

**Name :** Petros Katsafados  
**Office :** No. 3.4, Harokopou 89 Str., 17671, Kallithea, Athens, Greece  
**Telephone:** +30-210-9549384  
**email:** [pkatsaf@hua.gr](mailto:pkatsaf@hua.gr)  
**website:** <http://meteoclima.gr>

### **Academic Position**

Associate Professor in Atmosphere and Climate Dynamics, Department of Geography, Harokopio University of Athens (HUA).

### **Teaching experience**

Over 17 years teaching experience in undergraduate and graduate courses at the Harokopio University of Athens (HUA), the National and Kapodistrian University of Athens (NKUA), the National Technical University of Athens (NTUA) and the Technological Education Institute (TEI) of Piraeus.

### **Text books and contribution to book chapters**

1. Gualtieri C. and D.T. Mihailovic, (second edition) 2012: Fluid Mechanics of Environmental Interfaces, *Taylor & Francis Ltd*, (ISBN 13: 978-0-415-62156-4), pp. 480. Contribution to the Chapter 5 entitled as "Desert dust uptake-transport and deposition mechanisms—impacts of dust on radiation, clouds and precipitation", G. Kallos, P. Katsafados and C. Spyrou, pp. 107-144.
2. Karymbalis E., Papadopoulos A., and Chalkias C., (eds.) 2014: The Geography of the Coastal and Insular Areas, Stamoulis Eds. (ISBN 9789603519270), pp. 338. Contribution to the Chapter 7 entitled as "Flood risk estimation in small catchments", Karymbalis E., Katsafados P., Kalogeropoulos K., Karalis S.T., and Chalkias C., pp. 199-240 (in greek).
3. Katsafados P. and E. Mavromatidis, 2015: "An Introduction to the Atmospheric Physics and the Climate Change". Digital textbook in the framework of the funded action "Kallipos" pp. 350 (in greek).

### **Contribution to special editions**

1. Manousakis, M., T. Charandonis, G. Sakellaridis, J. Papageorgiou, E. Anadranistakis, G. Alexiou, P. Fragouli, D. Sgouros, G. Konstantinidis, N. Mimikou, A. Karachristou, S. Nickovic, P. Katsafados, and A. Papadopoulos, 1998: The Weather Forecasting System SKIRON, Vol. V: Post-processing. Graphics, ISBN 960-8468-19-1.
2. Katsafados, P., A. Papadopoulos, G. Kallos, and S. Nickovic, 2000: The Weather Forecasting System POSEIDON", Vol. I: Preprocessing and Operational Manual.
3. Nickovic, S., B. Rajkovic, A. Papadopoulos, P. Katsafados, and G. Kallos, 2000: The Weather Forecasting System POSEIDON", Vol. II: Description of the model.
4. Soukissian T., Hatzinaki M., Korres G., Papadopoulos A., Kallos G., Anadranistakis E., 2007: "Wave and Wind Atlas of the Hellenic Seas". Hellenic Centre for Marine Research Publ., 300 pp, ISBN 978-960-86651-9-4.
5. Parcharidis I., M. Fomelis and P. Katsafados. "Seasonal ground deformation monitoring over Southern Larissa Plain (Central Greece) by SAR interferometry". Advances in the Research of Aquatic Environment, N. Lambrakis et al. (Eds.), Vol. 2, doi 10.1007/978-3-642-24076-8, *Springer-Verlag Berlin Heidelberg*, 2011.
6. Katsafados P., E. Papadopoulou, A. Papadopoulos and E. Mavromatidis, 2012: "Seasonal forecasts for the 2010 Russian heat wave using an Atmospheric General Circulation Model". Advances in Meteorology, Climatology and Atmospheric Physics, Helmis C. and P. Nastos, (eds.), 2012, *Springer*, Vol. I, pp. 187-194, ISBN: 978-3-642-29171-5.
7. Papadopoulos A., P. Katsafados and I. Pytharoulis, 2012: "High resolution gridded meteorological data across the Mediterranean basin". Advances in Meteorology,

Climatology and Atmospheric Physics, Helmis C. and P. Nastos, (eds.), 2012, *Springer*, Vol. I, pp. 187-194, ISBN: 978-3-642-29171-5.

#### **Publications in international peer review journals**

1. Korres, G., A. Lascaratos, E. Hatzia Apostolou, and P. Katsafados, 2002: "Towards an ocean forecasting system for the Aegean Sea". *Global Atmosphere and Ocean System*, **8**, 191-218, (24 citations).
2. Papadopoulos, A., P. Katsafados, G. Kallos, and S. Nickovic, 2002: "The weather forecasting system for POSEIDON-An overview". *Global Atmosphere and Ocean System*, **8**, 219-237, (51 citations).
3. Ranmar, D. O., V. Matveev, U. Dayan, M. Peleg, J. Kaplan, A. W. Gertler, M. Luria, G. Kallos, P. Katsafados, and Y. Mahrer, 2002: "Impact of coastal transportation emissions on inland air pollution over Israel: Utilizing numerical simulations, airborne measurements, and synoptic analyses". *Journal of Geophysical Research*, **107**, 5.1-5.14, (6 citations).
4. Erel, Y., T. Axelrod, A. Veron, Y. Mahrer, P. Katsafados, and U. Dayan, 2002: "Transboundary atmospheric lead pollution". *Environmental Science and Technology*, **36**, No.15, 3230-3233, (20 citations).
5. Katsafados, P., A. Papadopoulos, and G. Kallos, 2005: "Regional Atmospheric Response to Tropical Pacific SST Perturbations". *Geophysical Research Letters*, **32**, L04806, doi: 10.1029/2004GL021828, (5 citations).
6. Kallos, G., A. Papadopoulos, P. Katsafados, and S. Nickovic, 2005: "Trans-Atlantic Saharan dust transport: Model simulation and results". *Journal of Geophysical Research-Atmosphere*, **111**, D09204, doi: 10.1029/2005JD006207, (53 citations).
7. Galanis, G., P. Louka, P. Katsafados, I. Pytharoulis, and G. Kallos, 2005: "Applications of Kalman filters based on non-linear functions to numerical weather predictions". *Annales Geophysicae*, **24**, 2451-2460, (30 citations).
8. Kallos G., M. Astitha, and P. Katsafados, 2007: "Long-Range Transport of Anthropogenically and Naturally Produced PM in the Mediterranean and North Atlantic: Present Status of Knowledge". *Journal of Applied Meteorology and Climatology*, **46**, No.8, 1230-1251, (76 citations).
9. Kishcha P., P. Alpert, A. Shtivelman, S.O. Krichak, J.H. Joseph, G. Kallos, P. Katsafados, C. Spyrou, G.P. Gobbi, F. Barnaba, S. Nickovic, C. Perez, and J.M. Baldasano, 2007: "Forecast errors in dust vertical distributions over Rome (Italy): Multiple particle size representation and cloud contributions". *Journal of Geophysical Research-Atmosphere*, **112**, D15205, doi:10.1029/2006JD007427, (12 citations).
10. Shilo E., Y. Ashkenazy, A. Rimmer, S. Assouline, P. Katsafados, Y. Mahrer, 2007: "Effect of wind variability on topographic waves: Lake Kinneret case". *Journal of Geophysical Research-Atmosphere*, **112**, C12024, doi:10.1029/2007JC004336, (8 citations).
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13. Louka, P., G. Galanis, N. Siebert, G. Kariniotakis, P. Katsafados, G. Kallos, and I. Pytharoulis, 2008: "Improvements in wind speed forecasts for wind power prediction purposes using Kalman filtering". *Wind Engineering and Industrial Aerodynamics*, **96** (12), pp. 2348-2362, (118 citations).
14. Cai, C., Hogrefe, C., Katsafados, P., Kallos, G., Beauharnois, M., Schwab, J.J., Ren, X., Brune, W.H., Zhou, X., He, Y., Demerjian, K.L., 2008: "Performance Evaluation of an Air Quality Forecast Modeling System for a Summer and Winter Season -

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  23. Karalis S., E. Karymbalis, K. Valkanou, C. Chalkias, P. Katsafados, K. Kalogeropoulos, V. Batzakis, and A. Bofilios A., 2014: “Assessment of the relationships among catchments’ morphometric parameters and hydrologic indices”. *International Journal of Geosciences (IF: 0.79)*, **5** (13), 1571-1583, doi:10.4236/ijg.2014.513128.
  24. Christakos, K., G. Varlas, J. Reuder, P., Katsafados, and A., Papadopoulos, 2014: “Analysis of a Low-level Coastal Jet off the Western Coast of Norway”. *Energy Procedia (SNIP: 0.786)*, **53**, 162-172.
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  27. Tsanakas, K., K., Gaki-Papanastasiou, K., Kalogeropoulos, C., Chalkias, P., Katsafados and E., Karymbalis, 2016: “Investigation of flash flood natural causes of Xirolaki torrent, Northern Greece based on flash flood modelling and geomorphological analysis”, *submitted to Natural Hazards*.

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1. Papadopoulos, A., G. Kallos, S. Nickovic, D. Jovic, M. Dacic, and P. Katsafados, 1997: "Sensitivity studies of the surface and radiation parameterization schemes of the Skiron system". *Proceedings of the Symposium on Regional Weather Prediction on Parallel Computer Environments*, 15-17 October 1997, Athens, Greece, pp. 155-164.
2. Kallos, G., A. Papadopoulos, and P. Katsafados, 2000: "The POSEIDON weather forecasting system". *6<sup>th</sup> Hellenic Symposium on Oceanography and Fisheries*, 23-26 May 2000, Chios, Greece, pp. 387-391.
3. Papadopoulos, A., K. Nittis, and P. Katsafados, 2000: "Evaluation of the Meteorological forecasting of the POSEIDON system". *6<sup>th</sup> Hellenic Symposium on Oceanography and Fisheries*, 23-26 May 2000, Chios, Greece, pp. 392-396.
4. Kallos, G., A. Voudouri, I. Pytharoulis, and O. Kakaliagou, E. Mavromatidis, M. Varinou, F. Gofa, P. Katsafados, F. Sprovieri, and P. Costa, 2001: "Atmospheric mercury in the Mediterranean Region: A source-receptor relationship study". *4th Open Science meeting of the European Land-Ocean Interaction Studies (ELOISE)*, 5-7 September 2001, University of Calabria, Rende, Italy, pp. 96.
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6. Kallos, G., A. Papadopoulos, and P. Katsafados, 2003: "Model derived seasonal amounts of dust deposited on Mediterranean Sea and Europe". *Building the European Capacity in Operational Oceanography, 3<sup>rd</sup> EuroGOOS Conference*, 3-6 December 2002, Athens, Greece, ISBN 0 444 51550 X, ISSN 0422 9894, pp. 57-63.
7. Papadopoulos, A., L. Perivoliotis, K. Nittis, and P. Katsafados, 2003: "Evaluation of Poseidon forecasts in the Aegean Sea for a three-year period". *Building the European Capacity in Operational Oceanography, 3<sup>rd</sup> EuroGOOS Conference*, 3-6 December 2002, ISBN 0 444 51550 X, ISSN 0422 9894, Athens, Greece, pp. 64-70.
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9. Papadopoulos, A., P. Katsafados, G. Kallos, S. Nickovic, S. Rodriguez, and X. Querol, 2003: "Contribution of desert dust transport to air quality degradation of urban environments. Recent model developments". *26th NATO/CCMS ITM on Air Pollution Modeling and its Application*, 26-30 May 2003, Istanbul, Turkey, ISBN 0-306-48464-1, pp. 279-286.
10. Astitha, M., Kallos, G., Katsafados, P., and Pytharoulis I., 2004: "Production and transformation of anthropogenic and natural aerosols in the Mediterranean Region". *13<sup>th</sup> World Clean Air and Environmental Protection*, 22-27 August 2004, London, UK.
11. Pytharoulis, I., P. Katsafados, K. Koutsoulis, G. Galanis, G. Emmanouil, and G. Kallos, 2005: "Air-sea interaction processes during extreme weather events in the Mediterranean region". *Geophysical Research Abstracts*, Vol. 7, 09505, European Geosciences Union General Assembly, 24-29 April 2005, Vienna, Austria.

12. Kallos, G., I. Pytharoulis, P. Katsafados, P. Louka, and G. Galanis 2005: "Limited area weather forecasting for the MFSTEP activities: Sensitivity and performance analysis". *4<sup>th</sup> EuroGOOS Conference*, 6-9 June 2005, Brest, France.
13. Kallos, G., P. Katsafados, C. Spyrou, and A. Papadopoulos, 2005: "Desert dust deposition over the Mediterranean Sea estimated with the SKIRON/Eta". *4<sup>th</sup> EuroGOOS Conference*, 6-9 June 2005, Brest, France.
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2. 1995-1997: Environmental impact analysis on the waste transportation, disposal and treatment in Athens, Municipality of Athens-GSRT (92-SYN 170)
3. 1996-1998: Atmospheric circulation and dispersion of air pollutants affected the Western Macedonia and released from local and distant sources, GSRT-PENED 1864.
4. 1997-2000: Supply, Installation and Operation of a System of Floating Oceanographic Measurement Stations for the Monitoring and Forecasting of the Greek Seas (POSEIDON Project), Financial Mechanism of the European Economic Area-EFTA.
5. 1998-2000: Mediterranean Forecasting System Pilot Project (MFSPP), EU-MAST Project (Contract # MA53-CT98-0171).
6. 2000-2002: Frost development and evolution in the area of Imathia-Pella, Northern Macedonia, ELGA.
7. 2000-2003: Subgrid-scale Investigation of Factors Determining the Occurrence of Ozone and Fine Particles (SUB-AERO), DG-XII of EU (Contract # EVK2-1999-00052)
8. 2001-2004: Atmospheric Deposition and Impact of Pollutants, Key Elements and Nutrients on the Mediterranean Sea (ADIOS), DG-XII of EU (Contract # EVK3-CT-2000- 00035).
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