IV, a study by W. L. Straus, Jr., of the microscopic anatomy of the skin, and Part V, a series of studies by A. H. Schultz on growth changes and certain skull features, fill out further deficiencies and exemplify more modern techniques and viewpoints. There remain regions of the gorilla's anatomy that are quite unrepresented in this volume, but published accounts of some of them are available elsewhere. Bibliographic references to these would have enhanced the value of the book.

Incomplete though it is, this large, handsome volume represents one of the best anatomical treatments of any infrahuman primate and stands as a fitting memorial to a worthy man and a real scientist.

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Treatise on Powder Metallurgy: Applied and Physical Metallurgy, Vol. II. Claus G. Goetzel. New York: Interscience, 1950. 910 pp. $18.00.

Since the publication of the first volume of Goetzel's *Treatise on Powder Metallurgy* this reviewer has observed with satisfaction the excellent reception the book received and has awaited the release of this second volume with high expectations; nor has he been disappointed by the reality. In the field of applied powder metallurgy this is again a truly encyclopedic work, and it is well organized, well documented, and well indexed.

It is evident that the author has set himself the enormous task of gathering in one place virtually everything that has been revealed in the technical and patent literature, as well as much previously unpublished material, concerning the products and uses of powder metallurgy, the materials being used, or that could be used, and the conditions of manufacture and application. In so doing, many of the more important technical papers are abstracted so fully that the reader need refer to them only for minor details. Lesser subjects are treated briefly, but with sufficient reference to the literature to guide the reader in an exhaustive search of his particular field of interest. Among the valuable and unusual features of the book is the inclusion of references to materials and processes that have failed, either for technical or economic reasons. All this wealth of material is built into a coherent account that may be read in sequence, or be used as a subject reference source, with equal satisfaction.

Among the major classes of subjects treated are: refractory metals, hard metals, electrical materials, magnetic materials, ferrous and nonferrous structural materials, porous products, friction products, dental alloys, and many related materials. In addition the author has included whole chapters dealing with the comparison of properties of powder metal products with those of materials manufactured in other ways, a survey of potentially useful powder metals and alloys, stress analysis of sintered products, testing methods, and theories of bonding and sintering.

Although it would be untruthful, and possibly mischievous, to say or to intimate, that this book is without faults of omission and commission, this reviewer feels that its users will agree with him that Dr. Goetzel has produced a highly useful and usable treatise and one that is almost certain to be regarded as a "must" for the bookshelf of the metallurgist and the design engineer. The purchaser should be advised, however, that the first and second volumes are partially interdependent, so that the possession of both is to be recommended. A third, and final, volume will present a classified and annotated bibliography of the technical and patent literature of powder metallurgy.

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Advances in Genetics, Vol. III. M. Demerec, Ed. New York: Academic Press, 1950. 267 pp. $6.80.

The third volume in this series contains six contributions, two or three of which may be praised highly, and all of which have considerable value. The chief criticism to be made is that certain of the reviews are too limited in scope or too biased by an individual point of view to be as useful as they might have been, were they more inclusive and more objective.

The first contribution, by Berthe Delaporte, is appropriately called "Observations on the Cytology of Bacteria," for it is in no sense a comprehensive review of bacterial cytology, but is more like a summary of the author's own observations. In picking out yeast cells as a comparative object, the author has done so because their "structure is well known"—this in spite of the vigorous controversy still going on about the identification of the true nucleus in yeast cells. Nor is there even a mention of the brilliant work of the author's own compatriots, Tulasne and Vendrely, who have so effectively used ribonuclease to demonstrate the distinction between desoxyribonucleic acid and ribonucleic acid in bacteria. The observations reported here represent an application of Giemsa and Feulgen stains to a variety of bacteria, along with stains for lipids, metachromatic granules, and glycogen made on organisms from the same culture and at the same age.

The competent review of "The Biochemical Genetics of Neurospora," by N. H. Horowitz, would raise the question whether another review of this field, so often covered in recent months, is really needed just now, were it not that the author has included an original section discussing the "one gene–one enzyme" theory of gene action. Here pertinent criticisms of the theory have been considered, particularly the question whether the methods of detecting biochemical mutants automatically lead to a selection of just those that fit the theory. Using mutants that have a biochemical requirement over a specific temperature range only, Horowitz has compared the proportions of mutants losing an indispensable function and those losing a