President—C. J. S. Bethune.

First Vice-president—Philip P. Calvert.

Second Vice-president—W. M. Marshall.

Secretary-Treasurer—Alex. D. MacGillivray.

Additional Members of the Executive Committee

—Herbert Osborn, C. P. Gillette, V. L. Kellogg,

J. G. Needham, C. T. Brues and Nathan Banks.

Member of Committee on Nomenclature for

three years—E. P. Felt.

ALEX. D. MACGILLIVRAY, Secretary

SOCIETIES AND ACADEMIES

THE BOTANICAL SOCIETY OF WASHINGTON

THE eighty-fifth regular meeting of the Botanical Society of Washington was held at the Cosmos Club, Tuesday evening, January 7, 1913.

The following scientific program was presented: Dr. David Griffiths: Performances in Species of Opuntia. (Illustrated with lantern slides.)

This paper will be published in the near future as a bulletin of the Bureau of Plant Industry.

Mr. J. B. Norton: Some Interesting Facts Concerning the Genus Asparagus. (Illustrated with lantern slides.)

This paper gave a review of the interesting features connected with the work of breeding a rust-resistant variety of asparagus. Asparagus officinalis has never been found to be completely immune to the attacks of its rust, Puccinia asparagi. Plants nearly immune to the destructive summer stages show no resistance to the æcidial stage of the fungus. Resistance seems to be due to morphological causes. Related species are attacked by the rust, but the members of other sections of the genus seem immune. The genus Asparagus and its relatives are entirely limited to the old world, the majority being African. A study is being made of the relationships of this group and many new characters based on the manner of growth, roots, stems, leaf scales, cladodes, etc., have been found. The arrangement of the stomata on the cladodes is very characteristic in the various groups. The old genus Asparagus contains several very distinct groups of species entitled to generic rank.

Only one hybrid form of known parentage has been secured, a cross between A. officinalis and A. davuricus. Many other combinations have failed to produce seed. Asparagus grows rapidly—some species average nine inches per day. The seed germination takes from 12 days with officinalis to 60 or more days with some African spe-

cies. Several new ornamental forms were described.

C. L. SHEAR, Corresponding Secretary

THE TORREY BOTANICAL CLUB

THE meeting of November 12, 1912, was held at the American Museum of Natural History. President Burgess presided.

The announced scientific program consisted of an illustrated lecture by Dr. J. J. Levison on "Tree Problems of our City."

THE meeting of November 27, 1912, was held in the laboratory of the New York Botanical Garden. Vice-president Barnhart presided.

The first paper was by Dr. W. A. Murrill, on "The Polypores of the Adirondacks." This paper has been published in full in the *Journal of the New York Botanical Garden*, 13: 174-178, November, 1912.

The second number was given by Dr. A. B. Stout. The subject of his discussion was "The Distribution of Tissues in the Root Tip of Carex aquatilis." Several photomicrographs of sections of root tips were exhibited, and drawings were made to illustrate particular features in the arrangement of the tissues.

THE meeting of December 10, 1912, was held at the American Museum of Natural History. President Burgess presided.

On the motion of Dr. Southwick the treasurer was authorized to draw an order for the sum of twenty dollars in favor of Dr. William Mansfield to cover the dues as the representative of the club to the council of the New York Academy of Sciences.

The paper of the evening was on "Diatoms," by Dr. Marshall A. Howe. It was a semi-popular account of the principal structural and morphological features of diatoms, their distribution and habitat, their geological interest and importance, the various economic uses of diatomaceous earths, etc. The talk was illustrated by about seventy-five lantern slides from the collection of the late Charles F. Cox. Many of the photographs shown were made under high powers of magnification and they brought out with much distinctness the secondary markings and other minute structural details of the walls of various types of diatoms.

B. O. Dodge,

Secretary