Application of robotic boats to the water quality control through Greece: EYDAP's success story

<u>Efthymios Lytras</u>, Nikos Tsalas, Alekos Dosis, Georgios Katsouras, Marina Despotidou, Stylianos Samios, and Kostas Papadopoulos

Athens Water and Sewerage Company S.A (E.Y.D.A.P.) – Research and Development – Oropou 156, 11146, Galatsi, Athens, Greecee-mail: <u>lytras@eydap.gr</u>

EYDAP's autonomous boats were deployed to a wide range of Geeek catchments and demonstrated clearly the benefits that are derived by their application in water monitoring. The boats equipped with basic and innovative sensors, were tested in *** lakes and rivers and proved to be a valuable tool to Research Institutes, Management Bodies and even sports events organizations, because:

- They achieved a more thorough monitoring campaign both in space and time and provided significantly higher amount of water quality data without requiring labour-intensive and costly monitoring schemes.
- They allowed the monitoring of ecological status more accurately with emphasis on phytoplankton growth. Monitoring by robotic boats provided valuable insights into the distribution and the responses of phytoplankton to environmental pressures.
- They allowed fast & flexible data collection of many discrete samples and provided with a representative coverage of the whole lake required for chemical classification.
- They received a very high public acceptance, social and environmental impact, adding a positive value to water security.



Figure 1: Conductivity in Lake Koumoundourou (left) and Chl-a in Lake Pamvotis (right)

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