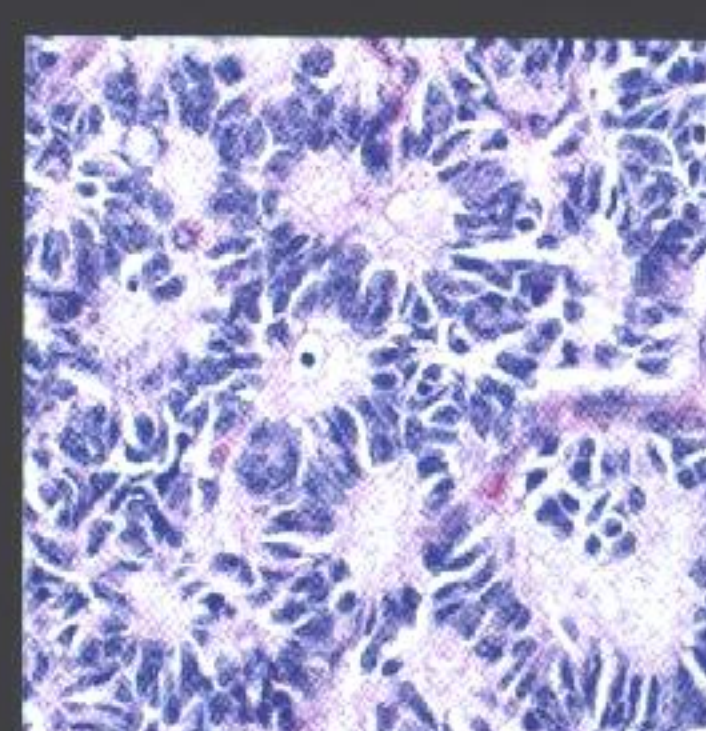
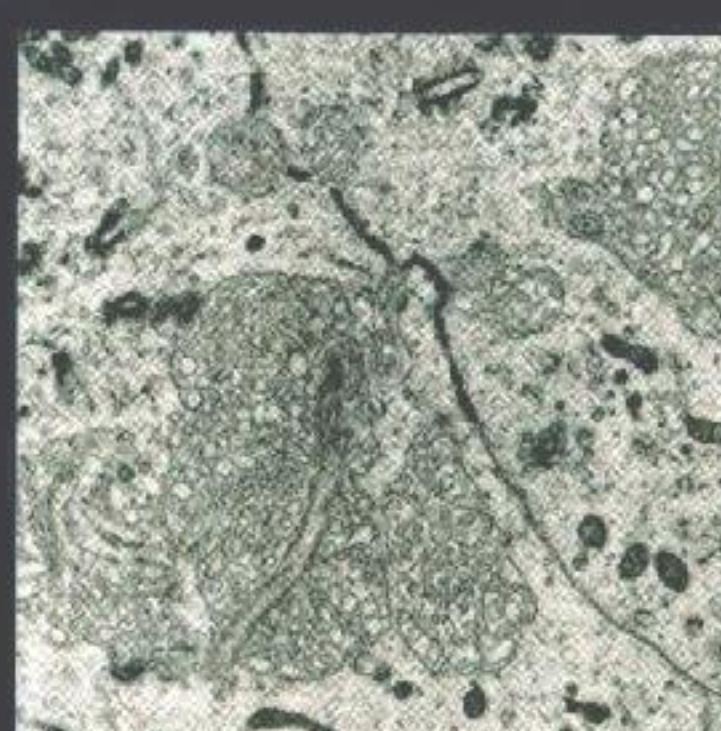
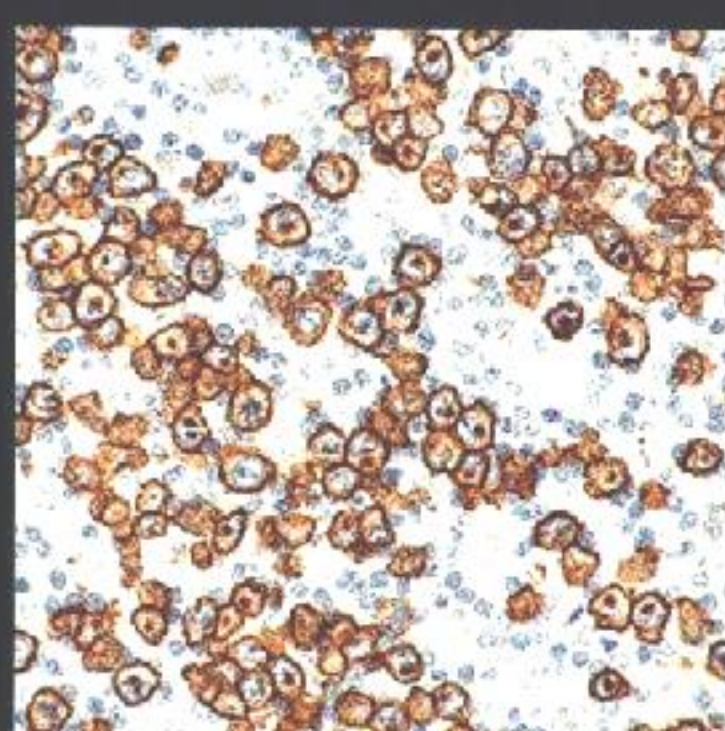
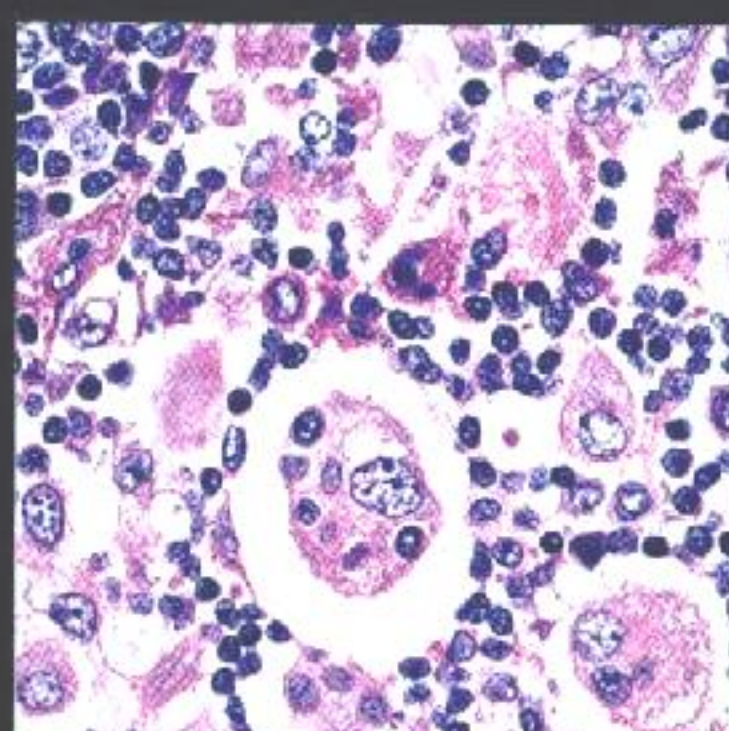
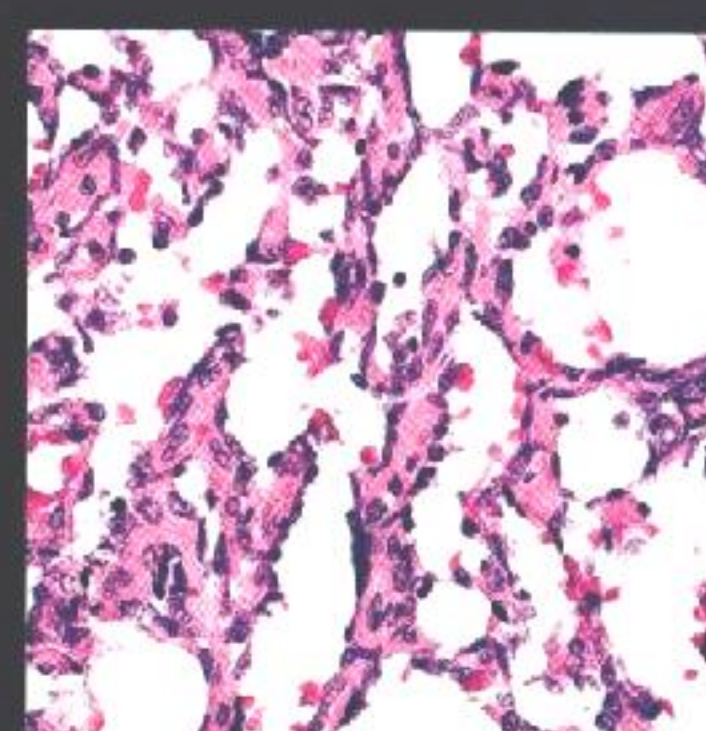
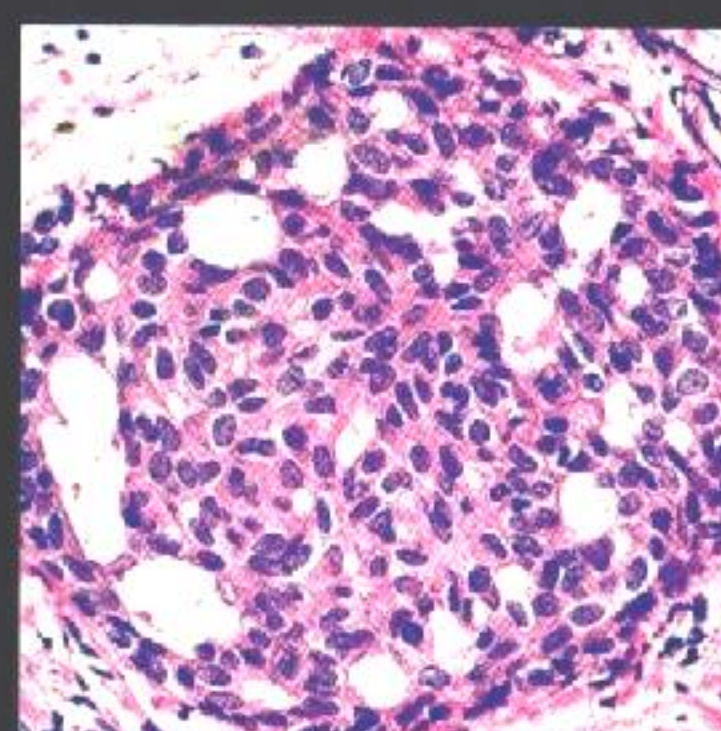
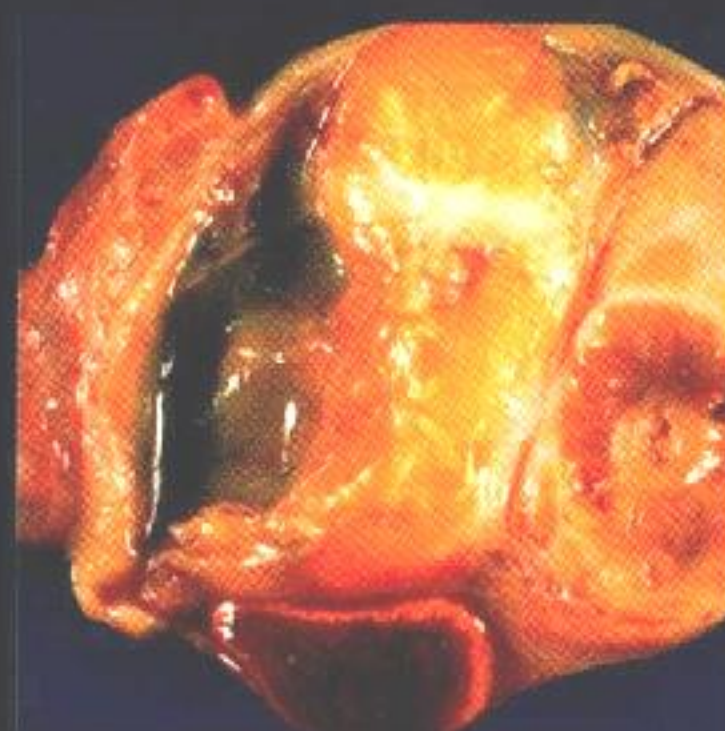
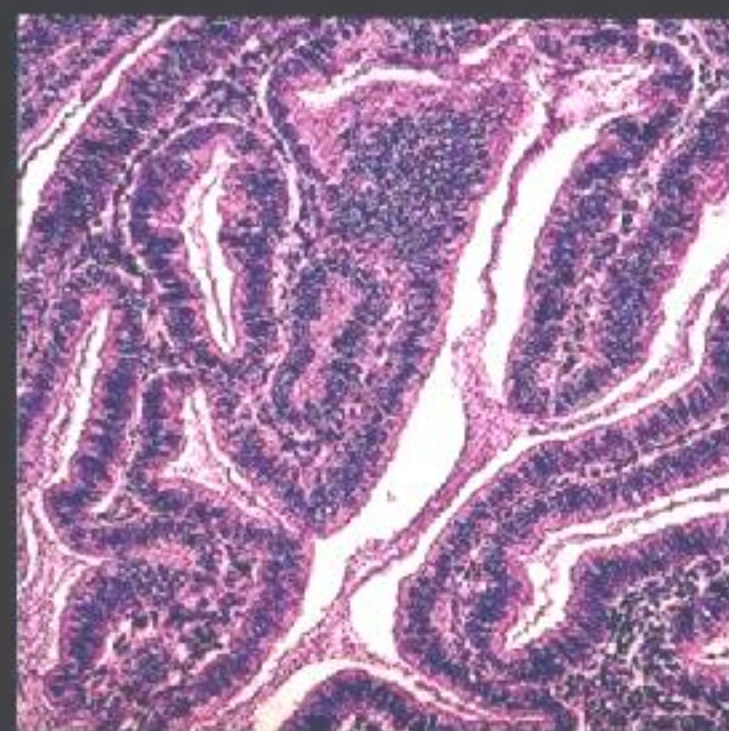
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ROSAI AND ACKERMAN'S

SURGICAL PATHOLOGY

TENTH EDITION

VOLUME 2



Juan Rosai

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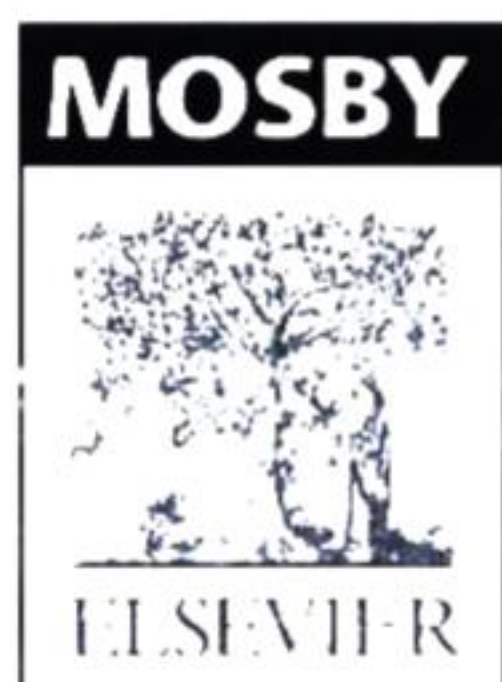
VOLUME 2

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Preface

to the tenth edition

The seven years that have elapsed between the current and the previous editions of this book have seen momentous changes taking place in the practice of surgical pathology. Immunohistochemistry has continued its notable expansion and has become an indispensable adjunct for the practice of the specialty. It has truly transformed the practice of surgical pathology in a fashion that no other technique has done before or after. Newcomers to the specialty take it for granted when ordering their panels, without pausing to think that only forty years ago none of this was available to the brave pathologists who based all of their diagnoses and other considerations on patterns of growth and cellular features seen in hematoxylin-stained slides, with the occasional modest help provided by one or another 'special stain'.

We are now in the midst of another transformation, resulting from the application to surgical pathology specimens of the enormous amount of new knowledge derived from the molecular genetic revolution. The potential and – in some instances – the already tangible benefits of this technology are too obvious to be emphasized. It may instead be instructive to reflect on the effect that this barrage of new information is having on the approach to surgical pathology by the new generation of practitioners, and the danger that the tradition of meticulous gross and microscopic examination upon which surgical pathology has been built may be gradually eroding. Some of this may be inevitable and is perhaps not altogether undesirable, yet the amount of information that this time-honored examination can still provide is so rich and dependable that one recoils at the thought of it being belittled or altogether ignored. With that caveat in mind, this edition dutifully incorporates the many promising results reached with the new technologies (emphasizing those in which a clinical validation has occurred), but always matching them against the results and conclusions derived from the morphology-based approach that has served pathologists so well for so long.

This difficult integration task has been carried out in most chapters by Dr John KC Chan, a brilliant representative of that emerging and still sparse cadre of surgical pathologists who combine a superb knowledge of conventional pathology with an understanding of the principles, possible applications and potential pitfalls of molecular genetic techniques.

Another important change that has taken place during this period concerns the increasing demands for standardization, compliance

with regulatory controls and legal accountability, which have prompted various pathology organizations to produce sets of guidelines to help us navigate through an increasingly complicated terrain.

Yet another significant development concerns the pervasive influence acquired by electronic information systems in practically all activities that take place in the surgical pathology laboratory, rendering some degree of computer literacy indispensable to those wishing to practice the specialty.

It has not been easy to accommodate this rapidly changing and continuously expanding universe within the confines of the covers of this book. The amount of information that had to be reviewed, even if often of a merely confirmatory or plainly repetitive nature, was daunting, and the trend for the establishment of subspecialties in surgical pathology – each with its own rites and lingo – has accelerated. The sum of these factors has made the production of this book a heavy burden, to the point of making one wonder on more than one occasion whether it had grown beyond the capabilities of an individual. Yet, as you can see, despite it all, another edition has been completed, once again for the most part written by one author, in the continuing hope that whatever expertise is inevitably missing as a result may be compensated by what somebody in a related context referred to as 'the ultimate simplicity of one voice speaking'. Along those lines, a constant attempt has been made to preserve as much as possible the pragmatic flavor initially given to this work by its peerless begetter, Dr Lauren V Ackerman (1905-1993).

This goal of coherence notwithstanding, it became increasingly obvious that there were highly specialized areas (mainly but not exclusively in the non-neoplastic field) that could not have been covered adequately without the contribution of experts. I was fortunate in being able to secure once again the collaboration of outstanding individuals (listed on the contributors' page) for this purpose, and I am extremely grateful to them for their willingness in lending their considerable expertise to this effort.

A book that has gone through so many editions is bound to contain strata of text and illustrative material that have been contributed by somebody at some point, to subsequently being covered by other strata from somebody else, but whose original source will still be identifiable to the initiated. Among the several past contributors, I would like to mention Dr Morton E. Smith (Chapter 30), Dr

Robert E Vickers (Chapter 6), and Dr John Morrow (sections on information systems on surgical pathology and model for an automated anatomic pathology system, Chapter 1).

Thanks are also due to the many colleagues and associates who generously contributed illustrative material from their own files or who pointed out inaccuracies, omissions, duplications, and typographical errors. Among them, I would like to single out for the magnitude of their contributions the following: Dr Fabio Facchetti, Brescia, Italy; Dr Robert Erlandson, South Berlington, Vermont, Dr Robin A Cooke, Brisbane, Australia; Dr Juan José Segura, San José, Costa Rica; Dr Pedro J Grases Galofré, Barcelona, Spain; Dr Michele Bisceglia, San Giovanni Rotondo, Italy; and Ms Loredana Alasio, Former Chief Cytotechnologist at the National Cancer Institute of Milan. I would also like to thank Dr Francesca Bono, Monza, Italy, for her help in producing the long list of immunohistochemical markers listed in Chapter 3.

Each of the editions of this book in which I have been involved has been written at a different place: the fifth at Washington University (St Louis), the sixth at the University of Minnesota (Minneapolis), the seventh at Yale University (New Haven), the eighth at Memorial Sloan-Kettering Cancer Center (New York), the ninth at the National Cancer Institute (Milan), and the current one at the Centro Diagnostico Italiano (Milan). In each place I have learned a great deal from my colleagues and have incorporated

many of their comments and suggestions. I am most grateful to the countless staff pathologists, pathology residents, and pathology fellows from each of these places who have unwittingly contributed to the book in this fashion. I suspect that some of them will recognize themselves in some of the statements. These dear colleagues are too numerous to be named individually. I hope it will suffice if in their stead I were to name Drs Tshering Dorji and Giovanni Fellegara, my two latest associates, in representation of the entire group.

Once again, the contribution made by my wife, Dr Maria Luisa Carcangiu, has been colossal. It has encompassed every aspect of the book production, including innumerable conceptual and practical suggestions, tedious proof-readings of the text and double-checking of references, not to speak of the psychological support in the many moments of near collapse.

Finally, my thanks also go to Mrs Armanda Locatelli, the Assistant who collaborated in this effort from the beginning to the end, with accuracy, speed, and utmost dedication.

So, here it is for you, my fellow surgical pathologist, hoping that it will provide you with some assistance in carrying out our demanding, stressful, wonderful job.

Juan Rosai MD
Milan, Italy, 2011

Preface to the first edition

This book can be only an introduction to the vast field of surgical pathology: the pathology of the living. It does not pretend to replace in any way the textbooks to general pathology, its purpose being merely to supplement them, assuming that the reader has a background in or access to those texts. The contents are not as complete as they might be because emphasis has been placed on the common rather than the rare lesions and are, to a great extent, based on the author's personal experiences.

This book has been written for the medical student as well as for those physicians who are daily intimately concerned with surgical pathology. This must of necessity include not only the surgeon and the pathologist, but also those physicians in other fields who are affected by its decisions, such as the radiologist and the internist. Gross pathology has been stressed throughout with an attempt to correlate the gross findings with the clinical observations. The many illustrations have been selected as typical of the various surgical conditions, although in a few instances the author has been unable to resist showing some of the more interesting rare lesions he has encountered. Concluding each chapter there is a bibliography listing those references which are not only relatively recent and readily available, but also those which will lead the reader to a more detailed knowledge of the subject.

Dr Zola K Cooper, Assistant Professor of Pathology and Surgical Pathology, has written one of the sections on Skin, and Dr David E Smith, Assistant Professor of Pathology and Surgical Pathology, has written the chapter on Central Nervous System. Both of these members of the Department are particularly well qualified for their respective roles because of their background and present responsibilities in these fields. Their efforts on my behalf are most gratefully acknowledged.

Many members of the Surgical Staff at Barnes Hospital have given much help both knowingly and unwittingly. I am particularly

grateful to Dr Charles L Eckert, Associate Professor of Surgery, for letting me bother him rather constantly with my questions and for giving freely of his experience. Dr Richard Johnson, who succeeded me as Pathologist at the Ellis Fischel State Cancer Hospital, agreeably made available all the material there, and Dr Franz Leidler, Pathologist at the Veterans Hospital, has been most cooperative.

Thanks must be given to Dr HR McCarroll, Assistant Professor of Orthopedics, for constructively criticizing the chapter on Bone and Joint, and to Dr CA Waldron for helping me with the chapters related to the Oral Cavity. Among other faculty friends and colleagues who were especially helpful, I would like to mention Dr Carl E Lischer, Dr Eugene M Bricker, Dr Heinz Haffner, Dr Thomas H Burford, Dr Carl A Moyer, Dr Evarts A Graham, Dr Robert Elman, Dr Edward H Reinhard, Dr J Albert Key, Dr Glover H Copher, Dr Margaret G Smith, and Dr Robert A Moore.

Mr Cramer K Lewis, of our Department of Illustration, has been very patient with my demands, and his efforts and skill have been invaluable. Miss Marion Murphy, in charge of our Medical Library, and her associates gave untiringly of their time.

Because of recent advances in anesthesia, antibiotics, and pre- and postoperative care, modern surgery permits the radical excision of portions or all of various organs. There is a need today for contemplative surgeons, men with a rich background in the fundamental sciences, whether chemistry, physiology, or pathology. The modern surgeon should not ask himself, "Can I get away with this operation?" but rather, "What does the future hold for this patient?" It is hoped that this book may contribute in some small fashion toward the acquisition of this attitude.

Lauren V Ackerman MD
St. Louis, Missouri, USA
1953

