more and better chosen illustrations will be incorporated.

The reviewer has a guilty feeling in making these few derogatory comments because the authors have made an honest effort to achieve their purpose and have succeeded so well that the general reaction is one of gratitude for having placed on the market a book of such usefulness. The reviewer commends it to medical students and to the medical profession in general. For biochemists and pathologists it should serve to present admirable perspectives of each other's activities.

S. B. WOLBACH

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CELLS

Unresting Cells. By R. W. GERARD. xv + 439 pp. New York: Harper and Brothers. $3.75. 1940.

THIS book is a straightforward, lucidly illustrated account of the structure, function, growth and reproduction of cells from the view-point of a physiologist. The author's reasons for writing a book of popular science are set forth in his preface as follows: "the scientist—yes, the pure scientist—is not merely justified in spending some energy on the popularization of sound science, but even more, has some duty to civilization to do so," . . . for, "scientists must help recruit men in other walks of life to the method and attitude of science in dealing with problems of state and society."

Following a brief account of the characteristic properties of protoplasm, two chapters deal with the structure and simpler chemistry of protoplasm. Enzymes, their nature and activities, are treated in a long chapter which prepares the way for an account of metabolic processes. The questions of energy sources and the conversion of energy which crept into the previous chapters are then considered, with emphasis on the concept of free energy. Thus half of the volume is devoted to the more strictly physico-chemical aspects of cells.

The remainder of the book consists of an excellent account of irritability and behavior, an account of the structure and differentiation of cells as seen through the microscope, and then proceeds to the problems of reproduction and inheritance. The latter, treated largely as problems of the reproduction and inheritance of molecules, are superbly done.

The illustrations are consistently good, the lighter note in some of the drawings serving to get the layman over certain difficult bits of terrain. The drawing for the chapter head on heredity represents chromosomes of the giant salivary gland type (which never undergo mitotic division) in the process of dividing. This is the only striking inaccuracy in the book and will prove tantalizing to those cytologists who would like to see such chromosomes undergo division. There is a good index.

This is a stimulating volume which will be read with great interest by students of science as well as the layman, for Professor Gerard writes with clarity and enthusiasm, as well as with purpose.

D. F. POULSON

YALE UNIVERSITY

REPORTS

AWARD OF GUGGENHEIM FELLOWSHIPS FOR 1941

EIGHTY-FIVE fellowships with grants of funds amounting to $180,000 to assist research and creative work to be carried on in the year 1941–42 by American and Canadian scholars and artists are announced by the John Simon Guggenheim Memorial Foundation. Last year seventy-three fellowships were granted and fifty-eight were awarded in 1939. The recipients were selected from more than fourteen hundred applicants. This is the sixteenth annual series of fellowship awards by the foundation, which was established and endowed by former United States Senator and Mrs. Simon Guggenheim as a memorial to a son.

The Guggenheim fellowships are granted to scholars and artists who by their previous work have shown themselves to be persons of unusual ability. Men and women, married and unmarried, of all races and creeds, who are citizens or permanent residents of the United States, citizens of Canada and of certain Latin American countries, are eligible on equal terms. The fellows are usually of ages between 25 and 40 years. This year their average age is thirty-six years. The stipends are usually $2,500 for a year.

Since its establishment sixteen years ago the foundation has granted 1,017 fellowships with stipends amounting to about $2,300,000.

The following fellowships in the sciences have been awarded:

DR. CORNELIUS BECKER PHILIP, medical entomologist in the U. S. Public Health Service, stationed at the Rocky Mountain Laboratory, Hamilton, Mont., who will prepare a book on ticks and their relation to animal and human disease. He will work in Mexico, Colombia and Brazil.

DR. EDWARD HOLLAND SPICER, instructor in anthropology in the University of Arizona, will prepare a comparative study of the influences of contact with other cultures upon the Yaqui Indian communities of Mexico and Arizona.

DR. ISABEL TRUESDELL KELLY, of the University of