

The mystery of dark matter

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More than a 50 years ago, it became obvious from the astrophysical observations that our Universe is made mostly of 'dark' particles whose properties are completely different from the usual matter that surrounds us. Dr Marco Cirelli is one of the world leading researchers in the rapidly growing field of the quest to discover the very nature of this 'dark' particles, which are known to make up most of the mass in our Universe but whose nature still eludes us.

Dr Cirelli obtained Ph.D. in Physics from the Scuola Normale Superiore, and further developed his research career at the Yale University (New Haven, CT, USA), CERN (Geneve, Switzerland) and at CEA/Saclay, Paris. He currently holds a prestigious grant from the European Council dedicated to studies of possible explanations for dark matter nature and works at the LPTHE Labs and the Université Pierre et Marie Curie - Paris 6 (Sorbonne Universités), in Paris, France.

Nowadays, we are privileged to live in a time where many new experiments which are expected to shine light on this mystery started taking their data. In this lecture, Dr. Cirelli will review what we currently know about the dark matter and the status of the quest to resolve this long lasting puzzle.

The lecture will be followed by a reception and sky-observations with an amateur telescope in the yard of the Lanthieri Mansion.

