

EDITORIAL

Announcement of the winner of the Longuet-Higgins Young Author's Prize 2011

The Editors of *Molecular Physics* are pleased to announce the winner of the **Longuet-Higgins Young Author's Prize**, Dr Niels Boon, for his outstanding work with Dr René van Roij on the theory of sustainable energy recovery from mixing seawater with river water. The energy resource discussed in their paper is potentially huge – at a level comparable with present-day worldwide electricity use – and they present an advanced and rigorous account of theoretical aspects and the conceptual background for this technology. Their work draws on the analogy between heat engines and blueenergy engines, both at the thermodynamic and at the molecular level, and employs Poisson–Boltzmann theory. A profile of the winner follows this Editorial.

This year we received 55 nominations -16 more nominations than in the inaugural year of the prize and 4 more than last year.

The entries emphasised the wide-ranging and exciting science published in *Molecular Physics*, from spectroscopic studies of isolated molecules and clusters to the properties of complex liquids and biological systems, encompassing both experimental and theoretical approaches.

Each year the Editors are tasked with selecting the best papers from a number of high-quality nominations. As the standard of nominations has grown stronger year on year, the Editors have decided this year to award three **Molecular Physics Young Author Prizes** with a \$250 prize attached to each.

We thank the nominators and congratulate all authors on their valuable contributions to this area of science. The journal, *Molecular Physics*, is keen to support young emerging authors in all its scientific areas of interest.

The Longuet-Higgins Young Author Prize Winner received \$1000



Niels Boon, Utrecht University, the Netherlands 'Blue energy' from ion adsorption and electrode charging in sea and river water

Niels Boon & René van Roij Volume 109, Issues 7–10, Pages 1229–1241

Molecular Physics Young Author Prize Winners received \$250



Gareth Dickenson, VU University, the Netherlands *VUV spectroscopic study of* the $D^{-1}\Pi_{u}$ state of molecular deuterium

G.D. Dickenson, T.I. Ivanov, W. Ubachs, M. Roudjane, N. de Oliveira, D. Joyeux, L. Nahon, W.-Ü.L. Tchang-Brillet, M.

Glass-Maujean, H. Schmoranzer, A. Knie, S. Kübler & A. Ehresmann Volume 109, Issue 22, Pages 2693–2708

Editorial



Matthias Tröndle, Max Planck Institute for Intelligent Systems, Germany Trapping colloids near chemical stripes via critical Casimir forces

Matthias Tröndle, Olga Zvyagolskaya, Andrea Gambassi, Dominik Vogt,

Ludger Harnau, Clemens Bechinger & Siegfried Dietrich

Volume 109, Issues 7-10, Pages 1169-1185

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James Whitfield, Harvard University, USA Simulation of electronic structure Hamiltonians using quantum computers James D. Whitfield, Jacob Biamonte & Alán Aspuru-Guzik Volume 109, Issue 5,

For information on how to nominate a young author for next year's prize and to read H.C. Longuet-Higgins' papers published in *Molecular Physics*, please visit the prize website: www.tandf.co.uk/journals/ authors/tmph_authors_prize.asp

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