

Biography of a Mathematician:

Apastamba

Brittany Kirby

Math 200-102

Professor Wilder

October 30, 2013

It is hard to write much of Apastamba since researchers are unable to discover a great deal about him. This struggle is expressed through two different websites explaining the same issue. Apastamba's exact birth dates and death dates are currently unknown. Since he is known to have lived around 600 BC, scholars will typically list this as both his birth and death year. He is well known for writing Sulbasutra and the further approximation of the value of the square root of two in the Sulbasutra writing. Apastamba had no intentions of becoming a mathematician, his writings and accomplishments were due to many religious purposes. Various excerpts in Sulbasutra, demonstrates Apastamba's skills as a priest, teacher of religion and craftsman like abilities. Similar to Baudhayana, Apastamba used the proper math in Sulbasutra to accurately construct altars that were needed at the time. Earlier works of the Sulbasutra by Baudhayana only consisted of three chapters meanwhile Apastamba's expanded version contained six chapters. Apastamba's main work in his extended version of the Sulbastura was to give the estimation of the square root of two. The general equation he presented to give this estimation was: $1 + \frac{1}{3} + \frac{1}{(3 \times 4)} - \frac{1}{(3 \times 4 \times 34)} = 1.4142156861$. Other contributions by Apastamba that were not fully explained included squaring the circle and dividing a segment into seven equal parts. Further explanations of his work can be found in translated versions of the Sulbastura. Various critics have tried to reconstruct these processes but they have proved unsuccessful, leaving Apastamba's to be the most well known in modern day.



Apastamba

References

India NetZone. (2011). *History of Indian Mathematicians*. Retrieved October 30, 2013, from

http://www.indianetzone.com/43/history_indian_mathematics.htm

O'Connor, J. and Robertson, E. (2008). *Apastamba*. Retrieved October 30, 2013 from

http://www.anusandhan.net/kids/old/apastamba_3htm.jsp

University of St. Andrews. (2000). *Apastamba*. Retrieved October 30, 2013, from [http://www-](http://www-history.mcs.st-andrews.ac.uk/Biographies/Apastamba.html)

[history.mcs.st-andrews.ac.uk/Biographies/Apastamba.html](http://www-history.mcs.st-andrews.ac.uk/Biographies/Apastamba.html)

Websites by India Netzone and O'Connor and Robertson contain identical information

