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### **LIFE Blue Lakes Capacity Building Workshop**

1st July 2021

Summary of Interactive Session II





BENEFICIARIO COORDINATORE

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### **Interactive Session 2 – Breakout Rooms**

- 4. How can we **standardise the monitoring** of microplastics to obtain comparable data? *Valentina Della Bella, ARPA UMBRIA*
- 5. How can microplastic particles be efficiently removed from **wastewater**? *Prof. Francesco Fatone, UNIVPM*
- 6. How can a **Lake White Paper** contribute to strengthening the European regulatory framework for the protection of lakes from microplastics? *Leonardo Gatta*, *ABDAC*





















# Room 4: How can we **standardise the monitoring** of microplastics to obtain comparable data?

Valentina Della Bella, ARPA UMBRIA

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**Links to project partner** Italian National Agency for New Technologies, Energy and Sustainable Economic Development (ENEA); Italy:

https://www.enea.it/it





















# Room 4: How can we **standardise the monitoring** of microplastics to obtain comparable data?

Valentina Della Bella, ARPA UMBRIA

- A standardised Monitoring Protocol for Microplastics in lakes is important:
  - to obtain robust data
  - to compare results from different lakes and countries
  - to make (political) decisions on solid ground
  - to put pressure on the industry (Avoid & Polluter pays, internalisation of externalities)
- Water sampling with Manta and Bongo nets show good results.
- It must not only be better elaborated what municipalities can do to keep lakes clean (from plastic waste) but also how municipalities can be supported in their efforts to achieve that.
- University of Trieste is working with Slovenia on a microplastics monitoring project in ground water and aquifers = > links to Goletta Verde e Goletta dei Laghi from Legambiente (<a href="https://golettaverde.legambiente.it/">https://golettaverde.legambiente.it/</a>)



















## Room 5: How can microplastic particles be efficiently removed from wastewater?

Prof. Francesco Fatone, UNIVPM

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How can microplastic particles be efficiently removed from wastewater?

treatment systems required upgrading WTP if possible no sewage systems e.g. floating villages

individual solutions required

reduce microplastic sources first!

awareness and knowledge education for technical solutions

fresh water supplies alternatives

Mangrove impact - ecosystem influence the lakes

## Room 5: How can microplastic particles be efficiently removed from wastewater?

Prof. Francesco Fatone, UNIVPM

In this session it was discussed what is required to remove microplastic particles from (waste) water. In the global context of the workshop the frameworks are quite different from one continent to another! For that all participants agreed, that first microplastic sources must be reduced.

Three items were in the focus:

- If waste water treatment plants are in work, upgrading is necessary. In regions where there are no sewage system existing other solutions not at the end of the pipe but at the causes for plastic pollutions must be installed. Individual technical solutions for waste water could be developed and introduced or added to already existing systems.
- Awareness and knowledge of the impact of microplastic is for local people important.
- The impact on ecosystems, like mangroves needs a scientific research. It is in fact unknown how microplastic influences vegetation.





















Room 6: How can a Lake White Paper contribute to strengthening the European regulatory framework for the protection of lakes from microplastics?

Leonardo Gatta, ABDAC

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Lake Biwa, Japan

Osaka Bay =
bigger
amount of
micro
plastics

Participatory approaches to reduse use of plastics

Microplastics and impact on ecosystems, on health ... complex and difficult to cover in legislation

in discussion, but not jet conclusions How can the Lake White Paper contribute to strengthening the European regulatory framework for the protection of lakes from microplastics?

Include Microplastics into the WFD could open a discussion on the whole WFD

Look at the Marine Strategie Micropollutants are considered as crucial

Knowledge, e.g. Monitoring protocols Costs for measures to be covered by public and private

Understand financial flows

Polluters pay principle

Need to show how much each source pollutes Also the driver of the car is part of the polluter!

Taxes on tiers?