Vatican Observatory
Foundation

Official Media Kit

About Us

The Vatican Observatory is a scientific institution established by Pope Leo XIII in 1891 for astronomical research and public outreach, to advance the scientific understanding of our universe.

From its headquarters at the papal summer residence in Castel Gandolfo, outside Rome, and with additional offices at the University of Arizona in Tucson supporting its telescope at the Mount Graham International Onservatory, the Vatican Observatory is the national observatory of the Vatican City State. It supports a dozen Jesuit priests and brothers from four continents who study the universe utilizing modern scientific methods. In addition, another dozen adjunct astronomers, both lay and religious, collaborate from observatories and univerisities around the world.

The Vatican Observatory works with the Vatican Observatory Foundation to promote education and public engagement in astronomy, and constructive dialogue in the area of faith and science. The Vatican Observatory Foundation, a 501(c) (3) nonprofit incorporated in Arizona, is the fundraising organization for the Observatory.

Pope Leo XIV at the Refractor Telescope in Castel Gandolfo

Physics and Planetary Sciences

Observatory scientists study a range of related sciences such as quantum gravity; meteorites and Moon rocks; and possible life on planets orbiting other stars. Vatican meteoriticists have produced a comprehensive catalog of meteorite physical properties and are have measured samples returned from the asteroid Bennu. The Observatory has also set up three sets of sky cameras to record bright bolides and faint meteors entering Earth's atmosphere over Tucson and Rome.

Research

For 135 years, scientists at the Vatican Observatory have been advancing scientific inquiry and promoting awareness of how our universe works. Here are a few examples of our contributions.

Astronomy

Unique among large observatories, the Vatican Observatory has specialized in long-term survey projects from the 19th-20th century *Carte du Ciel* (Map of the Heavens) – the first photographic atlas of the stars – to modern catalogs of galaxies, open clusters, and peculiar stars. For the Carte du Ciel, Fr. Hagan recruited "computer" nuns from the Sisters of the Holy Child Mary to record the stars' positions. These data are now digitized and provide a valuable record of changes in stellar brightness and position.

The Vatican telescope VATT produced the first comprehensive search for dark matter candidate "MACHOs" in the Andromeda Galaxy. To match the famous Hubble Space Telescope survey of distant galaxies, Vatican astronomers helped produce a catalog of similar nearby galaxies. And the VATT has characterized stellar clusters embedded in dust clouds within our galaxy.

Technology

The Vatican Observatory Research Group (VORG) operates the 1.8m Alice P. Lennon Telescope with its Thomas J. Bannan Astrophysics Facility, known together as the Vatican Advanced Technology Telescope (VATT), located at Mount Graham near Safford Arizona. With its state of the art electronic cameras, the VATT has pioneered new ways of building large telescopes.

The primary mirror of the VATT was the first ever made using the rotating furnace technology developed by the Mirror Lab at the University of Arizona, which has gone on to revolutionize the creation of large, lightweight, telescope mirrors. The computer-controlled aiming and focusing of the VATT with its gear-free direct drive motors allow the telescope to track objects with less than an arc second of error.

In 2024 the "Don" remote observing system was installed at the VATT. With this system, observers need not be physically present on the mountaintop to observe. They can open (and close) the domes, control the telescope, and operate its cameras from anywhere where there is internet connection.

To learn more about our research, find our Annual Reports at:
https://www.vaticanobservatory.va/en/publications/annual-report#

Education and Public Engagement

The Vatican Observatory is committed to education, from K-12 to postgraduate students, especially in the developing world. Every two years, 25 advanced students from around the world participate in the Vatican Observatory Summer School, spending four weeks in Castel Gandolfo attending lectures and working on research projects with notable astronomers including Nobel laureates. The schools are free, supported by the Vatican Observatory Foundation.

Biennial "Astronomy for Catholics in Ministry and Education" (ACME) workshops in Arizona bring parish priests and educators from K-12 Catholic schools for an immersion into the world of astronomy in Tucson and provide a forum to share ideas on how to teach science in the setting of Catholic schools and parishes.

Vatican astronomers also teach astronomy courses both for undergraduates and graduate students in the Astronomy Department of the University of Arizona. The Vatican Observatory Foundation sponsors science fair awards for students in Southern Arizona. And Vatican astronomers are regular speakers, both in person and on-line, to astronomy clubs, parishes, and schools in North America, Europe, Africa, and India.

Learn more aboutour educational activities at:
https://www.vaticanobservatory.org/education/

Culture and History

Fr. Christopher Clavius, S.J, key figure in the Gregorian Calendar reform.

The 1582 Gregorian Calendar... biographies of notable Catholic scientists... workshops on the peaceful uses of space... all show the Observatory's active role in the larger society and the Church. With the move of the Observatory from Rome to Castel Gandolfo in 1935, a large library was set up including historical astronomical books, some dating from the 16th century, which has served as a vital resource for many historians and scientists. In addition, the Vatican Observatory Foundation maintains an online resource of materials on the topics of faith and science. The international role of the Vatican Observatory has included a number of important roles in the International Astronomical Union, and it recently co-hosted with the United Nations Office of Outer Space Affairs a workshop on the peaceful uses of space.

Learn more about our history at:
https://www.vaticanobservatory.va/en/history

Principal Spokespersons

Fr. Richard D'Souza, S.J.

Director, Vatican Observatory

BSc Physics, St. Xavier's College, University of Mumbai, 2002
MSc Physics, University of Heidelberg, 2005
Bachelors in Philosophy, Jnana Deepa Vidyapeth, Pune, 2007
BA Theology, Jnana Deepa Vidyapeth, Pune, 2011
PhD Astronomy, Ludwig Maximilian University, Munich, 2016

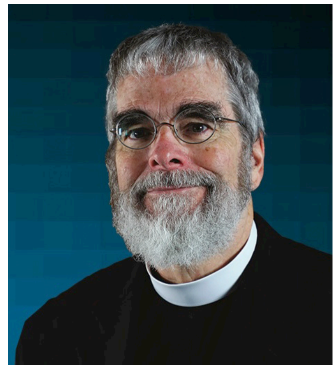
Fr. Richard D'Souza SJ was born in 1978 in Pune, India and hails from Goa, India. His initial school years were spent in Kuwait; from 1990, he moved back to Goa and entered the Society of Jesus in 1996. In 2016, he formally joined the staff of the Vatican Observatory while taking a postdoc at the University of Michigan, Ann Arbor. In 2019, he moved to the headquarters of the Vatican Observatory in Castel Gandolfo. In 2025, Pope Leo XIV named him director of the Vatican Observatory.

Fr. Richard D'Souza studies the formation and evolution of galaxies. In particular, through observations and simulations, he has studied the outer stellar halos of galaxies in order to decipher their accretion histories.

Br. Guy J. Consolmagno, S.J.

Director emeritus, Vatican Observatory

President, Vatican Observatory Foundation



ScB & ScM Earth and Planetary Sciences, Massachusetts Institute of Technology, Cambridge MA
PhD Planetary Science, University of Arizona

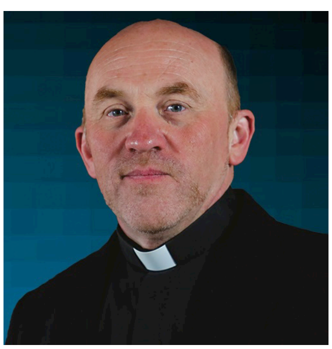
Br. Guy Consolmagno SJ was born in 1952 in Detroit, Michigan. From 1978-80 he was a postdoctoral fellow and lecturer at the Harvard College Observatory, and from 1980-1983 continued as postdoc and lecturer at MIT.

In 1983 he served the US Peace Corps in Kenya, then taught at Lafayette College until his entry into the Jesuit order in 1989. He joined the Vatican Observatory in 1993, and served as its director from 2015 - 2025.

Br. Consolmagno studies meteorites, asteroids, and the origin and evolution of small bodies in the solar system. He is also the author of a number of popular books, most recently *A Jesuit Guide to the Stars.*

Fr. Gabriele Gionti, S.J.

Vice Director, Vatican Observatory, Castel Gandolfo



MSc Physics, University of Naples Frederic II, 1993
PhD Physics, School of Advanced Studies, Trieste, 1998
BA Philosophy, Pontifical Gregorian University, Rome, 2004
MDiv/STB/STL Theology, Santa Clara University, 2010

Fr. Gabriele Gionti SJ was born in 1967 in Capua, Ital and served in the Italian Army 1994-1995. In 1999 he postdocted at the University of California at Irvine. He joined the Jesuits in his native Italy in 2000. In the fall 2004 he was assigned to the Vatican Observatory in Tucson, Arizona for two years, and worked at the Steward Observatory of the University of Arizona. He began his work in Rome in 2010, and was appointed Vice Director for Castel Gandolfo in 2023.

His research is in theoretical cosmolgly, specializing in studies of Discrete Quantum Gravity.

Fr. Pavel Gabor, S.J.

Vice Director, Vatican Observatory, Tucson

MSc Physics, Charles University, Prague, 1995
BA Philosophy Ignatianum, Cracow, 1999
BA Theology, Centre Sevres, Paris, 2003
MSc Astrophysics Universite Paris VII, Paris, 2006
PhD. Astrophysics, Universite Paris XI, Paris, 2009

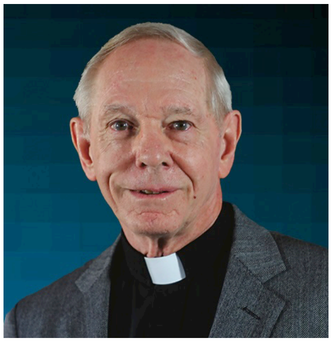
Fr. Paul Gabor SJ was born in 1969 in Košice, Slovakia. He worked in the development of the ATLAS detector for the Large Hadron Collider at CERN, the European Laboratory for Particle Physics in Geneva, Switzerland.

He entered the Society of Jesus in 1995 and joined the Vatican Observatory in September 2010 in Tucson, where he became its local Vice Director in September 2012.

His research is centered on instrumentation and techniques that can be used to discover planets orbiting other stars.

Fr. Christopher Corbally, S.J.

President, Vatican City State Committee for the IAU



LicPhil Philosophy, Heythrop College, Oxfordshire, 1968
BSc Physics, Bristol University, 1971
MSc Astronomy, University of Sussex, Brighton, 1972
BD Theology, Heythrop College, London. 1976
PhD Astronomy, University of Toronto, 1983

Fr. Chris Corbally S.J. was born near London in 1946 and entered the Society of Jesus in 1963. Since 1983 Fr. Corbally has been a research astronomer of the Vatican Observatory, and he served as its Vice Director for the Vatican Observatory Research Group in Tucson from 1984 until 2012.

Fr. Corbally's research includes multiple star systems, stellar spectral classification, peculiar and metal-weak stars especially those with lambda Boötis characteristics, activity in solar-type stars, galactic structure and star formation regions, and telescope technology.

Learn more about our astronomers and other staff at:
https://www.vaticanobservatory.org/about/team/

Contact us:

Vatican City

Journalists with questions about any aspect of our Observatory and its work are welcome to contact us.

If you wish to conduct a formal interview on site, please note the following:

All reporters conducting interviews in Castel Gandolfo need to have written permission from the Vatican; this includes, but is not limited to, any sort of pictures, film, or other media recording.

Before the interview, prepare a proposal to send the Vatican City State (see below) with:

- The title and brief description of the program
- The names of all of those who will be on the filming crew
- The date and time of the shoot
- The purpose of the interview
- Who will be interviewed
- How long it will take
- How the material will be used

You should e-mail this request to presidenza@scv.va and copy staff@specola.va

U.S.

All reporters wishing to conduct interviews or do filming at the VATT or any other telescope affiliated with the University of Arizona, or at the Richard Caris Mirror Lab, or on campus at the offices of Steward Observatory, University of Arizona, should contact Cathi Duncan at Steward Observatory:

Cathi Duncan
Development & Stewardship Manager
Department of Astronomy
Email: cduncanf@arizona.edu
Phone Number: +1 520 621 1320

For any other press or media related inquiries, feel free to reach out at:

Email: info@vaticanobservatory.org
Phone Number: +1 520 474 0661

Travel to the Vatican Advanced Technology Telescope on Mt. Graham is difficult and requires advance notice. Upon request we can provide high resolution images and professionally produced video of the site which journalists would be free to use.