

# Miguel A. Virasoro Biography

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Miguel Ángel Virasoro (May 9, 1940-) was born in Buenos Aires, Argentina, the son of Miguel Ángel Casildo Virasoro, a lawyer and academic philosopher, and María Catalina Regnasco.

Virasoro did his undergraduate studies in physics at Universidad de Buenos Aires (1959-1962), where he also received a PhD in theoretical physics (1967) for a thesis entitled *Ecuación de Klein Gordon y transformaciones de medida generalizada* (The Klein-Gordon equation and generalized measure transformations), under the supervision Carlos Guido Bollini. He left Argentina after *la Noche de los Bastones Largos* in 1966, and was then a postdoc at the Weizmann Institute, in Israel, in the group of Hector R. Rubinstein (1967-1968), and at the University of Wisconsin-Madison (1968-1969) with Bunji Sakita. He spent a year as visiting researcher at the University of California Berkeley (1970), before returning to Universidad de Buenos Aires in 1971 as an assistant professor of physics. The 1976 Argentine coup d'état, which took place during Virasoro's sabbatical at the Institute of Advanced Studies, in Princeton, New Jersey, USA (1975-1976), made his return to the country impossible. He thus took up temporary positions at École normale supérieure in Paris, France (1977) and then at Istituto Nazionale di Fisica Nucleare (INFN) in Torino, Italy (1978-1981). He was finally awarded a theoretical physics professorship at Università di Lecce, in Italy (1981-1982), and then at Università di Roma La Sapienza (1982). From 1995 to 2002, he was director of the International Center for Theoretical Physics (ICTP) in Trieste. Upon retiring from La Sapienza in 2010, he returned to Argentina, where since 2014 he is Honorary Professor at the Instituto de Ciencias of the Universidad Nacional de General Sarmiento.

Virasoro is well-known for his discovery of the Virasoro Model and for his contributions to the development of infinite-dimensional Lie algebras through the introduction of the Virasoro algebra. He met Giorgio Parisi upon his arrival in Rome, and later met Marc Mézard, Gérard Toulouse and Nicolas Surlas in Paris. This led him to embark on a highly-collaborative statistical physics program, first on ultrametricity and then on neural networks. These interests led him to co-author the landmark book *Spin Glass Theory and Beyond* (1987) with Mézard and Parisi.

Virasoro was a 1987 Guggenheim Fellow. He also received the 1993 Rammal Medal from the Société française de physique, and the 2020 Dirac Medal of the ICTP (with André Neveu and Pierre Raymond) "for their pioneering contributions to the inception and formulation of string theory which introduced new Bosonic and Fermionic symmetries into physics".