

Dear colleague,

We would like to invite you to participate in the 8th Workshop on Quantum Phase Transitions in Nuclei and Many-Body Systems (QPTN-8) that will take place in Prague from 6th to 9th June, 2016 (Monday-Thursday).

The QPTN-8 Workshop is a continuation of a series of workshops on shape-phase transitions and critical point phenomena in nuclei. The previous workshops took place in Berkeley (2004), Camerino (2005), Athens (2006), Sofia (2007), Istanbul (2009), Darmstadt (2012), and Sevilla (2014). The early workshops were focused prevalingly to the evolution of the shapes and structure of atomic nuclei, but the span of the topics has gradually grown to involve various critical effects in general strongly interacting many-body systems (like molecules, Bose-Einstein condensates, lattice systems, synthetic quantum systems etc.).

In Prague, we would like to preserve the spirit of the previous workshops, which were always very informative and fruitful meetings, rather effective in stimulating the activity in all related areas. We hope that unique atmosphere and historical context of the city of Prague will create a spectacular background for the scientific content of the meeting.

The QPTN-8 Workshop will have the following six sessions:

Experimental signatures of quantum phase transitions in nuclei  
Convenors: R. Casten, N. Pietralla

Algebraic approaches to quantum phase transitions  
Convenors: P. Van Isacker, A. Leviatan

Microscopic approaches to quantum phase transitions  
Convenors: D. Vretenar, L. Robledo

Quantum phase transitions in coupled systems (including Bose-Fermi)  
Convenors: F. Perez Bernal, J.E. Garcia Ramos

Quantum phase transitions in non-nuclear many-body systems  
Convenors: L. Carr, J. Dukelsky

Excited state quantum phase transitions  
Convenors: T. Brandes, M. Macek

Each session has two collaborating convenors responsible for selecting the speakers and adjusting the subjects of contributions. We assume that each session will contain one or two overview talks and a series of shorter contributions. The duration of short contributions is supposed to be roughly between 5 and 15 minutes, depending on the specific subject and on the preferences of the convenors of the session. An essential part of each session will be an intense and deep discussion of the topics presented.

This email is a first announcement of the QPTN-8 Workshop. You are kindly asked to let us know (by email to [gptn2016@ipnp.troja.mff.cuni.cz](mailto:gptn2016@ipnp.troja.mff.cuni.cz)) whether you would like to join us in Prague. We also encourage you to submit a proposed topic of your contribution (tentative title and a short abstract) to the convenors of the respective session (in case you are uncertain concerning the session to which your topic belongs, please contact us at the above address).

Email addresses of the convenors of all sessions are as follows:

R. Casten <[richard.casten@yale.edu](mailto:richard.casten@yale.edu)>  
N. Pietralla <[pietralla@ikp.tu-darmstadt.de](mailto:pietralla@ikp.tu-darmstadt.de)>  
P. Van Isacker <[isacker@ganil.fr](mailto:isacker@ganil.fr)>  
A. Leviatan <[ami@phys.huji.ac.il](mailto:ami@phys.huji.ac.il)>  
D. Vretenar <[vretenar@phy.hr](mailto:vretenar@phy.hr)>  
L. Robledo <[luis.robledo@uam.es](mailto:luis.robledo@uam.es)>  
F. Perez Bernal <[francisco.perez@dfaie.uhu.es](mailto:francisco.perez@dfaie.uhu.es)>  
J.E. Garcia Ramos <[francisco.perez@dfaie.uhu.es](mailto:francisco.perez@dfaie.uhu.es)>  
L. Carr <[lcarr@mines.edu](mailto:lcarr@mines.edu)>  
J. Dukelsky <[dukelsky@iem.cfmac.csic.es](mailto:dukelsky@iem.cfmac.csic.es)>  
T. Brandes <[tobias.brandes@mailbox.tu-berlin.de](mailto:tobias.brandes@mailbox.tu-berlin.de)>  
M. Macek <[macek@ipnp.troja.mff.cuni.cz](mailto:macek@ipnp.troja.mff.cuni.cz)>

More specific information about the QPTN-8 Workshop, also including the Workshop webpage where all information will be accumulated, will follow soon.

Please disseminate this message among your colleagues who might be interested.

We are looking forward very much to your response!

With kind regards,

Pavel Cejnar

(for the local organization committee: P. Cejnar, P. Stransky, M. Kloc)