Combinatorial Physics is an emerging area which unites combinatorial and discrete mathematical techniques applied to theoretical physics, especially Quantum Theory. Our aim is to assemble experts working in these fields as well as new entrants to the subject and to discuss both recent results in the field and further development of Combinatorial Physics.

**Topics**

- Combinatorial representations of algebraic structures in Quantum Theory
- Methods of discrete mathematics as a universal tool in solving physical problems
- Graph representations of quantum mechanical operators
- Combinatorial field theory and renormalization
- Quantum-mechanical interpretation of classical combinatorial sequences
- Coherent states and their combinatorial interpretation
- Combinatorial methods in quantum computing
- Combinatorial solutions to ordering problems of quantum operators

**Speakers**

J. Alvarez (Valladolid), D. Broadhurst (Milton Keynes), C. Burdik (Prague), D. Chruściński (Toruń), G. Dattoli (Frascati), N. Destainville (Toulouse), K. Ebrahimi-Fard (Bonn), R. Flume (Bonn), D. Foata (Strasbourg), L. Foissy (Reims), J-P. Gazeau (Paris), Y. Hassouni (Rabat), J. Katriel (Haifa), R. Kerner (Paris), R.C. King (Southampton), M. Kuś (Warsaw), A. Lascoux (Marne-la-Vallée), A. Maciolek (Stuttgart), J-M. Maillard (Paris), T. Mansour (Haifa), M. Méndez (Caracas), R. Mosseri (Paris), O. Navratil (Prague), L.M. Nieto (Valladolid), A. Orłowski (Warsaw), G. Oshanin (Paris), P. Pieranski (Orsay), S. Posta (Prague), C. Quesne (Brussels), S. Sabphapandit (Orsay), M. Schork (Frankfurt), S. Severini (Waterloo), J-Y. Thibon (Marne-la-Vallée), C. Tollu (Villetaneuse), A. Vourdas (Bradford), E. Zipper (Katowice)

**Organizers**

P. Blasiak, A. Horzela (Kraków)
G.H.E. Duchamp, K.A. Penson (Paris)
A.I. Solomon (Open University/Paris)

**Host institution**

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**Conference site**

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