

[Episode 14 - Charlotte Angas Scott Transcript]

Hello, my name is Lourdes Gomez. And I'm a marine biology student at Cabrillo College. I've prepared a little bit of a biography today about a mathematician I admire, Charlotte Angas Scott. Ms. Scott was born in England to a minister. Her father, Reverend Caleb Scott, worked with the Congregational Church of England. His position was critical to her education in a couple of ways. Partially because her father was involved in the Congregational Church he had an attitude of promoting opportunities for his daughter. At the time, the Congregational Church was pushing for women's rights and encouraging education for women. He was able to afford that to his daughter starting from a young age Charlotte got the support and the push into mathematics that she embraced and ran with. Secondly, Reverend Scott was the principle of Lancastshire Independent College. His high position made it easier for him to get tutors for all of his children, but especially for Charlotte Scott. She had math tutors from the age of seven, and she fell in love with the subject at a young age. Although Ms. Scott was not included officially in the graduation ceremony, her fellow male students celebrated her in their own way. They had a lot of admiration for Ms. Charlotte Scott and they showed that and honored her at their graduation ceremony. She was one of them. She had made it through all of the difficult moments and passed all of the exams. They felt the need to honor her. I'm going to read this excerpt from an account. "The man read out the names and when he came to eighth, before he could say the name, all undergraduates called out 'Scotts of Girton' and cheered tremendously, shouting her name over and over again with tremendous cheers and raising of hats." I love the support that her male students had for her, despite the restrictions or rules of tradition at the University of Cambridge at the time. Ms. Scott had quite a following and support. Not to discount the ladies of Girton college; they also had an admiration for Ms. Charlotte and they honored her with sincerity. I'm going to read another excerpt from a student description, that reads as follows: "At dinner we clapped and cheered her. Then we told her there would be college songs in hall at nine. She was led in by Miss Welsh, up an avenue of students to the top of the hall, while See, the Conquering Hero Comes was played on piano and sung by us all. At the top, Miss Herschel was standing on a sort of dias, and when we had finished singing, she recited an ode to Miss Scott, composed by Miss Welsh for the occasion, and then crowned her with laurels while we clapped and applauded with all our might." "So Miss Scott's champion success encouraged people in institutions everywhere to open the academy doors," as it was written in a weekly paper called Punch, to ladies in academics and just kind of everywhere. In just a couple of months 8,000 signatures were collected petitioning for the allowance of women to take university exams. This is at a time when there were no Facebook shares or reposts or emails or

anything, so 8,000 signatures was a lot to collect in a short period of time. This voiced the support of men and women everywhere seeking to promote the allowance of opportunities for women, especially in the academic field. Scott continued to research at Girton and algebraic geometry was her specialty. She worked under the supervision of author Cayley. Having no official degree, she looked to University of London which was open to women. In 1882, she was awarded a bachelor's of science degree with first class honors in mathematics. Three years later she received her doctorate in mathematics. While working on her degrees she was teaching, as well. She had been appointed a math lecturer at Girton College, and she held this position from 1880-1884. From 1880-1883 she was also giving lectures at noonam College. In 1885 Bryn Mawr College, in Pennsylvania, was opened in the United States. It was the first institution of higher education in the United States offering graduate training for women. Naturally, Miss Scott was the perfect fit. On the recommendation of Arthur Cayley, the aforementioned research advisor, Scott became the first head of the mathematics department. Of the eight faculty members at that time, she was the first mathematician. Scott was devoted to her students there, being described as an "exceptionally capable and gifted teacher." She published quite a few works and published a book in 1884, called "An Introductory Account of Certain Modern Ideas and Methods in Plane Analytical Geometry." Scott became an editor for The American Journal for Mathematics. As an editor, she continued to write and publish quite a few of her works. Scott was a founding member of the American Mathematical Society. In the early years of the twentieth century, Scott's health deteriorated from rheumatoid arthritis and loss of hearing. There was speculation that she missed her home country. Scott loved England. She was in the United States for 30 years and accomplished many things through her wonderful work. According to some writers she saw her work as duty and accomplishment, not really a love of where she was in the United States. Miss Scott retired from teaching in 1924. A celebration in her honor was held. In dedication to her students she remained at Bryn Mawr for an additional year and supervised the work of her doctoral student to completion. In 1925, Miss Scott returned to England and settled in Cambridge for the remainder of her life surrounded by her family. Although she did outlive most people in her family of her generation, she was greatly loved by her nieces and nephews. Miss Scott was known to be very witty, never at a loss for words, and very clever. Through her work we can see that she was very hard working and impassioned throughout her life. Miss Scott championed education and the pursuit of what she loved despite the odds. Many wonderful things have come out of her work, which we can look at today and be inspired by her example of pursuing education. Thank you for listening. I hope you enjoyed Women, The Limit Does Not Exist.