

Vicky Kalogera

Vicky Kalogera received an undergraduate degree in physics from the University of Thessaloniki in Greece and a doctorate in astronomy from the University of Illinois at Urbana-Champaign. Following this she completed a prize postdoctoral fellowship at the Harvard-Smithsonian Center for Astrophysics and joined Northwestern in 2001 as a junior faculty. In 2009 she was named the E.O. Haven Professor of Physics and Astronomy; in 2017 she was selected for the first Daniel I. Linzer Distinguished University Professorship which she still holds. In 2009 she co-founded CIERA which she leads as director to date. In 2024 she became director of the NSF-Simons AI Institute for the Sky (NSF-Simons SkAI). This multi-institution research institute will unleash the discovery potential of revolutionary sky surveys and empower astronomers to use cutting-edge AI tools to address the fast-evolving challenges ahead.

Kalogera is a world expert in the astrophysics of compact objects (black holes, neutron stars, and white dwarfs). She is also a leading astrophysicist in the LIGO Scientific Collaboration, LIGO being the special kind of 'telescopes' that first detected gravitational waves in 2015. These waves were first predicted to exist by Einstein a hundred years earlier. Her research is cross-disciplinary coupling gravitational-wave and stellar astrophysics to data science, machine learning, and high-performance computing.

For her research she has been recognized by numerous awards, including the Hans A. Bethe Prize by the American Physical Society (2016), the Dannie Heineman Prize for Astrophysics by the American Institute for Physics and the American Astronomical Society (2018), and a Guggenheim Fellowship (2021). For her work with the LIGO Collaboration, she has been awarded the Special Breakthrough Prize in Fundamental Physics (2016), and the Bruno Rossi Prize by the American Astronomical Society (2017). In 2018 she was elected to the National Academy of Sciences and in 2021 to the American Academy of Arts and Sciences. She is also a Fellow of the American Physical Society (2009), a Simons Fellow in Theoretical Physics (2012), an Elected Fellow of the American Association for the Advancement of Science (2019), and a Legacy Fellow of the American Astronomical Society (2020).