

**PERSONAL
INFORMATION****Monica Scognamiglio**

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Scopus ID: 25930158200

WOS ID: U-1116-2017

WORK EXPERIENCE

- 10/12/2022–Present **Associate Professor of Organic Chemistry (SSD CHIM/06)**
Dipartimento di Scienze e Tecnologie Ambientali Biologiche e Farmaceutiche (DiSTABiF),
University of Campania "Luigi Vanvitelli", Caserta (Italy)
- 10/12/2019–9/12/2022 **RTDB (SSD CHIM/06)**
DiSTABiF, University of Campania "Luigi Vanvitelli", Caserta (Italy)
- 01/03/2018–30/11/2019 **Post-doctoral researcher**
Biochemistry Department, Max Planck Institute for Chemical Ecology, Jena (Germany)
Project: Stable isotope labelling of spruce diterpenes
- 01/09/2015–
31/12/2017 **Post-doctoral researcher (Alexander von Humboldt fellow).**
NMR/Biosynthesis Group, Max Planck Institute for Chemical Ecology, Jena (Germany)
Project: Metabolomic Studies of Allelopathic interactions.
- 01/04/2014–
30/04/2015 **Research assistant (Assegnista di ricerca)**
DiSTABiF, Second University of Naples, Caserta (Italy)
Project: Characterization of nutraceuticals by NMR based metabolomics
- 01/11/2012–31/08/2013 **Post-doctoral Researcher ("L'Oréal for Women in Science"-UNESCO scholarship)**
Department of Life Sciences, Second University of Naples, Caserta (Italy)
Project: "Metabolomics approach to the isolation of antioxidant compounds from plants"
- 01/04/2012–
31/10/2012 **Post-doctoral Researcher**
Department of Life Sciences, Second University of Naples, Caserta (Italy)
Project: "Bioaccumulation and biotransformation of drugs by plants"

EDUCATION

- 01/11/2008–16/12/2011 **PhD in Resources and Environment**
Second University of Naples, Caserta (Italy)
Thesis "Phytochemical analysis of Mediterranean plants: metabolomic approach to study allelopathic interactions among coexisting species" (tutor: Prof. Pietro Monaco).
- 09/2009–04/2010 **Internship (visiting PhD student)**
Division of Pharmacognosy, Section Metabolomics, Institute Biology, Leiden University
(Netherlands).
- 2008 **Master's degree in biology** 110/110 cum
laude
Faculty of Science of the Second University of Naples, Caserta (Italy)
Thesis in Organic Chemistry: "Metabolomic approach in the identification of bioactive compounds
in apple cultivars".

PERSONAL SKILLS

Mother tongue(s) Italian

Foreign language(s)	UNDERSTANDING		SPEAKING		WRITING
	Listening	Reading	Spoken interaction	Spoken production	
English	C2	C2	C1	C2	C2
German	B1	B1	B1	B1	B1
French	A1	A2	A1	A1	A1

Levels: A1 and A2: Basic user - B1 and B2: Independent user - C1 and C2: Proficient user
[Common European Framework of Reference for Languages - Self-assessment grid](#)

Communication and organisational skills Good communication, organisational, leadership and management skills

Job-related skills

- Metabolomics
- Nuclear Magnetic Resonance spectroscopy for structural elucidation of natural products
- Further spectroscopic techniques (MS, IR, UV-vis)
- All the major chromatographic techniques
- Software and platforms for NMR and MS processing and data analysis
- Stable isotope labelling.
- Bioassays for allelopathy studies; hydroponic plant cultures.

ADDITIONAL INFORMATION

Previously Funded Projects

- **SynCheD**: PI of the project funded by the University of Campania "Luigi Vanvitelli" (Bando di Ateneo per il finanziamento di progetti di ricerca fondamentale ed applicata dedicato ai giovani Ricercatori; fund: € 34.000).

Project: Synergistic allelochemicals from *Daphne gnidium*
Duration: 8 months

- **Phytocrop**: PI of the project funded in the V:ALERE 2020 framework (bando per progetti di ricerca applicata e a carattere industriale per RTD di tipo A e B; fund: € 22.500).

Project: Phytochemicals for Crop Protection (PhytoCrop).
Duration: 6 months

- **Alexander von Humboldt fellowship**: post-doctoral fellowship granted by the Alexander von Humboldt upon peer review of the submitted proposal

Project: Metabolomic Studies of Allelopathic interactions
Duration: 24 months

Host Institution: Max Planck Institute for Chemical Ecology, Jena (DE)

- **"L'Oréal Italia per le Donne e la Scienza"**: post-doctoral scholarship granted by a committee upon evaluation of the submitted project

Project: "Metabolomics approach to the isolation of antioxidant compounds from plants
Duration: 10 months

Host Institution: Second University of Naples

- Participation as unit component to several research projects

Publications

Total publications (see attached list): 65*

Corresponding author in 11 papers; **First author** in 22 papers; **Last author** in 4 papers

Total citations: 1299, **H-index**: 23

(Source: Scopus, 14/08/2023)

*68 according to the database, which also includes some of the book chapters

Co-author of 5 peer-reviewed **book chapters**: (see attached list)

Conferences Oral presentations: 14 (see attached list); Poster presentation: 8 (see attached list); Co-author of more than 20 further conference communications.

- Other presentations**
- NMR-based plant metabolomics: speeding up the discovery of bioactive specialized metabolites (invited talk), in the context of the Webinar Series "PhytochemTalks". Online event 21/10/2022
 - Metabolomics: an Invaluable and Versatile Tool in Phytochemistry (invited talk), in the context of the Webinar "Current Analytical Methods in Phytochemistry", organized by the Phytochemical Society of Europe. Online event 15/03/2022
 - Metabolomics as a powerful tool in life sciences. Symposium for the selection of a Max Planck Tandem group leader at Universidad del Valle (Cali). Bogotá (Colombia), 2017
 - Metabolomics Studies of Allelopathic Interactions. MPI für chemische Ökologie, Jena (DE). 2017 (invited talk)

Research Activity Research activity is mainly focused on plant natural products, with the aim of understanding their physiological/ecological role on one hand and finding bioactive molecules on the other hand. These aims are pursued by combining classical phytochemical studies with the cutting-edge metabolomics approach.

- Honours and awards**
- Prize "L'Oréal-UNESCO For Women in Science-Italy" (May 2012)
 - Award as the best student of the Second University of Naples (October 2009)
 - Award for the best master's degree thesis (December 2008)
 - Master's degree thesis award "Palasciano" (November 2008)

- Further training**
- Docimology and quality of teaching course, March-April 2022, University of Campania "Luigi Vanvitelli"
 - Workshop "Voice and Body Coaching: Communicating with Confidence and Accuracy" organized by Minerva-FemmeNet /Max Planck Society, 7-9 May 2019, Leipzig (DE).
 - Workshop "Strategic planning of research careers" organized by Minerva-FemmeNet /Max Planck Society 16-17 October 2018, Leipzig (DE)
 - EMBO Laboratory Management Course for postdocs, 1-3 August 2018, Heidelberg (DE).
 - EMBO Practical Course on Metabolomics Bioinformatics for Life Scientists, 25/02-1/03/ 2017, Cambridge UK (Selected for participation).
 - Metabolomic workshop, 12-16 April 2010, Netherlands Metabolomic Centre, Leiden University (NL).
 - Metabolomic workshop, 20-24 April 2009, Netherlands Metabolomic Centre, Leiden University (NL)
 - Nuclear Magnetic Resonance theoretical and practical course for the study of molecules in solution. 2-19 February 2009, CIMCF, Università degli Studi di Napoli Federico II
 - Scuola di fitochimica "P. Ceccherelli", 3-6 October 2007, "Mirto e Zafferano di Sardegna. Un esempio di valorizzazione delle risorse locali. Aspetti etnobotanici, fitochimici, analitici e di coltivazione". Tempio Pausania, Università di Sassari

- Teaching**
- from academic year 2020-2021 to present: **Organic Chemistry Course** (9 CFU) for the degree in Biological Sciences, DiSTABiF, University of Campania "Luigi Vanvitelli"
 - academic year 2019-2020: Organic Chemistry Course (2CFU) for the degree in Biological Sciences, DiSTABiF, University of Campania "Luigi Vanvitelli"
 - from academic year 2020-2021 to present: **Metabolomics course** (5 CFU) for the master's degree in biology, DiSTABiF, University of Campania "Luigi Vanvitelli"
 - from academic year 2020-2021 to present: Metabolomics seminar for the students of the PhD

program in Molecular Life Sciences, DiSTABiF, University of Campania “Luigi Vanvitelli”

- March 2016: NMR Course at the “International Max Planck Research School (IMPRS): The Exploration of Ecological Interactions with Molecular and Chemical Techniques at Friederich Schiller University, Jena”

- 2010-2014: tutoring activity in Organic Chemistry, Second University of Naples.

- Tutor of 3 master’s degree theses; Co-tutor of: 13 bachelor’s degree theses, 15 master’s degree theses, 1 PhD thesis.

- Supervisor of 2 PhD students

- Curator and co-author of the blog Chimica Organica-DiSTABiF (<https://chimicaorganicadistabif.com/>)

- Scientific Societies** Member at large of the Board of Directors of International Allelopathy Society (2016-present). Member of: International Allelopathy Society, Phytochemical Society of Europe, Società Chimica Italiana
- Editorial Activity** Topic and Guest Editor for *Molecules*
Associate editor for: *BMC Research Notes (Associate Editor)*, *Allelopathy Journal (Associate Editor)*
Peer-reviewer activity for several Journals
- Further activities** Peer reviewer for the evaluation of research projects by the Croatian Science Foundation, research cooperability program (1 project), Conicyt (Comisión Nacional de Investigación Científica y Tecnológica), Ministero dell’Educazione, Cile. Programa Fondecyt (2 projects), and National Science Center-Poland (1)
- Outreach activities** - Curator and author of the blog PhytoChem (<https://phyto-chem.com/>)
- Webinar (in Italian) “Piante e Chimica: un binomio insospettabile”, 15 February 2021
- University curriculum counsellor for high school students

La sottoscritta, consapevole che le dichiarazioni false comportano l’applicazione delle sanzioni penali previste dall’art. 76 del D.P.R. 445/2000, dichiara che le informazioni riportate nel presente curriculum vitae, corrispondono a verità. Inoltre la sottoscritta autorizza il trattamento dei dati personali ai sensi dell’art. 13 Dlgs 196 del 30 giugno 2003 e dell’art. 13 GDPR (Regolamento UE 2016/679).

Caserta, 14/08/2023

Monica Scognamiglio

LIST OF PEER-REVIEWED PUBLICATIONS

1. Grilli, E.; Vigliotti, R.C.; Fiorentino, A.; **Scognamiglio, M.**; Rossetti, L.; Nogueira, T.A.R.; Jani, A.D.; Abreu-Junior, C.H.; Ribeiro Roder, L.; Ganga, A.; et al. Constructed Technosols as a Soil Rebuilding Technique to Reclaim Abandoned Limestone Quarries in the Mediterranean Region: A Field Study. *Sustainability* 2023, 15, 5036. <https://doi.org/10.3390/su15065036>
2. N. Landi, **M. Scognamiglio**, P. Woodrow, L. F. Ciarmiello, S. Ragucci, A. Clemente, H.Z.F. Hussain, A. Fiorentino, A. Di Maro. Biochemical traits, ¹H NMR profile and residual DNA content of 'Asprinio', white wine from Campania region (Southern Italy), *Foods*, 2022, 11(15), 2322
3. O.F. Restaino, **M. Scognamiglio**, S. F. Mirpoor, M. Cammarota, R. Ventriglia, C. V. L. Giosafatto, A. Fiorentino, R. Porta, C. Schiraldi. Enhancement of *Streptomyces roseochromogenes* extracellular melanin production by *Posidonia oceanica* Neptune ball (egagropili) powder, *Applied Microbiology and Biotechnology*, 2022, 106(21), pp. 7265–7283
4. A. Cirillo, A. Magri, **M. Scognamiglio**, B. D'Abrosca, A. Fiorentino, M. Petriccione, C. Di Vaio, C. (2022). Evaluation of morphological, qualitative, and metabolomic traits during fruit ripening in pomegranate (*Punica granatum* L.). *Horticulturae*, 8(5), 384.
5. A. Esposito, P. F. De Luca, V. Graziani, B. D'abrosca, A. Fiorentino*, **M. Scognamiglio***, (2021). Phytochemical characterization of *Olea europaea* L. cultivars of Cilento National Park (South Italy) through NMR-based metabolomics. *Molecules*, 26(13) doi:10.3390/molecules26133845 (Invited paper).
6. S. Hafez Ghoran, H. Rahimi, A. Kazemi, **M. Scognamiglio**, M. Naderian, A. Iraj, F. Bordbar, (2021). *Allium hooshidaryae* (alliaceae); chemical compositions, biological and ethnomedicine uses. *Journal of Ethnopharmacology*, 274 doi:10.1016/j.jep.2021.113918.
7. V. Graziani, N. Potenza, B. D'Abrosca, T. Troiani, S. Napolitano, A. Fiorentino*, **M. Scognamiglio*** (2021). NMR profiling of *Ononis diffusa* identifies cytotoxic compounds against cetuximab-resistant colon cancer cell lines. *Molecules*, 26(11) doi:10.3390/molecules26113266.
8. S. Piccolella, **M. Scognamiglio**[§], B. D'abrosca, A. Esposito, A. Fiorentino, S. Pacifico (2021). Chemical fractionation joint to in-mixture NMR analysis for avoiding the hepatotoxicity of *Teucrium chamaedrys* L. subsp. *chamaedrys*. *Biomolecules*, 11(5) doi:10.3390/biom11050690 (Invited paper).
9. E. Grilli, R.C. Vigliotti, L. Rossetti, **M. Scognamiglio**, V. Fiumano, A. Fiorentino, N. Leone, T.A.R. Nogueira, C.H. Abreu-Junior, A.D. Jani, G.F. Capra, Ganga, A. (2021). Restoration of quarry areas in mediterranean regions through a low-cost soil rebuilding technique for profitable pedotechnosystems development. *Soil and Tillage Research*, 209 doi:10.1016/j.still.2021.104936.
10. M. Grassia, F. Sarghini, M. Bruno, L. Cinquanta, **M. Scognamiglio**, S. Pacifico, A. Geraci, R. Schicchi, O. Corona (2021). Chemical composition and microencapsulation suitability of sumac (*Rhus coriaria* L.) fruit extract. *European Food Research and Technology*, 247(5), 1133-1148. doi:10.1007/s00217-021-03694-1.
11. E. Grilli, E. Di Resta, **M. Scognamiglio**, S. Pacifico, A. Fiorentino, T. A. R. Nogueira R.C. Vigliotti, A. Ganga (2020). Soil phenolic compound variability in two mediterranean olive groves. *Plant, Soil and Environment*, 66(5), 207-215. doi:10.17221/165/2020-PSE.
12. G. Valentino, V. Graziani, B. D'Abrosca, S. Pacifico, A. Fiorentino*, **M. Scognamiglio*** (2020). NMR-based plant metabolomics in nutraceutical research: An overview. *Molecules*, 25(6) doi:10.3390/molecules25061444 (Invited paper).

13. O. Celaj, A. G. Durán, P. Cennamo, **M. Scognamiglio**, A. Fiorentino, A. Esposito, B. D'Abrosca, (2021). Phloroglucinols from Myrtaceae: Attractive targets for structural characterization, biological properties and synthetic procedures. *Phytochemistry Reviews*, 20(1), 259-299. doi:10.1007/s11101-020-09697-2.
14. F. Guzzo, **M. Scognamiglio**[§], A. Fiorentino, E. Buommino, B. D'Abrosca (2020). Plant derived natural products against *Pseudomonas aeruginosa* and *Staphylococcus aureus*: Antibiofilm activity and molecular mechanisms. *Molecules*, 25(21) doi:10.3390/molecules25215024.
15. **M. Scognamiglio**^{*}, B. Schneider. (2020). Identification of potential allelochemicals from donor plants and their synergistic effects on the metabolome of *Aegilops geniculata*. *Frontiers in Plant Science*, 11 doi:10.3389/fpls.2020.01046.
16. M. Formato, G. Crescente, **M. Scognamiglio**, A. Fiorentino, M.T. Pecoraro, S. Piccolella, S., M. Catauro, S. Pacifico (2020). (-)-Cannabidiolic acid, a still overlooked bioactive compound: An introductory review and preliminary research. *Molecules*, 25(11) doi:10.3390/molecules25112638.
17. **M. Scognamiglio**, V. Graziani, N. Tsafantakis, A. Esposito, A. Fiorentino, B. D'Abrosca. (2019). NMR-based metabolomics and bioassays to study phytotoxic extracts and putative phytotoxins from Mediterranean plant species. *Phytochemical Analysis*. <https://doi.org/10.1002/pca.2842>.
18. V. Graziani, A. Esposito, **M. Scognamiglio**^{*}, A. Chambery, A. Russo, F. Ciardiello, T. Troiani, N. Potenza, A. Fiorentino^{*}, B. D'Abrosca (2019). Spectroscopic Characterization and Cytotoxicity Assessment towards Human Colon Cancer Cell Lines of Acylated Cycloartane Glycosides from *Astragalus boeticus* L. *Molecules*, 24(9), 1725.
19. V. Graziani, **M. Scognamiglio**[§], A. Esposito, A. Fiorentino, B. D'Abrosca (2019). Chemical diversity and biological activities of the saponins isolated from Astragalus genus: focus on Astragaloside IV. *Phytochemistry Reviews*, <https://doi.org/10.1007/s11101-019-09626-y>.
20. C. Russo, V. Graziani, M. Lavorgna, B. D'Abrosca, C. Piscitelli, A. Fiorentino, **M. Scognamiglio**^{*}, M. Isidori^{*} (2019). Lymphocytes exposed to vegetables grown in waters contaminated by anticancer drugs: metabolome alterations and genotoxic risks for human health. *Mutation Research/Genetic Toxicology and Environmental Mutagenesis* 842, 125-131.
21. V. Graziani, **M. Scognamiglio**[§], V. Belli, A. Esposito, B. D'Abrosca, A. Chambery, R. Russo, M. Panella, A. Russo, F. Ciardiello, T. Troiani, N. Potenza, A. Fiorentino (2018). Metabolomic approach for the rapid identification of natural products with cytotoxic activity against human colorectal cancer cells. *Scientific reports*, 8, doi:10.1038/s41598-018-23704-9.
22. C. Sanna, **M. Scognamiglio**[§], A. Fiorentino, A. Corona, V. Graziani, A. Caredda, P. Cortis, M. Montisci, E. R. Ceresola, F. Canducci, F. Poli, E. Tramontano, F. Esposito (2018). Prenylated phloroglucinols from *Hypericum scruglii*, an endemic species of Sardinia (Italy), as new dual HIV-1 inhibitors effective on HIV-1 replication. *PLoS ONE* 13(3): e0195168. <https://doi.org/10.1371/journal.pone.0195168>.
23. G. Crescente, S. Piccolella, A. Esposito, **M. Scognamiglio**, A. Fiorentino, S. Pacifico (2018). Chemical composition and nutraceutical properties of hempseed: an ancient food with actual functional value. *Phytochemistry Reviews*, 17(4), 733-749.
24. B. D'Abrosca, **M. Scognamiglio**, L. Corrado, I. Chiochio, L. Zampella, F. Mastrobuoni, P. Rega, M. Scortichini, A. Fiorentino, M. Petriccione (2017). Evaluation of different training systems on Annurca apple fruits revealed by agronomical, qualitative and NMR-based metabolomic approaches. *Food Chemistry*, 222, 18-27.
25. F. Araniti, **M. Scognamiglio**, A. Chambery, R. Russo, A. Esposito, B. D'Abrosca, A. Fiorentino, A. Lupini, F. Sunseri, M.R. Abenavoli (2017). Highlighting the effects of coumarin on adult plants of *Arabidopsis thaliana* (L.) Heynh. by an integrated-omic approach. *Journal of Plant Physiology*, 213, 30-41.
26. B. D'Abrosca, M. Lavorgna, **M. Scognamiglio**, C. Russo, V. Graziani, C. Piscitelli, A. Fiorentino, M. Isidori (2017). 2D-NMR investigation and in vitro evaluation of antioxidant, antigenotoxic and estrogenic/antiestrogenic activities of strawberry grape. *Food and Chemical Toxicology*, 105, 52-60.
27. M. Mandrone, **M. Scognamiglio**, A. Fiorentino, C. Sanna, L. Comioli, F. Antognoni, F. Poli. (2017). Phytochemical profile and α -glucosidase inhibitory activity of Sardinian *Hypericum scruglii* and *Hypericum hircinum*. *Fitoterapia*. 120, 184-193.

28. E. Buommino, B. D'Abrosca, G. Donnarumma, A. Parisi, **M. Scognamiglio**, A. Fiorentino, A. De Luca (2017). Evaluation of the antioxidant properties of carexanes in AGS cells transfected with the *Helicobacter pylori*'s protein HspB. *Microbial Pathogenesis*, 108, 71-77.
29. **M. Scognamiglio***, E. Buommino, L. Coretti, V. Graziani, R. Russo, P. Caputo, G. Donnarumma, B. D'Abrosca, A. Fiorentino (2016). Phytochemical investigation and antimicrobial assessment of *Bellis sylvestris* leaves. *Phytochemistry Letters*, 17, 6-13.
30. A. Bougandoura, B. D'Abrosca, S. Ameddah, **M. Scognamiglio**, R. Mekkiou, A. Fiorentino, S. Benayache, F. Benayache (2016). Chemical constituents and in vitro anti-inflammatory activity of *Cistanche violacea* Desf.(Orobanchaceae) extract. *Fitoterapia*, 109, 248-253.
31. B. D'Abrosca, E. Buommino, P. Caputo, **M. Scognamiglio**, A. Chambery, G. Donnarumma, A. Fiorentino (2016). Phytochemical study of *Helichrysum italicum* (Roth) G. Don: Spectroscopic elucidation of unusual amino-phlorogucinols and antimicrobial assessment of secondary metabolites from medium-polar extract. *Phytochemistry*, 132, 86-94.
32. **M. Scognamiglio***, B. D'Abrosca, A. Esposito, A. Fiorentino (2015). Chemical Composition and Seasonality of Aromatic Mediterranean Plant Species by NMR-Based Metabolomics. *Journal of analytical methods in chemistry*, 2015.
33. **M. Scognamiglio**, B. D'Abrosca, A. Esposito, A. Fiorentino (2015). Metabolomics: an unexplored tool for allelopathy studies. *Journal of Allelochemical Interactions*, 1, 9-23.
34. N. Brahmi, **M. Scognamiglio**[§], S. Pacifico, A. Mekhoukhe, K. Madani, A. Fiorentino, P. Monaco (2015). ¹H NMR based metabolic profiling of eleven Algerian aromatic plants and evaluation of their antioxidant and cytotoxic properties. *Food Research International*, 76, 334-341.
35. **M. Scognamiglio**, B. D'Abrosca, V. Severino, A. Chambery, P. Monaco, A. Fiorentino (2014) Two new acylated drimane-type sesquiterpene glucosides from *Petrorhagia saxifraga*. *Phytochem. Lett.* 7, 46–51.
36. **M. Scognamiglio**, B. D'Abrosca, V. Fiumano, M. Golino, A. Esposito, A. Fiorentino (2014) Seasonal phytochemical changes in *Phillyrea angustifolia* L.: metabolomic analysis and phytotoxicity assessment. *Phytochemistry Lett.*, 8, 163-170.
37. R. Nicoletti, A. Fiorentino, **M. Scognamiglio**, (2014). Endophytism of *Penicillium* species in woody plants. *Open Mycology Journal*, 8, 1-26.
38. V. Severino, A. Farina, F. Fleischmann, R.J. Dalio, A. Di Maro, **M. Scognamiglio**, A. Fiorentino, A. Parente, W. Osswald, A. Chambery (2014). Molecular profiling of the *Phytophthora plurivora* secretome: a step towards understanding the cross-talk between plant pathogenic oomycetes and their hosts. *PLoS One*, 9(11), e112317.
39. **M. Scognamiglio***, V. Fiumano, B. D'Abrosca, A. Esposito, Y.H. Choi, R. Verpoorte, A. Fiorentino, (2014). Chemical interactions between plants in Mediterranean vegetation: the influence of selected plant extracts on *Aegilops geniculata* metabolome. *Phytochemistry*, 106, 69-85.
40. R. Nicoletti, **M. Scognamiglio**, A. Fiorentino (2014). Structural and bioactive properties of 3-O-methylfunicone. *Mini reviews in medicinal chemistry*, 14(13), 1043-1047.
41. **M. Scognamiglio**, R. Nicoletti, S. Pacifico, B. D'Abrosca, A. Fiorentino (2014). Spectroscopic Characterization of a Pyridine Alkaloid from an Endophytic Strain of the *Fusarium incarnatum-equiseti* Species Complex. *Current Bioactive Compounds* 10 (3), 196-200.
42. E. Buommino, **M. Scognamiglio**, G. Donnarumma, A. Fiorentino, B. D'Abrosca (2014) Recent advances in natural product-based anti-biofilm approaches to control infections. *Mini reviews in medicinal chemistry* 14 (14), 1169-1182.
43. B. D'Abrosca, S. Pacifico, **M. Scognamiglio**, G. D'Angelo, S. Galasso, P. Monaco, A. Fiorentino (2013) A new acylated flavone glycoside with antioxidant and radical scavenging activities from *Teucrium polium* leaves. *Nat. Prod. Res.* 27 (4-5): 356-363.
44. B. D'Abrosca, S. Pacifico, **M. Scognamiglio**, N. Tsfantakis, E. Pagliari, P. Monaco, A. Fiorentino (2013) Petrorhagioside A-D, new γ -pyrone derivatives from *Petrorhagia saxifraga* L. *Helv. Chim. Acta.* 96:1273-1279.
45. S. Pacifico, B. D'Abrosca, **M. Scognamiglio**, M. Gallicchio, S. Galasso, P. Monaco A. Fiorentino (2013) Antioxidant

46. B. D'Abrosca, **M. Scognamiglio***, V. Fiumano, A. Esposito, Y. H. Choi, R. Verpoorte, A. Fiorentino (2013) Plant bioassay to assess the effects of allelochemicals on the metabolome of the target species *Aegilops geniculata* by a NMR-based approach. *Phytochemistry*. 93:27–40.
47. **M. Scognamiglio***, F. Temussi, B. D'Abrosca, A. Fiorentino (2013) Comment on the paper: "Spectroscopic and computational study of the major oxidation products formed during the reaction of two quercetin conformers with a free radical" *Spectrochim. Acta A - Mol. Biomol. Spectrosc.* 116:651-653.
48. **M. Scognamiglio**, B. D'Abrosca, A. Esposito, S. Pacifico, P. Monaco, A. Fiorentino (2013) Plant Growth Inhibitors: allelopathic role or phytotoxic effects? Focus on Mediterranean biomes. *Phytochem. Rev.* 12(4):803-830.
49. B. D'Abrosca, E. Buommino, G. D'Angelo, L. Coretti, **M. Scognamiglio**, V. Severino, S. Pacifico, G. Donnarumma, A. Fiorentino (2013) Spectroscopic identification and anti-biofilm properties of polar metabolites from the medicinal plant *Helichrysum italicum* against *Pseudomonas aeruginosa*. *Bioorg. Med. Chem.* 21(22): 7038–7046.
50. **M. Scognamiglio**, V. Fiumano, B. D'Abrosca, S. Pacifico, A. Messere, A. Esposito, A. Fiorentino (2012) Allelopathic Potential of Alkylphenols from *Dactylis glomerata* subsp. *hispanica* (Roth) Nyman. *Phytochemistry Lett.* 5 (1), 206-210.
51. **M. Scognamiglio**, B. D'Abrosca, S. Pacifico, V. Fiumano, P. F. De Luca, P. Monaco, A. Fiorentino (2012) Polyphenol characterization and antioxidant evaluation of *Olea europaea* varieties cultivated in Cilento National Park (Italy). *Food Res. Int.* 46 (1), 294-303.
52. B. D'Abrosca, S. Pacifico, **M. Scognamiglio**, N. Tsafantakis, A. Messere, P. Monaco, A. Fiorentino (2012) A new glucosylated cinnamoyl glycerol from aerial parts of *Phleum subulatum*. *Biochem. Syst. Ecol.* 42, 79-82.
53. **M. Scognamiglio**, A. Esposito, B. D'Abrosca, S. Pacifico, V. Fiumano, N. Tsafantakis, P. Monaco, A. Fiorentino (2012) Isolation, distribution and allelopathic effect of caffeic acid derivatives from *Bellis perennis* L. *Biochem. Syst. Ecol.* 43, 108-113.
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LIST OF PEER-REVIEWED BOOK CHAPTERS

1. G. Mastroianni, **M. Scognamiglio**, C. Russo, A. Fiorentino, M. Lavorogna (2020). Environmental metabolomics: A powerful tool to investigate biochemical responses to drugs in nontarget organisms. In: Fate and effects of anticancer drugs in the environment (pp. 441-465) doi:10.1007/978-3-030-21048-9_18.
2. **M. Scognamiglio***, Severino, V., D'Abrosca, B., Chambery, A., & Fiorentino, A. (2015). Structural elucidation of saponins: a combined approach based on high-resolution spectroscopic techniques. *Studies in Natural Products Chemistry*, 45, 85-120.
3. **M. Scognamiglio**, B. D'Abrosca, S. Pacifico, M. Isidori, A. Fiorentino (2015). Fat-Soluble Vitamins. In: *Handbook of Food Analysis*, 3rd edition, edited by L. Nollet and F. Toldrá.
4. S. Pacifico, **M. Scognamiglio**, B. D'Abrosca, P. Monaco A. Fiorentino (2012) Tocopherols, Tocotrienols and their Bioactive Analogues, in *Handbook of Analysis of Active Compounds in Functional Foods*, Eds. L.M.L. Nollet, F. Toldra. *CRC press*, Ch 10, pp 165-194.
5. **M. Scognamiglio**, B. D'Abrosca, S. Pacifico, M. Isidori, A. Esposito, A. Fiorentino (2012) Mediterranean Wild Plants as Useful Sources of Potential Natural Food Additives, in *Emerging Trends in Dietary Components for Preventing and Combating Disease*, Eds. Patil, B.S., Jayaprakasha, G.K., Murthy, K. N. C., and Seeram, N., ACS symposium series, Vol. 1093, *Oxford University press, New York, USA*, Ch 12, pp 209–235.

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CONFERENCE PRESENTATIONS

ORAL PRESENTATIONS:

1. **M. Scognamiglio**, V. Graziani, D. Romano, B. D'Abrosca, A. Fiorentino. NMR-based metabolomics of *Ononis diffusa*: rapid identification of new oxylipins and cytotoxic activity against cetuximab-resistant colon cancer cell lines, PSE Young Scientists' Meeting, 28-30 June **2023**, Paris (FR)
2. **M. Scognamiglio**, A. Sorice, G. Valentino, B. D'Abrosca, A. Fiorentino. NMR profiling-guided isolation of potentially bioactive oleanane saponins from *Bellis sylvestris* Cyr., PSE Meeting 2022, 19-22 September **2022**, Iasi (Romania)
3. **M. Scognamiglio**, V. Graziani, D. Romano, B. D'Abrosca, A. Fiorentino. NMR metabolomics-guided isolation and structural elucidation of oxylipins from *Ononis diffusa* with potential cytotoxicity against cetuximab-resistant colon cancer cell lines, XL Convegno Nazionale della Divisione di Chimica Organica della Società Chimica Italiana, 11-15 September **2022**, Palermo (IT)
4. **M. Scognamiglio**. Identification of natural products as potential plant-derived herbicides through metabolomics. Metabolomics 2022, 19-23 June **2022**, Valencia, Spagna.
5. **M. Scognamiglio***, J. Rodriguez, G. Valentino, B. D'Abrosca, R. Russo, A. Esposito, A. Fiorentino. Isolation and structural elucidation of oleanane saponins from *Bellis sylvestris* Cyr. involved in plant-plant chemical interactions **SCI 2021**, XXVII CONGRESSO NAZIONALE DELLA SOCIETÀ CHIMICA ITALIANA, 14-23 September **2021** (online).
6. **M. Scognamiglio**; Metabolomics as a powerful tool in life sciences. Symposium for the selection of a Max Planck Tandem group leader at Universidad del Valle (Cali). Bogotá (Colombia), 27-29 Settembre **2017** (**invited speaker**).
7. **M. Scognamiglio**, B. Schneider; Metabolomics studies of allelopathy: unravelling chemical interactions between Mediterranean plants through an omics approach. XXVI Congresso Nazionale della SCI. Paestum. (**A grant was obtained for the participation**). 10-14/09/**2017**.
8. **M. Scognamiglio**, B. Schneider; Metabolomics as a tool to study allelopathic interactions between Mediterranean plants. Advances in NMR and MS-based Metabolomics Padova (**A grant was obtained for the participation**). 14-16/11/**2017**.
9. **M. Scognamiglio**, B. Schneider (2017) Metabolomics study of allelochemicals from selected Mediterranean plant species 8th World Congress of Allelopathy. Marseille (FR). 24-28/07/**2017**.
10. **M. Scognamiglio**, Metabolomics Studies of Allelopathic Interactions. **Seminario su invito**. MPI für chemische Ökologie, Jena (DE). 13/07/**2017**.
11. **M. Scognamiglio**, B. D'Abrosca, A. Esposito, Y.H. Choi, R. Verpoorte, A. Fiorentino Metabolomics as a powerful tool to study chemical interactions among plants: a case study of Mediterranean macchia vegetation. 7th World Congress on Allelopathy. Vigo, Spain, 28/07- 01/08/**2014**.
12. **M. Scognamiglio**, B. D'Abrosca, A. Esposito, V. Fiumano, M. Isidori and A. Fiorentino; Effects of cytostatic agents on the metabolome of plant species. 1st CytoThreat workshop on the effects of residues of cytostatics and other pharmaceuticals on non-target organisms. Napoli, 16-18/10/**2012**.
13. A. Fiorentino, B. D'Abrosca, A. Esposito, M. Isidori, P. Monaco, S. Pacifico, S. Piccolella, A. Ricci, **M. Scognamiglio**; Mediterranean wild plants: Endless source of natural food additives? 240th ACS National Meeting, AGFD-203, Boston, USA, 22-26/08/**2010**.
14. **M. Scognamiglio**, S. Pacifico, B. D'Abrosca, S. Piccolella, M. Gallicchio, A. Ricci, A. Fiorentino; Antiproliferative activity on HepG2 human hepatoblastoma cells of polyphenols from *Petrorhagia velutina*. The 14th International Congress PHYTOPHARM 2010, St-Petersburg, Russia, 01-03/07/**2010**.

POSTER PRESENTATIONS:

1. **M. Scognamiglio**, B. D'Abrosca, A. Fiorentino. NMR-based metabolomics to study specialized metabolism variability in plants: a case study of seasonal phytochemical changes in selected officinal plants. PSE Meeting 2022, 19-22 September **2022**, Iasi (Romania)
2. **M. Scognamiglio**, V. Graziani, N. Potenza, B. D'Abrosca, T. Troiani, S. Napolitano, A. Fiorentino. NMR profiling of *Ononis diffusa* identifies cytotoxic compounds against cetuximab-resistant colon cancer cell lines. RDPA (Recent Developments in Pharmaceuticals Analysis) 2021, 6-8 September **2021** (online).
3. **M. Scognamiglio**, F. Feistel, E. Perreca, C. Paetz, J. Gershenzon, A. Schmidt; Stable isotope labelling and omics approaches to study the spatiotemporal regulation of diterpenoid resin acids biosynthesis in Norway spruce. 15th Annual Conference of the Metabolomics Society. Den Haag (NL) 23-25/06/**2019**.
4. **M. Scognamiglio**, B. Schneider; Metabolomics as a tool to study allelopathic interactions between Mediterranean plants. Metabolomics 2017; 13th Annual Conference of the Metabolomics Society. Brisbane (AUS) 25-29/06/**2017**.
5. **M. Scognamiglio**, B. Schneider; The whole is greater than the sum of its parts: *Daphne gnidium* extracts and isolated pure compounds differently affect the receiving plant *Aegilops geniculata*. 8th World Congress of Allelopathy. Marseille (FR). 24-28/07/**2017**.
6. **M. Scognamiglio**, B. Schneider; Metabolomic Studies of Allelopathic Interactions. Science Advisory Board Meeting, Max Planck Institute for Chemical Ecology. Jena (DE). **2016**.
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8. **M. Scognamiglio**, B. D'Abrosca, V. Fiumano, R. Di Cerbo, A. Esposito, A. Fiorentino (2012) Metabolomics: a valuable tool to identify shikimic acid as unsuspected phytotoxic metabolite in *Pistacia lentiscus* leaves. Biocom 12, Semiochemicals involving plants. The Phytochemical Society of Europe Congress. Cadiz. Spain. 9-12 September **2012**.