

ENGLISH EDITION

Miguel Rojas, the Venezuelan boy who discovered an asteroid and was certified by NASA

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Miguel will be able to name his asteroid when all the characteristics of this new rocky celestial body are known.



The research work of Miguel Rojas, a 13-year-old Venezuelan boy, has been certified in a program supported by the US National Aeronautics and Space

Administration (NASA), for the discovery of an orbiting asteroid in the solar system, between the planets Mars and Jupiter.

This young boy with a passion for astronomy, born in the state of Lara, in western Venezuela, made the discovery in April of this year and his finding was recognized days ago by the Pan-Starrs observatory of the Institute of Astronomy of the University of Hawaii and the Hardin Simmons University, through the International Astronomical Search Collaboration (IASC) that accompanies NASA.

“With great emotion, I share the recognition that NASA has given me, my preliminary discovery is now provisional, that is, NASA has already certified that I have discovered an asteroid. Its temporary name is 2021GG40”, Miguel explained in a post he made on his social networks.

RT spoke with Miguel – with permission from his parents – to learn more about what he is passionate about, the details of the discovery and how the process that led him to obtain recognition from NASA and academic institutions was like.

«All my life I have liked astronomy»

Miguel is a nice and educated boy, with great confidence in his thoughts and words, especially when he talks about what he is most passionate about: astronomy. «I have liked it all my life, from a very young age. For as long as I can remember, I have known that I have wanted to dedicate myself to this», he said.

«I also have to say that as a 13-year-old I also love movies, such as Star Wars, superheroes and action movies», adds Miguel, who also likes to read and is passionate about investigating, exploring and obtaining new knowledge.

The first books that interested him were encyclopedias on space and the solar system. «When I read them, it increases my interest to learn more and delve into the wonderful world of science and astrophysics», explained Miguel.

Miguel's path towards the discovery of the asteroid began through the CI 130 Orbit Program, which is dedicated to early identification, diagnosis, mentoring and specialized comprehensive assistance for children and youth with high abilities, high performance and giftedness.

It was this organization that invited Miguel to actively participate as an explorer in the asteroid search campaign organized by the IASC and which is taking place around the world.

How was Miguel's discovery done?

«Thanks to the fact that I am part of that foundation, I participated in that asteroid search campaign and it was through that, that I managed to discover it», explained Miguel, who indicates that making the find requires a lot of patience, focus and meeting the requirements.

“It is quite a process. First you join the asteroid search campaign, which is organized by the IASC. Then, you have to look for the images taken by the Pan-Starrs telescope at the University of Hawaii», he explained.

The photographs, he adds, “are from a place in the solar system, between the planet Mars and Jupiter, which has many asteroids and my duty as a member of that campaign is to download them, analyze them and everything I see, I must put in a written report that I send to the IASC coordination. Then, a professional astronomer compares my written report with a database and there they determine if there is a possible new asteroid or not».

Miguel's report has already passed two phases, the first was when the first astronomer classified his report as a 'Preliminary' Discovery; and the second occurred when experts from various observatories analyzed the report again and verified that it was indeed a new contribution.

“Several observatories study that section of the sky to see if they agree that it is indeed a new asteroid. When everyone agrees, it becomes a ‘Provisional Discovery’ and that’s when NASA certifies, recognizes and identifies it”, explains the young researcher.

The process between the preliminary and provisional discovery takes several months, so, although Miguel made the discovery of the asteroid in April, it was not until December that he received the certification. «Now, they must monitor the orbit of the asteroid until all its characteristics are known, a process that takes years, and then you can name it and I will be the one that gives it a name», he said with enthusiasm.

An admirer of Elon Musk

«What I like the most is researching», insists Miguel when asked what he likes the most, in addition to astronomy. However, he comments that as he has grown, his parents and the teachers at his school have instilled in him that, at his age, it is important to include the practice of sports for his growth and development.

«That’s why I started to practice tennis and boxing. I also like music, I play the cuatro [the characteristic Venezuelan string musical instrument] and my favorite music is that of the 70s, 80s and 90s», said the teenager, who confesses that he also likes to learn new languages, such as English and French, which he has been studying for several years.

The young man is also interested in astrophysics, cosmology, planetary sciences and above all, aerospace engineering, a career that he wishes to study in order to become a professional and work with NASA.

Another of his goals is to meet and talk with the CEO of Space X and Tesla, Elon Musk. «He is an inspiration, a role model for me. He is one of the most influential

people in the world, making great technological and spatial advancements. I would like to meet and talk with him».

Why is space exploration important?

For Miguel, aerospace research and exploration is what can help humanity the most, both in technological advances and in its preservation as a species in the future.

“People who say that space travel does not contribute are very wrong, because the technology that helps us in everyday life comes from there and sometimes we do not even realize it. It is in the technology of cell phones, in the internet, communications, satellite signals, cameras, laptops, in everything».

Along these lines, he affirmed: «Space exploration will continue to help us to continue the evolution of humanity, to discover new territories, new technologies, planets and galaxies. Until, one day, trips to the Moon, Mars, interplanetary travel are common and there is even a base in space where we can live».

«I would love to take a vacation in space. To get to Mars and live in a base created by astronomers and that from there we can travel to other planets, and although they seem like science fiction things, we are very close to achieving it».

Miguel: «I want to leave a mark on the world»

At his young age, this Venezuelan, continues to work so as to make new discoveries and achieve his dreams, with the unconditional support of his parents.

«I want to leave a mark on the world through astronomy, which is the future, and I am very grateful to my parents because without their support I would not be where I am now. They have supported me from a very young age in this, which is not a common interest, and they have done everything possible to provide me with the best tools and to follow my dreams».

Miguel adds that children with unusual interests must keep their dreams alive and work towards them, no matter what other people tell them.

«I tell them to continue believing in doing science, not to be afraid of being interested in something that is not common in young people our age, to continue studying, reading, researching, listening to lectures».

To do science you do not need a large telescope or a large laboratory – adds Miguel – who assures that what is required to make an important scientific discovery is to be persistent, constant and dedicated.

In Venezuela, in addition to Miguel's discovery, the IASC has also recognized the recent finding made by Venezuelan researchers José Ángel Mora Robles, Antares José Mora Sánchez and Isaac Buitriago, from the Caronte Astronomical Center of the state of Táchira, who managed to locate a distant star located in the Milky Way, which is believed to be a dwarf star experiencing a massive flare.

Fuente: [El Ciudadano](#)