



**CENTRE OF SCIENTIFIC RESEARCH ON MACHINES AND THERMAL EQUIPMENT AND ENVIRONMENTAL ENGINEERING IN ENERGETICS (METIME)**

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**RELEVANT INDEXED PAPERS**

**2019**

1. Spiru Paraschiv, Lizica-Simona Paraschiv, Analysis of traffic and industrial source contributions to ambient air pollution with nitrogen dioxide in two urban areas in Romania, Energy Procedia, Volume 157, January 2019, Pages 1553-1560
2. Frățița M, F Popescu, K Uzuneanu, V Mereuță, I Ion, Fatigue analysis of the connecting rod in internal combustion engines, OP Conf. Series: Materials Science and Engineering (2019) 012008 IOP Publishing doi:10.1088/1757-899X/485/1/012008
3. T H Nguyen, Q H Nguyen, G Coman, C Tran Dinh, V Le Hong, Thermodynamic properties of FCC interstitial alloy AuSi with defects, OP Conf. Series: Materials Science and Engineering (2019) 012018 IOP Publishing doi:10.1088/1757-899X/485/1/012018
4. Mathematical modelling and optimization of the thermomechanical treatment process applied to AlZn4.5Mg1Cu alloy, IOP Conf. Series: Materials Science and Engineering (2019) 012016 IOP Publishing doi:10.1088/1757-899X/485/1/012016
5. Gelu Coman, Gabriel - Bogdan Carp, Ion Ion, Alina Ceoromila, Nicusor Baroiu, Composite Materials Based on Autoclaved Aerated Concrete, Waste and Unsaturated Polyester Resin, MATERIALE PLASTICE, 56, No. 1, 2019
6. Nguyen T H, Q H Nguyen, G Coman, V Dinh Quang, C Tran Dinh, Thermodynamic properties of BCC interstitial alloy FeH under pressure, 2019 IOP Conf. Ser.: Mater. Sci. Eng. 485 012017 <https://doi.org/10.1088/1757-899X/485/1/012017>

**2018**

7. Spiru Paraschiv, Lizica-Simona Paraschiv, Marian Bordei, Viorel Dragan, „Analysis o temporal variation of NO<sub>2</sub> concentrations in an urban area ”, SGEM 2018, Albena, Bulgaria, Volumul 18 - Energy and Clean Technologies, Issue 4.2, pp. 313-319, ISBN 978-619-7408-45-4.
8. Paraschiv Spiru, Paraschiv Lizica-Simona, Technical and economical analysis of a PV/wind/diesel hybrid power system for a remote area, Energy Procedia 147 (2018), pp. 343–350. <https://www.sciencedirect.com/science/article/pii/S1876610218302595>
9. Lizica-Simona Paraschiv, Spiru Paraschiv, Particle collection efficiency analysis of an electrostatic precipitator, 7th International Conference on Thermal Equipment, Renewable Energy and Rural Development TE-RE-RD 2018, Drobeta Turnu Severin – Romania, 31 May - 02 June 2018, pp. 491-494.

10. Ion V. Ion, F. Popescu, S.L. Paraschiv, S. Paraschiv, Performance analysis of a biogas-fueled gas turbine cogeneration system, 7th International Conference on Thermal Equipment, Renewable Energy and Rural Development TE-RE-RD 2018, Drobeta Turnu Severin – Romania, 31 May - 02 June 2018, pp.59-62.
11. Ion V.I., Popescu F., Paraschiv S.L., Paraschiv S., Heat requirement in an indoor recirculating aquaculture system, Proceedings of the Alternative energy sources, materials and technologies (AESMT'18), 14 - 15 May, 2018, Plovdiv, Bulgaria
12. Uzuneanu, K. Increasing the efficiency of thermal collectors by using thermal tubes, 7th International Conference on Thermal Equipment, Renewable Energy and Rural Development TE-RE-RD 2018, Drobeta Turnu Severin – Romania, 31 May - 02 June 2018, pp. 139-142. <http://www.tererd.pub.ro/wp-content/uploads/2015/01/Proceedings-TE-RE-RD-2018-CD-ROM.pdf>
13. Uzuneanu, K., Ugur Akyol, Carmen Ema Panaite, Aristotel Popescu - Energetic analysis of a CCHP system with Stirling engine for residential buildings- 4th Anatolian Energy Symposium with International Participation (EDIRNE 18-20 April 2018) <https://aes2018-en.trakya.edu.tr/>
14. Uzuneanu, K., Ugur Akyol, Carmen Ema Panaite, Aristotel Popescu - Energetic analysis of a CCHP system with Stirling engine for residential buildings, proceedings of the 4th Anatolian Energy Symposium with International Participation (18-20 April 2018), pag 226-234 <https://aes2018-en.trakya.edu.tr/news/4th-anatolian-energy-symposium-with-international-participation-fulltext-book> ,
15. Frățița M., K. Uzuneanu, D. T Balanescu- About I- Beam versus H-beam connecting rod design using Inventor Autodesk 2018 <http://iopscience.iop.org/issue/1757-899X/444/8> IOP Conf. Series: Materials Science and Engineering 444 (2018) 072008 doi:10.1088/1757-899X/444/7/072008
16. Uzuneanu K., Theoretical study on performance of a combined steam and gas turbine propulsion system for road transport <http://iopscience.iop.org/issue/1757-899X/444/8> IOP Conf. Series: Materials Science and Engineering 444 (2018) 082026 doi:10.1088/1757-899X/444/8/082026
17. Panaite C E, A Popescu, V M Homutescu, K Uzuneanu, Performance Assessment of a Solar-Powered Adsorption Air Conditioning System <http://iopscience.iop.org/issue/1757-899X/444/8> IOP Conf. Series: Materials Science and Engineering 444 (2018) 082027 doi:10.1088/1757-899X/444/8/082027
18. Popa C.L., Viorel Popa, Using auto-cad environment to profile the revolution tools generating helical rotors with involute undercutting profiled lobes, January 2018, Academic Journal of Manufacturing Engineering 16(1):151-154
19. Popa V, C L Popa, Study concerning the influence of refrigerant injection on the efficiency of a heat pump, IOP Conference Series: Materials Science and Engineering, Volume 444, 2018, IOP Conf. Ser.: Mater. Sci. Eng.444082011
20. Popa V, C L Popa, Increasing the air source heat pump efficiency at low ambient temperature by using a two-phase ejector, IOP Conference Series: Materials Science and Engineering, Volume 444, 2018 IOP Conf. Ser.: Mater. Sci. Eng.444082010

21. Popescu F, R A Mahu, N A Antonescu, I V Ion, CFD prediction of combustion in a swirl combustor, 2018, IOP Conf. Ser.: Mater. Sci. Eng. 444082009
22. Paraschiv, S.; Paraschiv, L. S., ASSESSMENT OF ATMOSPHERIC POLLUTION WITH NO<sub>2</sub> AND ITS TREND DUE TO URBAN TRAFFIC IN GALATI, ROMANIA, SGEM 2018, Albena, Bulgaria, Volumul 18 - Energy and Clean Technologies, Issue 4.2, pp. 313-319, ISBN 978-619-7408-45-4.
23. Popa Camelia Lăcrămioara, PopaViorel, Profiling disk tool for generating female rotor screw compressor component by meaning of graphical method, Procedia Manufacturing, Volume 22, 2018, Pages 85-92
24. Gelu COMAN, Mugurel Salvadore BURCIU, Nicușor BAROIU.” Vehicles emissions under different driving conditions in urban areas”, Revista de Chimie, REV.CHIM.(Bucharest) 70 No. 2 2019 <http://www.revistadechimie.ro>
25. Burciu S M, Coman G, A comparative study of smoke emissions between idling regimes and high load regimes for a standard diesel direct injection car”, autori, <https://iopscience.iop.org/article/10.1088/1757-899X/444/7/072018>

## 2017

26. S M Burciu, “Traction of a classic vehicle compared to the traction of a hybrid car”, The Annals of "Dunarea de Jos" University of Galati, Fascicle IV year XXX, 2017, Refrigerating Technique, Internal Combustion Engines, Boilers and Turbines, 2017, ISSN 1221-4558
27. Paraschiv S., Paraschiv L. S., A review on interactions between energy performance of the buildings, outdoor air pollution and the indoor air quality, Energy Procedia, Volume 128, September 2017, Pages 179-186
28. Spiru Paraschiv, Daniel-Eduard Constantin, Simona-Lizica Paraschiv, Mirela Voiculescu, OMI and Ground-Based In-Situ Tropospheric Nitrogen Dioxide Observations over Several Important European Cities during 2005–2014, Int J Environ Res Public Health. 2017 Nov; 14(11): 1415.
29. Coman Gelu, Fratita Michael, Heat Recovery on the Sterilization Processes in Clinics and Hospitals, The Annals of "Dunarea de Jos" University of Galati, Fascicle IV year XXX, 2017, Refrigerating Technique, Internal Combustion Engines, Boilers and Turbines, 2017, ISSN 1221-4558
30. Paraschiv Lizica Simona, Paraschiv Spiru, Ion V.Ion, Increasing the energy efficiency of buildings by thermal insulation, Energy Procedia, Volume 128, September 2017, Pages 393-399
31. Viorel Popa, Camelia Popa, Theoretical Analysis for Solar Driven Mechanical Refrigeration Systems, Energy Procedia, Volume 112, March 2017, Pages 442-449
32. Paraschiv Lizica Simona, Paraschiv Spiru, Ion V.Ion, Mathematical modelling of sawdust drying process for biomass pelleting, Energy Procedia, Volume 141, December 2017, Pages 150-154