

# **Seminario Interdisciplinare Fisica-Filosofia**

**Venerdi 31 Marzo 2017**  
**ore 15-17**

Aula Magna  
Dipartimento di Fisica e Astronomia

## **String Theory and the Case for Non-Empirical Confirmation**

**Richard Dawid**

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For the last thirty years, string theory has played a highly influential role in fundamental physics without having found empirical confirmation. The presentation will analyze reasons for the high degree of trust many physicists have developed in a theory that, according to classical standards of theory assessment, would have to be called an unconfirmed speculation. It will be argued that the cases of string theory and some other theories in contemporary fundamental physics suggest an extension of the concept of theory confirmation that allows for a weaker form of confirmation by observations that are not predicted by the theory in question (to be called 'non-empirical confirmation'). In the last part of the talk I will address some worries that have been raised with respect to the presented ideas.

**Coordinatori:** A. Cappelli, E. Castellani, F. Colomo