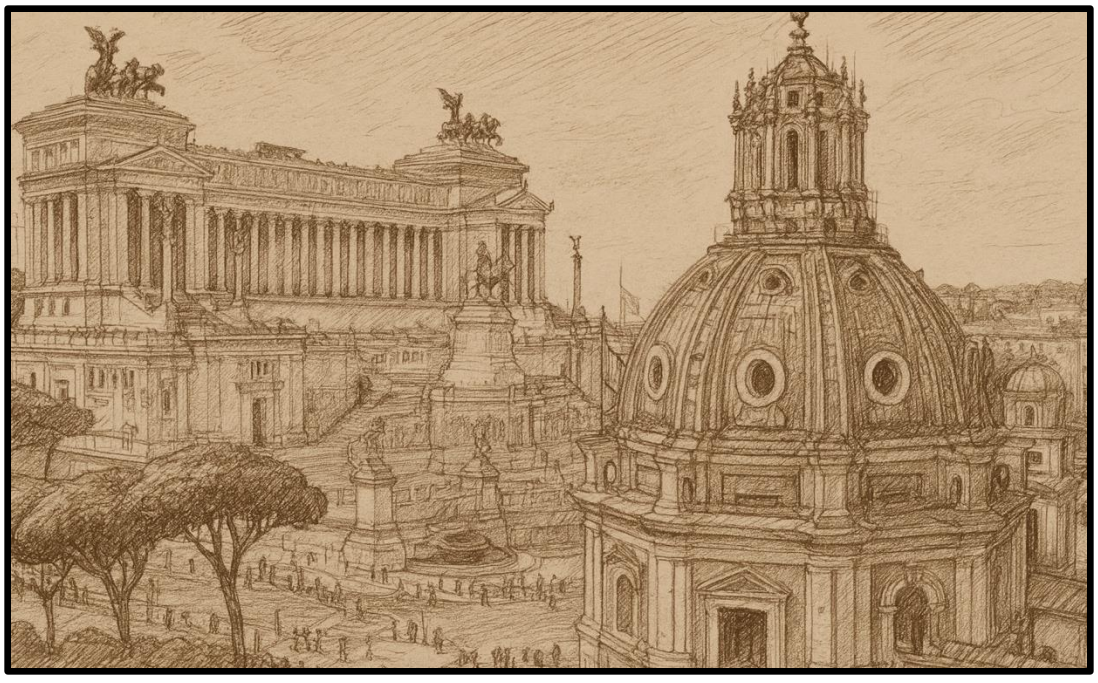
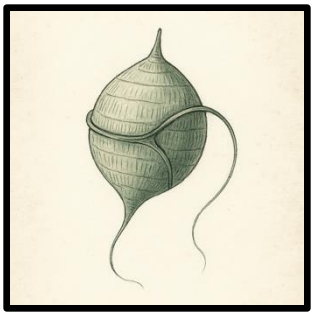
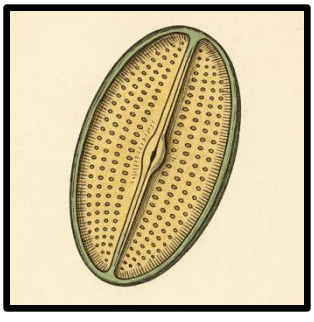
TOR VERGATA
UNIVERSITÀ DEGLI STUDI DI ROMA







GRUPPO ALGOLOGIA
Società Botanica Italiana

Riunione Scientifica Annuale
14-15 Novembre 2025

Aula Magna P. Gismondi, Macroarea di Scienze
Via Della Ricerca Scientifica 1, 00133, Roma

PROGRAMMA

VENERDI' 14 NOVEMBRE 2025

9:00-9:30: REGISTRAZIONE

9:30-10:00: SALUTI E APERTURA DEI LAVORI

10:00-10:30: RELAZIONE AD INVITO- A. Marzocchella (Università degli Studi di Napoli Federico II, Associazione Italiana per lo Studio e le Applicazioni delle Microalghe**)**

SESSIONE 1: Unveiling Diversity (Biodiversity, Taxonomy, and Ecological Succession)
Moderatori: G. Alongi, *C. Totti*

10:30-10:45 • A new species of *Halymenia* (Halymeniaceae, Rhodophyta) from Atimo Vatae Expedition in southern Madagascar. (**V. Avola**, M. Morabito, L. Le Gall, A. Manghisi)

10:45-11:00 • Unraveling diatom diversity through metabarcoding in the Gulf of Naples: seasonal, spatial and toxicological perspectives. (**E. Martone**, M. I. Ferrante, L. Campese)

11:00-11:15 • The MoVaFisu project in the Marine Protected Area "Isola di Ustica": first results on the vertical distribution of *Cystoseira s.l.* communities. (**A.M. Mannino**, G. Aversa, G. Marletta, A. Lombardo, M. Toccaceli, M.C. Alessi, A. Bono, D. Serio)

11:15-11:45 **COFFEE BREAK e SESSIONE POSTER**

11:45-12:00 • Italian macroalgal herbaria in the 21st century: new roles in modern phycological research. (**F. Rindi**, A.M. Mannino, S. Armeli Minicante)

12:00-12:15 • Microalgal communities in mucilage aggregates in the northern Adriatic Sea (summer 2024) based on microscopy and metabarcoding. (M. Ubaldi, **F. Neri**, G. Montali, T. Romagnoli, A. Tomasini, F. Cerino, T. Turk Dermastia, J. Francé, P. Mozetič, S. Accoroni, C. Totti)

SESSIONE 2: Surviving and Thriving (Environmental Drivers, Stress Responses, and Adaptation)
Moderatori: A. Zingone, L. Pezzolesi

12:15-12:30 • Environmental triggers of spore formation in *Chaetoceros* spp.: the role of nutrient limitation and cell density. (**T. Greca**, M. L. Madeo, M. Ferrari, W.H.C.F. Kooistra, G. Romano, R. Cozza, T. Romeo, M. Montresor)

12:30-12:45 • Influence of nitrate and light on fucoxanthin content and key gene expression in the marine diatom *Thalassiosira rotula*. (**M.L. Madeo**, I. Orefice, M. Ferrari, T. Greca, L. Bruno, G. Romano, R. Cozza)

12:45-13:00 • Effects of rising temperatures on the decreasing of native Phaeophyceae and increasing of alien Rhodophyceae in the Venice Lagoon in the last two decades. (**A. Sfriso**, M.A. Wolf, K. Sciuto, A.A. Sfriso)

13:00-13:15 • Hydrographic influence on phytoplankton community diversity and activity in the Tyrrhenian Sea. (**C. Caroppo**, G. Caruso, A. Bergamasco, F. Decembrini)

13:15-13:30 • Contaminants impact on diatom resting phases: the case study of pharmaceutical products on *Phaeodactylum tricornutum*. (**E. Le Floc'h**, M. Montresor, M.I. Ferrante, G. Cheloni)

13:30-14:30 **LUNCH BREAK**

SESSIONE 3: Innovating the Micro-scape (Microalgae Monitoring and Innovative Technologies)
Moderatori: I. Moro, R. Pistocchi

14:30-14:45 • Phytoplankton imaging in the Italian LTER marine network. (**M. Bastianini**, D. Sarno, L. Roselli, C. Totti, P. Povero, F. Bernardi Aubry, S. Finotto, A. Di Cicco, E. Organelli, S. Denni, S. Accoroni, F. Neri, E. Scalco, M.S. Mente, E. Luzi, L Magnone, F. Massa, E. Houliez)

14:45-15:00 • Imaging FlowCytobot in the Mediterranean Sea: automated plankton observation, applications and challenges. (E. Houliez, M.S. Mente, E. Scalco, D. Sarno, A. Passarelli, S. Canese, T. Romeo, **L. Roselli**)

15:00-15:15 • Not all troubles come from toxins: a new list of non-toxigenic harmful microalgae. (**A. Zingone** and L. Escalera)

15:15-15:30 • Potentially harmful marine benthic thecate dinoflagellates in Sardinia Island: first data and possible implications. (C.T. Satta, A. Reñé, M. Hoppenrath, M. Campàs, J. Diogène, E. Garcés, J. Culurgioni, G. Costa, F. Mura, A. Lugliè, N. Fois)

15:30-15:45 • Interannual trend of *Ostreopsis* cf. *ovata* along the Mediterranean coast based on 14 years of data. (**G. Montali**, F. Neri, M. Ubaldi, P. Borrello, E. Spada, T. Romagnoli, C. Totti, R. Lemée, M. Vila, J. Davenet, E. Berdalet, L. Mangialajo, M.Y. Bottein, M. Chiantore, V. Asnaghi, S. Accoroni)

15:45-16:15 **COFFEE BREAK e SESSIONE POSTER**

SESSIONE 4: Algae for Tomorrow…or Today? (Algal Biotechnology and Applied Innovations)
Moderatori: S. Savio, E. Bellini

16:15-16:30 • Study and applications of a microalgal consortium: results and perspectives. (**L. Mollo** and A. Norici)

16:30-16:45 • *Rugulopteryx okamurae*: turning a challenge into an opportunity. (**R. Trentin**, W. Macquigneau, T. Braga, E. Moschin, I. Moro, M.J. Rodrigues, L. Custódio)

16:45-17:00 • Tailoring cyanobacterial cell factories: *Synechocystis* sp. PCC 6803 and *Synechococcus* sp. PCC 7002 for photocatalytic hydrogen production. (**M. Ferrari**, M. Marieschi, D. Ceresini, G. Molinari, A. Bolchi, G. Spagnoli, C. Cotti, A. Torelli)

17:00-17:15 • Effects of non-thermal plasma on harmful cyanobacteria and their metabolites for the sustainable treatment of water resources. (**M. Simonazzi**, C. D'Alterio, M. Colangelo, F. Guerrini, V. Miele, M. Saleem, G. Tomei, M. Varotto, L. Tartaglione, E. Marotta, R. Pistocchi)

17:15-17:30 • Influence of microalgal feeding on the qualitative performance of the oyster *Crassostrea gigas*. (**M. Franchini**, G. Bonazza, L. Aguiari, L. Pezzolesi)

17:30-17:45 *Cylindrotheca closterium* extract protects crops from *Botrytis cinerea via* modulation of leaf surface hydrophobicity (**S. Savio**, E. Bellini, R. Lorrai, A. Guzzon, S. De, F. Sciubba, I. Bavasso, S. Serranti, R. Congestri, S. Ferrari)

17:45-18:00 Amenità ficologiche… e non solo! (**G. Furnari**)

18:00-19:00 Assemblea dei Soci

21:00 Cena Sociale

SABATO 15 NOVEMBRE 2025

SESSIONE 5: Guardians of Aquatic Habitats (Conservation and Habitat Restoration)
Moderatori: D. Serio, F. Rindi

10:00-10:15 • Exploring the potential of *Galdieria daedala* for the bioremediation of pharmaceutical pollutants. (**S. Avilia**, E. Pozzuoli, M. Iovinella, C. Auciello, S. C. Di Prisco, C. Ciniglia and S. Papa)

10:15-10:30 • Assessing temporal and spatial variation in communities associated with *Gongolaria barbata* forests in the Conero Riviera (Ancona) using molecular approaches. (**G. Bellanti**, S. Varrella, M. Parioli, F. Rindi)

10:30-10:45 • Aquatic macrophytes in the oriented natural reserve "Laghetti di Marinello", Northern Sicily (Italy). (**I. Nusco**, M. Soppelsa, F. Mondello, A. Manghisi, S. Giacobbe, M. Morabito)

10:45-11:00 • A comparison between epibionts from fake and true seagrasses (**A.A. Sfriso**, K. Sciuto, A. Sfriso, G. Forlani)

11:00-11:15 • Insights into a patchy meadow of the little Neptune grass *Cymodocea nodosa* and its epiphytic macroalgal community in the Central Adriatic Sea. (**M. Parioli**, G. Bellanti, F. Neri, S. Accoroni, A. Annibaldi, F. Rindi, P. Cingano, A. Di Bonaventura)

11:15-11:30 • Enhancing *ex situ* cultivation of Mediterranean Fucales in an ecological restoration perspective: species-specific responses of *Gongolaria barbata* and *Ericaria crinita* seedlings to algal extracts. (**A. Falace**, A. Lokovšek, M. Orlando-Bonaca, E. Gljušćić, A. Bilajac, L. Iveša, A. Di Cave, S. Savio, F. Ortenzi, D. Trkov, R. Congestri)

11:30-12:00 COFFEE BREAK e SESSIONE POSTER

SESSIONE 6: Turbulence and Transformation (Biological Invasions, Ecological Impacts, and System Responses)
Moderatori: R. Congestri, S. Accoroni

12:00-12:15 • First assessment of the diversity and dynamics of coral diatoms in Saudi Arabian Gulf. (**C. Auciello**, C. Pennesi, C. Ciniglia, M. Iovinella, E. Pozzuoli, S. Papa, S. Avilia, S. Arossa, L. Rabaoui, M. De Stefano)

12:15-12:30 • Plant-based strategies for controlling biofilms in the Colosseum. (**R. Ranaldi**, L. Rugnini, F. Gabriele, G. Pepe, G. Migliore, F. Tasso, P. Di Martino, N. Spreti, F. Scuderi, R. Braglia, A. Pujia, A. Canini)

12:30-12:45 • Unusual proliferation event of *Dudresnaya verticillata* (Withering) Le Jolis along the Salento coast. (**S.Ö. Tarantini** and A. Toso)

12:45-13:00 • Effects of acidification on algal colonization and ecological succession on different carbonate substrates in the vent systems of the Castello Aragonese (Ischia Island, Italy). (**E. Marchettoni**, L. Germinario, E. Moschin, C. Mazzoli, I. Moro)

13:00-13:30 SALUTI E CHIUSURA DEI LAVORI

SESSIONE POSTER

- Effects of rising temperatures on the decreasing of native Phaeophyceae and increasing of alien Rhodophyceae in the Venice Lagoon in the last two decades. **(A. Sfriso, M.A. Wolf, K. Sciuto, A.A. Sfriso)**
- From bulk analysis to single-cell resolution: advantages of CyTOF over conventional ICP-MS. **(E. Pozzuoli, G. Barra, M. Iovinella, A. Fontana, G. d'Ippolito and C. Ciniglia)**
- Establishment of a circular supply chain through the cultivation of algae using potential by-products from the agri-food industry. **(I. Zuchegna, A. Norici)**
- The MISSION project: Microfluidic Sensors for rapid detection of cyanotoxins. (**M. Sodini, M. Odorisio**, **S. Savio, , F. Pizzoli, L. Lvova, R. Congestri**)
- Implication of nitrogen and sulfur limitation on the growth, metabolic activity, and dimethylsulfoniopropionate (DMSP) production in the dinoflagellates *Ostreopsis* cf. *ovata* and *Prorocentrum cordatum* (**L. Montalbetti, A. Facchin, C. Torri, S. Vanucci, L. Pezzolesi**)
- Real-time qPCR monitoring of *Alexandrium* spp. and paralytic shellfish toxin genes (*sxtA1*, *sxtA4*) in Sardinian mussel farms **(G. Zoffoli, F. Cucchi, N. Caputo, L. Mirimin, R. Pistocchi, M. Cangini, S. Dall'Ara, L. Pezzolesi)**
- Sulfur metabolism and chromium tolerance in the unicellular green alga *Scenedesmus acutus*: role of Serine Acetyl Transferase (SAT) (**G. Molinari, M. Marieschi, M. Ferrari, L. Prati, A. Torelli**)
- Large-scale integrative surveys of *Cystoseira* s.l. marine forests along the Cilento coast (Campania, Italy): implications for conservation and restoration (**I. Pagana, S. D'ambros Burchio, L. Appolloni, S. Lorenzini, S. Ciriaco, M. Paganin, Z. Dalla Nora, A. Falace**)
- When species biology sets the limits: challenges in restoring *Cystoseira crinitophylla* (**M. Paganin, S. D'Ambros Burchio, F. Rendina, I. Cerciello, I. Pagana, FZ. Dalla Nora, A. Falace**)
- Broad-Spectrum Essential Oil Blends as a Sustainable Strategy Against Phototrophic Biodeterioration of Stone Cultural Heritage (**L. Rugnini, R. Ranaldi, G. Migliore, A. Canini**)
- Transplants of aquatic angiosperms and monitoring of macroalgal communities at Goro, Barbamarco, Caleri in the Po Delta and at Fattibello in Comacchio Valleys, Italy. (**Sfriso, A. Buosi, G. Silan, Y. Tomio, M-A. Wolf, K. Sciuto, M. Mistri, C. Munari, A.A. Sfriso**)
- Effects of rising temperatures on the decreasing of native Phaeophyceae and increasing of alien Rhodophyceae in the Venice Lagoon in the last two decades (**A. Sfriso, M.-A. Wolf, K. Sciuto, A.A. Sfriso**)
- *Rugulopteryx okamurae* in the Strait of Messina (Italy) (**M. Soppelsa, I. Nusco, V. Avola, F. Mondello, A. Manghisi, S. Giacobbe, M. Morabito**)
- First results about the effects of salinity on two Japanese microalgae, *Tetraselmis* sp. NKG400013 and *Fistulifera solaris* JPCC DA0580, and the cyanobacterium S*ynechocystis* sp. PCC 6803 (**A. Tassetto, T. Tanaka, T. Yamanaka, C. Munari, M. Mistri, K. Sciuto**)
- A preliminary survey of species of *Cladophoraceae* (*Chlorophyta*) in two Nature Oriented Reserves in norther Sicily (Italy). (**M. Vita, M. Soppelsa, F. Mondello, A. Manghisi, S. Giacobbe, M. Morabito**)

- Antiviral activity of *Cylindrotheca closterium* and *Staurosirella pinnata* extracts. (**M. Odorisio, S. Savio, M. Sodini, A. Riccio. S. La Frazia, R. Congestri**)
- The Sono-photobioreactor modulates exopolysaccharide and phycobiliprotein yields in the cyanobacterium *Trichormus variabilis* VRUC 168 (**F. Ortenzi, F. Montereali, S. Savio, S. Cardinale, A. Di Cave, B. Morozzo della Rocca, R. Congestri)**

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ALGARES
LE ALGHE E LE BIOTECNOLOGIE

AISAM
ASSOCIAZIONE ITALIANA PER LO STUDIO E LE APPLICAZIONI DELLE MICROALGHE