

### Summer school

# From nature to bedside: How to discover novel bioactive compounds in algae and develop functional food and pharmaceuticals

An interdisciplinary summer school on harnessing the potential of algae for functional foods and pharmaceuticals.

#### When:

15th - 26th July 2024

#### Where:

CCMAR, University of Algarve, Faro, Portugal

#### For whom:

PhD students and early post-docs





## **Summer School Agenda**

#### Week 1

Time	Monday	Tuesday	Wednesday	Thursday	Friday		
09:30	Welcome and introduction	Macroalgae harvesting	Bioactivities of microalgae and seaweeds (Part 1)	Extraction and novel sustainable approaches	Biodiversity to treat chronic inflammation		
- 11:00	Dr. Dorit Avni, MIGAL Galilee Research Institute	Dr. Benoit Qieguineur, Algaia	Prof. Daria Monti, University of Naples	Bernando Carvalho, GreenCoLab	Dr. Federica Ungaro, San Raffaele Hospital		
11:00 - 11:15	Break						
11:15	Microalgae background and culture collection	Macroalgae farming	Bioactivities of microalgae and seaweeds (Part 2)	Isolation of bioactive compounds	Pain relieve development		
- 12:45	Prof. Antonino Pollio, University of Naples & João Navalho, Necton	Yossi Karta, Seakura	Prof. Daria Monti, University of Naples	Dr. Pavel Hrouzek, Centre Algatech	Dr. Diego Hartmann, Sea4US & Dr. Eduardo Moura, Sea4US		
12:45 - 14:15	Lunch						
14:15 - 15:45	Microalgae cultivation and challenges Dr. Mariana Carneiro, Necton	Workshop: Microalgae cultivation and	Workshop: Extraction techniques and	Workshop: Compound separation using	Visits to Botarium and GreenCoLab		
15:45 - 16:00	Break	identification, and methodology	antioxidant assays	different methods	0.00.00205		
16:00	Strain improvement	Assoc. Prof. João Varela, CCMAR	Prof. Luísa Barreira, CCMAR, University of Algarve	Prof. Luísa Barreira, CCMAR, University of Algarve			
- 17:30	Dr. Bettina Ughy, Biological Research Centre Szeged						
17:30 - 18:00	Break & Summary						



### **Summer School Agenda**

#### Weekend

Saturday	Sunday
<b>Social activity:</b> Boat trip to Algarve coast visiting caves and seeing dolphins and whales.	Free time



### **Summer School Agenda**

#### Week 2

Time	Monday	Tuesday	Wednesday	Thursday	Friday		
09:30 - 11:00	<b>Life cycle and market analysis</b> Dr. Lais Speranza, GreenCoLab	<b>Microbiome</b> Prof. Kiron Viswanath,  Nord University	Regulation of functional food ingredients Dr. Maria Hayes, Teagasc & Dr. Benoit Qieguineur, Algaia	Career development under the Algae4IBD umbrella	Project presentation		
11:00 - 11:15	Break						
11:15 - 12:45	Project development Dr. Dorit Avni, MIGAL Galilee Research Institute	Digestability and bio-accessibility  Dr. Maria Hayes, Teagasc	Formulation and techno- functionality for functional food ingredients Dr. Maria Hayes, Teagasc & Dr. Benoit Qieguineur, Algaia	Project preparation	Project presentation		
12:45 - 14:15	Lunch						
14:15 - 17:30	Visit to Necton	Digestion and bioactivity assessment Dr. Maria Hayes, Teagasc	Workshop: Microalgae cooking class Dr. Maria Hayes, Teagasc & Dr. Benoit Qieguineur, Algaia	Project preparation			
17:30 - 18:00	Break & Summary						