COLPITTS, Julia T. February 22, 1875–August 8, 1936.
University of Mount Allison College (BA 1899), Cornell University (MA 1900, PhD 1924).

Julia Trueman Colpitts was born in Pointe de Bute, New Brunswick, Canada, the third of eight children of Celia Eliza (Trueman) (1848–1930) and James Wallace Colpitts (ca. 1844–1919), who married in 1871. The family was from a long line of farm families in New Brunswick. The children were Edwin Henry (1872–1949), Andrew Weldon (1874–1901), Julia, Albert James (1876–1950), Elmer Clifford (1879–1963), Laura Jane (1882–1948), Walter Howard (1886–1972), and Mary Alice (1892–1920).

Several of the children went into teaching or scientific careers. Edwin, the eldest, first attended normal school in New Brunswick before earning a bachelor's degree at Mount Allison and an additional BA and an MS at Harvard. He was a distinguished communications engineer whose career was with the American Bell Telephone Company. Elmer C. Colpitts earned a PhD in mathematics from Cornell University in 1906 as a student of Virgil Snyder. His retirement from the State College of Washington (now Washington State University) was reported in 1950. Mary Colpitts, who also studied at Mount Allison, was an instructor of mathematics at the University of Wisconsin when she died of tuberculosis at age twenty-eight.

Julia Colpitts attended the public high school at Pointe de Bute and the normal School at Fredericton, New Brunswick, from which she graduated. She graduated from the University of Mount Allison College in 1899 with honors in mathematics. The next year she studied at Cornell University where she earned her master's degree in 1900.

After receiving her master's degree, Colpitts joined the faculty at Iowa State College of Agriculture and Mechanic Arts (now Iowa State University of Science and Technology) as an instructor. She was promoted to assistant professor in 1906 and to associate professor in 1913. Colpitts studied at the University of Chicago during the summer of 1912, at Columbia University during the summer of 1915, and again at Chicago during the summer of 1919. In addition, she took many graduate courses at Iowa State for which she received no credit since she was a member of the faculty. She coauthored an analytic geometry textbook with Maria Roberts, her mathematics department colleague and with whose family she was boarding at the time of the 1910 census. The book first appeared in 1918, with a second edition in 1926.

In addition to taking graduate courses at Iowa State, Colpitts had also taught graduate courses by the time she applied to Cornell in February 1922. Included among her letters of recommendation was one of March 15, 1922, from a former student who had done graduate work at Wisconsin, Yale, and Columbia. This student felt that Colpitts was surpassed by no other teacher of mathematics "with the single exception of Professor Pierpont of Yale" (Mary G. Miller to J. H. Tanner, Graduate School Records, Division of Rare and Manuscript Collections, Cornell University Library).

In 1922–23 Colpitts was granted a leave from Iowa State in order to study at Cornell. During that year she took a number of courses and worked on a dissertation with C. F. Craig. She then returned to Iowa State and remained on the faculty for the rest of her career. In early 1924 Craig went on leave to Europe, and J.

I. Hutchinson replaced him as the chairman of her doctoral committee. Colpitts received her PhD in 1924 at age forty-nine with her major analysis, first minor geometry, and second minor philosophy. In the summer of 1929 she did further studies at the University of Chicago.

Colpitts held leadership positions in a number of professional organizations. She was national secretary in 1926 and national president in 1927 of Sigma Delta Epsilon, the graduate women's scientific fraternity. She then became active in the Iowa Section of the MAA and served as vice chairman 1928–29 and 1932–33 and as chairman 1935–36. She was a member of the Iowa Academy of Science and was chair of the mathematics section for the April 1936 meeting of the academy. She attended the International Congress of Mathematicians in Toronto in 1924, in Bologna in 1928, and in Oslo in 1936.

Julia Colpitts was scheduled to depart for the United States from Hamburg on August 6, 1936, after the Oslo congress but became ill and died on August 8 in Southampton, England. She was sixty-one at the time of her death. The Julia Colpitts Memorial Fund was established in her memory by her brother Edwin H. Colpitts, with the income to be used to purchase books in mathematics for the Mount Allison library.

Organizational affiliations: AMS, MAA (charter member), Sigma Xi, Phi Kappa Phi, Sigma Delta Epsilon.

Thesis and dissertation:
1900 On the resolution of the algebraic function. MA thesis, Cornell University. Handwritten.
1924 Entire functions defined by series of the form $\sum f(n)\frac{z^n}{n!}$. PhD dissertation, Cornell University, directed by Clyde Firman Craig (on leave second semester 1923–24) and John Irwin Hutchinson. Typescript. Printed version, 1926, Princeton, NJ, reprinted from *Ann. of Math.* 2nd ser., 27:209–23.

Publications:
1918 with M. M. Roberts. *Analytic Geometry.* New York: John Wiley & Sons; London: Chapman & Hall. Reviews: *Amer. Math. Monthly* 26:250–52 (C. H. Currier); *Math. Gaz.* 10:345 (W. J. Dobbs); *Nature* 104:390 (S. Brodetsky); *Sch. Sci. Math.* 20:560 (H. E. Cobb). Second ed.: 1926. New York: John Wiley & Sons; London: Chapman & Hall. Reviews: *JFM* 52.0625.01 (W. Rinow); *Nature* 118 (suppl.): 28; *Science Progress* 12:534.
1926 Entire functions defined by certain power series. *Ann. of Math.* 2nd ser., 27:209–23. Published version of PhD dissertation. Reviews: *JFM* 52.0334.01 (A. Dinghas); *Rev. semestr. publ. math.* 33, pt. 1: 11 (W. A. Wythoff). Presented as "Entire functions defined by the series of the form $f(z){=}\sum f(n)(z^n/n!)$" to the AMS, Ames, IA, 29 Nov 1924; abstract: *Bull. Amer. Math. Soc.* 31:118 #7.
1935 Mathematics in Japan and China. *Natl. Math. Mag.* 9:123–29.

Abstracts not listed above:
1924 The zeros of the function $f_k(z){\equiv}\sum_{n=0}^{\infty} n^k \frac{z^n}{n!}$, where k is a positive integer. *Amer. Math. Monthly* 32:102 #4. Presented to a meeting of the MAA, Ames, IA, 2–3 May 1924.
1927a Asymptotic series. *Amer. Math. Monthly* 34:399 #8. Presented to a meeting of the MAA, Iowa City, IA, 6–7 May 1927.
1927b The real zeros and other properties of a certain entire function of genus unity. *Bull. Amer. Math. Soc.* 33:164 #9. Presented to the AMS, Lincoln, NE, 27 Nov 1926.
1929 The Bologna Congress. *Amer. Math. Monthly* 36:355 #10. Presented to a meeting of the MAA, Fairfield, IA, 26–27 Apr 1929.

References to: AmMSc 4–6.
"Recent deaths." *Science* n.s., 84 (1936): 175.

Allen, Edward S. "Julia Trueman Colpitts, 1875–1936." *Proc. Iowa Acad. Sci.* 44 (1937).

Other sources: Division of Rare and Manuscript Collections, Cornell University Library; communication with Iowa State University Archives; communication with Mount Allison Federated Alumni; DcAmB S4 (Colpitts, Edwin Henry); Wisconsin death certificate (Mary Alice Colpitts); 1881 Canadian Census; US Census 1910 1920 IA, 1920 WI.

Last modified: March 6, 2009.