


Dr. Ioanna Pitterou


Chemical Engineer NTUA (*M.Eng.*), *M.Sc.*, *Ph.D.*



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BACKGROUND

Dr. Ioanna Pitterou holds a **PhD in Engineering** from the **School of Chemical Engineering** at the **National Technical University of Athens (NTUA)**. Her **Ph.D. Dissertation** focuses on **Green Nanotechnology**, and she also holds a **Master's Degree** from the **Athens Medical School** in the field of **drug development**. Moreover, she has extensive laboratory experience in the preparation of **nanosystems for drug delivery**. Her research contributions are demonstrated by **10 publications** in peer-reviewed international scientific journals (**h-index = 6, 174 citations, SCOPUS September 2024**). Additionally, she has presented her work at **57 international and national conferences**. Dr. Pitterou actively participates in significant research projects, including involvement in **2 national and 1 international research program** focused on delivery systems for bioactive compounds. Her **academic support** extends to **undergraduate and postgraduate lab courses** and the **supervision of over 30 theses** carried out at the **Organic Chemistry Laboratory of the School of Chemical Engineering at NTUA**. Moreover, she has submitted patents, demonstrating her innovative contributions to the field. Her work has been recognized with several prestigious awards, including the **Thomaideio Award** for Scientific Publication in an International Scientific Journal in 2020, 2021, 2022, and 2023. In recognition of her academic and research performance, she has been awarded **scholarships** from the **A.G. Leventis Foundation** and the **State Scholarships Foundation (IKY)** for her doctoral studies.

EDUCATION

04/2019-10/2023: Doctor of Philosophy-PhD

Doctoral Thesis: "Development of green encapsulation processes of bioactive compounds in modified release carriers"

Laboratory of Organic Chemistry, School of Chemical Engineering NTUA, Supervisor A. Detsi, Professor NTUA

02/2020-04/2022: Master of Science-MSc, Development of new drugs: research, launch and access

School of Medicine, NKUA

Grade: 9,34/10 ("Excellent")

Diploma Thesis: "Targeted nanosystems and transport of drug molecules: application in modern therapeutic and clinical practice"

Supervisor: Professor Costas Demetzos, NKUA

10/2013-10/2018: Degree in Chemical Engineering (5-year joint Bachelor & MEng)

School of Chemical Engineering, NTUA

Grade: 7,45/10 ("Very good")

05/2017-09/2018: Diploma thesis

"Development of an encapsulation process of umbeliferone analogues in β -cyclodextrin and evaluation of their bioactivity"

Laboratory of Organic Chemistry, School of Chemical Engineering NTUA, Supervisor A. Detsi, Professor NTUA

2010-2013: 2nd Secondary School of Agion Anargiron (Lykeion)

Grade: 18,7/20("Excellent")

CONTINUING EDUCATION

01.2024-Today: Supplementary Distance Education Programme (E-Learning), National and Kapodistrian University

of Athens (NKUA), Cosmetology: Method of Preparation of Cosmetics from Natural Raw Materials and Medicinal Plants.

04.2024-09.2024: Distance Learning Supplementary Education Program (E-Learning), National and Kapodistrian University of Athens (NKUA), Entrepreneurship and Strategic Planning for the Future in an Environment of Uncertainty.

WORK EXPERIENCE

01/2023 -05/2024: **Researcher and Development Scientist/**Cloudpharm P.C., Greece

09/2019-12/2022: **Laboratory training on laboratory exercises** for the courses "Organic Chemistry ", "Selected Topics on Bioorganic and Natural Products Chemistry", "Green Chemistry and Engineering " and "Pharmaceutical Chemistry and Technology" courses of NTUA School of Chemical Engineering

Participation in the **supervision of dissertations** conducted in the Laboratory of Organic Chemistry at the School of Chemical Engineering, NTUA.

02/2022-12/2022: **Laboratory training and teaching assistance** on IPP "Materials Science and Technology" postgraduate students of Chemical Engineering School of NTUA (2nd Semester) in obligatory laboratory course "Synthesis and characterization of nanomaterials for applications in pharmaceutical and biomedical applications"

10/2021-09/2022: **Researcher in Chemical Engineering Department of National Technical University of Athens**, Greece, for the project: "ΑΙΘΕΝΤΟΟΛ-Utilization of essential oils of aromatic plants for the development of new insecticides"(MIS 5073650), of the action ΕΠΑνΕΚ 2014-2020 Operational program "Competitiveness - Entrepreneurship - Innovation", with the co-financing of Greece and the European Union

02/2021-09/2021: **Researcher in Chemical Engineering Department of National Technical University of Athens**, Greece, for the project: "NANOARTHROSIS - Multifunctional nanosystems with natural therapeutic agents for the treatment of osteoarthritis"(MIS 5033633), of the action ΕΠΑνΕΚ 2014-2020 Operational program " Competitiveness - Entrepreneurship - Innovation", with the co-financing of Greece and the European Union

01/09/2018-30/09/2018: INTERNSHIP

Internship in the R&D department of PHARMATEN SA.

Training in the use, validation, processing and evaluation of the results of HPLC – PDA, GC analytical methods

LABORATORY SKILLS

- High-performance liquid chromatography-photodiode array (HPLC –PDA)
- Gas chromatography (GC)
- Mass spectrometry (MS)
- Thin Layer Chromatography (TLC) Column Chromatography
- Nuclear magnetic resonance (NMR): VARIAN 300MHz και 600 MHz
- Fourier-transform infrared spectroscopy (FTIR)
- Ultraviolet–visible spectroscopy (UV-Vis) : Jasco 770
- Dynamic Light Scattering (DLS): Malvern Zetasizer Nano ZSP
- Nanoparticle Tracking Analysis (NTA): Malvern Panalytical, NanoSight NTA system

COMPUTER SKILLS

- Very good use of PC, Internet and Microsoft Office programs (Word, Excel, PowerPoint)
- Computer Engineering Certificate (CAD / CAM, software tools, AutoCAD, Aspen Plus, Mathcad, Comsol Multiphysics MsProject), MATLAB, ChemOfficeUltra 2008, ChemBioOffice 2008, AutoDockTools, PyMOL

LANGUAGES

English (ECCE,Level:B2)

SCHOLARSHIPS

- 05/2022** Operational Program (Human Resources Development, Education, and Lifelong Learning) under the project "Enhancing Research Potential through Doctoral Research" (MIS-5113934), implemented by the **State Scholarships Foundation (IKY)**.
- 2020-2021** Scholarship awarded by the **A. G. Leventis Foundation** for the completion of doctoral studies during the academic year 2020-2021.

HONORS & AWARDS

- 04/2024**
- **Her_Research 2024 Competition by SEGE** (Association of Women Entrepreneursof Greece), in the category "Innovation of the Year"
 - **"Proof of Concept" Competition** by the NTUA Technology Transfer Office, **1st place** <https://tto.ntua.gr/oloklirosi-tis-3is-kai-teleftaias-fasis-tou-programmatos-proof-of-concept/>.
- 05/2022** **Invited speaker at BioChem Day 2022, organized by Chemecon**, with a talk titled **"Applications of Green Solvents in Biotechnology."**
- 2022-2020** Distinction of the published scientific publication entitled **"Green Extraction of Greek Propolis Using Natural Deep Eutectic Solvents (NADES) and Incorporation of the NADES-Extracts in Cosmetic Formulation"** to be **"Cover Story"** at the journal **"Sustainable Chemistry" (Volume 4, Issue 1)** [<https://www.mdpi.com/2673-4079/4/1>].
- Thomaidio Awards for Scientific Publication in International Peer-Reviewed Journal:**
- **2023 Award**, Publication Title: "Novel chitosan/alginate hydrogels as carriers of phenolic-enriched extracts from saffron floral by-products using natural deep eutectic solvents as green extraction media" (*Food Science* 6 (2023): 100469)
 - **2022 Award**, Publication Title: "Green Extraction of Greek Propolis Using Natural Deep Eutectic Solvents (NADES) and Incorporation of the NADES-Extracts in Cosmetic Formulation" (*Sustainable Chemistry*, 4(1), 8-25)
 - **2021 Award**, Publication Title: «Synthesis and characterization of inclusion complexes of rosemary essential oil with various β -cyclodextrins and evaluation of their antibacterial activity against *Staphylococcus aureus*" (*J. Drug Deliv. Sci. Technol.* 65 (2021) 102660)
 - **2020 Award**, Publication Title: " β -Cyclodextrin as carrier of novel antioxidants: A structural and efficacy study" (*Colloids Surfaces A Physicochem. Eng. Asp.* 603 (2020) 125262).

PARTICIPATION IN PATENT

Participation as an inventor in the European patent titled **"Nanosystems for the encapsulation of therapeutic agents"** submitted on 15/12/2022 to the Hellenic Industrial Property Organization (OBI) with the application number **NANOARTHRITIS**, currently under review by the European Patent Office. The patent relates to the utilization of results from the NANOARTHRITIS project (MIS5033633). The patent involves the institutions NTUA, Democritus University of Thrace, and Theracell SA.

PARTICIPATION IN EUROPEAN PROGRAM

01/2023 - 08/2023: Researcher in the Research and Development (R&D) Department of Cloudpharm P.C. **Participation in the European program** titled **"Next generation toolbox for greener pharmaceuticals design and manufacturing towards reduced environmental impact-ENVIROMED"**.

PUBLICATIONS IN INTERNATIONAL PEER-REVIEWED JOURNALS

1. **I. Pitterou**, F. Kalogeropoulou, A. Tzani, K. Tsiantas, M. A. Gatou, E. Pavlatou, A. Batrinou, C. Fountzoula, A. Kriebardis, P. Zoumpoulakis, A. Detsi, Development and optimization of hybrid nanosystems comprising of essential oil-loaded chitosan nanoparticles incorporated in alginate hydrogels. *Molecules*, (2024) (**under review-manuscript ID: molecules-3151978**)
2. E. Kavetsou, **I. Pitterou**, N. G. Dimitrioglou, S. Kikionis, E. Kritsi, P. Zoumpoulakis, E. Pontiki, D. Hadjipavlou-Litina, D. T. Hatzivramidis, A. Detsi, Formulation of pharmaceutical tablets containing β -cyclodextrin-4-methylumbelliferone (hymecromone) inclusion complexes and study of the dissolution kinetics. *Micro*, (2023), 3, 892-911. <https://doi.org/10.3390/micro3040061>.
3. C. Gkountela, D. Markoulakis, M. Mathioudaki, **I. Pitterou**, A. Detsi, S. Vouyiouka, Scalable enzymatic polymerization and low-temperature post-polymerization of poly (butylene succinate): process parameters and application. *European Polymer Journal*, (2023), 112423. <https://doi.org/10.1016/j.eurpolymj.2023.112423>.
4. A. Tzani, T. Lymperopoulou, **I. Pitterou**, I. Karetta, F. Belfquih, A. Detsi, Development and optimization of green extraction process of spent coffee grounds using natural deep eutectic solvents. *Sustain. Chem. Pharm.* (2023) 34, 101144. <https://doi.org/10.1016/j.scp.2023.101144>. (IF:5.5)
5. D. Cerdá-Bernad, **I. Pitterou**, A. Tzani, A. Detsi, M. J. Frutos, Novel chitosan/alginate hydrogels as carriers of phenolic-enriched extracts from saffron floral by-products using natural deep eutectic solvents as green extraction media. *Current Research in Food Science* 6 (2023): 100469. <https://doi.org/10.1016/j.crf.2023.100469>. (IF: 6.2)
6. A. Tzani, **I. Pitterou**, F. Divani, T.Tsiaka, G. Sotiroidis, P. Zoumpoulakis, A. Detsi. Green Extraction of Greek Propolis Using Natural Deep Eutectic Solvents (NADES) and Incorporation of the NADES-Extracts in Cosmetic Formulation. *Sustainable Chemistry*. 2023; 4(1):8-25. <https://doi.org/10.3390/suschem4010002>. (**Selected as cover of the journals issue**)
7. E. Kavetsou, **I. Pitterou**, A. Katopodi, G. Petridou, A. Adjali, S. Grigorakis, A. Detsi, Preparation, Characterization, and Acetylcholinesterase Inhibitory Ability of the Inclusion Complex of β -Cyclodextrin–Cedar (*Juniperus phoenicea*) Essential Oil, *Micro*. 1 (2021) 250–266. <https://doi.org/10.3390/micro1020019>.
8. A. Halahlah, E. Kavetsou, **I. Pitterou**, S. Grigorakis, S. Loupassaki, L. Tziveleka, S. Kikionis, E. Ioannou, A. Detsi, Journal of Drug Delivery Science and Technology Synthesis and characterization of inclusion complexes of rosemary essential oil with various β -cyclodextrins and evaluation of their antibacterial activity against *Staphylococcus aureus*, *J. Drug Deliv. Sci. Technol.* 65 (2021) 102660. <https://doi.org/10.1016/j.jddst.2021.102660>. (IF: 4.5)
9. M. Chatzidaki, I. Kostopoulou, C. Kourtesi, **I. Pitterou**, S. Avramiotis, A. Xenakis, A. Detsi, β -Cyclodextrin as carrier of novel antioxidants: A structural and efficacy study, *Colloids Surfaces A Physicochem. Eng. Asp.* 603 (2020) 125262. <https://doi.org/10.1016/j.colsurfa.2020.125262>. (IF: 4.9)
10. A. Detsi, E. Kavetsou, I. Kostopoulou, **I. Pitterou**, A.R.N. Pontillo, A. Tzani, P. Christodoulou, A. Siliachli, P. Zoumpoulakis, Nanosystems for the encapsulation of natural products: The case of chitosan biopolymer as a matrix, *Pharmaceutics*. 12 (2020) 1–68. <https://doi.org/10.3390/pharmaceutics12070669>. (IF: 4.9)

PEER-REVIEWED ABSTRACTS IN CONFERENCES

INTERNATIONAL CONFERENCES

1. **I. Pitterou**, M. Belia, A. Tzani, A. Detsi Extraction of beetroot peels using Natural Deep Eutectic Solvents and incorporation of the extract in cosmetic formulation, 11th International Conference on Sustainable Solid Waste Management. June 19-22, 2024, Rhodes, Greece (Agenda p.33). https://rhodes2024.uest.gr/draft_Rhodes_2024.pdf.
2. A. Tzani, **I. Pitterou**, A. Chroni, I. Kostopoulou, A. Detsi, Biomass Valorisation for the Development of Chitosan Films Using Natural Deep Eutectic Solvents, 11th International Conference on Sustainable Solid Waste Management. June 19-22, 2024, Rhodes, Greece (Agenda p.33). https://rhodes2024.uest.gr/draft_Rhodes_2024.pdf.
3. **I. Pitterou**, A.Malliaraki, A. Tzavara, A. Tzani, K.Tsiantas, A. Batrinou, C. Fountzoula, A. Kriebardis, P. Zoumpoulakis, A. Detsi Towards Green Nanotechnology: Chamomile-Natural Deep Eutectic Solvent extract for the development of nanocomposite alginate-silver nanoparticles hydrogels, 19th Food Colloids Conference, 14-18 April 2024, Thessaloniki, Greece(Book of abstracts p.264). <https://foodcolloids2024.org/abstract-book/>.
4. V. Kakokefalou, **I. Pitterou**, A. Katopodi, M. Roussaki, S. Tsatsouli, P. Zoumpoulakis, A. Detsi, A green approach for the development of novel chitosan hydrogels for food applications, 19th Food Colloids Conference, 14-18 April 2024, Thessaloniki, Greece(Book of abstracts p.117). <https://foodcolloids2024.org/abstract-book/>.
5. D. Perdikis, S. Dervisoglou, C. Traka, A. Roussos, C. Misailidou, M. Polissiou, D. Daferera, E. Kakouri, E. Kaparakou, P.K. Revelou, E. Kavetsou, **I. Pitterou**, A. Kalospyros, A. Detsi, "Evaluation of *Mentha pulegium*, *Ocimum basilicum* and *Origanum majorana* essential oils encapsulated in nanosystems against *Tetranychus urticae*, *Aphis gossypii* and

Tuta absoluta”, XII European Congress of Entomology, October 16-20, 2023, Heraklion, Crete, Greece (Book of abstracts p.332).

6. **I. Pitterou**, E. Kavetsou, A. Kalospyros, I. Kostopoulou, C. Derzekou, E. Kontogeorgou, T. Armeni, D. Daferera, P.A. Tarantilis, S. Dervisoglou, D. Perdakis, A. Detsi, “Synthesis and Characterization of Inclusion Complexes of β -Cyclodextrins and Essential Oils of Greek Origin”, 13th International Conference on Instrumental Methods of Analysis: Modern Trends and Applications, September 17-20, 2023, Chania, Crete (Book of abstracts p.130).

7. D. Perdakis, S. Dervisoglou, C. Traka, A. Roussos, C. Misailidou, P. Tarantilis, D. Daferera, E. Kakouri, E. Kaparakou, E. Kavetsou, **I. Pitterou**, A. Kalospyros, A. Detsi, “Evaluation of *Origanum majorana L. (Lamiaceae)* essential oil and its encapsulation in nanoformulation system on mortality and repellency against *Tetranychus urticae Koch* (Acari: *Tetranychidae*)”, IOBC-WPRS WGs “Integrated Control in Protected Crops, Temperate Climate” and “Integrated Control in Protected Crops, Mediterranean Climate”, August 27 – 31, 2023, Brest, France.

8. **I. Pitterou**, A. Tzavara, A. Tzani, M. Andriakaina, K. Pyrovolou, K. Tsiantas, A. Batrinou, S. Konteles, C. Fountzoula, A. Kriebardis, P. Zoumpoulakis, A. Detsi, “Nanocomposite alginate hydrogels incorporating silver nanoparticles: a green approach towards smart antimicrobial materials”, XII Paul Ehrlich PhD NetWork in Medicinal Chemistry, July 16 – 18, 2023, Thessaloniki, Greece (Book of abstracts p.97).

9. **I. Pitterou**, A. Tzavara, A. Malliaraki, A. Tzani, K. Tsiantas, A. Batrinou, C. Fountzoula, A. Kriebardis, P. Zoumpoulakis, A. Detsi, “A step towards Green Nanotechnology: biomass-NADES extracts for the development of nanocomposite alginate-silver nanoparticles hydrogels”, 10th International Conference on Sustainable Solid Waste Management. June 21-24, 2023 Chania, Greece (Agenda p.62).

10. **I. Pitterou**, S. Chinni, V. A. Georgiou, A. Tzani, A. Detsi, “Valorization of olive leaves extract in Natural Deep Eutectic Solvents for the development of bioactive chitosan films and hydrogels”, 10th International Conference on Sustainable Solid Waste Management. June 21-24, 2023 Chania, Greece (Agenda p.61).

11. **I. Pitterou**, A. Tzani, A. Malliaraki, A. Sklapani, C. Fountzoula, A. Kriebardis, A. Detsi, “Exploring the potential of Natural Deep Eutectic Solvents for the development of innovative materials with enhanced bioactivity”, 3rd International Meeting on Deep Eutectic Systems, June 19-22, 2023, Lisbon, Portugal (Book of abstracts p.20)

12. **I. Pitterou**, D. A. Nanou, S. Chinni, A. Tzani, A. Detsi, “A green approach for the development of chitosan hydrogels using olive leaf extract as dissolution and gelating agent”, 2nd Greenering International Conference, March 21-23, 2023, Valladolid, Spain (Program p.4).

13. A. Drolapas, **I. Pitterou**, E. Kavetsou, E. Alexandratou, K. Prousis, A. Detsi, “Development of Novel Nanosystem for Bio-imaging and Photodynamic Cancer Therapy: The Case of β -Cyclodextrin Inclusion Complexes with a Near-infrared Cyanine-type Photosensitizer”, 10th International Conference on Oxidative Stress in Skin Medicine and Biology, 15-18 September 2022, Andros, Greece. (Book of abstracts p.112)

14. **I. Pitterou**, A. Ntirogianni, A. Tzani, K. Tsiantas, A. Batrinou, P. Zoumpoulakis, A. Detsi, “Development of bioactive chitosan-based hydrogels using natural deep eutectic solvents (NADES) as dissolution and gelating agents”, 9th IUPAC International Conference on Green Chemistry, 5–9 September 2022, Athens, Greece (Book of abstracts p.643).

15. A. Tzavara, **I. Pitterou**, E. M. Kousouli, A. Tzani, A. Detsi, “Green synthesis of silver nanoparticles incorporated in alginate hydrogels using olive leaf extract as the reducing agent and crosslinker”, Athens Summer School on Organic Synthesis 2022 (ASSOS2022), 7-9 July 2022, Athens, Greece (Book of abstracts p.46).

16. A. Drolapas, **I. Pitterou**, E. Kavetsou, E. Alexandratou, K. Prousis, A. Detsi, “Preparation and Characterization of Supramolecular Inclusion Complexes of a Near-infrared Fluorescent Cyanine-type Photosensitizer with β -Cyclodextrin for Theranostic Cancer Applications”, Athens Summer School on Organic Synthesis 2022 (ASSOS2022), 7-9 July 2022, Athens, Greece (Book of abstracts p.41).

17. **I. Pitterou**, K. Pavlopoulou, A. Tzani, T. Andreou, A. Detsi, “Investigation of ctDNA stability in aqueous solutions of natural deep eutectic solvents”, 22nd Tetrahedron Symposium Catalysis for a Sustainable World, June 28–July 1, 2022, Lisbon, Portugal.

18. **I. Pitterou**, A. Tzavara, E.M. Kousouli, A. Tzani, A. Detsi “Green synthesis of silver nanoparticles incorporated in alginate hydrogels using olive leaf extract as the reducing agent and crosslinker”, 9th International Conference on Sustainable Solid Waste Management, 15-18 June 2022, Corfu, Greece (Agenda p.66).

19. A. Tzani, T. Tsiaka, F. Divani, **I. Pitterou**, P. Zoumpoulakis, A. Detsi, “Green extraction of greek propolis using natural deep eutectic solvents (NADES) and incorporation of the NADES-extracts in cosmetic formulation”, Greenering Scientific Meeting, February 28 - March 2, 2022, Coimbra, Portugal (Book of abstracts p.19).

20. **I. Pitterou**, F. Kalogeropoulou, A. Tzani, A. Lazou, A. Batrinou, P. Zoumpoulakis, A. Detsi, “Preparation and bioactivity of alginate-based hydrogels incorporating essential oil – loaded chitosan nanoparticles”, 6th Green and Sustainable Chemistry Conference, Live and On demand, November 16-18, 2021 (Book of abstracts p.270).

21. A. Tzani, I. Koutsomitis, **I. Pitterou**, A. Detsi, “Exploring the use of a Natural Deep Eutectic Solvents for the valorization of Brewers’ spent grain”, 6th Green and Sustainable Chemistry Conference, Live and on demand, November 16-18, 2021 (Book of abstracts p.194).

22. **I. Pitterou**, M. Spilioti, A. Detsi, “Process development and optimization for the encapsulation of caffeine in chitosomes using natural deep eutectic solvents”, 9th International Conference on Oxidative Stress in Skin Medicine and Biology, Online Conference, September 9- 12, 2021 (Book of abstracts p.20).

23. **I. Pitterou**, I. Stamatiou, E. Kavetsou, E. Alexandratou, G. Megariotis, D. Theodorou, A. Detsi, “Encapsulation of

dopamine and L-DOPA in β -cyclodextrin and modified cyclodextrins: investigation of the properties of sustained release nanosystems”, 9th International Conference on Oxidative Stress in Skin Medicine and Biology, Online Conference, September 9- 12, 2021(Book of abstracts p.44).

24. **I. Pitterou**, F. Kalogeropoulou, A. Tzani, A. Detsi, “Alginate-Based Hydrogel Containing Lavender and Mentha Essential Oil – Loaded Chitosan Nanoparticles Using Natural Deep Eutectic Solvents”, Athens Summer School on Organic Synthesis 2021 (ASSOS2021), Virtual Event ,August 25-27, 2021(Book of abstracts p.41).

25. **I. Pitterou**, F. Kalogeropoulou, A. Detsi, “Alginate-based hydrogel containing lavender and mentha essential oil – loaded chitosan nanoparticles using natural deep eutectic solvents”, European Symposium on Organic Chemistry, Virtual Symposium, July 5-6, 2021(Book of abstracts p.119).

26. **I. Pitterou**, K. Pallios, M.Bairaktari, E.Kavetsou, A.Detsi, “Inclusion complexes of the natural product curcumin in various nanosystems and study of their binding with ctDNA”, European Symposium on Organic Chemistry, Virtual Symposium, July 5-6, 2021(Book of abstracts p.189).

27. **I. Pitterou**, M. Spilioti, A. Detsi, “Encapsulation of caffeine in chitosomes using natural deep eutectic solvents”, European Symposium on Organic Chemistry, Virtual Symposium, July 5-6, 2021(Book of abstracts p.188).

28. E. Kavetsou, C. Tsoukalas Koulas, **I. Pitterou**, E. Alexandratou, A. Detsi, “Development of magnesium phthalocyanine- β -cyclodextrin inclusion complexes for application in photodynamic therapy”, European Symposium on Organic Chemistry, Virtual Symposium, July 5-6, 2021(Book of abstracts p.81).

29. **I. Pitterou**, A. Katopodi, A. Tsami, E. Kavetsou, T. Lymperopoulou, A. Detsi, “Encapsulation of citrus and cedar essential oils in β -cyclodextrins and evaluation of their ability to inhibit acetylcholinesterase”, XXIX European Colloquium on Heterocyclic Chemistry. Virtual Event April 26-28, 2021(Book of abstracts p.150).

30. E. Kavetsou, A. Katopodi, **I. Pitterou**, A. Kalospyros, E. Pontiki, D. Hadjipavlou-Litina, A. Detsi, “Improving the biological activity of natural and synthetic coumarin analogues via complexation with β -cyclodextrin”, XXIX European Colloquium on Heterocyclic Chemistry. Virtual Event, April 26-28, 2021 (Book of abstracts p.141).

31. **I. Pitterou**, A. Katopodi, E. Kavetsou, A. Detsi, “Development of solid lipid nanoparticles (SLNs) and nanostructured lipid carriers (NLCs) for the encapsulation and sustained release of the flavonoid naringin”, Applied Nanotechnology and Nanoscience International Conference 2021, Online Conference, March 24-25-26, 2021. (Book of abstracts p.151).

32. **I. Pitterou**, I. Stamatiou, E. Kavetsou, E. Alexandratou, A. Detsi, “Encapsulation of Dopamine and L-DOPA in various biodegradable nanosystems”, Applied Nanotechnology and Nanoscience International Conference 2021, Online Conference, March 24-25-26, 2021 (Book of abstracts p. 182).

33. A. Katopodi, **I. Pitterou**, G. Petridou, R. Spanou, E. Kavetsou, A. Detsi, “Cedar essential oil- β -cyclodextrin nanocomplex formation for the effective inhibition of acetylcholinesterase”, Applied Nanotechnology and Nanoscience International Conference 2021, Online Conference, March 24-25-26, 2021. (Book of abstracts p.150).

34. **I. Pitterou**, I. Kostopoulou, G. Petridou, S. Papastefanou, E. Kavetsou, A.Detsi, “Encapsulation of naringin in biodegradable carriers”, EFMC International Symposium on Advances in Synthetic and Medicinal Chemistry, 1- 5 September, 2019, Athens, Greece.

35. E. Kavetsou, M. Tsampoula, **I. Pitterou**, E. Pontiki, D. Hadjipavlou-Litina, P. Politis, A. Detsi, “7- and 5-prenyloxy-3-aryl-coumarin derivatives with combined anti-inflammatory and cytotoxic activity”, Athens Conference on Advances in Chemistry, 30 October-2 November 2018 ,Athens, Greece.

36. E. Kavetsou, A. Katopodi, **I. Pitterou**, A. Gousseau, A. Detsi, “Encapsulation of bioactive coumarin analogues in various nanaocarriers”, 8th International Conference on Oxidative Stress in Skin Medicine and Biology, 6 - 9 September 2018, Andros, Greece. (Book of abstracts p.66).

37. E. Kavetsou, A. Katopodi, **I. Pitterou**, T. Liargkova, E. Pontiki, D. Hadjipavlou-Litina, A. Detsi, “Design and synthesis of novel substituted coumarins and assessment of their antioxidant and lipoxygenase inhibitory activity”, 19th Tetrahedron Symposium 26-29 June, 2018, Riva del Garda, Lake Garda, Italy.

38. E. Kavetsou, A. Katopodi, **I. Pitterou**, C. Gkolfinopoulou, L. Argyri, S. Kikionis, E. Pontiki, D. Hadjipavlou-Litina, A. Chroni, A. Detsi, “Improving the biological activity of natural products via complexation with β -Cyclodextrin: the case of 4-methyl-umbelliferone”, 15th European Symposium on Controlled Drug Delivery, 11 – 13 April 2018, Hotel Zuiderduin in Egmond aan Zee, The Netherlands.

HELLENIC CONFERENCES

1. **I.Pitterou**, S. Chinni, A. Tzani, A.Detsi, Valorization of olive leaves extract in Natural Deep Eutectic Solvents for the development of bioactive chitosan hydrogels, 23rd Panhellenic Chemistry Conference with International Participation, 25-28 September 2024, Central Building of the National and Kapodistrian University of Athens, Greece. <https://chemconference.gr/2024/scprogram>.

2.**I.Pitterou**, K. Kyriakopoulos A. Tzani, A.Detsi, Novel Nanocomposite Eutectogels Incorporating Chrysin-Loaded Chitosan Nanoparticles,23rd Panhellenic Chemistry Conference with International Participation, 25-28 September 2024, Central Building of the National and Kapodistrian University of Athens, Greece. <https://chemconference.gr/2024/scprogram>.

3. F. Kalogeropoulou, **I. Pitterou**, K. Spyropoulou, E. Alexandratou, A. Detsi, Synthesis of nanocomposite alginate-AgNPs hydrogels for application in photodynamic therapy (PDT), 23rd Panhellenic Chemistry Conference with International Participation, 25-28 September 2024, Central Building of the National and Kapodistrian University of Athens, Greece. <https://chemconference.gr/2024/scprogram>.

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