

Workshop CALL FOR PAPERS

Unconventional Computational Problems: Examples and Solutions

Part of the *Sixth International Conference on Unconventional Computation UC'07*

August 13-17, 2007, Kingston, Canada

Workshop description

The field of unconventional computing is mostly concerned with the exploration of novel, non-traditional ways of performing computations that can offer some advantage over the classical approach. The inspiration for the design of such unconventional computing models usually comes from natural phenomena and, although exotic, these methods are generally applied to well-known, classical problems.

The purpose of this one-day workshop is to explore a less developed branch of unconventional computing, where the attribute "unconventional" characterizes the computational paradigm or problem to be solved, rather than the model or means employed to address a conventional problem. This research direction is motivated by the increasing number of real-world problems we are facing today and that cannot be formulated in the rigid framework imposed by a classical Turing machine.

A typical submission will identify those characteristics of a computation that makes it unconventional and possibly propose a model (either theoretical or practical) that is able to successfully tackle the problem. This description is illustrative rather than imposing a fixed structure. The paradigm discussed may be inspired from Nature or suggested by technological advancements. The model used to address the problem can be classical or unconventional. If the model is theoretical, prospects for a practical implementation may be discussed.

Important dates

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| Submission deadline: | April 7, 2007 |
| Notification of acceptance: | May 5, 2007 |
| Camera ready due: | May 15, 2007 |
| Workshop day (tentative): | August 13, 2007 |

Submission instructions

Authors are invited to submit an electronic version (pdf or ps) of their work as an e-mail attachment to any of the workshop organizers: Marius Nagy (marius@cs.queensu.ca) or Naya Nagy (nagy@cs.queensu.ca). Accepted papers will be published in a standalone Workshop Proceedings volume made available during the workshop. Revised versions of selected papers will be considered for publication in a special issue of the *International Journal of Parallel, Emergent and Distributed Systems* (<http://www.ijpeds.net>). The workshop is tentatively scheduled for August 13, 2007 as an integral part of the main conference and is free for anyone registered at UC'07. For registration details and general information, please check the conference web site at <http://www.cs.queensu.ca/uc07>.

Contact address

Please send any questions and inquiries to either

Marius Nagy
School of Computing, Queen's University
Kingston, Ontario, Canada K7L 3N6
E-mail: marius@cs.queensu.ca

or

Naya Nagy
School of Computing, Queen's University
Kingston, Ontario, Canada K7L 3N6
E-mail: nagy@cs.queensu.ca

We are looking forward to seeing you in Kingston!