

Pedro Nunes Contributions In The Field Of Nautical Sciences

Posted on October 25, 2019

Pedro Nunes and the Development of Nautical Science

Pedro Nunes is one of the most prominent scientists of all time, from around 1502 to 1578. Nunes was a professor, mathematician, and cosmographer. He was from a Christian family with a Jewish origin. He was a great scientist of resurgence, and he was born in the year 1502 in the region of Alcacer do Sal in Portugal (Almeida et al. 2015). He grew up in this place, and his primary study was around this place. He made quite a number of contributions to the field of nautical sciences, and he was the first person to approach this field in a mathematical manner and succeeded so well. He was the first person in history to oppose Loxodrome. He invented several devices for measuring, and just to mention a few, he invented bonus, which was later developed into the Vernier scale after his death.

In addition to his life and education, not much is known about his early education, family background, and early life. However, as said earlier, his parents were of the Jewish religion. To some extent, people believed that he was Jewish, and being that some of his grandchildren believed he had been put behind bars when they were accused of practicing Judaism and professing in Portugal. Even though much is not known of him, even where he did his basic primary school in specific it is believed he must have learnt in the nearby school to his place of birth, much is not known as well in his relationship he had with the scientists of his time. Nevertheless, with the reconstruction of his works and publications alongside the references he made in his writings, people can only get a clue of who he was and what he contributed to the field of science and mathematics. In most of his works, he signed his name as Pedro Nudes through suspicions, and in many appearances, his real name appears to be Petrus Nonius, which is the Latinized form of the name he used (Almeida et al. 2015). Pedro Nunes' early life, however, remains a mere suspicion as there is no evidence pointing out his original and exact birthplace, the kind of parents he had, and the number of siblings he had.

He is believed to have studied at the University of Salamanca, probably between the years 1521 and 1522. He later continued with his studies at the University of Coimbra, from where he was able to achieve a degree in medicine around 1525. By then, the study of medicine included mathematics and astronomy in the coursework, and he graduated with knowledge in both fields. He continued to explore his ability in the field of medicine as he continued with his studies on medicine even though he was already a teacher at the University of Lisbon, where he taught Philosophy, Logic, Morals, and Metaphysics (Fernandes, 2017). Later, in the year 1537, when the Portuguese that was located in Lisbon got moved back to Coimbra, Pedro moved to the newly found University of Coimbra to lecture

Mathematics. He taught mathematics at this university for quite a while, up to around 1562. The post that he held in the university was new to the University of Coimbra, and it was specifically founded to give instructions on the general technical requirements or rather needs in the field of navigation. Navigation was a very important topic in Portugal at that time, as they were the leading sea trade in the world, and it was their main source of wealth. Mathematics was later made an independent subject in Portugal in around 1544.

Royal Cosmography, Mathematics, and Service to Portuguese Navigation

Besides teaching at the University, Pedro Nunes was made the Royal Cosmographer by the year 1529, and later, in 1547, he was made the Chief Royal Cosmographer. He held this position for quite a long period until he died. Christopher Clavius, the renowned astronomer, was a student of Pedro at the University of Coimbra. Pedro influenced him in many ways, and he was more or less like a mentor to him. He referred to Pedro as a “supreme mathematical genius.”

Due to the great contributions made by Pedro in the field of science, specifically in navigation, mathematics, and medicine, he received many awards in history for his appreciation of the work he did as a professor at the university, including his innovations (Fernandes, 2017). Several schools and institutions were named after them in remembrance of his work and a sense of honor for his doings. Just to mention a few, the best public high school known in Lisbon is named after him, and it is *Escola Secundaria de Pedro Nunes*. The school teaches from the 7th grade up to the 12th grade. The school was started in 1906 as Central Liceum, a 3rd-grade school in the area of Lisbon. The school has had changes in the name since then; however, Pedro Nunes has always remained part of the name since time immemorial, even though it still remains known by many as Liceu Pedro Nunes.

The institution has released many prominent people from Portugal, and it is renowned for its good work and performance in the entire country. Pedro Nunes has also been honored not only by having institutions named after him but also in other ways. For some time in history, he was made the national treasure when he was made the face of the national one hundred coins. That is just one of the other ways he was rewarded in remembrance of his vital contribution to the field of science in Portugal.

Scientific Recognition and the Institutional Legacy of Nunes

Pedro Nunes' rewards did not just end by that; several others followed suit years after he died. A very massive institution in Coimbra, which was mainly an innovation center and business incubator, was named after him (Nunes, 2016). The institution was called the Instituto Pedro Nunes. The institution

deals mainly with research and technological issues in the modern world. Scientists also did not just forget the work done by Pedro but instead honored him by naming a heavenly body after him. Asteroid 5313 was named after Pedro, and it was called Nunes in honor of his contribution to the field of science. A Portugal Airline has also named an airbus after Pedro. TAP named the Airbus A330-202 plane after Pedro. Several statues were erected in his hometown where he was born, and paintings of him were made and sold in the world markets until today.

Pedro is believed to have died in the year 1578, around the 1st of August. His life coincided with the years when the country is believed to have had a great development. His life is regarded as one of the most beneficial in the history of Portugal (Nunes, 2016). His contributions in the field of navigation, science, and mathematics still stand out. Surely, Pedro lived a life worth remembering, and the contribution he made to his country is unbelievable now.

In summary, Pedro Nunes is worth remembering for the contributions he made to his country. He is not only a hero but also a source of inspiration to the coming generations, and the contribution of an individual can result in change in the whole country. He is also a role model, mentor, and influence to some people, just like he inspired some of his students in class.

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