5 Scientists in Latino History Who Changed the World

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Science in its many disciplines is universal and diverse. It spans across all languages, continents, and cultures; notable contributors in its fields come from all corners of the globe. Although the U.S. is viewed worldwide as the global scientific research powerhouse thanks to generous funding of programs, education, and experimentation, the Latin American world has also been making incredible scientific strides for centuries. Latino culture has raised Nobel Prize winners, geniuses in environmental science, and quantum field theory game changers. Here are some brilliant Latin Science minds who have changed the way we understand the world:

1. José Sarukhán (July 15, 1940-)

Mexico- based Ecologist José Sarukhán is responsible for the establishment of a department within the country's government dedicated to rainforest conservation and and biodiversity research. This department, known as the Comisión Nacional para el Conocimiento y Uso de la Biodiversidad (National Commission for the Knowledge and Use of Biodiversity) is trailblazing as one of the world's first government departments dedicated solely to environmental protection and national biodiversity online databasing. Often referred to as CONABIO, it is commissioned over ten Mexican federal ministries and is now in it's 25th year in developing policies on conservation and sustainability of over 11 million local specimens. Learn more about the regional and global impact of CONABIO here: https://www.youtube.com/watch?v=egb98LxJFYk&feature=youtu.be

For his work regarding the CONABIO, Sarukhán will be awarded the 2017 Tyler Prize for Environmental

Achievement, placing him among the ranks of other world-famous scientists like Jane Goodall and E.O Wilson. Often referred to as 'the Nobel for the environment', the Tyler Prize is the most prestigious international awards for environmental science.

2. Adriana Ocampo (January 5, 1955-)

Born in Barranquilla, Colombia, and raised in Argentina, Planetary Geologist Adriana Ocampo moved to the U.S. as a teen. Having grown up with an affinity for space, in high school she joined a NASA Jet Propulsion Laboratory (JPL) volunteer group, and then continued working at JPL throughout college. She received a Master of Science in planetary geology while still at JPL full-time. During this time, Ocampo also conducted research on a crater that caused the extinction of over half Earth's species 65 million years ago. The massive impact of this crater, called the Chicxulub crater, led to Ocampo's Master's and Ph.D. theses, later resulting in her spearheading six research expeditions relating to the topic.

She credits her parents as her inspiration and recalls dreaming of designing space colonies while sitting atop the roof of her family's Argentinian home. In addition, Ocampo also Ocampo has served the Society of Hispanic Professional Engineers as both secretary and vice president. She is currently a Science Program Manager at NASA Headquarters.

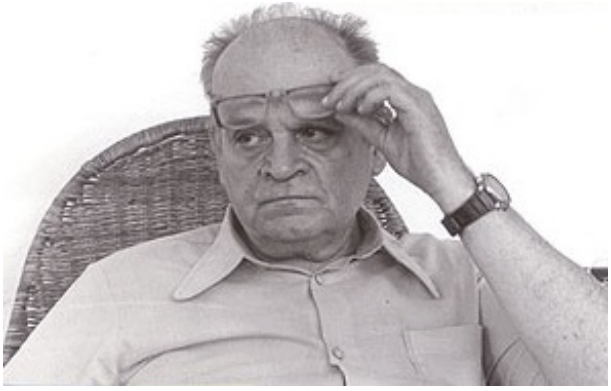
To have a virtual visit with Adriana Ocampo and learn about her passion for space, you can go here: https://www.youtube.com/watch?v=5IZQ8Qf5Y8w

3. Mario J. Molina (March 19, 1943-)

Mario J. Molina is the first Mexican- born recipient of a Nobel Prize in Chemistry Laureate for being one of three environmental scientists to recognize the relation between Chlorofluorocarbons (CFCs) used in manufacturing of commercial goods such as aerosol sprays, and the earth's deteriorating ozone layer. This discovery was made in 1974, followed by its reveal at a press conference held by the American Chemical Society that was met with skepticism at a time when scientists had not yet began reflecting on the effects of CFCs. At the press conference, Mario J. Molina, Paul Crutzen, and Sherwood Rowland called for a controversial ban of further emissions of CFCs into the atmosphere.

In 1985 the British Antarctic Survey later confirmed Molina's work with the discovery of a large hole in the ozone layer over the Earth's southern hemisphere, causing 20 nations- many of them major CFC producers- to sign the Montreal Protocol treaty as to minimize the production of products that give off the CFCs partially responsible for ozone depletion. Molina also received the U.S. Presidential Medal of Freedom in August 2013 as "a visionary chemist and environmental scientist" without whose work we would not have insight as to the effects of commercialized goods on our atmosphere.

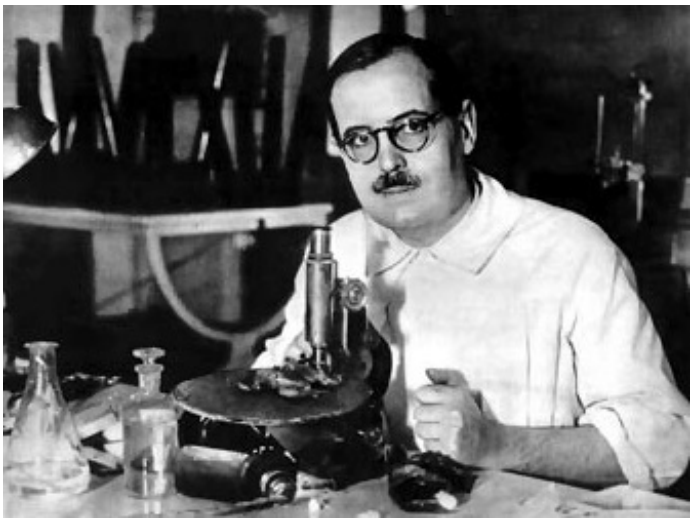
4. Cesare Mansueto Giulio Lattes (July 11, 1924- March 8, 2005)



Brazilian experimental physicist César Lattes is credited as having been one of the discoverers of the pion, a subatomic particle that consists of a quark and an antiquark. Lattes conducted his fundamental nuclear science atop the Bolivian Andes in 1946. He also was the first to record the movement of cosmic rays traveling through a pion. Lattes did so by adding Boron to a newly photographic plate, which he discovered stopped the tracks made by cosmic rays traveling through the pion from from disappearing and becoming impossible to take note of. This technique resulted in the recording of the first artificially produced pion. Lattes work with cosmic rays contributed greatly to the field of atomic physics in the years after World War II.

Following his research, Lattes taught at the University of São Paulo Brazil in 1948, and later co-founded the Brazilian Center for Research in Physics as its scientific director until 1955. His contributions, nearly 70 years later, still push ongoing development in the ever-expanding field of quantum field theory.

5. Bernardo Houssay (April 10 1887- September 21, 1971)



Argentinean child prodigy Bernardo Houssay graduated the School of Pharmacy of the University of Buenos Aires at in 1904 the age of 14. After studying medicine following graduation, he became Chief Physician at the Alvear Hospital of Buenos Aires, Argentina in 1913. At that time, he also was charged with overseeing the Laboratory of Experimental Physiology and Pathology in Argentina's National Department of Hygiene as well.

In 1908 Houssay cared for a patient suffering from symptoms of acromegaly, or a pituitary gland tumor. Inspired in his studies by French physiologist Claude Bernard, Houssay taught himself to harvest and analyze the gland tissue for causes of acromegaly. This self- taught skill lead to his increased interest in the functionings of the pituitary gland, as well as his doctoral thesis, which awarded the University of Buenos Aires' prestigious Faculty of Medical Science Award.

In 1947 Houssay became the first Latin American Nobel laureate in the Sciences for the shared discovery of the role pituitary hormones in regulating glucose in animals. He is the first Latin American Nobel laureate in the Sciences. During his scientific career in Argentina, Bernardo Houssay was involved in almost all fields of physiologic study, and was a constant advocate of university and medical education, especially within the realm of scientific research.