



Course on Innovative Processes and



Practices for Wastewater Treatment and Re-use Technical Content and Programme

October 8th, Monday

Session 1-a. OPENING (Chair: M. Fürhacker)

09:00 Welcoming addresses

- *Rıdvan Berber, ANKU - Turkey*
- *Nusret Aras, Rector, Ankara Un.- Turkey*

09:30 Introduction, INNOVA-MED Project

- *Damià Barceló, CSIC - Spain*

10:00 [Environmental problems facing us: An overall assessment from Turkey](#)

- *Celal Gökçay, Middle East Tech. Un.- Turkey*

11:00 Legal issues pertaining waste water treatment and re-use

- [EU Perspective](#)- *Damià Barceló, CSIC - Spain*
- [Local perspective](#)- *Recep Şahin, Ministry of Env. & Forestry – Turkey*

Session 1-b. FATE AND BEHAVIOUR OF POLLUTANTS

(Chair: T. Knepper)

13:30 Monitoring organic pollutants within the WFD: Why and How

- *Thomas Knepper, EFF – Germany*

14:30 [Biotic and abiotic degradation studies of organic contaminants during WWT](#)

- *ManuelaPeschka, EFF - Germany*

15:45 [Fate and behaviour of organic contaminants in the aquatic environment](#)
-Miren Lopez de Alda, CSIC – Spain

October 9th, Tuesday

Session 2-a. PROCESS ENGINEERING
(Chair: M. Tawfic)

8:30 [Evaluation and optimization of WW treatment by AOPs](#)
- Sixto Malato, CIEMAT - Spain

10:15 [Process systems engineering in water quality control](#)
(real time monitoring and modeling; optimization and control of WWT plants)
- Ridvan Berber, ANKU - Turkey
[-Additional Paper 1](#)
[-Additional Paper 2](#)

11:15 [Elimination of emerging contaminants \(surfactants, pharmaceuticals, polar pesticides\) by membrane bioreactor technologies in waste water and drinking water treatment](#)
- Mira Petrovic, CSIC – Spain

Session 2-b. PANEL DISCUSSION
(Moderator: R. Berber)

“Routes from lab to field in waste water treatment area:
What should be done in Mediterranean Partner Countries”
Participants :

- [Prof. Fikret Kargı](#) - 9 Eylul Un.- Turkey
- Prof. Thomas Knepper - EFF – Germany
- Prof. Sixto Malato - PSA - Spain
- Prof. Mohamed Tawfic - SCU - Egypt
- Dr. Coşkun Yurteri -DOKAY Natural Res. Manag. Engng. & Cons.Co. Ltd. - Turkey

October 10th, Wednesday

Session 3-a. INNOVATIVE TECHNIQUES
(Chair: O. Zimmo)

8:30 [Waste water treatment by advanced oxidation processes](#)
(solar photocatalysis in degradation of industrial contaminants)
- Sixto Malato, PSA - Spain

10:15 [Solar disinfection of drinking water](#)

- *Pilar Fernández, PSA - Spain*

Session 3-b. CASE STUDIES

(Chair: S. Malato)

13:30 Gravel Bed Hydroponic System in non - crop agriculture

- *Mohamed Tawfic, SCU - Egypt*

14:00 [Constructed wetland applications in Mediterranean countries and further recommendations](#)

- *E. Asuman Korkusuz - Turkey*

14:30 [Al-Bireh wastewater treatment and reuse](#)

- *Omar Zimmo, BZU - Palestine*

15:20 Applications of LCA to wastewater treatment processes

- *Mohamed Tawfic, SCU - Egypt*

15:50 Small community scale rural wastewater treatment by aquatic plants

- *Rym Ben Ammar Guizani, CITET - Tunisia*

October 11th, Thursday

Session 4-a. BIOLOGICAL & HEALTH ISSUES

(Chair: S. Malato)

8:30 [Ecotoxicity in waste waters and natural waters](#)

- *Marinella Farre, CSIC - Spain*

[-Additional Paper 1](#)

9:30 [Risk management: Source control and emission reduction](#) (waste water treatment, drinking water treatment)

- *Maria Fürhacker, BOKU - Austria*

[-Additional Paper 1](#)

[-Additional Paper 2](#)