

Δημήτριος Νίνος

Καθηγητής

Βιογραφικό σημείωμα

Σπουδές

- Πτυχίο Φυσικού, Εθνικό και Καποδιστριακό Πανεπιστήμιο Αθηνών (1969)
- Πτυχίο Μηχανικού ΕΜΠ (1973).
- M.Sc. Ηλεκτρονικής και Ραδιοηλεκτρολογίας, Εθνικό και Καποδιστριακό Πανεπιστήμιο Αθηνών (1975).
- Ph.D. Τμήμα Φυσικής, Τομέας Ηλεκτρονικής, Εθνικό και Καποδιστριακό Πανεπιστήμιο Αθηνών (2004).

Ακαδημαϊκή Απασχόληση

- Έμμισθος βοηθός στην έδρα Υψηλών Τάσεων και Ηλεκτρικών Μετρήσεων της Σχολής Ηλεκτρολόγων - Μηχανολόγων Μηχανικών του Εθνικού Μετσόβιου Πολυτεχνείου (1970-1978).
- Καθηγητής του Τμήματος Ηλεκτρονικών Μηχανικών της Σχολής Τεχνολογικών Εφαρμογών (ΣΤΕΦ) του ΤΕΙ Αθήνας (1978).
- Προϊστάμενος του Τμήματος Ηλεκτρονικών Μηχανικών του ΤΕΙ Αθήνας (1980-1986 & 2002-2005).
- Διευθυντής της Σχολής Τεχνολογικών Εφαρμογών (ΣΤΕΦ) του ΤΕΙ Αθήνας (1986-1992).
- Αντιπρόεδρος του Τεχνολογικού Εκπαιδευτικού Ιδρύματος (ΤΕΙ) Αθήνας (1992-1995).
- Πρόεδρος του Τεχνολογικού Εκπαιδευτικού Ιδρύματος (ΤΕΙ) Αθήνας (1995-1998, 1999-2002, 2005-2008, 2009-2012).

Μέλος Επιστημονικών και Επαγγελματικών Ενώσεων

- Μέλος Τεχνικού Επιμελητηρίου Ελλάδος (ΤΕΕ).
- Μέλος Ένωσης Ελλήνων Φυσικών (ΕΕΦ).

Διοικητικό Έργο

Συμμετοχή σε επιτροπές και όργανα για την:

- αναβάθμιση και αξιολόγηση των ΤΕΙ
- την ένταξη τους στην Ανώτατη Εκπαίδευση, και
- πρωτοβουλία λειτουργίας Μεταπτυχιακών Προγραμμάτων

Διδακτικό Έργο

- Ηλεκτρικές μετρήσεις
- Ηλεκτρονικές μετρήσεις
- Φυσική I
- Φυσική II
- Ηλεκτρονική Φυσική

Συγγραφικό έργο

- Ηλεκτρικές και Ηλεκτρονικές Μετρήσεις, Δ. Νίνος - Σ. Πακτίτης
- Φυσική I και II, Δ. Νίνος - Σ. Πακτίτης
- Ηλεκτρονική Φυσική, Δ. Νίνος - Ν. Παταργιάς
- Θεωρία Κυκλωμάτων, Δ. Νίνος - Σ. Πακτίτης

Ερευνητική Δραστηριότητα

A) Διδακτορική Διατριβή

Τίτλος: «Συμβολή στην ανίχνευση, καταγραφή και ερμηνεία της εκπομπής ακουστικών και ηλεκτρομαγνητικών κυμάτων και των φαινομένων μνήμης κατά την παραμόρφωση διηλεκτρικών κρυστάλλων», Πανεπιστήμιο Αθηνών, 2004.

B) Δημοσιευμένο επιστημονικό έργο σε διεθνή περιοδικά και συνέδρια

1. C. Mavromatou, V. Hadjikitis, D. Ninos, D. Mastrogiannis, E. Hadjikitis and K. Eftaxias, "Understanding the fracture phenomena in inhomogeneous electromagnetic emission during their deformation", EGS - AGU - EUG Joint Assembly, Nice, France 2003.
2. Mavromatou C., Hadjikitis V., Ninos D., Mastrogiannis D., Hadjikitis E., Eftaxias K., "Understanding the fracture phenomena in inhomogeneous rock

- samples and ionic crystals, by monitoring the electromagnetic emission during their deformation", *Physics and Chemistry of the Earth* 29 (4-9), pp. 353-357, 2004.
3. D. Ninos, G. Tombras, C. Mavromatou and V. Hadjicontis, "On the detection of acoustic and electromagnetic signals before of dielectric crystalline materials", *IEEE, Geoscience and Remote Sensing Letters*, 1(3), pp. 162.165, 2004.
 4. C. Mavromatou, D. Ninos, G. Tombras and V. Hadjicontis, "Electromagnetic Memory Effects in Cyclic deformation (loading - unloading) of rocks", *EGU 1st General Assembly, Nice, France, 2004.*
 5. V. Hadjicontis, C. Mavromatou, and D. Ninos, "Laboratory results on deformation process and accompanying electrification and electromagnetic emission phenomena of rocks and ionic crystals", presented at *EGU 1st General Assembly, Nice, France, 2004.*
 6. Hadjicontis V., Mavromatou C., Ninos D., "Stress induced polarization currents and electromagnetic emission from rocks and ionic crystals, accompanying their deformation", *Natural Hazards and Earth System Science* 4 (5-6), pp. 633-639, 2004.
 7. V. Hadjicontis, V. Panin, V. Deryugin, D. Ninos and C. Mavromatou, "Scale levels of strain localization and electric signal spectrum on the surface of LiF single crystals under compression", *Physical Mesomechanics* 7, p.109-116, 2004.
 8. V. Hadjicontis, V. Panin, V. Deryugin, D. Ninos, C. Mavromatou and K. Eftaxias, "Stages of strain localization and effects of electrical polarization in ionic crystals", *Proc. Int. Conf. MESO 2004, TOMSK, RUSSIA.*
 9. N. Piliouras, T. Kalatzis, P. Georgiadis, D. Ninos, G. Koulouras, G. Minadakis, D. Cavouras and K. Nomikos, "Electromagnetic seismic signal analysis employing pattern recognition methods", Accepted for presentation in: *1st International Conference: From Scientific Computing to Computational Engineering, Athens, September 2004.*
 10. C. Anastasiadis, I. Stavrakas, A. Kyriazopoulos, D. Ninos and D. Triantis, "Non destructive damage estimation on rocks with laboratory measurements of dielectric loss ($\tan\delta$)", *Proceedings of the 8th International Conference of the Slovenian Society for Non-Destructive Testing, Portorož, Slovenia, 1-3 September 2005*, pp. 401-407.
 11. D. Triantis, I. Stavrakas, P. Tsiakas, C. Stergiopoulos, D. Ninos, "A pilot application of electronic examination applied to students of electronic engineering: Preliminary results", *Advances in Engineering Education*, vol. 1, Issue 1, pp. 26-30, 2004.
 12. D.Ninos, Tombras G., Mavromatou C., Hadjicontis V., "On the detection of acoustic and electromagnetic signals before fracture of dielectric crystalline materials", *IEEE Geoscience and Remote Sensing Letters* 1 (3), pp. 162-165.

13. Hadjicontis V., Tombras G.S., Ninos D., Mavromatou C., "Memory effects in EM emission during uniaxial deformation of dielectric crystalline materials", IEEE Geoscience and Remote Sensing Letters 2 (2), pp 118-120, 2005.
14. Mavromatou C., Tombras G.S, Ninos D., Hadjicontis V., "Electromagnetic emission memory phenomena related to LIF ionic crystal deformation", Journal of Physics, 103 (8), art. no. 083518, 2008.

Αναφορές στο δημοσιευμένο έργο

Επιστημονική Δημοσίευση	Ετεροαναφορές
<p>Mavromatou C., Tombras G.S., Ninos D., Hadjicontis V., "Electromagnetic emission memory phenomena related to LIF ionic crystal deformation", Journal of Applied Physics, 103 (8), art. no. 083518, 2008.</p>	<p>1. Ai Q., Liu C.X., Chen X.R., He P., Wang Y., Acoustic emission of fatigue crack in pressure pipe under cyclic pressure, Nuclear Engineering and Design 240 (10), pp. 3616-3620, 2010.</p>
<p>Hadjikontis V., Tombras G.S., Ninos D., Mavromatou C., "Memory effects in EM emission during uniaxial deformation of dielectric crystalline materials", IEEE Geoscience and Remote Sensing Letters, pp. 118-120, 2005.</p>	<p>2. Hadjicontis V., Mavromatou C., Antsygina T.N., Chishko K.A., Mechanism of electromagnetic emission in plastically deformed ionic crystals, Physical Review B-- Condensed Matter and Materials Physics 76 (2), art. no. 024106, 2007.</p>
<p>Hadjikontis V., Mavromatou C., Ninos D., "Stress induced polarization currents and electromagnetic emission from rocks and ionic crystals, accompanying their deformation", Natural Hazards and earth System Science, (5-6), pp. 633-639, 2004.</p>	<p>3. Chen Z., Huang K.M., Using the oscillating dipoles model to study the electromagnetic radiation induced by fracture of rocks, Progress In Electromagnetics Research M 14, pp. 221-231, 2010.</p> <p>4. Lacidogna G., Manuello A., Carpinteri A., Niccolini G., Agosto A., Durin G., Acoustic and electromagnetic emissions in rocks under compression, Society for Experimental Mechanics - SEM Annual Conference and Exposition on Experimental and Applied Mechanics 2010 2, pp. 924-931, 2010.</p> <p>5. Chen Z., Huang K.M., A numerical analytic method for electromagnetic radiation accompanying with fracture of rocks, Chinese Physics B 19 (10), art. no. 105201, 2010.</p> <p>6. Lacidogna G., Manuello A., Durin G., Niccolini G., Agosto A., Carpinteri A., Acoustic and electromagnetic emissions as precursor phenomena in failure processes, Society for Experimental Mechanics - SEM Annual Conference and Exposition on Experimental and Applied Mechanics 2009 1, pp. 24-32, 2009.</p> <p>7. Hadjicontis V., Mavromatou C., Antsygina T.N., Chishko K.A.,</p>

	<p>Mechanism of electromagnetic emission in plastically deformed ionic crystals, <i>Physical Review B - Condensed Matter and Materials Physics</i> 76 (2), art. no. 024106, 2007.</p> <p>8. K.P. Teisseyre in the chapter "Charged Dislocations and Various Sources of Electric Field Excitation", of the Book: <i>Physics of asymmetric continuum: extreme and fracture processes : earthquake rotation and solid waves</i>, Springer, ISBN 978-3-540-68354-4.</p>
<p>Ninos D., Tombras G.S., Mavromatou C., Hadjicontis V., "On the detection of acoustic and electromagnetic signals before fracture of dielectric crystalline materials", 2004, <i>IEEE Geoscience and Remote Sensing Letters</i>, (3), pp. 162-165, 2004.</p>	<p>9. Hadjicontis V., Mavromatou C., Antsygina T.N., Chishko K.A., Mechanism of electromagnetic emission in plastically deformed ionic crystals, <i>Physical Review B - Condensed Matter and Materials Physics</i> 76 (2), art. no. 024106, 2007.</p> <p>10. Hadjicontis V., Tombras G.S., Ninos D., Mavromatou C., Memory effects in EM emission during uniaxial deformation of dielectric crystalline materials, <i>IEEE Geoscience and Remote Sensing Letters</i> 2 (2), pp. 118-120, 2005.</p>
<p>Mavromatou C., Hadjicontis V., Ninos D., Mastrogiannis D., Hadjicontis E., Eftaxias K., "Understanding the fracture phenomena in inhomogeneous rock samples and ionic crystals, by monitoring the electromagnetic emission during their deformation", <i>Physics and Chemistry of the Earth</i> 29 (4-9), pp. 353-357, 2004.</p>	<p>11. Koktavy P., Experimental study of electromagnetic emission signals generated by crack generation in composite materials, <i>Measurement Science and Technology</i> 20 (1), art. no. 015704, 2009.</p> <p>12. Eftaxias K., Contoyiannis Y., Balasis G., Karamanos K., Kopanas J., Antonopoulos G., Koulouras G., Nomicos C., Evidence of fractional-Brownian-motion-type asperity model for earthquake generation in candidate pre-seismic electromagnetic emissions, <i>Natural Hazards and Earth System Science</i> 8 (4), pp. 657-669, 2008.</p> <p>13. Papadimitriou C., Kalimeri M., Eftaxias K., Nonextensivity and universality in the earthquake preparation process, <i>Physical Review E - Statistical, Nonlinear, and Soft Matter Physics</i> 77 (3), art. no. 036101, 2008.</p> <p>14. Hadjicontis V., Mavromatou C., Antsygina T.N., Chishko K.A., Mechanism of electromagnetic emission in plastically deformed ionic crystals, <i>Physical Review B - Condensed Matter and Materials Physics</i> 76 (2), art. no. 024106, 2007.</p> <p>15. Eftaxias K., Panin V.E., Deryugin Ye.Ye., Evolution-EM signals before earthquakes in terms of mesomechanics and complexity, <i>Tectonophysics</i> 431 (1-4), pp. 273-300, 2007.</p> <p>16. Karamanos K., Dakopoulos D., Aloupis K., Peratzakis A., Athanasopoulou L., Nikolopoulos S., Kapiris P., Eftaxias K., Preseismic electromagnetic signals in terms of complexity, <i>Physical Review E - Statistical, Nonlinear, and Soft Matter Physics</i> 74 (1), art. no. 016104, 2006.</p> <p>17. Eftaxias K.A., Kapiris P.G., Balasis G.T., Peratzakis A., Karamanos K., Kopanas J., Antonopoulos G., Nomicos K.D., Unified approach to catastrophic events: From the normal state to geological or biological shock</p>

	<p>in terms of spectral fractal and nonlinear analysis, <i>Natural Hazards and Earth System Science</i> 6 (2), pp. 205-228, 2006.</p> <p>18. Karamanos K., Peratzakis A., Kapiris P., Nikolopoulos S., Kopanas J., Eftaxias K., Extracting preseismic electromagnetic signatures in terms of symbolic dynamics, <i>Nonlinear Processes in Geophysics</i> 12 (6), pp. 835-848, 2005.</p> <p>19. Lavrov A., Fracture-induced physical phenomena and memory effects in rocks: A review, <i>Strain</i> 41 (4), pp. 135-149, 2005.</p> <p>20. Contoyiannis Y.F., Kapiris P.G., Eftaxias K.A., Monitoring of a preseismic phase from its electromagnetic precursors, <i>Physical Review E - Statistical, Nonlinear, and Soft Matter Physics</i> 71 (6), art. no. 066123, pp. 1-14, 2005.</p>
<p>D. Triantis, I. Stavrakas, P. Tsiakas, C. Stergiopoulos, D. Ninios, "A pilot application of electronic examination applied to students of electronic engineering: Preliminary results", <i>Advances in Engineering Education</i>, vol. 1, Issue 1, pp. 26-30, 2004.</p>	<p>21. P. Tsiakas, C. Stergiopoulos, M. Kaitsa, D. Triantis, New technologies applied in the educational process in the TEI of Athens: the case of "e-education" platform and electronic examination of students results, <i>DIWEB'06 Proceedings of the 5th WSEAS International Conference on Distance Learning and Web Engineering</i>, ISBN:960-8457-34-3, 2005.</p> <p>22. Charalampos Stergiopoulos, Panagiotis Tsiakas, Dimos Triantis, Maria Kaitsa, "Evaluating Electronic Examination Methods Applied to Students of Electronics. Effectiveness and Comparison to the Paper-and-Pencil Method.," <i>subc</i>, vol. 2, pp.143-151, <i>IEEE International Conference on Sensor Networks, Ubiquitous, and Trustworthy Computing - Vol. 2 - Workshops</i>, 2006.</p> <p>23. D. Triantis, I. Stavrakas, C. Anastasiadis and I. Marinos, "Networked Learning Physics of Semiconductors through a Virtual Laboratory Environment", <i>Proceedings of the 6th International Conference on Networked Learning</i>, pp. 845-846, 2005, ISBN No: 978-1-86220-206-1.</p> <p>24. D. Triantis, C. Anastasiadis, "Conclusions from the introduction of a nanoelectronics course in the studies curriculum of the Technological Educational Institution of Athens", <i>Proceeding NANOTECHNOLOGY'09 Proceedings of the 1st WSEAS international conference on Nanotechnology</i>, ISBN: 978-960-474-059-8.</p> <p>25. C. Stergiopoulos, P. Tsiakas, M. Kaitsa, D. Triantis, I. Fragoulis, C. Ninios, "Methods of Electronic Examination Applied to Students of Electronics. Comparison of results with the conventional (paper-and-pencil) method", <i>Proceedings of the 2nd International Conference on Web Information Systems and Technologies</i>, 11-13 April 2006, Portugal, pp. 305-311.</p> <p>26. D. Triantis, C. Anastasiadis, P. Tsiakas, Ch. Stergiopoulos, "Asynchronous teaching methods and electronic assessment applied to students of the module: Physics of Semiconductor Devices". <i>Journal of Materials Education</i>, vol. 29, Nos. 1-3, pp. 133-140 (2007).</p>
<p>C. Anastasiadis, I. Stavrakas, A. Kyriazopoulos, D. Ninios and D.</p>	<p>27. Stelios Maurigiannakis, Nikos Mitritsakis, Zacharias Agioutantis, Cimon Anastasiadis, Dimos Triantis, Ilias Stavrakas, "Investigation and</p>

Triantis: «Non destructive damage estimation on rocks with laboratory measurements of dielectric loss ($\tan\delta$)», Proceedings of the 8th International Conference of the Slovenian Society for Non-Destructive Testing, Portorož, Slovenia, 1-3 September 2005, pp. 401-407.

Quantification of Damage in Geomaterials with the Technique of Dielectric Spectroscopy", Proceedings of the 9th ECNDT, Berlin, 25-29 September 2006.

28. I. Stavrakas, C. Anastasiadis, S. Maurigiannakis, D. Triantis, Z. Agioutantis, "PERMITTIVITY VARIATIONS ON MARBLE BEAMS SUBJECTED TO VARIOUS LOADING LEVELS", The 10th International Conference of the Slovenian Society for Non Destructive Testing. Application of Contemporary Non-Destructive Testing in Engineering, September 1-3, 2009, Ljubljana, Slovenia, 431-436.

29. V. Saltas, D. Triantis, I. Stavrakas, C. Anastasiadis, F. Vallianatos, "DIELECTRIC SPECTROSCOPY AS A DIAGNOSTIC TEST METHOD FOR THE DETERMINATION OF MECHANICAL DAMAGE IN MARBLE SAMPLES", The 10th International Conference of the Slovenian Society for Non Destructive Testing. Application of Contemporary Non-Destructive Testing in Engineering, September 1-3, 2009, Ljubljana, Slovenia, 415-421.

30. Rattiphorn Sumang, Theerachai Bongkarn, "The Effect of Excess PbO on Crystal Structure", Microstructure, Phase Transition and Dielectric Properties of (Pb_{0.75} Sr_{0.25}) TiO₃ Ceramics, Ferroelectrics, Volume 403, 2010, Pages 82 - 90, DOI: 10.1080/00150191003748949.