

Academic Personnel Short Profile / Short CV

University:	Frederick University
Surname:	Lontos
Name:	Antonios
Rank/Position:	Professor
School:	Engineering
Department:	Mechanical Engineering
Scientific Domain:	Engineering Design and Analysis – Specialization: Mechanical Engineering Design and Machine

Academic qualifications				
Qualification	Year	Awarding Institution	Department	Thesis title (Optional Entry)
PhD in Mechanical Engineering	2002	Aristotle's University of Thessaloniki	Mechanical Engineering	Determination of The Mechanical and Creep Behaviour of Mono and Multi-Layer Thick Thermal Sprayed Coatings, Operating Under Dynamic or Static Loads
BSc-MSc (5 Years)	1998	Aristotle's University of Thessaloniki	Mechanical Engineering	Coated cutting tools and milling machining

Employment history in Academic Institutions/Research Centers				
Period of employment		Employer	Location	Position
From	To			
2022	Present	Frederick University, Frederick Research Center	Cyprus	Professor
2015	2022	Frederick University, Frederick Research Center	Cyprus	Associate Professor
2007	2015	Frederick University, Frederick Research Center	Cyprus	Assistant Professor
2003	2007	Frederick Institute of Technology, Frederick Research Center	Cyprus	Lecturer – Researcher
1998	2002	Electromechanical installations D. SAMARAS	Greece	Electromechanical installations engineer
2000	2002	ATLANTIS Consulting S.A., Q-PLAN A.E.	Greece	Quality control systems engineer
1998	2003	Laboratory for Machine Tools and Manufacturing Engineering, A.U.TH	Greece	Research assistant

Key refereed journal papers, monographs, books, conference publications etc.						
Ref. Number	Year	Title	Other authors	Journal and Publisher / Conference	Vol.	Pages
1	2022	"The preliminary simulated effect of stretching and blowing combination on the wall thickness distribution of 1.5Lt PET bottle during ISBM process	A. Gregoriou	Global Conference on Polymers, Plastics and Composites", Budapest, Hungary		
2	2021	Fatigue behaviour of Plasma Sprayed Titania and Chromia Coatings	Koutsomichalis, G. Loukas, M. Vardavoulis, N. Vaxevanidis, A. Gregoriou,	International Conference of Engineering Against Failure (ICEAF), Athens		
3	2020	The preliminary simulated effect of stretching and blowing combination on the wall thickness distribution of 1.5Lt PET bottle during ISBM process	A. Gregoriou,	Fibers and Polymers, Springer		
4	2019	, The effect of the deformation rate on the wall thickness of 1.5LT PET bottle during ISBM (Injection Stretch Blow Molding) process	A. Gregoriou	CIRP Manufacturing Systems Conference, Procedia CIRP 81 (1307-1312)		
5	2018	A numerical investigation of the effect of preform length for the fabrication of 1.5Lt PET bottle through the injection stretch blow molding process	A. Gregoriou,	ICEAF-V 2018, MATEC Web of Conferences 188		
6	2016	, Construction of Inflatable Lungs to Simulate Respiratory Motion in Myocardial Perfusion Imaging	A. Antoniou, I. Chrysanthou, S. Christofides, O. Demetriadou, Chr. Panagidis, Ch. Yiannakkaras, D. Kaolis, Y. Parpottas	Springer International Publishing Switzerland 2016, IFMBE Proceedings 57		
7	2016	Characterization of attenuation and respiratory motion artifacts and their influence on SPECT MP image	Y. Parpottas, I. Chrysanthou	Journal of Nuclear Cardiology, Springer ISSN 1071-3581		

		evaluation using a dynamic phantom assembly with variable cardiac defects,				
8	2013	The effect of kyphoplasty parameters on the dynamic load transfer within the lumbar spine considering the response of a bio-realistic spine segment,	A. Tsouknidas, S. Savvakis, Y. Asaniotis, K. Anagnostidis, N. Michailidis	Clinical Biomechanics, Elsevier, Clinical Biomechanics vol. 28, pp. 949–955		
9	2013	A Non-Linear Finite Element Model for Assessment Of Lumbar Spinal Injury Due To Dynamic Loading	Tsouknidas A., Savvakis S., Tsirelis N., Michailidis N.	International Conference on Bioinformatics Models, Methods and Algorithms (BIOINFORMATICS), pp. 237-241, Barcelona, Spain, 2013		
10	2013	Nonintrusive 3D Reconstruction of Human Bone Models to Simulate their Bio-mechanical Response	A. Tsouknidas, S. Savvakis, N. Michailidis	3D Research Center, Kwangwoon University and Springer, pp 1-10, 2012		

Research Projects				
Ref. Number	Date	Title	Funded by	Project Role
1	2022-23	Strength and quality improvement of leisure water sport skis	The Research and Innovation Foundation Programmes For Research, Technological Development and Innovation “Restart 2021-26”	Principal investigator
2	2016-19	Project “Hippoactive”, L.K. RehabTech Ltd, Frederick University.	E.U. Structural Funds and the Republic of Cyprus, under the Operational Programme 2014-2020 - Competitiveness and Sustainable Development -	Principal investigator

			Scheme for the Support of Business Innovation - Development of Innovative Products, Services and Processes, of the Ministry of Energy, Commerce, Industry and Tourism. Budget €75000.	
3	2016-18	Project “Certification of a new type of wind turbine”, O.G.T Greentech Ltd, Kassinis International Consulting Ltd, Frederick University.	E.U. Structural Funds and the Republic of Cyprus, under the Operational Programme 2014-2020 - Competitiveness and Sustainable Development - Scheme for the Support of Business Innovation - Development of Innovative Products, Services and Processes, of the Ministry of Energy, Commerce, Industry and Tourism. Budget €470000	Principal investigator
4	2012-15	Support of Postdoctoral Researchers. Budget €150.000 FEM supported determination of the biomechanical response of the human spine considering all musculo-skeletal characteristics, Acronym: BioSpine, Project ID: 3227,	Greek Ministry of Education, Lifelong Learning and Religious Affairs,	Member of the Post-Doctoral Committee
5	2012-14	Optimizing the diagnostic value of SPECT myocardial perfusion images under the influence of respiratory motion, (Development of a respiratory motion phantom)	Cyprus Research Promotion Foundation, ΥΓΕΙΑ/ΔΥΓΕΙΑ/0311(BIE)/27, €179.520	Research Assistant
6	2011-13	Design and development of a low permeability measuring system for construction materials, Σχεδιασμός και Ανάπτυξη Συσκευής Προσδιορισμού της Διαπερατότητας Δομικών Υλικών Χαμηλού Πορώδους»	Cyprus Research Promotion Foundation, Επιχειρήσεις/Προϊόν/0609/112, €145.700	Research Assistant

7	2010-12	Increase of the passive safety of cars for the protection of pedestrians by Crash Resistant Adhesive Bonding of attachments on LACquered Surfaces (CRAB LACS)	Cyprus Research Promotion Foundation, CORNET II/0809/01, Funding €135.000	Principal investigator
8	2006-09	Improvement of the working life of aluminum extrusion dies by means of advance and innovative procedures	Cyprus Research Promotion Foundation, AKIΠE/0506/06, Funding CYP 81.795	Principal investigator
9	2006-09	Reconstruction of Archaeological Findings by Computer Tomographies and Rapid Prototyping Methods	EUREKA, E!3881 FACTORY, Funding CYP 60.000	Principal investigator
10	2006-09	Development of new and innovative computational and experimental methodologies for the characterization of thin hard coatings performance	Cyprus Research Promotion Foundation, TEXNO/0506/14, Funding CYP 87.000	Principal investigator

Academic Consulting Services and/or Participation in Councils / Boards/ Editorial Committees				
Ref. Number	Period	Organization	Title of Position or Service	Key Activities
1	2020-24	Cyprus Productivity Center (CPC), European Association of Career Guidance (EACG), Co-funded by the Erasmus+ Programme and the European Union, 2020-2024	External member of the European Centre of Vocational Excellence in Microelectronics (ECOVEM), Cyprus Chamber of Commerce and Industry (CCCI),	
2	2020	Cyprus Productivity Center (CPC)	Member of the Cypriot Organizing Committee for Euroskills, Mechanical Engineering Design-CAD, 2020.	

3	2021	Cyprus Ministry of Education and Culture	Member of the Examinations Service for Higher Education Department for recruitment of high school teachers in the public sector	
4	2018	Cyprus Productivity Center (CPC)	Member of the Cypriot Organizing Committee for Euroskills, Mechanical Engineering Design-CAD	
5	2014	Cyprus Organisation for Standardisation (CYS)	Chairman of the National Technical Committee "CYS/TC 16 - Safety of Go-Karts facilities")	
6	2007-13	Cyprus Research Promotion Foundation (ΙΡΕ	Member of the National Advisory Scientific Group in the field of "Nanosciences, Nanotechnologies, Materials and new Production Technologies (NMP)", National Contact Point for the Programmes of the Seventh Framework Programme FP7	

Awards / International Recognition			
Ref. Number	Date	Title	Awarded by:
1	2021	Award from Frederick University, "Most Engaging Co-Curricular Activity Award", Formula Racing Team.	Frederick University
2	2019	Cyprus Education Leaders Awards 2019, Category Best Learning Experience: «Active	Cyprus Education Leaders Awards 2019

		Students through Co-Teaching Activities, FUF Racing Team.	
3	2005-06	Award from Frederick Institute of Technology for the "Dedicated work in research and development and the significant contribution in research projects in the period 2005-2006".	Frederick Institute of Technology
4	2004-05	Award from Frederick Institute of Technology for the "Dedicated work in research and development and the significant contribution in research projects in the period 2004-2005".	Frederick Institute of Technology
5	2003-04	Award from Frederick Institute of Technology for the "Dedicated work in research and development and the significant contribution in research projects in the period 2003-2004".	Frederick Institute of Technology
6	1999-2000	Financing as new researcher by the Supporting Program of Researchers (ΠΕΝΕΔ 99).	Aristoteles University of Thessaloniki
7	1998-2002	Financing by the committee of researches of A.U.TH during Doctoral Thesis.	Aristoteles University of Thessaloniki
8	1993-1998	Scholarship from the Cypriot Democracy during undergraduate studies.	Cyprus Government