MEARS, Florence M. May 18, 1896–December 3, 1995.
Goucher College (BA 1917), Cornell University (MA 1924, PhD 1927).

Florence Marie Mears was born in Baltimore, Maryland, the daughter of Florence Kate (Waidlich) (1867–1966) and Frank G. Mears (b. 1863), both natives of Pennsylvania. Her mother attended college for one year, while her father had a high school education; they married in 1895. Her father was manager of a farm implements store. Her twin brother, John W. Mears (1896–1988), was her only sibling. His obituary notes that he was a retired railroad engineer, a WWI Navy veteran, and retired from Aberdeen Proving Ground in Maryland.

The Mears family lived in Baltimore while Florence Mears was growing up, and it is likely that she attended elementary and high school in that city. She graduated as a mathematics major from Goucher College in 1917. A letter of recommendation written several years later indicates that she had assisted in the physical and chemical laboratories at Eastern High School in Baltimore for five years, presumably just after her graduation from Goucher.

Mears began her formal graduate studies during the summer of 1922, when she studied invariants and covariants at the Johns Hopkins University. The following summer she was at Cornell University, where she enrolled in a course in education and courses in advanced calculus and advanced analytic geometry. She remained at Cornell during the academic year 1923–24, taking four mathematics courses a semester and earning her masters degree in June 1924.

Mears returned to Cornell in 1925 and received her doctorate in June 1927. She held one of three graduate scholarships in mathematics 1925–26 and a fellowship her last year. In addition to her work in analysis and geometry, she also took courses, and minored, in physics. After receiving her PhD, Mears served for one year as head of the department at Alabama College, then a women's college and now the coeducational University of Montevallo. She served as acting assistant professor at Pennsylvania State College the following year, 1928–29.

In 1929 Mears began her career at George Washington University in Washington, D.C., as an assistant professor. In 1930 she was living with her widowed mother in nearby Bethesda, Maryland, where she continued to reside. She was promoted to associate professor in 1936 and to professor in 1944. She continued her work in the general area of her dissertation, the summability of divergent series. The most frequently cited of her results appeared in 1937 in the *Annals of Mathematics*, soon after her promotion to associate professor; this article continued to be cited for more than fifty years. Her last two research papers appeared after her promotion to professor. Mears directed nine master's theses between 1949 and 1964 and two doctoral dissertations at George Washington. Her first doctoral student, Joseph Blum, received his degree in 1958, when Mears was sixty-two, and her second, Janos Edvard Hanson, two years later. George Washington had awarded only four doctorates in mathematics prior to these: two in the 1930s and two in the early 1950s.

In 1939 Mears was elected president of the George Washington University Faculty Club; she was the first woman elected to that office. The following year she served as an officer of the local chapter of Phi Beta Kappa. She was active in the Maryland-District of Columbia-Virginia Section of the MAA; she served as secretary of the

section 1949–50 and was on the executive committee 1951–52. Mears was also a member of the Washington Academy of Sciences.

Mears retired from George Washington University as professor emeritus in June 1966. At that time the citation from the university president included the following:

> The chairman of her department and the Dean of Columbian College of Arts and Sciences have commended her for her excellence as a teacher, her contributions to research, her vital contributions to the Department of Mathematics, and for the esteem in which her students hold her. In 1955 she received an Alumni Citation for twenty-five years of distinguished service. In 1958 the University of California selected her as one of ten women mathematicians as consultants for a Mathematics Project for the study of creativity. In 1962 she was a member of the Examining Committee for doctoral dissertations in mathematics for the University of Allahabad, India. (George Washington University Archives)

After her retirement from George Washington, Mears was immediately hired by Howard University, also in Washington, D.C., where she taught for another ten years. After her second retirement, at age eighty, Mears remained in Bethesda, Maryland, where "her interests included gardening, knitting, cross-stitching and lace-making" according to an obituary in the *Washington Post*. "She became a master weaver and was a member of the Potomac Craftsmen in Washington and the Twenty Weavers." In the late 1940s she had included "dogs" as one of her hobbies. In 1949 an article in the George Washington University alumni magazine noted her interest in growing roses and in Robin, her Dandie Dinmont terrier.

Florence Mears died at Suburban Hospital in Bethesda of heart disease at age ninety-nine in 1995.

Organizational affiliations: AMS, MAA, Phi Beta Kappa, Phi Kappa Phi, Sigma Xi.

Thesis and dissertation:

1924 A special function of one variable. MA thesis, Cornell University, directed by Walter Buckingham Carver. Typescript.

1927 Riesz summability for double series. PhD dissertation, Cornell University, directed by Wallie Abraham Hurwitz. Typescript. Printed version, 1928, reprinted from *Trans. Amer. Math. Soc.* 30:686–709.

Publications:

1928 Riesz summability for double series. *Trans. Amer. Math. Soc.* 30:686–709. Published version of PhD dissertation. Reviews: *JFM* 54.0239.01 (W. Rogosinski); *Rev. semestr. publ. math.* 34, pt. 1: 47 (P. Mulder). Presented by title to the AMS, Madison, WI, 9 Sep 1927; abstract: *Bull. Amer. Math. Soc.* 33:659 #54.

1935 Some multiplication theorems for the Nörlund mean. *Bull. Amer. Math. Soc.* 41:875–80. Reviews: *JFM* 61.1094.02 (V. Garten); *Zbl* 013.26104 (E. Kogbetliantz).

1937 Absolute regularity and the Nörlund mean. *Ann. of Math.* 2nd ser., 38:594–601. Reviews: *JFM* 63.0166.03 (J. Karamata); *Zbl* 017.16201 (E. Kogbetliantz). Presented by title as "Summability for absolutely convergent series" to the AMS, Atlantic City, NJ, 27 Dec 1932; abstract: *Bull. Amer. Math. Soc.* 39:25 #12.

1941 Review of *College Algebra*, by P. R. Rider. *Amer. Math. Monthly* 48:54–55.

1943 The inverse Nörlund mean. *Ann. of Math.* 2nd ser., 44:401–10. Reviews: *MR* 5,64d (T. Fort); *Zbl* 061.12202 (D. Gaier).

1945 Nörlund summability of Cauchy products. *Ann. of Math.* 2nd ser., 46:563–66. Reviews: *MR* 7,153a (R. P. Agnew); *Zbl* 061.12201 (D. Gaier).

1948 Transformations of double sequences. *Amer. J. Math.* 70:804–32. Reviews: *MR* 10,245e (J. D. Hill); *Zbl* 035.15903 (R. Schmidt).
1958 Review of *Mathematical Analysis*, by T. M. Apostol. *Amer. Math. Monthly* 65:463–64.
1961 Review of *Calculus of Functions of One Argument with Analytic Geometry and Differential Equations*, by E. J. Cogan, R. Z. Norman, and G. L. Thompson. *Amer. Math. Monthly* 68:193.

Abstract not listed above:
1952 with S. B. Jackson, E. C. Marth, and V. G. Schult. Proposals for future activities of the section. *Amer. Math. Monthly* 59:509 #5. Presented by Miss Schult to the MAA, Lexington, VA, 26 Apr 1952.

References to: AmMSc 5–8, 9P–11P; AmMWSc 12P–13P; AmWom 1935–40; WhoAmW 1.
"Dr. Mears Heads Club." *Washington Post*, 10 Sep 1939.
Davis, Margaret. "Professors are People." *George Washington University Alumni Review* (Apr 1949): 5.
"Florence M. Mears Mathematics Professor." (Obituary) *Washington Post*, 6 Dec 1995.

Other sources: Owens questionnaires 1937, 1940; Smithsonian questionnaire 1982; Division of Rare and Manuscript Collections, Cornell University Library; communications with George Washington University Archives and with Aberdeen Branch of the Harford County (MD) Public Library; "John W. Mears," (Obituary) *Harford County Aegis*; US Census 1900, 1910, 1920, 1930 MD; SSDI.

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