note that credit for the voltage multiplier is given to the Swiss Greinacher.

This is a very intriguing and easily understandable book mainly teaching the experimentalist (relatively little theory is given). The fact that it is written in French is not a serious detriment if one has a fair understanding of physics and just a vague idea of French.

The MKS system is used throughout, and some sensible abbreviations are used. The cps is replaced by the Hz (after Hertz, and long in use in Europe) and the weber/m^2 (= 10 000 gauss) is called a tesla, which should satisfy many an otherwise ardent fan of cgs units. A word of caution: the French word "rayon" has the two meanings "ray" and "radius" and caused me no little confusion (Section 5-10 "rayons ioniques" means "ionic radii", while in Chapter 10 "rayons cosmiques" means "cosmic rays").

While the book on the whole is an admirable creation, there are many small faults. First of all, the whole quality of materials and typography is seriously inferior to American books, at a superior price (about $14). Next there are very many misprints, omissions, and other errors to be found. While this may not be very serious for a person thoroughly familiar with physics *and* the language, it will make the reading more difficult for others. The discovery of the neutron is placed in 1939 on page 33; on page 25 the atomic number of the last of the actinides is not given; the curie is defined as 3.71×10^{-10} decays per second. Nevertheless, I would recommend this book highly to any student of physics who wants to get a different point of view.

Contemporary Models of the Atomic Nucleus. By P. E. Nemirovskii. Translated from Russian by S. and M. Nikolic. Transl. edited by Bernard T. Feld. 332 pp. (Pergamon, Oxford) Macmillan, New York, 1963. $15.00.
Reviewed by Ernest M. Henley, University of Washington.

This book, translated from the Russian into rather nonfluent English, is a curious combination of material. It consists, in part, of a relatively up-to-date survey of nuclear models, and, in part, of an advanced treatise on special topics. The text begins with a short description of static nuclear properties, followed by a longer survey of the shell and collective models. In these chapters explanations are often totally absent, assertions are made without justification (e.g., that certain terms in an equation may be disregarded), and material is used without being introduced (e.g., the density matrix).

In Chapters 4 and 5, the author presents discussions, based in large part on his own work, of the optical and shell models. In contrast to the first few chapters, complicated details and lengthy derivations are introduced. However, even in these chapters, judgments are made without adequate reason. For example, on page 241 it is stated that, in the Born approximation treatment of the stripping reaction, "It is *logical* to assume the potential of the neutron-proton interaction to be of the form $V_0\delta(|\mathbf{r}_p - \mathbf{r}_n|)$." (Italics are the reviewer's.)

It is not clear to this reviewer whether the book is aimed at the student who is beginning to learn nuclear physics, or at the more advanced student and research physicist. It is difficult to recommend the book to either group because of the lack of explanations in the first part, and the one-sided presentation in the latter part. The value of the book is not enhanced by the lack of an index, by common misspelling of references, and by its exorbitant price.

Mathematical Theory of Elastic Equilibrium. Recent Results. By Giuseppe Grioli. 168 pp. (Springer-Verlag, Berlin) Academic Press, New York, 1962. Paper $7.25.
Reviewed by E. H. Dill, University of Washington.

This is a brief monograph of interest only to the advanced scholar specializing in the theory of elasticity. Some thermodynamic potentials of the exact theory are reviewed. Successive approximations to the exact equations, uniqueness, and existence of solutions to the linear theory are studied by regarding the solution as depending on a single parameter. Methods of determining upper and lower bounds on the stress and displacement at a point are presented for the linear theory. Plane stress, plane strain, and hypoelasticity are reviewed. Lastly, the equations of elasticity with nonsymmetric stress tensor are considered.

Renewed interest in the theory of elasticity in the last twenty years has resulted in several well-written books. This is not one of them. The presentation of the fundamental relations is poorly written and can best be studied elsewhere. Nevertheless, the author seems to be quite capable and all results are correct.

Once the reader has overcome the natural annoyance incurred by the frustration of trying to comprehend the author's nonexplanations, several interesting new results will be noticed. The chapters on inequalities for the linear theory and on integration of the basic equations of the linear theory, which comprise thirty per cent of the book, are well worth the effort required to study them.

Perhaps one of the most important virtues of this monograph is that it makes available the recent work written in Italian. About half of the 160 references are to the Italian literature and over half of the references have been published since 1950.

Theoretical Electromagnetism. By R. H. Atkin. 260 pp. Wiley, New York, 1962. $9.00.
Reviewed by Harold Mendlowitz, National Bureau of Standards, Washington, D.C.

Nowadays many intermediate texts in physics are basically geared toward the goal of preparing the student for a course in quantum mechanics. When this happens, the subjects taught at the intermediate level are used as examples of the various techniques to be mastered before one is able to handle the mathematical tools necessary for a course in quantum mechanics. Of course, one can sometimes gain a great deal of insight into the subject matter of the intermediate-level course although the choice of topics to be treated depends somewhat upon the needs of another course.

Theoretical electromagnetism is treated by the present author as an end in itself. The treatment follows