

In the Name of God
A Summary of

Untold History of AI: Invisible Women Programmed America's First Electronic Computer

By Ali Shahverdi
810196611

In the inception of general purpose computers, the media's focus was mainly on the male engineers who designed these so called "electronic calculators" and little if any attention was given to the female mathematicians who were responsible for the arduous task of programming and handling the maintenance of these machines. One of the first of these such computers (named ENIAC) was first presented in 1946 at which point it was too late to serve the purpose it was originally designed for, which was calculating the trajectory of enemy missiles. What none of the attendants at that presentation knew was the fact that the people behind the calculations demonstrated to them were six women who were in charge of the trajectory calculations before the idea of the general purpose computer appeared, meaning they were mathematicians with university degrees who could not find respectable engineering jobs and were instead trained to hand-calculate firing tables for artillery shells since the work was considered "too wearying" for male engineers. Not only were these women responsible for programming the device using the punch-card technique previously used by IBM, they had to understand the thirty-ton machine inside and out so as to be able to maintain and debug it. Though it arrived too late to do the trajectory computations it was supposed to carry out, it was employed heavily in nuclear computations, a task which required over one million punch cards. It was also heavily demonstrated by the United States military as a symbol of their technological dominance in the dawn of the Cold War. However, these women's work received no recognition since their occupation was barely even considered clerical. Their hard work instead went unnoticed and overlooked; their hours upon hours of painstaking labour doing the programming, wiring and maintenance of the computer and moving computer science and electronics forward went virtually unrewarded.