

# Book Reviews

*Encyclopedia of endocrinology*. Section IV: *The ovary*; Vol. VII: *Ovarian tumors*. Hans Selye. Montreal: Richardson, Bond and Wright, 1946. Pp. vi + 289; Bibliography: Pp. 427. \$21.75.

In this two-part volume, which forms Section IV of a contemplated 10-section treatise, Dr. Selye has undertaken an experiment designed to demonstrate the practicability of preparing, as he expresses it, a rational classification and evaluation of all publications pertinent to a large field of medicine. In this instance consideration is given to ovarian tumors as part of the field of endocrinology.

In his interesting foreword the author reveals the realistic and generally unexpressed suspicion that some of the very heavily financed investigative efforts now in progress are, in many instances, of the leaf-raking variety, probably more productive of voluminous reports by job-maintaining, time-killing researchers than they are indicative of that critical and spontaneously sustained avid scientific interest possessed by so few.

The text is divided into 10 sections, each marked by a marginal thumb index. The general plan for each section, or chapter, is similar. The author first gives literary references to general reviews, in the various languages, covering the subject matter. These are followed by a definition of material under consideration, a brief history of the subject, a classification, a discussion of the pathologic anatomy, chemical considerations where indicated, incidence, pathogenesis, clinical course, complications, diagnosis, prognosis, and therapy.

The last five subheadings arouse this reviewer's curiosity, for they are concerned primarily with clinical considerations, and the author, although a doctor of medicine, is not a clinician. It has therefore proved interesting to see how these subjects are treated by one whose efforts have been confined principally to the preclinical phases of medicine. It is apparent that the author's lack of experience in the clinical arena at times deprives the text of a much-needed critical clinical evaluation.

The first chapter is devoted to a general discussion of ovarian tumors. Obviously, the author's first task is to define what he means by an ovarian tumor. This, it must be conceded, he has not done. He states (p. 2) that the transplantation theory of endometriosis is now generally accepted. It is doubtful, however, whether this general acceptance exists. Ten different classifications of ovarian tumors, including one of the author's are given. Dr. Selye's own classification does nothing to assuage the general unsatisfactory prolixity that clouds the subject.

It is stated (pp. 2 and 3) that folliculomas and Brenner tumors have been known to cause virilization. The reviewer finds it difficult to accept such a flat, unqualified statement in a field where the utmost reserve is essential.

The author states (p. 15) that ovarian neoplasms, such as folliculomas, and particularly follicle cysts, which secrete an excess of folliculoid material may, therefore, be oncogenic and produce primary tumor formation in another organ. This

statement has an uncomparable experimental basis and not more than questionable clinical support.

The discussion of the use of ovarian tissue for biopsy in the course of an operation as a guide to conservative or radical surgery (p. 23) would be more helpful to the general reader if it were distinctly emphasized that where the tumor is single and can be completely delivered and removed, material for biopsy should be obtained after such removal. This would avoid spilling material from an unsuspected cancer cyst or a mucinoid tumor into the peritoneal cavity. Under differential diagnosis the author fails to mention corpus luteum persistans and the occasional large, simple, follicular cyst, which produce clinical tumors whose character can only be suspected and which, under observation, generally disappear permanently.

Para-ovarian tumors are interestingly and well discussed in the second chapter.

Endocrine tumors comprise the next section. Follicle cysts are first discussed. The author apparently believes that so-called cystic ovaries that may occur after hysterectomy, salpingectomy, etc., are invariably due to disturbances in formation of the gonadotropic hormone. The fact that interference with the ovarian circulation may be the principal factor in most instances, due largely to the surgical technic employed is not considered.

In discussing "metropathia hemorrhagica" (p. 39), Dr. Selye considers inclusion of abnormal uterine bleeding appropriate because this is the most important clinical manifestation of cystic ovaries, while the principal associated uterine endometrial change is a benign glandular hyperplasia. The issue is patently confused by considering that endometrial hyperplasia is always present and therefore synonymous with metropathia hemorrhagica. Certainly in the reviewer's experience, critical study of abnormal uterine bleeding of the so-called dysfunctional type is by no means generally associated with endometrial hyperplasia. More often the picture is that of a proliferative, nonsecretory endometrium. Occasionally an unmistakable premenstrual secretory change is observed. It is regrettable that a problem which has begun to show some clarification in modern texts is again rendered confusing and misleading to the reader.

Under differential diagnosis of metropathia hemorrhagica (p. 43) the highly debatable statement is made that this abnormal bleeding state is not likely to be confused with cervical cancer, because cervical cancers *are palpable and visible at an early stage of their development* (italics the reviewer's).

The author states unqualifiedly (p. 51) that the folliculoma (generic term for granulosa cell tumor) is a tumor of the ovarian follicle. To the tyro this will prove a misleading statement and one which, because of its simplicity, he unfortunately is likely to remember.

The section on corpus luteum cyst leaves much to be desired. One may well question whether Fig. 3, plate 11, is a corpus luteum cyst, as designated, rather than a normal large cystic

corpus luteum. A good discussion of lipid cell tumors follows. The author also discourses interestingly on so-called testoid hyperthecosis. However, when he states that ovariectomy must be the treatment for this ill-defined state (p. 74), one may well question the wisdom of his recommendation.

Under tubular adenomas there is a good discussion of the tumors commonly referred to as arrhenoblastomas. Also included are the small, not uncommon, so-called rete adenomas. The author's logically presented reasons for the term tubular adenomas fail, however, when he includes those tumors which show no identifiable tubular elements but are associated with virilizing phenomena.

The heading "Ovarian Common Cysts," as used (p. 98), is confusing, because the discussion actually concerns cystic neoplasms, *i.e.* cystomas.

The sections on endometriosis and teratoid tumors are excellent. It would have been helpful, however, if the author, in discussing dermoid cysts, had more fully evaluated the relative importance or unimportance of X-ray studies in their diagnosis (p. 235). It is also confusing to note so many illustrations labeled as "dysembryoma," since the term is hardly utilized in the body of the text.

The final section is given over to nonepithelial ovarian tumors.

The illustrations throughout the text vary from indifferent to excellent. A 60-page list of periodicals which concludes this volume might well be included in the bibliographic volume in future editions.

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**Musical acoustics.** (2nd ed.) Charles A. Culver. Philadelphia: Blakiston, 1947. Pp xiv + 215. (Illustrated.) \$3.00.

At the recent meetings of the Acoustical Society in New York physicists and engineers mapped grand strategy for a peaceful invasion of the field of music. Prof. Culver's book constitutes somewhat of an insurance policy to future generations of musicians that the invasion will remain a peaceful one; or, if this invasion should prove less peaceful than advertised, it guarantees to those musicians who will study it that they will at least be able to understand the language in which the peace treaty may be written.

*Musical acoustics* is a useful and readable book for those interested in the physics of music. It should also bring reading enjoyment to a much wider audience. It should prove most valuable, however, as a text in a one-semester course for music majors. The book is written at a level appropriate to the usual background and needs of such students.

An introduction to certain general principles of acoustics is followed by chapters on hearing, pitch, and quality. From there we go to a discussion of somewhat more technical topics such as musical intervals, temperament, consonance, and dissonance. The author never tries to draw up a musical code or to arrive at aesthetic judgments on the basis of cabalistic juggleries; on the contrary, he invites the reader "to maintain an open mind with regard to the possible adoption of new forms of tonal expression."

The second half of the book is given over largely to a comprehensive treatment of the production of musical sounds by the more important instruments. Here we find a wealth of oscillograms and sound spectrograms, many of which have

been taken by the author himself. Prof. Culver's own contributions to experimentation in this field—the harmonic analyzer for unsteady musical sounds and the Syntheophone, which produces entirely new musical sounds—find their natural place in these surroundings. In the last part we find a chapter on "The Acoustics of Rooms," followed by a rather brief chapter on "Electronic Musical Instruments."

In this second edition Prof. Culver concludes with a discussion on the recording and reproduction of music. Beyond this substantial addition there are entirely new sections on the Doppler effect and transients and an enlargement of the section on vocal organs and the voice.

In the spirit of constructive criticism, which Prof. Culver invites, this reviewer would like to make two minor points. It should be possible to replace many of the oscillograms by more distinct ones. Some progress in this direction has been made in this edition, but there is room for more. Also, nowhere in the book do we find a discussion of auditory masking, though its importance for composers and orchestrators can hardly be overlooked.

All in all, Prof. Culver's book points the way toward a more sympathetic cooperation between the scientist and the musician in their very pleasant task of making man's life richer and more beautiful.

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**Russian-English technical and chemical dictionary.**

Ludmilla Ignatiev Callahan. New York: John Wiley, 1947. Pp. xvii + 794. \$10.00.

It is to be regretted that this dictionary was not made available some five or six years ago, when the need for such a book was very urgent. It is more than a chemical dictionary, for it includes a fairly complete coverage of mineralogy, metallurgy, mining and geology, general engineering, machinery and mechanics, electrical engineering, pharmacy, and botany, as well as other pure and applied sciences.

The book is generally well done and contains less than the expected number of deficiencies for a first edition. A number of possible meanings provided for each Russian word may be considered as adequate. The lesser deficiencies may be typified by the translation of "АЛЮСТЪ," which is really a state of redness rather than "ruby color." The translations of a number of compounds in the phosphorus family do not conform to the accepted nomenclature and may be misleading; thus, "ФОСФИНИСТАЯ К." should be -phosphonous acid, and "ФОСФИНОВАЯ К." should be -phosphonic acid. The reviewer feels that the inclusion of the letters of the old orthography should have been permitted because of the existence of a considerable amount of pre-Soviet literature. This is compensated for, however, by a number of highly desirable features: translations of numerous abbreviations, a listing of word endings, and a good coverage of idiomatic phrases.

Although the appearance and legibility of the book are very good, one would expect a more durable binding for a book of this size (and price) than the "flexible" one provided. A thumb index should also have been provided to facilitate the use of the book by persons not fluently familiar with the Russian alphabet.

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