

TABLE V
*Errors in Locating the Cardinal Points of the
 Compass in the Case of Subjects Having
 No Imaginary Maps*

Name	Direction	Deviation from Correct Direction	Mean Deviation or Error
W. S. N.....	North	5° clockwise	24°
	East	37° clockwise	
	South	34° clockwise	
	West	18° clockwise	
R. M.....	North	31° counter-clockwise	31°
	East	34° counter-clockwise	
	South	29° counter-clockwise	
	West	31° counter-clockwise	
F. N. C.....	North	8° counter-clockwise	7°
	East	8° counter-clockwise	
	South	7° counter-clockwise	
	West	3° counter-clockwise	
W. A. D.....	North	34° clockwise	1°
	East	34° clockwise	
	South	31° clockwise	
	West	25° clockwise	
A. C. M.....	North	25° clockwise	22°
	East	19° clockwise	
	South	22° clockwise	
	West	23° clockwise	
T. E. H.....	North	12° clockwise	15°
	East	5° clockwise	
	South	19° clockwise	
	West	22° clockwise	
H. F. J.....	North	19° clockwise	22°
	East	24° clockwise	
	South	20° clockwise	
	West	25° clockwise	
G. F. W.....	North	79° clockwise	85°
	East	84° clockwise	
	South	88° clockwise	
	West	88° clockwise	
J. M. G.....	North	52° clockwise	56°
	East	57° clockwise	
	South	59° clockwise	
	West	57° clockwise	
W. W. R.....	North	11° clockwise	9°
	East	14° clockwise	
	South	2° clockwise	
	West	10° clockwise	

C. C. TROWBRIDGE

COLUMBIA UNIVERSITY

THE CONVOCATION WEEK MEETING OF
 SCIENTIFIC SOCIETIES

THE American Association for the Advancement of Science and the national scientific

societies named below will meet at Atlanta, Ga., during convocation week, beginning on December 29, 1913.

American Association for the Advancement of Science.—President, Professor Edmund B. Wilson, Columbia University; retiring president, Professor Edward C. Pickering, Harvard College Observatory; permanent secretary, Dr. L. O. Howard, Smithsonian Institution, Washington, D. C.; general secretary, Professor Harry W. Springsteen, Western Reserve University, Cleveland, Ohio; secretary of the council, Professor William A. Worsham, Jr., State College of Agriculture, Athens, Ga.

Section A—Mathematics and Astronomy.—Vice-president, Dr. Frank Schlesinger, Allegheny Observatory; secretary, Professor Forest R. Moulton, University of Chicago, Chicago, Ill.

Section B—Physics.—Vice-president, Professor Alfred D. Cole, Ohio State University; secretary, Dr. W. J. Humphreys, Mount Weather, Va.

Section C—Chemistry.—Vice-president, Dr. Carl L. Alsberg, Bureau of Chemistry; secretary, Dr. John Johnston, Geophysical Laboratory, Washington, D. C.

Section D—Mechanical Science and Engineering.—Vice-president, Dr. O. P. Hood, U. S. Bureau of Mines; secretary, Professor Arthur H. Blanchard, Columbia University, New York City.

Section E—Geology and Geography.—Vice-president, J. S. Diller, U. S. Geological Survey; secretary, Professor George F. Kay, University of Iowa.

Section F—Zoology.—Vice-president, Dr. Alfred G. Mayer, Carnegie Institution of Washington; secretary, Professor Herbert V. Neal, Tufts College, Mass.

Section G—Botany.—Vice-president, Professor Henry C. Cowles, University of Chicago; secretary, Professor W. J. V. Osterhout, Harvard University, Cambridge, Mass.

Section H—Anthropology and Psychology.—Vice-president, Professor Walter B. Pillsbury, University of Michigan; acting secretary, Dr. E. K. Strong, Jr., Columbia University, New York City.

Section I—Social and Economic Science.—Vice-president, Judson G. Wall, Tax Commissioner, New York City; secretary, Seymour C. Loomis, 69 Church St., New Haven, Conn.

Section K—Physiology and Experimental Medicine.—Vice-president, Professor Theodore Hough,

University of Virginia; secretary, Dr. Donald R. Hooker, Johns Hopkins Medical School, Baltimore, Md.

Section L—Education.—Vice-president, Dr. Philander P. Claxton, Commissioner of Education, Washington, D. C.; secretary, Dr. Stuart A. Courtis, Liggett School, Detroit, Mich.

The Astronomical and Astrophysical Society of America.—December 29–January 3. President, Professor E. C. Pickering, Harvard College Observatory; secretary, Professor Philip Fox, Dearborn Observatory, Evanston, Ill.

The American Physical Society.—December 29–January 3. President, Professor B. O. Peirce, Harvard University; secretary, Professor A. D. Cole, Ohio State University, Columbus, Ohio.

The American Federation of Teachers of the Mathematical and the Natural Sciences.—Between December 30. President, Professor C. R. Mann, University of Chicago; secretary, Dr. Wm. A. Hedrick, Washington, D. C.

The Entomological Society of America.—December 30–31. President, Dr. C. J. S. Bethune, Ontario Agricultural College; secretary, Professor Alexander D. MacGillivray, 603 West Michigan Ave., Urbana, Ill.

The American Association of Economic Entomologists.—December 31–January 2. President, Professor P. J. Parrott, Geneva, N. Y.; secretary, A. F. Burgess, Melrose Highlands, Mass.

The Botanical Society of America.—December 30–January 2. President, Professor D. H. Campbell, Stanford University; secretary, Dr. George T. Moore, Botanical Garden, St. Louis, Mo.

The American Phytopathological Society.—December 30–January 2. President, F. C. Stewart, Agricultural Experiment Station, Geneva, N. Y.; secretary, Dr. C. L. Shear, Department of Agriculture, Washington, D. C.

The American Microscopical Society.—December 30. Secretary, T. W. Galloway, James Millikin University, Decatur, Ill.

American Association of Official Horticultural Inspectors.—December 29. President, E. L. Worsham, Atlanta, Ga.; secretary, J. G. Saunders, Madison, Wis.

The Southern Society for Philosophy and Psychology.—December 31–January 1. President, Professor H. J. Pearce, Gainesville, Ga.; secretary,

Professor W. C. Ruediger, George Washington University, Washington, D. C.

The Sigma Xi Convention.—December 30. President, Professor J. McKeen Cattell, Columbia University; recording secretary, Professor Dayton C. Miller, Case School of Applied Science, Cleveland, Ohio.

Gamma Alpha Graduate Scientific Fraternity.—December 30. President, Professor J. I. Tracey, Yale University; secretary, Professor H. E. Howe, Randolph-Macon College, Ashland, Va.

PHILADELPHIA

The American Society of Naturalists.—December 31. President, Professor Ross G. Harrison, Yale University; secretary, Dr. Bradley M. Davis, University of Pennsylvania, Philadelphia, Pa.

The American Society of Zoologists.—December 30–January 1. *Eastern Branch:* President, Dr. Raymond Pearl, Maine Agricultural Experiment Station; secretary, Dr. Caswell Grave, The Johns Hopkins University, Baltimore, Md. *Central Branch*—December 29–January 1: president, Professor H. B. Ward, University of Nebraska; secretary, Professor W. C. Curtis, University of Missouri, Columbia, Mo.

The American Physiological Society.—December 29–31. President, Dr. S. J. Meltzer, Rockefeller Institute for Medical Research, New York City; secretary, Professor A. J. Carlson, University of Chicago, Chicago, Ill.

The Association of American Anatomists.—December 29–31. President, Professor Ross G. Harrison, Yale University; secretary, Professor G. Carl Huber, 1330 Hill Street, Ann Arbor, Mich.

The American Society of Biological Chemists.—December 29–31. President, Professor A. B. Macallum, University of Toronto; secretary, Professor Philip A. Shaffer, 1806 Locust St., St. Louis, Mo.

The Society for Pharmacology and Experimental Therapeutics.—December 30–31. President, Dr. Torald Sollmann, Western Reserve University Medical School, Cleveland, Ohio; secretary, Dr. John Auer, Rockefeller Institute for Medical Research, New York City.

NEW YORK CITY

The American Mathematical Society.—December 30–31. President, Professor E. B. Van Vleck, Uni-

versity of Wisconsin; secretary, Professor F. N. Cole, 501 West 116th Street, New York City. Chicago, December 26, 27, secretary of Chicago meeting, Professor H. E. Slaughter, University of Chicago, Chicago, Ill.

The American Anthropological Association.—December 29–31. President, Professor Roland B. Dixon, Harvard University; secretary, Professor George Grant MacCurdy, Yale University, New Haven, Conn.

The American Folk-Lore Society.—December 31. President, John A. Lomax, University of Texas; secretary, Dr. Charles Peabody, 197 Brattle St., Cambridge, Mass.

PRINCETON

The Geological Society of America.—December 30–January 1. President, Professor Eugene A. Smith, University of Alabama; secretary, Dr. Edmund Otis Hovey, American Museum of Natural History, New York City.

The Association of American Geographers.—Probably meets at Princeton but official information has not been received.

The Paleontological Society.—December 31–January 1. President, Dr. Charles D. Walcott, Smithsonian Institution; secretary, Dr. R. S. Bassler, U. S. National Museum, Washington, D. C.

NEW HAVEN

The American Psychological Association.—December 30–January 1. President, Professor Howard C. Warren, Princeton University; secretary, W. Van Dyke Bingham, Dartmouth College, Hanover, N. H.

The American Philosophical Association.—December 29–31. President, Professor E. B. McGilvary, University of Wisconsin; secretary, Professor E. G. Spaulding, Princeton, N. J.

MINNEAPOLIS

The American Economic Association.—December 27–30. President, Professor David Kinley, University of Illinois; secretary, Professor T. N. Carver, Harvard University, Cambridge, Mass.

The American Sociological Society.—December 27–30. President, Professor Albion W. Small, University of Chicago; secretary, Scott E. W. Bedford, University of Chicago, Chicago, Ill.

WASHINGTON, D. C.

The American Association for Labor Legislation.—December 30–31. President, Professor W.

W. Willoughby, Princeton University; secretary, Dr. John B. Andrews, 131 East 23d St., New York City.

MONTREAL

The Society of American Bacteriologists.—December 31–January 2. President, Professor C. E. A. Winslow, College of the City of New York; secretary, Dr. A. Parker Hitchens, Glenolden, Pa.

SOCIETIES AND ACADEMIES

THE BOTANICAL SOCIETY OF WASHINGTON

THE thirteenth annual meeting of the Botanical Society of Washington was held in the committee room of the Bureau of Plant Industry on October 17, 1913, at 1:30 P.M., with seventeen members present. The customary reports were presented and approved and the following officers elected for the ensuing year: *President*, C. L. Shear; *Vice-president*, A. S. Hitchcock; *Recording Secretary*, C. E. Chambliss; *Corresponding Secretary*, P. L. Ricker; *Treasurer*, H. H. Bartlett. Mr. F. L. Lewton was nominated as Vice-president from the society for the Washington Academy of Sciences.

The ninetieth regular meeting of the Botanical Society of Washington was held in the assembly hall of the Cosmos Club on Monday, October 6, 1913, at 8 P.M., with forty-two members and seventeen guests present, including the following distinguished European botanists: Frau Dr. Brockmann-Jerosch, Zürich; Dr. Edward Rübel, Zürich; Professor Carl Schröter, Zürich; Professor C. von Tubeuf, München.

The program consisted of brief informal remarks, as follows:

An address of welcome to the guests of the society, by President Stockberger.

"Citrus Plants of the World and their Importance and Use in Connection with Citrus Cultures and Citrus Breeding," by Mr. Walter T. Swingle.

"A Brief Summary of the Results of Twenty Years' Work with Mistletoe," by Professor C. von Tubeuf.

Professor Carl Schröter of Zürich translated Professor Tubeuf's address into English.

"Plant Introduction Work of the Bureau of Plant Industry," by Mr. David Fairchild.

"Impressions Received during the American International Phytogeographic Excursions," by Professor Carl Schröter.

"Nodule Production and Nitrogen Fixation by Plants other than Leguminosæ," by Dr. Carl Kellerman.