

## CURRICULUM VITAE

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**Date and place of birth:** 6 October 1948, Pithio-Evrou, Greece.

**Nationality:** Greek

**Prof. Status:** Professor of Chemistry (1998- present), in Agricultural University of Athens (AUA), Greece

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### Education Background:

- Degree (Licence) in Chemistry, University of Brussels (U.L.B.), Belgium, 1971.
- Doctor of Philosophy (Ph.D), University of Brussels (U.L.B.), Belgium, 1976.

### Academic Positions:

- Lecturer, Laboratory of General Chemistry, Agricultural University of Athens, Greece (1977-1986).
- Visiting Professor, Chemistry Department, University of Montreal, Canada (1980-1981).
- Assistant Professor, Laboratory of General Chemistry, Agricultural University of Athens, Greece (1986-1992).
- Visiting Professor, Faculty of Pharmacy, University of Reims, France (1988-1989).
- Associate Professor, Laboratory of General Chemistry, Agricultural University of Athens, Greece (1992-1998).
- Director of Chemistry Laboratory (AUA) (1993- present)
- Full Professor, Laboratory of General Chemistry, Agricultural University of Athens, Greece (1998-today).
- Head of the Department of Sciences (AUA), (1999-2003).
- Head of the Division of Chemical and Physical Sciences (AUA) (2004-2005)
- Scientific Director of Post-Graduate Studies of the Department of Sciences (AUA) (2004-2006).
- Vice Rector for Academic Affairs and Personnel (AUA) (2006-2010).

### Other Positions:

- Scientific Associate of the Hellenic General Secretariat for Research & Technology.
- Member of the Hellenic Chemical Society.
- Member of Spectroscopy Society of Canada.
- Member of the Hellenic Society of Biotechnology.
- Member of Society for the Development of Research on Magnesium
- Member of European Society for the Spectroscopy of Biological Molecules.
- Council member of EUROPAM (European Herbs Growers Association).
- Member of International Society of Food, Agriculture and Environment

### Current Research Interests

- Conformational analysis: Conformational analysis of organic compounds and organometallic complexes with biological activity by FT-IR, FT-Raman and NMR spectroscopy.
- Isolation, purification and structural determination of natural products: Development of new techniques to separate and evaluate the main compounds of natural products cultivated in Greece such as Saffron (*Crocus sativus L.*), mastic gum (*Pistacia lentiscus var. chia*), Greek oregano (*Origanum vulgare* subsp. *hirtum*) and other aromatic plants.

- Antioxidant capacity, antimicrobial action and spectrophotometric study of the interaction of natural products with DNA, RNA and proteins.
- Biological activity: The biological activity of the natural products main components is estimated by *in vitro* experiments.
- Implementation and exploitation of natural products in agricultural practice in order to save natural resources and to develop new ecological products.

### International Research Projects

1. Isolation, separation et purification des carotenoids du safran et etude in vivo a l'echelle cellulaire de leurs activites biologiques. Join Research and Technology Programmes, **1990**, Greece – France, General Secretariat for research & technology, Greece.
2. The biochemistry and archestructure of fruit and vegetable tissue as quality predictors for optimising storage and processing regimes: Basic research leading to applicable models and rules. AIR 1 (AIR 1- CT92-0278) **1993**, E.U.
3. Novel spectroscopic approaches to studies of biomolecular structure and interactions at the molecular and cellular levels, INTAS 93-1829 (**1994**), E.U.
4. Molecular Mechanisms of Interactions of DNA-Topoisomerases and Integrase Inhibitors with DNA, Enzymes and in Ternary Complexes, INTAS 94-0905 (**1994**), E.U.
5. The improvement of olive oil quality by biotechnology means, AIR 3 (AIR 3- CT94-1395) **1995**, E.U.
6. «Cost D-10/0016/99-Sonochemical Applications to Food Additives, Flavors, Fragrances and Pharmaceuticals Extraction from renewable natural resources:SAFEcost Action D-10. E.U. **2000**
7. «Isolation and targeted modification of non-cellulose polysaccharide components of important agricultural plants». Join Research and Technology Programmes (**2001-2003**) Greece – Slovakia, General Secretariat for research & technology, Greece.
8. «Physicochemical investigation of bacterial metabolites and biocomplexes involved in plant-microbe interactions», Nato Scientific Affairs Div. Belgium **2001**, Nato Science Programme.
9. «Saffron Adulteration by Colour Additives:Developing an Antifraud Methology», Craft-**2002**, E.U.
10. «Improvement of the Saffron European Sector competitiveness favoring the quality and the innovation», INTERREG IIIC, **2005-2006** via the Region of West Macedonia (Partner no 2).
11. «Methodologies for Implementing International Standards for Saffron Purity and Quality – SAFFIC», Sixth Framework Programme **2006-2009**, E.U
12. «CROCUSBANK “Genetic Resources of Saffron and Allies” AGRI GEN RES Community Programme **2007-2011**, E.U.
13. Omics Technologies for Crop Improvement, Traceability, Determination of Authenticity, Adulteration and Origin in Saffron, Cost Action FA 1101, May **2011 -2014**.

### List of papers

1. High Resolution Proton NMR Studies of 5'-GMP and Mg<sup>++</sup> Interactions and Anticarcinogenic Effect of Magnesium. T. Theophanides and M. Polissiou. **Inorg. Chim. Acta 56 L1-L3 (1981)**.
2. Platinum (II) and Palladium (II) Complexes with amino acid Derivatives. Synthesis, Interpretation of IR and NMR spectra and conformational Impications. S. Mylonas, A. Valavanidis, V. Voukouvalidis and M. Polissiou. **Inorg. Chim. Acta 55 p. 125-128, (1981)**.
3. High Resolution Nuclear Magnetic Resonance Studies of Platinum (II) Guanosine-5'-Monophosphate Interactions in Aqueous Solutions. M. Polissiou, P.V. Tan, M. ST. Jacques and T. Theophanides. **Can. J. Chem. 59, 3297-3302 (1981)**.
4. Synthesis of S-2-Aminoethyl-L-Cysteine and S-2- Aminoethyl-D, L-Penicillamine Complexes with Pt (II) and Pd (II). Interpretation of IR and 1H NMR Spectra and Conformational Implications. S. Mylonas, A. Valavanidis, V. Voukouvalidis and M. Polissiou. **Inorg. Chim. Acta 66, 25-28, (1982)**.
5. Products of Furans 3. Crystal and Molecular Structure, <sup>1</sup>H NMR and Conformational studies of 2-methyl-2-aryl substituted 6-Hydroxy-2H-pyran-3(6H)-one derivatives.

- Georgiadis, E. Couladouros, M. Polissiou, S. Filippakis, D. Mentzafos, A. Terzis. **J. Org. Chem.** **47**, 3054-3058 (1982).
6. Antitumor activity of Platinum (II) and Palladium (II) complexes of S-2-Aminoethyl-L-Cysteine, S-2-Aminoethyl-D, L-Penicillamine. S. Mylonas, A. Valavanidis, V. Voukouvalidis and M. Polissiou. **Chim. Chr., New Series** **12**, 165-168 (1983).
  7. Binding Study of cis and trans Dichlorodiammine Platinum (II) to G5'p by proton Carbon-13 Nuclear Magnetic Resonance spectroscopy. M. Polissiou, P.V. Tan, M. St. Jacques and T. Theophanides. **Inorg. Chim. Acta** **203-210**, (1985).
  8. FT-IR and <sup>1</sup>H NMR Spectroscopic Studies of C2'-endo, and C3'-endo Sugar Ring Conformations in 5'-GMP and 3'-GMP Nucleotides and their Platinum Complexes. Okamoto, V. Behnam, M. T. Phan Viet, M. Polissiou, J-Y Gauthier, S. Hanessian and T. Theophanides. **Inorg. Chim. Acta** **123**, 13-15, (1986).
  9. Magnesium-Nucleic Acid Conformational Changes and Cancer. T. Theophanides, M. Polissiou. **Magnesium** **5:221-233** (1986).
  10. NMR and FT-IR Conformational Studies of 8-Substituted Guanine. Nucleosides and their Metal Adducts and Cancer. M.Polissiou and T.Theophanides. **Inorg.Chim.Acta**, **137**, 195-201 (1987).
  11. Synthesis, Molecular Structure determination and Antitumor Activity of Platinum (II) and Palladium (II) Complexes of 2-substituted Benzimidazole. S.Mylonas, A.Valavanidis, K.Dimitropoulos, M.Polissiou, A.Tsiftsoglou and I.Vizirianakis. **J.Inorg.Biochem.** **34**, 265-275, (1988).
  12. Structure of a Dithiolane. D.Mentzafos, M.Polissiou and M.Georgiadis. **Acta Crystallogr.** **C44**, 2030-2031, (1988).
  13. Stereochemistry of the Bucherer-Berg Reaction and a Modified Strecker Reaction on Tetrahydro-2H-pyran-3-ones. S. Haroutounian, M. Georgiadis and M. Polissiou. **J. Heterocyclic Chem.** **26**, 1283-1287, (1989).
  14. Possible role of water structure in magnesium biological systems. T.Theophanides, J-F. Angiboust, M. Polissiou, J. Anastassopoulou and M. Manfait. **Magnesium Res.** **3**, pp. 5-13, (1990).
  15. A Convenient Synthesis of Oxaspiro[5.5]undecane derivatives. M.P.Georgiadis, A.Tsekouras, S.I.Kotretsou, S.A.Haroutounian and M.G.Polissiou. **Synthesis**, 929-932, (1991).
  16. The structure of dimethylcrocin. P.Tarantilis, M.Polissiou, D.Mentzafos, A.Terzis, M.Manfait. **J.Chem.Crystallogr.**, **24**, 739-742, (1994).
  17. Separation of picrocrocin, cis-trans-crocins and safranal of saffron using high-performance liquid chromatography with photodiode-array detection. P.Tarantilis, M.Polissiou, M.Manfait. **J.Chromatogr.A**, **664**, 55-61, (1994).
  18. Inhibition of Growth and Induction of Differentiation of Promyelocytic Leukemia (HL-60) by Carotenoids from *Crocus sativus* L. P.Tarantilis, M.Polissiou, M.Manfait. **Anticancer Res.**, **14**: 1913-1918 (1994).
  19. X-Ray and NMR studies on the rotational isomerism about C5-C6 bond of 6-substituted methyl-2,3,4-tri-O-acetyl-6-x-a-D glucopyranoside derivatives. Mentzafos, M. Polissiou, I. Grapsas, M.Georgiadis, A. Hountas and A.Terzis. **J.Chem.Crystallogr.**, **25**, 157-164, (1995).
  20. Determination of saffron (*Crocus sativus* L.) components in crude plant extract using high-performance liquid chromatography-UV-visible photodiode-array detection-mass spectrometry. P.Tarantilis, G.Tsoupras, M.Polissiou. **J.Chromatogr. A**, **699**, 107-118, (1995).
  21. Isolation and Identification of the Aroma Components from Saffron (*Crocus sativus* L.). P.Tarantilis, M.Polissiou **J.Agr.Food Chem.**, **45**, 459-462, (1997).
  22. Molecular and cellular Interaction of the Differentiating Antitumor Agent Dimethylcrocin with Nuclear Retinoic Acid Receptor as studied by Near-Infrared and Visible SERS Spectroscopy. A.Beljebbar, H.Morjani, J.F.Anngiboust, G.D.Sockalignum, M.Polissiou, M.Manfait. **J.Raman Spectrosc.**, **28**, 159-163, (1997).
  23. Automated flow injection spectrophotometric non-aqueous titrimetric determination of the free fatty acid content of olive oil. P.G.Nouros, C.A.Georgiou and M.G.Polissiou. **Anal. Chim. Acta** ,**351**, 291-297 (1997).

24. UV-Vis, FT-Raman and <sup>1</sup>H NMR Spectroscopies of Cis-Trans carotenoids from Saffron (*Crocus sativus* L.). M.K.Assimiadis, P.A.Tarantilis and M.G.Polissiou **Appl. Spectrosc.**, **52**, No 4, 5-8 (1998).
25. FT-IR, FT-Raman Spectroscopic study of carotenoids from Saffron (*Crocus Sativus* L.) and some derivatives. P.A.Tarantillis, A.Beljebbar, M.Manfait and M.Polissiou. **Spectrochim. Acta, A: Biomolecular Spectroscopy**, **54**, 651-657 (1998).
26. FT-IR Spectroscopic Determination of the Degree of Esterification of Cell Wall Pectins from stored Peaches and Correlation to textural changes. A.Chatjigakis, C.Pappas, N.Proxenia, O.Kalantzi, P.Rodis and M.Polissiou. **Carbohydr. Polym.**, **37**, 395-408 (1998).
27. Determination of Kenaf (*Hibiscus cannabinus* L.) Lignin in Crude Plant Material Using Diffuse Reflectance Infrared Fourier Transform Spectroscopy. C.Pappas, P.A. Tarantilis, and M. Polissiou **Appl. Spectrosc.**, **52**, 1399-1402 (1998).
28. Direct parallel flow injection multichannel spectrophotometric determination of olive oil peroxide value. P.G.Nouros, C.A.Georgiou and M.G.Polissiou **Analytica Chimica Acta**, **389** (1-3), 239-245 (1999)
29. Prediction of the pH in Wood by Diffuse Reflectance Infrared Fourier Transform Spectroscopy.C.Pappas, P. Rodis, P.A. Tarantilis, and M. Polissiou **Appl. Spectrosc.**, **53**, 805-809 (1999).
30. Interaction of β-Cyclodextrin with Unsaturated and Saturated Straight Chain Fatty Acid Anions Studied by Phenolphthalein displacement. **Journal of Inclusion Phenomena and Macrocyclic Chemistry**, **34**, 85-96, (1999).
31. Quantitative Determination of Fenthion in Pesticide Formulations by FT-Raman Spectroscopy. S.G. Skoulika, C.A. Georgiou and M.G. Polissiou **Appl. Spectrosc.**, **53** (11), 1470-1474 (1999).
32. FT-Raman Spectroscopy – Analytical Tool for Routine Analysis of Diazinon in Pesticide Formulations. S.G. Skoulika, C.A. Georgiou and M.G. Polissiou **Talanta**, **51**, 599-604 (2000).
33. Rapid Quantitative Analysis of Organophosphorus Pesticide Formulations by FT-Raman Spectroscopy. S.G. Skoulika, C.A. Georgiou and M.G. Polissiou **Internet Journal of Vibrational Spectrosc.**, **4** (3), 2 (2000).
34. Determination of olive oil 2-thiobarbituric acid reactive substances by parallel flow injection. P.G.Nouros, C.A.Georgiou and M.G.Polissiou **Analytica Chimica Acta**, **417** (1), 119-124, (2000).
35. GC-MS Analysis of Essential Oils from Some Greek Aromatic Plants and their Fungitoxicity on *Penicillium digitatum*, D. J. Daferera, Basil N. Ziogas, M. G. Polissiou, **J. Agric. Food Chem.** **48** (6), 2576-2581 (2000).
36. Fourier transform Raman spectroscopic characterisation of cells of the plant-associated soil bacterium *Azospirillum brasilense* Sp7. Kamnev, A. A. Tarantilis, P. A. Antonyuk, L. P. Bespalova, L. A.; Polissiou, M. G. Colina, M. Gardiner, P. H. Ignatov, V. V. **J. Mol. Struct.** **563-564**, 199-207 (2001).
37. Spectroscopic investigation of indole-3-acetic acid interaction with iron(III) Kamnev, A. A. Shchelochkov, A. G. Perfiliev, Y. D. Tarantilis, P. A. Polissiou, M. G. **J. Mol. Struct.** **563-564**, 565-572 (2001).
38. Complexation of Indole-3-acetic Acid with Iron(III): Influence of Coordination on the pi-Electronic System of the Ligand Kamnev, A. A. Shchelochkov, A. G. Tarantilis, P. A. Polissiou, M. G. Perfiliev, Y. D. **Monats. Chem.** **132**, 675-682 (2001).
39. Enzymatic acylation of hydroxypropyl cellulose in organic media and determination of ester formation by diffuse reflectance infrared Fourier transform (DRIFT) spectroscopy Sereti V, Stamatis H, Pappas C, Polissiou M, Kolisis FN **Biotechnology and Bioengineering** **72** (4): 495-500, 2001.
40. Comparison of classical and ultrasound-assisted isolation procedures of cellulose from kenaf (*Hibiscus cannabinus* L.) and eucalyptus (*Eucalyptus rodustrus* Sm.) Pappas, C. Tarantilis, P. A. Daliani, I. Mavromoustakos, T.; Polissiou, M. **Ultrason. Sonochem.** **9**, 19-23 ( 2002).
41. Fourier transform infrared spectroscopic characterization of heavy metal-induced metabolic changes in the plant-associated soil bacterium *Azospirillum brasilense* Sp7.

- A. A. Kamnev, L. P. Antonyuk, A. V. Tugarova, P. A. Tarantilis, M. G. Polissiou and P. H. E. Gardiner. **J. Mol. Struct.**, **610**, 127-131 (2002).
42. Quantitative analysis of  $\alpha$ -pinene and  $\beta$ -myrcene in mastic gum oil using FT-Raman spectroscopy, D. Daferera, C. Pappas, P. A. Tarantilis and M. Polissiou. **Food Chem.** **77**, 511-515 (2002).
43. Characterization of essential oils from lamiaceae species by fourier transform raman spectroscopy. D.J. Daferera, P.A. Tarantilis, and M.G. Polissiou **J. Agric. Food Chem.** **50**, 5503-5507 (2002).
44. Spectroimmunochemistry using colloidal gold bioconjugates A.A. Kamnev, L.A. Dykman, P.A. Tarantilis, M.G. Polissiou **Bioscience Reports.** **22**. No. 5/6, 541-547 (2002).
45. Compositions and the *in vitro* antimicrobial activities of the essential oils of *Achillea setacea* and *Achillea teretifolia* (Compositae), M. Ünlü, D. Daferera, E. Dönmez, M. Polissiou, and A. Sökmen. **Journal of Ethnopharmacology**, **83** (1-2), 117-121 (2002).
46. A New Method for Pollen Identification by FT-IR Spectroscopy. C.S. Pappas, P.A. Tarantilis, P. C. Harizanis, M.G. Polissiou **Appl. Spectrosc.** **57**(1), 23-27 (2003).
47. Isolation and spectroscopic study of pectic substances from kenaf (*Hibiscus cannabinus* L.) C.S. Pappas, P.A. Tarantilis and M.G. Polissiou **Natural Products Research**, **17** (3), 171-176 (2003).
48. The Effectiveness of plant Essential Oils on *Botrytis cinerea*, *Fusarium* sp., and *Clavibacter michiganensis* subsp. *michiganensis*, D. J. Daferera, Basil N. Ziogas, M. G. Polissiou, **Crop protection** **22** (1), 39-44 (2003).
49. Ultrasound-Assisted Extraction of Volatile Compounds from Citrus Flowers And Citrus Honey. E. Alissandrakis, D. Daferera, P. A. Tarantilis, M. Polissiou, P. C. Harizanis, **Food Chem.** **82**, 575-582 (2003).
50. Antimicrobial and Antioxidant Activity of the Essential Oil and Methanol Extracts of *Thymus pectinatus* Fish. et Mey. var. *pectinatus* (Lamiaceae). G. Vardar-Ünlü, F. Candan, A. Sökmen, D. Daferera, M. Polissiou, M. Sökmen, E. Dönmez and B. Tepe, **J.Agric. Food Chem.**, **51** (1), 63-67 (2003).
51. Antimicrobial Activity of Essential Oil and Methanol Extracts of *Achillea sintenisii* Hub. Mor. (Asteraceae), A. Sökmen, G. Vardar-Ünlü, M. Polissiou, D. Daferera, M. Sökmen, B. Tepe, and E. Dönmez. **Phytotherapy Research**, **17**, 1005-1010 (2003).
52. In Vitro Antibacterial, Antifungal, and Antioxidant Activities of the Essential Oil and Methanol Extracts of Herbal Parts and Callus Cultures of *Satureja hortensis* L., M. Güllüce, M. Sokmen, D. Daferera, G. Açar, H. Özkan, N. Kartal, M. Polissiou, A. Sokmen, and F. Şahin, **J. Agric. Food Chem.** **51** (14), 3958-3965, (2003).
53. Antioxidant and Antimicrobial Activity of the Essential Oil and Methanol Extracts of *Achillea millefolium* subsp. *millefolium* Afan. (Asteraceae), F. Candan, M. Unlu, D. Daferera, M. Polissiou, A. Sökmen, and H. Aşkın Akpulat. **Journal of Ethnopharmacology.** **87** (2-3), 215-220 (2003).
54. Determination of uronic acids in isolated hemicelluloses from kenaf using diffuse reflectance infrared fourier transform Spectroscopy (DRIFTS) and the curve-fitting deconvolution method. A. N. Batsoulis, M. K. Nacos, C. S. Pappas, P. A. Tarantilis, T. Mavromoustakos, and M. G. Polissiou. **Appl. Spectrosc.** **58**(2), 199-222 (2004).
55. Antimicrobial and Antioxidative Activity of the Essential Oils and Methanol Extracts of *Salvia cryptantha* (Montbret et Aucher ex Benth.) and *Salvia multicaulis* (Vahl), B. Tepe, E. Donmez, M. Unlu, F. Candan, D. Daferera, G. Vardar-Unlu, M. Polissiou and A. Sökmen. **Food Chemistry**, **84**(4), 519-525, (2004).
56. In Vitro Antimicrobial and Antioxidant Activities of the Essential Oils and Various Extracts of *Thymus eigii* M. Zohary et P.H. Davis Tepe, B., Daferera, D., Sokmen, M., Polissiou, M., Sokmen, A. **J. Agric. Food Chem.**, **52**(5), 1132-1137, 2004.
57. Biological activities of the essential oils and methanol extract of *Origanum vulgare* ssp. *vulgare* in the Eastern Anatolia region of Turkey, F. Şahin, M. Güllüce, D. Daferera, A. Sökmen, M. Sökmen, M. Polissiou, G. Agar and H. Özer. **Food Control**, **2004**, **15**(7), 549-557.
58. The in vitro antimicrobial and antioxidant activities of the essential oils and methanol extracts of endemic *Thymus spathulifolius*. A. Sokmen, M. Gulluce, H. Askin Akpulat, D. Daferera, B. Tepe, M. Polissiou, M. Sokmen, F. Sahin. **Food Control**, **15** (2004)

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60. Spectroscopic determination of the degree of esterefication of pectic substances from kenaf. Christos S. Pappas, Petros A. Tarantilis and Moschos.G. Polissiou **Natural Products Research**, **18 (4)** 335-340 2004.
61. Determination of the degree of esterification of pectinates with decyl and benzyl ester groups by diffuse reflectance infrared Fourier transform spectroscopy (DRIFTS) and curve-fitting deconvolution method. C.S. Pappas, A. Malovikova, Z. Hromadkova, P.A.Tarantilis, A. Ebringerova, M.G. Polissiou. **Carbohydrate Polymers** **56 (4)** 465-469 2004.
62. In Vitro Antioxidant, Antimicrobial, and Antiviral Activities of the Essential Oil and Various Extracts from Herbal Parts and Callus Cultures of *Origanum acutidens*. Sokmen, M.; Serkedjieva, J.; Daferera, D.; Gulluce, M.; Polissiou, M.; Tepe, B.; Akpulat, H. A.; Sahin, F.; Sokmen, A.; **J. Agric. Food Chem.** **2004**, **52(11)**, 3309-3312.
63. Qualitative Determination of Volatile Compounds and Quantitative Evaluation of Safranal and 4-Hydroxy-2,6,6-trimethyl-1-cyclohexene-1-carboxaldehyde (HTCC) in Greek Saffron. Kanakis, C. D.; Daferera, D. J.; Tarantilis, P. A.; Polissiou, M. G.; **J. Agric. Food Chem.**; **2004**; **52(14)**; 4515-4521.
64. The *in vitro* antioxidant and antimicrobial activities of the essential oil and various extracts of *Origanum syriacum* L var *bevanii*. B. Tepe, D. Daferera, M. Sokmen, M. Polissiou and A. Sokmen. **J Sci Food Agric** **84:1389–1396 (2004)**.
65. The effect of sowing date and growth stage on the essential oil composition of three types of parsley. SA Petropoulos, D Daferera, CA Akoumianakis, HC Passam, MG Polissiou. **J Sci Food Agric** **84:1606–1610 (2004)**.
66. Chemical analysis and antitumor activity of natural and semi-natural carotenoids of saffron. P.A. Tarantilis, M.G. Polissiou, **Acta Horticulturae**, **650**, (2004), 447-459.
67. Kenaf (*Hibiscus cannabinus* L.) based substrates for the production of compact plants. A. Tsakonas, V. Stergiou, M. Polissiou, K. Akoumianakis and H. C. Passam **Industrial Crops and Products**, **21 (2)**, 2004, 223-227.
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69. Antimicrobial and antioxidant activities of the essential oil and various extracts of *Salvia tomentosa* Miller (Lamiaceae), B. Tepe, D. Daferera, A. Sokmen, M. Sokmen and M. Polissiou. **Food Chemistry** **90(3)**, 2005, 333-340.
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73. FT-Raman Spectroscopic Simultaneous Determination of Fructose and Glucose in Honey. Batsoulis, A. N.; Siatis, N. G.; Kimbaris, A. C.; Alissandrakis, E. K.; Pappas, C. S.; Tarantilis, P. A.; Harizanis, P. C.; Polissiou, M. G.; **J. Agric. Food Chem.** **2005**, **53**, 207-210.
74. Composition of the essential oils of *Tanacetum argyrophyllum* (C. Koch) Tvetz. var. *argyrophyllum* and *Tanacetum parthenium* (L.) Schultz Bip. (Asteraceae) from Turkey.

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5. High- Sensitive Detection of Intracellular Carotenoids in Single Living Cancer Cells as Probed by Surface-Enhanced Raman Microspectroscopy. M.Manfait, H.Morjani, R.Efremov, J.-F.Angiboust, M.Polissiou, I.Nabiev. **Spectroscopy of Biological Molecules**. R.E. Hester et al. (Eds.).The Royal Society Chemistry Cambridge **1991**, pp. 303-304.
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8. Magnesium and drinking water for health. S.Missailidis, J.Anastassopoulou, M.Polissiou, P.Tarantilis, Th.Theophanides. **Metal ions in Biology and Medicine**. J.Anastassopoulou et al. (Eds.). John Libbey Eurotext, Paris, **1992**, vol.2, pp. 351-353.
9. Differential interaction modes of dimethylcroctin in K562 and HL60 tumor cells as probed by near infrared FT-Raman microspectroscopy. A.Beljebbar, G.D.Sockalignum, H.Morjani, J.F.Angiboust, M.Polissiou, M.Manfait. **Spectroscopy of Biological Molecules**, J.C.Merlin et al.(Eds.). Kluwer Academic Publishers, Printed in The Netherlands **1995**, pp. **475-476**.
10. Monitoring the chemical changes of fruits and condiments by FT-IR and FT-Raman spectroscopies. M.Polissiou. **Spectroscopy of Biological Molecules**, J.C.Merlin et al. (Eds.). Kluwer Academic Publishers, Printed in the Netherlands **1995**, pp. **599- 602**.
11. FT-IR spectroscopy: A non-destructive method for the evaluation of the degree of esterification of pectins of peach cell wall materials. A.K.Chatjigakis, N.Proxenia, O.Kalantzi, P.Rodis, M.Polissiou **Spectroscopy of Biological Molecules**, J.C.Merlin et al.(Eds.). Kluwer Academic Publishers, Printed in The Netherlands **1995**, pp. **605-606**.
12. Near-Infrared Raman and Visible SERS Investigation of the molecular and cellular interaction of differentiating agent dimethylcroctin with human nuclear retionic acid receptor. Morjani, A. Beljebbar, G.D. Sockalignum, J.F. Angiboust, M. Polissiou and M.Manfait. **Spectroscopy of Biological Molecules: Modern Trends**. P.Carmona et al. (Eds.). Kluwer Academic Publishers. Printed in the Netherlands **1997**, pp. 399-400.
13. Determination of sugars in fruit juices with FT-IR spectroscopy. A.K.Chatjigakis, V.Valsamaki, M.Hoekman, M.Polissiou. **Spectroscopy of Biological Molecules. Modern Trends**. P.Carmona et al. (Eds.). Kluwer Academic Publishers, Printed in The Netherlands **1997**, pp. **491-492**.
14. Characterization of cis-trans isomers of saffron carotenoids by UV-Vis, FT-Raman and <sup>1</sup>H NMR spectroscopies. M.K. Assimiadis, P.A.Tarantilis and M.G.Polissiou **Spectroscopy of Biological Molecules: Modern Trends**. P.Carmona et al.(Eds.). Kluwer Academic Publishers. Printed in the Netherlands **1997**, pp.**495-496**.
15. Automated flow injection spectrophotometric determination of olive oil free fatty acid content and comparison with FT-IR method. P.Nouros, C.A.Georgiou, M.Polissiou. **Spectroscopy of Biological Molecules. Modern Trends**. P.Carmona et al.(eds.). Kluwer Academic Publishers, Printed in The Netherlands **1997**, pp. **497-498**.
16. Spectroscopic study of iron(III) complexes with some indole derivatives. A.G. Shchelochkov, A.A. Kamnev, P. A. Tarantilis and M. G. Polissiou. **Metal ions in Biology and Medicine**, vol. 7. Eds. L. Khassanova, Ph. Collery, I. Maynard, Z. Khassanova, J-C. Etienne. John Libbey Eurotext, Paris **2002**, pp. **37-40**.
17. Surface-enhanced Fourier transform infrared spectroscopy of protein A conjugated with colloidal gold. A.A. Kamnev, L. A. Dykman, P. A. Tarantilis and M. G. Polissiou. **Metal ions in Biology and Medicine**, vol. 7. Eds. L. Khassanova, Ph. Collery, I. Maynard, Z. Khassanova, J-C. Etienne. John Libbey Eurotext, Paris **2002**, pp. **231-236**.
18. Spectroscopic aspects in studying the impact of heavy metals on rhizobacteria and their role in bacterial metabolism. A.A. Kamnev, L. P. Antonyuk P. A. Tarantilis, M. G. Polissiou, L. A. Kulikov and Y.D. Perfiliev. **Metal ions in Biology and Medicine**, vol. 7. Eds. L. Khassanova, Ph. Collery, I. Maynard, Z. Khassanova, J-C. Etienne. John Libbey Eurotext, Paris **2002**, pp. **104-107**.
19. Effects of heavy metals on the plant-associated bacterium *Azospirillum brasiliense*: endophytic and non-endophytic strains. A.V. Tugarova, A.A. Kamnev, L. P. Antonyuk P. A. Tarantilis and M. G. Polissiou. **Metal ions in Biology and Medicine**, vol. 7. Eds. L. Khassanova, Ph. Collery, I. Maynard, Z. Khassanova, J-C. Etienne. John Libbey Eurotext, Paris **2002**, pp. **237-241**.

#### Invited presentations

1. Monitoring the chemical changes of fruits and condiments by FT-IR and FT-Raman spectroscopies. M.G. Polissiou. **6<sup>th</sup> European Conference on the spectroscopy of biological molecules. 3-8 September 1995, Villeneuve d'Ascq, France.**

2. Chemical Analysis and Antitumor Activity of Natural and Semi-Natural Carotenoids of Saffron P. A. Tarantilis and M. G. Polissiou. **1<sup>st</sup> International Symposium on Saffron Biology and Biotechnology, 22-25 October 2003, Albacete, Spain.**
3. Presentation of WHITE BOOK: Saffron in Europe. Moschos G. Polissiou. **3<sup>rd</sup> international Symposium on Saffron, 20-23 May 2009, Krokos, Kozani, GREECE.**
4. FT-IR and Raman spectroscopy in phytochemical analysis of medicinal and aromatic plants. Moschos Polissiou, **6<sup>th</sup> Black Sea Basin Conference on Analytical Chemistry, 10 – 14 September 2013, Trabzon, Turkey.**
5. Food Bioactive Constituents of Greek Diet. Moschos Polissiou. **12<sup>th</sup> National Conference on Nutrition and Dietetics, 5 – 8 December 2013, Athens.**

#### Organisation of International Conferences

1. 1<sup>st</sup> International Symposium on Metal ions in Biology and Medicine, Reims, France, 1990.
2. Cost Chemistry Action D6: Workshop on Chemistry and Biochemistry under extreme conditions, Santorini, Greece, 1998.
3. Cost Action FA 1101: WG2 Interim Meeting on Phytochemistry and metabolomics and WP2/WP4 Looking for Synergy and Dissemination Capacity Building, 24-26/5/2012, Athens, Greece.

#### Editorial Board member of International Journals or in Special Issues

1. Scientific Journal *Magnesium Research*.
2. Proceedings of the 1<sup>st</sup> International Symposium on Saffron Biology and Biotechnology. *Acta Horticulturae*, Volume 650, **2004**.
3. Proceedings of the 3<sup>rd</sup> International Symposium on Saffron: Forthcoming challenges in cultivation, research and economics. *Acta Horticulturae*, Volume 850, **2010**.

#### Recent International Congresses (2002-xxxx)

1. Fourier transform raman spectroscopic study of indole-3-acetic acid and its Fe(iii) complex in acetone solutions. Kamnev, A. A. Shchelochkov, A. G. Tarantilis, P. A. Polissiou, M. G. **Eighteenth International Conference on Raman Spectroscopy. Raman spectroscopy 2002 VOL 18, page(s) 873-874.**
2. Effects of colloidal gold particle size on surface-enhanced infrared absorption (SEIRA) of protein A conjugate and its interaction with immunoglobulin. Alexander A. Kamnev, Lev A. Dykman, Petros A. Tarantilis and Moschos G. Polissiou. **XXVI European Congress on Molecular Spectroscopy. 1- 6 September 2002. Villeneuve d'Ascq – France.**
3. Isolation and spectroscopic study of xylans from kenaf and of acidic fragments from their enzymatic digestion. M.K. Nacos, C. Pappas, P. Katapodis, P. Christakopoulos, D. Daferera, P.A. Tarantilis, M. Polissiou. **10th Bratislava Symposium on Saccharides. September 1-6, 2002, Smolenice, Slovakia, Program and Abstracts p. 43.**
4. Determination of the Degree of Esterification of Pectic Substances from Kenaf. C.S. Pappas, P.A. Tarantilis and M.G. Polissiou. **3rd Aegean Analytical Chemistry Days Polihnitos, Lesvos, Greece. September 29 - October 3, 2002 Proceedings p. 115-118.**
5. Ultrasound based method for the extraction of essential oils from aromatic plants. D. Daferera, P.A. Tarantilis, M. Polissiou. **Ultrasonics International 2003, 30 June-3 July 2003, Granada, Spain.**
6. Ultrasound assisted extraction of the essential oil from Saffron. C. Kanakis, P.A. Tarantilis, M. Polissiou. **Ultrasonics International 2003, 30 June-3 July 2003, Granada, Spain**
7. Chemical Analysis and Antitumor Activity of Natural and Semi-Natural Carotenoids of Saffron P. A. Tarantilis and M. G. Polissiou. **Proceedings of the 1<sup>st</sup> International Symposium on Saffron Biology and Biotechnology. Albacete, Spain 22-25 October 2003. Acta Horticulturae 650 (2004), 447-459.**
8. Effects of heavy metals on plant-associated rhizobacteria. A. V. Tugarova, A.A. kamnev, L.P. Antonyuk, P.H.E. Gardiner, P.A. Tarantilis, and M.G. Polissiou. Federation

- of European Societies on Trace Elements and Minerals, **Second International Symposium on Trace Elements and Minerals in Medicine and Biology, May, 13-15, 2004, Neuherberg-Munich**
9. Biopolymers conjugated with gold nanoparticles: FTIR spectroscopic study and detection of biospecific interactions. A.A. kamnev, L.A. Dykman, L.P. Antonyuk, Y.N. Sadovnikova, P.A. Tarantilis, and M.G. Polissiou. **5<sup>th</sup> International Symposium, Molecular Mobility and Oder in Polymer Systems. June 20-24, 2005, Saint Petersburg**
  10. Studies on *Thymus teucrioides* subsp. *candilicus*: Chemical composition of the essential oil content of the glandular trichomes, using a novel isolation method. A. Markantonatou, D. Daferera, V. Liakoura, P.A. Tarantilis, G. Karabourniotis, M. Polissiou, C. Fasseas. **XVII International Botanical Congress 17-23 July 2005, Vienna, Austria.**
  11. Surface-Enhanced FTIR Absorption Spectroscopy (FT-SEIRAS) of Proteins: the Effects of Conjugation with Colloidal Gold and Biospecific Interactions. A.A. kamnev, L.A. Dykman, P.A. Tarantilis, L.P. Antonyuk and M.G. Polissiou. Books of Abstracts **11<sup>th</sup> European Conference on the Spectroscopy of Biological Molecules. September 3-5, 2005, Aschaffenburg, Germany.**
  12. Instrumental analysis of bacterial cells and cellular constituents using vibrational and emission Mössbauer spectroscopy techniques. A.A. Kamnev, P.A. Tarantilis, Y.D. Perfiliev, L.P. Antonyuk, M.G. Polissiou. **Instrumental Methods of Analysis Modern Trends and Applications, IMA'05, 2-6 October, 2005 Iraklion, Crete, Greece.**
  13. Monitoring of allicin transformation to garlic essential oil constituents by means of FT-IR spectroscopy. N.G. Siatis, A.C. Kimbaris, D. J. Daferera, C.S. Pappas, P.A. Tarantilis, and M.G. Polissiou. **Instrumental Methods of Analysis Modern Trends and Applications, IMA'05, 2-6 October, 2005 Iraklion, Crete, Greece.**
  14. Evaluation of FT-Raman and FT-IR determination methods of honey floral origin A.N. Batsoulis, N.G Siatis, E.K.Aliassandrakis, C.S. Pappas, A.C. Kimbaris, P.A. Tarantilis, P.C. Harizanis and M.G. Polissiou. **Instrumental Methods of Analysis Modern Trends and Applications, IMA'05, 2-6 October, 2005 Iraklion, Crete, Greece.**
  15. Food characterization – Characterization of goat and ovine milk using FT-IR spectroscopy. C.S. Pappas, E. Moschopoulou, G. Moatsou, P.A. Tarantilis, I. Kandarakis, M.G. Polissiou. **International Congress on Bioprocesses in Food Industries, ICBF-2006 18-19 June 2006 Patras**
  16. Comparison of the antioxidant activity of Saffron's essential oil obtained by Hydrodistillation and Saffron's essential oil obtained by Ultrasound Assisted Extraction. C. D. Kanakis, D. J. Daferera, P.A. Tarantilis, M. Polissiou. **International Congress on Bioprocesses in Food Industries, ICBF-2006 18-19 June 2006 Patras**
  17. Discrimination of Acid Tolerant Phenotypes of *Streptococcus Macedonicus* by Fourier Transform Infrared Spectroscopy and Principal Component Analysis. K. Papadimitriou, G. Zoumpopoulou, P.A. Tarantilis, M. Polissiou, E. Tsakalidou. **FoodMicro 2006, Food Safety and Food Biotechnology: Diversity and Global Impact. August 29 – September 2, 2006, Bologna – Italy.**
  18. FTIR Spectroscopic Detection and Study of Biospecific Interactions Using Functionalised Gold Nanoparticles. A.A. Kamnev, L.A. Dykman, L.P. Antonyuk, P.A. Tarantilis and M.G. Polissiou. **XXVIII European Congress on Molecular Spectroscopy, September 3-8, 2006. Instabul, Turkey.**
  19. Isolation-Determination of Secondary Metabolites from Aromatic Plants and Study of their Antioxidant Activity. A.C. Kimbaris, E.G. Anastasaki, O.A. Papantoni, P.A. Tarantilis, M.G. Polissiou. **5<sup>th</sup> International Conference on Instrumental Analysis Modern Trends and Applications. 30 September- 4 October 2007, Rio-Patras Greece.**
  20. Antioxidant activity of crocins, crocetin and dimethylcrocetin tested by the DPPH antioxidant capacity assay. C. D. Kanakis, P.A. Tarantilis, M. G. Polissiou. **5<sup>th</sup> International Conference on Instrumental Analysis Modern Trends and Applications. 30 September- 4 October 2007, Rio-Patras Greece.**
  21. Determination of safranal percentage content in saffron (*Crocus sativus L.*) extracts using FT-IR spectroscopy. C.S.Pappas, C.D. Kanakis, E.G. Anastasaki, P.A. Tarantilis and M.G. Polissiou. **5<sup>th</sup> International Conference on Instrumental Analysis Modern Trends and Applications. 30 September- 4 October 2007, Rio-Patras Greece.**

22. Determination of caprine percentage content in milk mixtures using FT-IR spectroscopy. C.S.Pappas, E. Moschopoulou, G. Moatsou, P.A. Tarantilis, I. Kandarakis, M.G. Polissiou. **5<sup>th</sup> International Conference on Instrumental Analysis Modern Trends and Applications. 30 September- 4 October 2007, Rio-Patras Greece.**
23. Instrumental analysis of bacterial cells growing under different stress conditions using Diffuse Reflectance Infrared Fourier Transform (DRIFT) spectroscopy. A.A. Kamnev, P.A. Tarantilis, J.N. Sandovnikova, L.P. Antonyuk, M.G. Polissiou. **5<sup>th</sup> International Conference on Instrumental Analysis Modern Trends and Applications. 30 September- 4 October 2007, Rio-Patras Greece.**
24. SyMiC: A novel methodology for the location and exploitation of "economically important metabolites" of wild plants bearing glandular trichomes. Markantonatou, A., Daferera, D., Liakoura, V, Tarantilis, P., Constantinidis, T., Karabourniotis, G., Polissiou, M., Fasseas, C. Abstracts of Botany 2008. **Botany without Borders. July 26–30, 2008. University of British Columbia, Vancouver BC.**
25. Geographical origin of Saffron spice by Mid-Infrared spectroscopy (MIR), E.G. Anastasaki, C.D. Kanakis, C.S. Pappas, P.A. Tarantilis, M.G. Polissiou, **7<sup>th</sup> Joint Meeting of APERP, ASP, GA, PSE & SIF, August 3-8, 2008, Athens, Greece.**
26. "Insecticidal activity against *Myzus persicae* and chemical composition of three Lamiaceae essential oils obtained by microwave-assisted hydrodistillation: Comparison with traditional hydrodistillation". Petrakis, E., Kimbaris, A., Perdikis, D., Lykouressis, D., Tarantilis P., and Polissiou, M. **7th Joint Meeting "Natural Products", 3-8 August 2008, Athens Greece.**
27. Activity of non-oxygenated versus oxygenated monoterpenes against mosquitoes. An attempt to correlate toxicity with chemical structure. Michaelakis A, Koliopoulos G, Milonas P, Kontodimas D, Polissiou M, Kimbaris A, Papachristos D. **7th Joint Meeting "Natural Products", 3-8 August 2008, Athens Greece.**
28. "Repellent properties of hydrosols derived from three Lamiaceae species against the insect pest *Myzus persicae*". Petrakis, E., Perdikis, D., Kimbaris, A., Lykouressis, D., Tarantilis P., and Polissiou, M. **7th Joint Meeting "Natural Products", 3-8 August 2008, Athens Greece.**
29. Discrimination of saffron from different producing countries by mid-infrared spectroscopy. E.G. Anastasaki, C.D. Kanakis, C.S. Pappas, P.A. Tarantilis, L. Maggi, C.P. del Campo, M. Carmona, G.L. Alonso, M.G. Polissiou. **3<sup>rd</sup> international Symposium on Saffron, Krokos, Kozani, GREECE, 20-23 May 2009.**
30. Presentation of SAFFIC Project: results on methodologies for implementing international standards for saffron purity and quality. Manuel Carmona, Luana Maggi, C. Priscila del Campo, Gonzalo L. Alonso, Charalabos D. Kanakis, Eirini Anastasaki, Petros A. Tarantilis, Moschos G. Polissiou. **3<sup>rd</sup> international Symposium on Saffron, Krokos, Kozani, GREECE, 20-23 May 2009.**
31. Antioxidant saffron constituents bind DNA and tRNA. C.D. Kanakis, P.A. Tarantilis, H.A. Tajmir-Riahi and M.G. Polissiou. **3<sup>rd</sup> international Symposium on Saffron, Krokos, Kozani, GREECE, 20-23 May 2009.**
32. Antiamnestic and anxiolytic properties of the active constituents of *Crocus sativus* L., crocins. N. Pitsikas, A. Boulதாகakis, S. Zisopoulou, G. Georgiadou, P.A. Tarantilis and M.G. Polissiou. **3<sup>rd</sup> international Symposium on Saffron, Krokos, Kozani, GREECE, 20-23 May 2009.**
33. Do anthocyanins play a role in peltate gland metabolites of *Thymus teucrioides* subsp. *candilicus* leaves? Conclusions and ramifications. Anastasia Markantonatou, Vally Liakoura, Dimitra Daferera, Petros Tarantilis, Moschos Polissiou, Costas Fasseas, **5<sup>th</sup> Balkan Botanical Congress, 7-11 September 2009, Belgrade, Serbia.**
34. Determination of crocins content in saffron (*Crocus sativus* L.) using Raman spectroscopy. E.G. Anastasaki, C.D. kanakis, C.S. Pappas, P.A. Tarantilis, L. Maggi, C.P. del Campo, M. Carmona, G.L. Alonso, M.G. Polissiou. **IMA 2009, Athens, Greece, 4-8 October, 2009, 95p.**
35. Quantitative determination of pulegone by FT-IR spectroscopy. Eleftherios A. Petrakis, Athanasios C. Kimbaris, Christos S. Pappas, Petros A. Tarantilis, Moschos G. Polissiou, **IMA 2009, Athens, Greece, 4-8 October, 2009, 96p .**



36. Determination of the geographical origin of *Menta pulegium* using mid-infrared spectroscopy. C.D. Kanakis, E.A. Petrakis, A.C. Kimbaris, C. Pappas, P.A. Tarantilis, M.G. Polissiou. **IMA 2009, Athens, Greece, 4-8 October, 2009, 193p.**
37. Determination of Total Phenolic Content in Herbal Infusions by FT-IR and Chemometrics, E.G. Anastasaki, G. Kanellou, P.A. Tarantilis, M.G. Polissiou. **7<sup>th</sup> Aegean Analytical Chemistry Days, 29/9- 3/10/2010, Lesvos, Greece.**
38. Verification of the geographical origin of oregano (*Origanum vulgare* subsp. *hirtum*): Application of FT-IR spectroscopy and chemometrics. C. D. Kanakis, E. A. Petrakis, A. C. Kimbaris, P. A. Tarantilis, C. Pappas and **M. G. Polissiou. IMA 2011, The 7<sup>th</sup> International Conference on Instrumental Methods of Analysis Modern Trends and Applications, 18-22 Sept. 2011, Chania Crete, Greece.**
39. CHEMICAL CHARACTERIZATION OF DIFFERENT SPECIES OF THE GENUS *CROCUS* BY GC-MS AND FT-IR SPECTROSCOPY. **Polissiou M.**, Anastasaki E., Kanakis Ch., Petrakis E., Astraka K., Daferera D., Tarantilis P.A., Mantzouridou F., Tsimidou M., Santana Omar, De los Mozos-Pascual M., Fernandez Perez J-A. **1<sup>st</sup> INTERNATIONAL CONFERENCE, MEDICINAL CROPS (Plants & Mushrooms), Challenges and Prospects for Sustainable Development in Small Farming Athens, Greece, November 9-12, 2011.**
40. CLASSIFICATION OF MEDICINAL AND AROMATIC PLANTS ACCORDING TO GEOGRAPHICAL LOCATION USING FT-IR SPECTROSCOPY. **Polissiou M.G.**, Kanakis C.D., Petrakis E.A., Kimbaris A.C., Pappas C., Tarantilis P.A. **1<sup>st</sup> INTERNATIONAL CONFERENCE, MEDICINAL CROPS (Plants & Mushrooms), Challenges and Prospects for Sustainable Development in Small Farming Athens, Greece, November 9-12, 2011.**
41. Incidence of bacteriocins produced by food related lactic acid bacteria active towards oral pathogens. Zoumpopoulou G., Pepelassi E., Papaioannou W., Georgalaki M., Maragkoudakis P.A., Tarantilis P., Polissiou M., Tsakalidou E., and Papadimitriou K. **5<sup>th</sup> Conference of Microbiokosmos, Athens, Greece, December 13-15, 2012.**
42. Changes in *Lactococcus lactis* subsp. *cremoris* MG1363 cellular composition during stress adaptation as revealed by FT-IR spectroscopy. Kazou M., Zoumpopoulou G., Tarantilis P., Polissiou M., Tsakalidou E. and Papadimitriou K. **5<sup>th</sup> Conference of Microbiokosmos, Athens, Greece, December 13-15, 2012.**
43. Antimicrobial activity of *Melissa officinalis* L. and *Crocus sativus* L. against oral pathogens: Detection of cellular structural changes by FT-IR. Anastasaki E., Zoumpopoulou G., Papadimitriou K., Tarantilis P., Polissiou M. and Tsakalidou E. **5<sup>th</sup> Conference of Microbiokosmos, Athens, Greece, December 13-15, 2012.**
44. Biological activity of aromatic plants aqueous extracts against plant pathogenic and entomopathogenic fungi. Skotti E., Anastasaki E., Koundouri S.D., Bouchagier P., Tsitsigiannis D.I.b, Tarantilis P.A., Polissiou M. **5<sup>th</sup> Conference of Microbiokosmos, Athens, Greece, December 13-15, 2012.**
45. Total phenolics compounds, antioxidant activity and toxicity of selected medicinal and aromatic Plants. Skotti E., Anastasaki E., Tarantilis P.A., Polissiou M. **5<sup>th</sup> Conference of Microbiokosmos, Athens, Greece, December 13-15, 2012.**
46. Chemical Composition of Essential Oil of *Hyssopus officinalis* cultivated in Greece. D. Daferera and M. Polissiou. **6<sup>th</sup> Black Sea Basin Conference on Analytical Chemistry, 10 – 14 September 2013, Trabzon, Turkey.**

#### International collaborations

1. Laboratoire de Spectroscopie Biomoléculaire, U.F.R. de Pharmacie, 51096 Reims, France, Professor Michel Manfait (1988-1998).
2. Chemistry Department, Université de Montréal, Montreal, Quebec, Canada, H3C 3V1, Professor Theophile Theophanides(1980-1990).
3. Institute of Chemistry, Slovak Academy of Sciences, Dúbravská cesta, 842 38 Bratislava, Slovak Republic, Dr. Anna Ebringerová (2001-2004).
4. Department of Chemistry Biology, University of Québec, Trois-Rivières, TR (Québec) G9A5H7, Canada, Research Professor Heidar Ali Tajmir Riahi (2005-xxxx).

## CURRICULUM VITAE: Moschos POLISSIOU

5. Institute of Biochemistry and Physiology of Plants and Microorganisms, Russian Academy of Sciences, 13 Prosp. Entuziastov, 410015 Saratov, Russia, Dr. Alexander A. Kamnev (2000-xxxx).
6. Department of Biology, Faculty of Science and Literature, Karadeniz Technical University, Trabzon, Turkey, Professor Atalay Sökmen (2001-xxxx)
7. Cátedra de Química Agrícola, E.T.S.I. Agrónomos, Universidad Castilla-La Mancha, Campus Universitario, 02071 Albacete, Spain, Professor Gonzalo L. Alonso (2004-xxxx)
8. Laboratorio De Biotecnología-IDR, Universidad de Castilla-La Mancha (UCLM), Campus Universitario s/n, 02071 Albacete, Spain, Research Professor José-Antonio Fernández-Perez (2006-xxxx).
9. Centro Agrario de Albaladejito, Junta de Comunidades de Castilla-La Mancha, Ctra. Toledo-Cuenca km 174, 16194, Cuenca, Spain, Dr. Omar Santana.

### International Prizes and Awards

1. Award from Royal Academy of Science (Belgium), Prix STAS 1976.
2. Top-10 most cited author 2003-2008 for the article: The Effectiveness of plant Essential Oils on *Botrytis cinerea*, *Fusarium* sp., and *Clavibacter michiganensis* subsp. *michiganensis*, D. J. Daferera, Basil N. Ziogas, M. G. Polissiou, **Crop protection** **22** (1), 39-44 (2003).

**Reviewer of research projects for:** the Greek Government

### Reviewer in Scientific Journals: 20

1. Journal of Agricultural and Food Chemistry
2. Journal of Chromatography A
3. Analytica Chimica Acta
4. Applied Spectroscopy
5. Food Additives Contaminants
6. Food Chemistry
7. Journal of Molecular Structure
8. Journal of Plant Physiology
9. Ultrasonics Sonochemistry
10. Vibrational Spectroscopy
11. Journal of Photochemistry and Photobiology B: Biology
12. Chromatographia
13. Flavour and Fragrance Journal
14. British Journal of Pharmacology
15. Biomacromolecules
16. BMC Complementary and Alternative Medicine
17. SRX Pharmacology
18. Industrial Crops and Products
19. Journal of Molecular Liquids
20. Colloids and Surfaces B