The American Association for the Advancement of Science:
Reproduction and Inheritance in Ascomycetes:
DR. B. O. DODGE ............................................ 169

A Great Pupil and a Great Discovery—Both Supported by a Great Teacher: DR. HARRY N. HOLMES 175

Scientific Events:
Program of the American Wild Life Conference; Du Pont Fellowships for Research Chemists; Alumni Research Foundation of the University of Wisconsin; The Tenth Annual Priestley Lectures. Recent Deaths .................................................. 177

Scientific Notes and News .................................. 180

Discussion:

Scientific Books:

Special Articles:
The Aggregation of Orthic Tetrakaidecahedra: J. W. MARVIN. Succession of Coli-aerogenes Organisms in the Healthy Adult Fecal Flora: DR. LELAND W. PARE. Mode of Combination of an Enzyme with an Adsorbent and with a Substrate: DR. KURT G. STEIN ............................................. 188

Scientific Apparatus and Laboratory Methods:
Pipetting Device for Disinfectant Testing: DR. SAMUEL JACOBSON and DR. BRYCE PRINDLE. An Inexpensive Magnifier for Reading Film Copies of Scientific Articles: DR. H. J. CONN ..................... 191

Science News ...................................................................... 5

SCIENCE: A Weekly Journal devoted to the Advancement of Science, edited by J. McKEEN CATTELL and published every Friday by

THE SCIENCE PRESS
New York City: Grand Central Terminal
Lancaster, Pa. Garrison, N. Y.
Annual Subscription, $6.00 Single Copies, 15 Cts.

SCIENCE is the official organ of the American Association for the Advancement of Science. Information regarding membership in the Association may be secured from the office of the permanent secretary, in the Smithsonian Institution Building, Washington, D. C.

REPRODUCTION AND INHERITANCE IN ASCOMYCETES

By Dr. B. O. DODGE
THE NEW YORK BOTANICAL GARDEN

It is only within the last few years that students of the rusts and ascomycetes have obtained definite information about the processes actually involved in fertilization. Some of my associates have suggested that in view of this added knowledge it might be well to bring together in review on this program available information bearing on sex, maleness and femaleness as related particularly to heterothallism, incompatibilities and sterilities in the fungi. This did not seem to be advisable, however. Certainly by the time the naturalists hold their next regular quarter-century symposium on sex the mycologists will be in a better position to contribute positively to such a program.

Although some of the topics presented for your consideration to-day may incidentally have a bearing on questions relating to sex in general, they are brought forward primarily to indicate some further profitable lines for thought as well as research in connection with the ascomycetes.

Muller believes that the essence of sexuality is Mendelian recombinations. While morphological differentiations are enhancing, they are secondary and dispensable. Allen has long studied sexuality and inheritance in the dioecious Bryophyta where differentiation of antheridal and archegonial haploid plants is clear cut and probably has a chromosomal basis. He would not be inclined to accept, as applying to his group, the theory of relative sexuality according to which all organisms, simple or complex, haploid as