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(*b*. Marietta, Ohio, 26 January 1862; *d*. Chicago, Illinois, 30 December 1932)

mathematics.

Moore was prominent among the small circle of men who greatly influenced the rapid development of American mathematics at the turn of the twentieth century. The son of David Hastings Moore, a Methodist minister, and Julia Sophia Carpenter, he had an impressive preparation for his future career. While still in high school he served one summer as an assistant to Ormond Stone, the director of the Cincinnati Observatory, who aroused his interest in mathematics. He later attended Yale University, from which he received the A.B. in 1883 as class valedictorian and the Ph.D. in 1885. The mathematician Hubert Anson Newton, his guiding spirit at Yale, then financed a year's study abroad for him at the universities of Göttingen and Berlin. He spent the summer of 1885 in Göttingen, where he studied the German language; and the winter of 1885–1886 in Berlin, where Kronecker and Weierstrass were lecturing. The work of Kronecker impressed him, as did the rigorous methods of Weierstrass and Klein, who was then at Leipzig.

In 1886 Moore returned to the United States to begin his career in mathematics. He accepted an instructorship at the academy of Northwestern University for 1886–1887. During the next two years he was a tutor at Yale. In 1889 he returned to North-western as an assistant professor and in 1891 was promoted to associate professor. When the University of Chicago first opened in the autumn of 1892, Moore was appointed professor and acting head of the mathematics department. In 1896, after successfully organizing the new department, he became its permanent chairman, a post he held until his partial retire-ment in 1931. Shortly before assuming his post at Chicago, he married a childhood playmate, Martha Morris Young, on 21 June 1892, in Columbus, Ohio. They had two sons, David and Eliakim.

During his career Moore became a leader at the Uni-versity of Chicago and in mathematical associations. He helped shape the character of the university and gave it great distinction. With his faculty colleagues Oskar Bolza and Heinrich Maschke, he modified the methods of undergraduate instruction in mathematics. Casting aside textbooks, he stressed fundamentals and their graphical interpretations in "his;laboratory courses." Although a gentle man, he sometimes displayed impatience as he strove for excellence in his classes. He became a teacher of teachers. Among his supervised Ph.D.'s were L. E. Dickson, O. Veblen, and G. D. Birkhoff.

Moore also advanced his profession outside the classroom. In 1894 he helped transform the New York Mathematical Society into the American Mathe-matical Society, of which he was vice-president from 1898 to 1900 and president from 1900 to 1902. A founder of the society's *Transactions* in 1899, he was chief editor until 1907. He served on the editorial boards of the *Rendiconti del Circolo matematico di Palermo* (1908–1932), the University of Chicago Science Series (chairman, 1914–1929), and the *Proceedings of the National Academy of Sciences* (1915–1920). With his encouragement in, 1916 H. E. Slaught saw through the formation of the Mathe-matical Association of America. In 1921 Moore was president of the American Association for the Advancement of Science.

Rigor and generalization characterized the mathe-matical research of Moore. His research fell principally into the areas of (1) geometry; (2) algebra, groups, and number theory; (3) the theory of functions; and (4) integral equations and general analysis. Among these he emphasized the second and fourth areas. In geometry he examined the postulational foundations of Hilbert, as well as the earlier works of Pasch and Peano. He skillfully analyzed the independence of the axioms of Hilbert and formulated a system of axioms for *n*-dimensional geometry, using points only as undefined elements instead of the points, lines, and planes of Hilbert in the three-dimensional case. During his investigation of the theory of abstract groups, he stated and proved for the first time the important theorem that every finite field is a Galois field (1893). He also discovered that every finite group G of linear transformations on *n* variables has a Hermitian invariant (1896–1898). His probe of the theory of functions produced a clarified treatment of transcendentally transcendental functions and a proof of Goursat's extension of the Cauchy integral theorem for a function $f(z)$ without the assumption of the continuity of the derivative $f'(z)$.

His work in the area of integral equations and general analysis sparkled most. He brought to culmination the study of improper definite integrals before the appearance of the more effective integration theories of Borel and Lebesgue. He diligently advanced general analysis, which for him meant the development of a theory of classes of functions on a general range. The contributions of Cantor, Russell, and Zermelo underlay his research here. While inventing a mathe-matical notation for his analytical system, he urged Florian Cajori to prepare his two-volume *History of Mathematical Notations* (1928–1929). Throughout his work in general analysis, Moore stressed funda-mentals, as he sought to strengthen the foundations of mathematics. His research set a trend for precision in American mathematical literature at a time when vagueness and uncertainly were common.

Honors were bestowed upon Moore for his distin-guished contributions to mathematics and education. The University of Göttingen awarded him an honor-ary Ph.D. in 1899, and the University of Wisconsin an LL.D. in 1904. Yale, Clark, Toronto, Kansas, and Northwestern subsequently granted him honorary doctorates in science or mathematics. In 1929 the University of Chicago established the Eliakim Hastings Moore distinguished service professorship, while he was still an active member of the faculty. Besides belonging to American, English, German, and Italian mathematical societies, he was a member of the American Academy of Arts and Sciences, the American Philosophical Society, and the National Academy of Sciences.

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