

CURRICULUM VITAE AND ACADEMIC TRACK RECORD

Dr. Konstantinos Kaffas  0000-0003-1398-4371

EDUCATION

- 2012–2017 **PhD in Engineering Hydrology.** Hydraulic Engineering Division, Civil Engineering Department, Democritus University of Thrace, Xanthi, Greece.
- 2007–2008 **MSc in Hydraulic Engineering.** Direction of “Water Resource Management Works”. Civil Engineering Department, Democritus University of Thrace, Xanthi, Greece.
- 2001–2007 **Diploma and Master (Diploma/Master) in Environmental Engineering.** Environmental Engineering Department, Democritus University of Thrace, Xanthi, Greece.

WORK EXPERIENCE

- March 2024–Present **Fixed-term Researcher (RTDA).** Department of Science, University Roma Tre, Rome, Italy.
Research projects: AI4SoilHEalth, Soil-O-Live.
- August 2022–July 2023 **Postdoctoral Researcher.** Department of Agriculture, Food, Environment and Forestry (DAGRI), University of Florence, Florence, Italy.
Research project: Hydrological response of forested catchments during droughts.
- April 2022–August 2022 **Visiting Researcher.** Scientific Sector ICAR/02 (Hydrology, Hydraulic and Maritime Constructions), Faculty of Science and Technology, Free University of Bozen–Bolzano, Bolzano, Italy.
Research project: Techno-economic methodologies to investigate sustainable energy scenarios at urban level.
- April 2021–March 2022 **Postdoctoral Researcher.** Scientific Sector ICAR/02 (Hydrology, Hydraulic and Maritime Constructions), Faculty of Science and Technology, Free University of Bozen–Bolzano, Bolzano, Italy.
Research project: “BARS, Balancing Alpine reservoir sedimentation, sediment management practices and ecological impacts”.
- June 2020–November 2020 **Postdoctoral Researcher.** Scientific Sector ICAR/02 (Hydrology, Hydraulic and Maritime Constructions), Faculty of Science and Technology, Free University of Bozen–Bolzano, Bolzano, Italy.
Research project: “SEDIPLAN–r, Sediment budgeting and planning for rivers in South–Tyrol: from hazard mitigation to environmental restoration”.
- June 2019–June 2020 **Postdoctoral Researcher.** Scientific Sector ICAR/02 (Hydrology, Hydraulic and Maritime Constructions), Faculty of Science and Technology, Free University of Bozen–Bolzano, Bolzano, Italy.
Research project: “SEDIPLAN–r, Sediment budgeting and planning for rivers in South–Tyrol: from hazard mitigation to environmental restoration”.

June 2018–June 2019	Postdoctoral Researcher. Scientific Sector ICAR/02 (Hydrology, Hydraulic and Maritime Constructions), Faculty of Science and Technology, Free University of Bozen–Bolzano, Bolzano, Italy. Research project: “MOIEREF, Methods for Optimization and Integration Given Energy Prices and Renewable Resources Forecasts”.
June 2013–June 2014	Research Fellow. Special Account for Research Grants, DUTH. Project title: “ Calculation of Continuous Hydrographs and Sediment graphs in a Basin ”, Civil Engineering Department, Democritus University of Thrace, Xanthi, Greece.

TEACHING EXPERIENCE

December 2017	Assistant Lecturer by contract, Subjects: Advanced Engineering Hydrology. Postgraduate Program: “Hydraulic Engineering”, Civil Engineering Department, Democritus University of Thrace.
April–May 2016	Assistant Lecturer by contract, Subjects: Sediment Transport. Postgraduate Program: “Hydraulic Engineering”, Civil Engineering Department, Democritus University of Thrace.
April–May 2016 May–June 2015 March–April 2014 January–February 2014	Assistant Lecturer by contract, Subjects: Reservoir Design. Postgraduate Program: “Hydraulic Engineering”, Civil Engineering Department, Democritus University of Thrace.

LIST OF SELECTED PUBLICATIONS

International refereed journals

1. **Kaffas, K.**, Pisaturo, G. R., Premstaller, G., Hrissanthou, V., Penna, D., Righetti, M. (2024). Event-based soil erosion and sediment yield modelling for calculating long-term reservoir sedimentation in the Alps. *Hydrological Sciences Journal*, 69(3): 321–336. <https://doi.org/10.1080/02626667.2024.2311756>
2. **Kaffas, K.**, Pinaras, V., Al Sayah, M. J., Santopietro, S., Righetti, M. (2021). A USLE-based model with modified LS-factor combined with sediment delivery module for Alpine basins. *Catena*, 207: 105655. <https://doi.org/10.1016/j.catena.2021.105655>
3. Borrelli, P., Alewell, C., Alvarez, P., ..., **Kaffas, K.**, ..., Panagos, P. (2021). Soil erosion modelling: A global review and statistical analysis. *Science of the total environment*, 780: 146494. <https://doi.org/10.1016/j.scitotenv.2021.146494>
4. Bezak, N., Mikoš, M., Borrelli, P., ..., **Kaffas, K.**, ..., Panagos, P. (2021). Soil erosion modelling: A bibliometric analysis. *Environmental research*, 197: 111087. <https://doi.org/10.1016/j.envres.2021.111087>
5. Folegot, S., Bruno, M.C., Larsen, S., **Kaffas, K.**, Pisaturo, G.R., Andreoli, A., Comiti, F., Righetti, M. (2021). A functional approach to evaluate the effects of sediment flushing on macroinvertebrate communities in Alpine streams. *Hydrobiologia*, 848: 3921–3941. <https://doi.org/10.1007/s10750-021-04608-8>
6. **Kaffas, K.**, Hrissanthou, V., Sevastas, S. (2018). Modeling hydromorphological processes in a mountainous basin using a composite mathematical model and ArcSWAT. *Catena*, 162: 108-129. <https://doi.org/10.1016/j.catena.2017.11.017>
7. **Kaffas, K.**, Hrissanthou, V. (2015). Estimate of continuous sediment graphs in a basin, using a composite mathematical model. *Environmental Processes*, 2: 361-378. <https://doi.org/10.1007/s40710-015-0069-3>
8. **Kaffas, K.**, Hrissanthou, V. (2014). Application of a continuous rainfall-runoff model to the basin of Kosynthos river using the hydrologic software HEC-HMS. *Global NEST Journal*, 16(1): 188-203. <https://doi.org/10.30955/gnj.001200>