



THEODOROS E. KARAKASIDIS

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EDUCATION

- *BSc in Physics*, Aristotle University of Thessaloniki, Greece (1989).
- *MSc in Materials Science*, University Pierre et Marie Curie, Paris, France (1991).
- *PhD in Physics*, University Pierre et Marie Curie, Paris, France (1995).

POSITIONS HELD

- **31/08/18 – present** Professor, University of Thessaly, Dept of Civil Engineering
- **16/06/14 – 30-08-18** Associate Professor, University of Thessaly, Dept of Civil Engineering
- **19/11/09 – 15-06-14** Assistant Professor, University of Thessaly, Dept of Civil Engineering
- **1/9/05 – 18/11/09** Lecturer, University of Thessaly, Dept. of Civil Engineering
- **1/9/00 – 30/8/05** Adjunct Assistant Professor, University of Thessaly
- **1/9/97 – 30/8/00** Adjunct Lecturer, University of Thessaly
- **1/9/11 – 31/12/11** Visiting Professor, University of Cyprus, Dept. of Physics (on sabbatical leave from University of Thessaly)

RESEARCH INTERESTS

- System dynamics and non linear time series analysis, econophysics
- Fuzzy clustering applications
- Computational materials science, nanofluidics, microfluidics
- Nanofluidics and microfluidics
- Parallel computing and computational methods
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ARTICLE REVIEWER

Surface Science, Microfluidics Nanofluidics, Nanotechnology, Journal of Physics: Condensed Matter

,Modelling and Simulation in Materials Science and Engineering, Current Applied Physics, Mechanics of Advanced Materials and Structures, Journal of Mathematical Imaging and Vision, Journal of Computational and Applied Mathematics, International Journal of Bifurcation and chaos, Physical Review E.

CONFERENCE ORGANIZING COMMITETTES

- Member of the Local Organizing Committee of the 8th GRACM International Congress on Computational Mechanics 12th-15th July 2015, University of Thessaly, Volos, Greece
- Member of the Organizing Committee of the 2nd EWaS International Conference: “Efficient & Sustainable Water Systems Management toward Worth Living Development” June 1-4 2016 Chania, Crete, Greece.
- Member of the Local Scientific Committee στο 23rd International Congress on Sound and Vibration (ICSV23), 10-14 July 2016, Athens Greece
- Session Chairman στο 23rd International Congress on Sound and Vibration (ICSV23), 10-14 July 2016, Athens Greece
- President of the Organizing Committee of the 24th Summer School «Dynamical Systems and Complexity” Volos, 1-21 July 2017
- Coorganizer of Symposium “Multiscale Materials Modeling” in the frame of EUROMAT2017, Thessaloniki, September 17-22/9/2017
- Program Committee member of EDUCON2017 (IEEE Gobal Engineering Education Conference) 25-28 April 2017, Athens, Greece
- Member of the organizing of the 3rd Econophysics International Conference, Volos, 28-30 September 2017
- Programme Committee member International Conference Complex Systems 2018, 23-28 September, Thessaloniki, Greece

Selected Publications:

1. A.D.Fragkou, T.E. Karakasidis and E. Nathanail, “Detection of traffic incidents using Nonlinear Time series analysis”, Chaos (2108), v. 28(6) pp. 063108.
2. Charakopoulos, A.K., Katsouli, G.A., Karakasidis, T.E, Dynamics and causalities of atmospheric and oceanic data identified by complex networks and Granger causality analysis, Physica A: Statistical Mechanics and its Applications, Volume 495, (2018), Pages 436-453
3. Charakopoulos, A. K., Karakasidis, T. E., Papanicolaou, P. N., & Liakopoulos, A. (2014). The application of complex network time series analysis in turbulent heated jets. *Chaos: An Interdisciplinary Journal of Nonlinear Science*, 24(2), 024408.
4. Sofos, F., Karakasidis, T. E., & Liakopoulos, A. (2012). Surface wettability effects on flow in rough wall nanochannels. *Microfluidics and nanofluidics*, 12(1-4), 25-31.
5. Kasiteropoulou, D., Karakasidis, T. E., & Liakopoulos, A. (2013). Mesoscopic simulation of fluid flow in periodically grooved microchannels. *Computers & Fluids*, 74, 91-101.
6. Georgiou, D. N., Karakasidis, T. E., Nieto, J. J., & Torres, A. (2009). Use of fuzzy clustering technique and matrices to classify amino acids and its impact to Chou's pseudo amino acid composition. *Journal of theoretical biology*, 257(1), 17-26.
7. T.E. Karakasidis, A. Charakopoulos, Detection of low-dimensional chaos in wind time series, Chaos, Solitons and Fractals, 41, pp. 1723-1732 (2009)

8. Sofos, F., Karakasidis, T., & Liakopoulos, A. (2009). Transport properties of liquid argon in krypton nanochannels: anisotropy and non-homogeneity introduced by the solid walls. *International Journal of Heat and Mass Transfer*, 52(3), 735-743.
9. T.E. Karakasidis, A. Liakopoulos, A. Fragkou, P. Papanicolaou, “Recurrence Quantification Analysis of Temperature Fluctuations in a Horizontal Round Heated Jet”, *International Journal of Bifurcation and Chaos* 19, 2487 (2009).
10. F. Sofos, T. E. Karakasidis, A. Liakopoulos, “Effect of wall roughness on shear viscosity and diffusion in nanochannels”, *International Journal of Heat & Mass Transfer*, 53, pp. 3839-3846, 2010.
11. T.E. Karakasidis, A. Fragkou, A. Liakopoulos, “System dynamics revealed by recurrence quantification analysis: Application to molecular dynamics simulations”, *Physical Review E* 76, 021120 (2007).

For a full list see:

- Scopus: <http://www.scopus.com/authid/detail.url?authorId=6603783293>
- Google Scholar: <http://scholar.google.gr/citations?user=AbK9Kr0AAAAJ&hl=en>

CITATIONS : more than 900 (without self citations)