

Biographical Encyclopedia of Astronomers

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Hypatia

Born Alexandria, (Egypt), circa 370

Died Alexandria, (Egypt), March 415

Hypatia, famed for her beauty, intelligence, and virtue, was not only the head of the Alexandrian Neoplatonic school of philosophy but also the first significant female mathematician and astronomer.

Hypatia's first teacher was her mathematician-astronomer father, Theon of Alexandria, who may have been director of the Alexandrine Library, and with whom she may have co-authored a commentary on Ptolemy's *Almagest*. She traveled to Athens to study under Plutarch and his daughter Asclepegeneia. Upon her return to Alexandria, she became a popular teacher of geometry, algebra, and astronomy at the university, where her students included both Christians and pagans. Not only her scientifically rational thought but also her friendship with Orestes, Alexandria's Roman Prefect, aroused the enmity of Cyril, Bishop of Alexandria, Orestes's political enemy

Much of what we know about Hypatia comes from her extensive correspondence and from the Suda lexicon, the massive 10th-century Byzantine-Greek encyclopedia covering ancient literature, history, and biography. Among her correspondents was Synesius, Bishop of Ptolemy, who remained Hypatia's devoted disciple after studying under her, and who queried her about designs for a planisphere, an astrolabe, a hydrometer for measuring specific gravity, and a device for distilling water

According to the Suda lexicon, in around 400, at the age of 31, Hypatia became head of the Alexandrian Neoplatonic school. The Suda also identifies Hypatia as the author of commentaries on the *Arithmetica* of Diophantus of Alexandria, the *Conics* of Apollonius, and the astronomical canon of Ptolemy, none of which is extant. Other sources about Hypatia include Socrates Scholasticus's 5th-century *Ecclesiastical History* and the theologian Photius's 9th-century *Bibliotheca*.

All sources about Hypatia agree on the horrific circumstances of her death. In March 415, a mob forcibly removed her from her chariot, stripped her, and used oyster shells to slash and peel her to death. The parts of her dismembered body were then scattered throughout Alexandria.

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Selected References

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