

LIST OF PUBLICATIONS AFTER DEFENSE OF THE PHD THESIS

BOOKS/CHAPTERS IN BOOKS

1. **Lungu, M.** *Sisteme de conducere a zborului (Flight control systems)*. Sitech Publisher, Craiova, 2008, 329 pp., ISBN: 978-973-746-975-5 (the book has received **AUREL VLAICU Romanian Academy Award** in 2010) **(1 citation)**.
2. **Lungu, M.** *Algoritmi si structuri pentru identificarea, estimarea si conducerea zborului aeronavelor si rachetelor (Algorithms and structures for aircraft and rocket flight identification, estimation and control)*. Sitech Publisher, Craiova, 2013, 340 pp., ISBN: 978-606-11-3113-6.
3. **Lungu, M., Lungu R.** *Estimarea stării aparatelor de zbor (State estimation of the flying objects)*. Sitech Publisher, Craiova, 2014, 290 pp., ISBN: 978-606-11-3699-5 (**AGIR Award - General Association of the Romania Engineers – 2015**) **(1 citation)**.
4. Lungu, R., **Lungu M.** *Controlul automat al aeronavelor la aterizare (Aircraft automatic control during landing)*. Sitech Publisher, Craiova, 2015, 398 pp., ISBN: 978-606-11-4341-2 (**AGIR Award - General Association of the Romania Engineers – 2016**) **(1 citation)**.
5. **Lungu M.** *Controlul optimal al aparatelor de zbor (Optimal control of the flying objects)*. Sitech Publisher, Craiova, 2015, 178 pp., ISBN: 978-606-11-4840-0.
6. Lungu, R., Sepcu, L., **Lungu, M.** *Dinamica și controlul zborului micro-vehiculelor aeriene (Dynamics and control of the micro aerial vehicles)*. Sitech Publisher, Craiova, 2016, 238 pp., ISBN: 978-606-11-5103-5.
7. Lungu, R., **Lungu, M.** *Aircraft Landing Control Using the H-inf Control and the Dynamic Inversion Technique*. Chapter in the book „Automation and Control Trends”, ISBN 978-953-51-2671-3 (editors: Pedro Ponce, Arturo Molina Gutierrez, Luis M. Ibarra). Intech Publisher, 2016, pp. 101-120.

LABORATORY GUIDELINES

1. **Lungu, M., Lungu, R.** *Sisteme de conducere a zborului – Lucrari practice de laborator (Flight control systems – Laboratory Guidelines)*, Sitech Publisher, Craiova, 2010, 130 pp., ISBN: 978-606-530-688-2.
2. **Lungu, M., Lungu, R.** *Estimarea stării aparatelor de zbor – Lucrari practice de laborator (State estimation of the flying objects – Laboratory Guidelines)*, Sitech Publisher, Craiova, 2014, 160 pp., ISBN: 978-606-11-4151-7.

ISI JOURNAL PAPERS

1. Lungu, R., **Lungu, M., Rotaru, C.** *Non-linear adaptive system for the control of the helicopters pitch's angle*. Proceedings of the Romanian Academy, Series A: Mathematics, Physics, Technical Sciences, Information Science, vol. 12, nr. 2/2011, pp. 133-142, ISSN: 1454-9069, databases: ISI Web of Science (**ISI Journal**) **(1 citation)**. *Journal relative impact factor: 0.149, Journal Influence Relative Score: 0.*
2. **Lungu, M., Lungu, R., Rotaru, C.** *New Systems for Identification, Estimation and Adaptive Control of the Aircrafts' Movements*. Studies in Informatics and Control ISSN: 1220-1766,

- databases: ISI Web of Science (**ISI Journal**) (**5 citations**). *Journal relative impact factor: 0.671, Journal Influence Relative Score: 0. Databases: ISI Web of Science, Scopus.*
3. Grigorie, T.L., Botez, R.M., **Lungu, M.**, Edu, I.R., Obreja, R. *Micro-electromechanical systems gyro performance improvement through bias correction over temperature using an adaptive neural network-trained fuzzy inference system*. Proceedings of the Institution of Mechanical Engineers Part G - Journal of Aerospace engineering, vol. 226, no. 9, 2012, pp. 1121-1138, DOI: 10.1177/0954410011417793, ISSN: 0954-4100 (**ISI Journal**) (**2 citations**). *Journal relative impact factor: 1.18923, Journal Influence Relative Score: 0.683. Databases: ISI Web of Science, Scopus.*
 4. Lungu, R., **Lungu, M.**, Grigorie, T.L. *ALSSs with Conventional and Fuzzy Controllers Considering Wind Shears and Gyro Errors*. Journal of Aerospace Engineering, vol. 26, no. 4, pp. 794-813, DOI: 10.1061/(ASCE)AS.1943-5525.0000207, ISSN: 0893-1321, e-ISSN: 1943-5525 (**ISI Journal**) (**1 citation**). *Journal relative impact factor: 1.09846, Journal Influence Relative Score: 1.409. Databases: ISI Web of Science, Scopus.*
 5. **Lungu, M.**, Lungu, R., *Full-Order Observer Design for Linear Systems with Unknown Inputs*. International Journal of Control, vol. 85, no: 10, 2012, pp. 1602-1615, DOI: 10.1080/00207179.2012.695397, ISSN: 0020-7179, e-ISSN: 1366-5820 (**ISI Journal**) (**20 citations**). *Journal relative impact factor: 0.977, Journal Influence Relative Score: 1.00. Databases: ISI Web of Science, Scopus.*
 6. **Lungu, M.**, Lungu, R. *Adaptive Backstepping Flight Control for a Mini-UAV*. International Journal of Adaptive Control and Signal Processing, vol. 27, pp. 635-650, 2013, DOI: 10.1002/ACS.2330, ISSN: 0890-6327, e-ISSN: 1099-1115 (**ISI Journal**) (**12 citations**). *Journal relative impact factor: 0.913, Journal Influence Relative Score: 1.081. Databases: ISI Web of Science, Scopus.*
 7. Lungu, R., **Lungu, M.** *Adaptive Control of the Helicopters' Pitch Angle and Velocity*. Journal of Aerospace Engineering, vol. 27, no. 5, DOI: 10.1061/(ASCE)AS.1943-5525.0000286, ISSN: 0893-1321, e-ISSN: 1943-5525 (**ISI Journal**) (**3 citations**). *Journal relative impact factor: 1.09846, Journal Influence Relative Score: 1.409. Databases: ISI Web of Science, Scopus.*
 8. Lungu, R., **Lungu, M.**, Grigorie, T.L. *Automatic Control of Aircraft in Longitudinal Plane During Landing*. IEEE Transactions on Aerospace & Electronic Systems, vol. 49, no. 2, 2013, pp. 1338-1350, DOI: 10.1109/TAES.2013.6494418, ISSN: 0018-9251 (**ISI Journal**) (**9 citations**). *Journal relative impact factor: 1.095, Journal Influence Relative Score: 2.212. Databases: ISI Web of Science, IEEE Xplore, Scopus.*
 9. **Lungu, M.**, Lungu, R. *Reduced Order Observer for Linear Time-Invariant Multivariable Systems with Unknown Inputs*. Circuits, Systems, and Signal Processing, Springer, vol. 32, no. 6, pp. 2883-2898, 2013, DOI: 10.1007/s00034-013-9618-z, ISSN: 0278-081X, e-ISSN: 1531-5878 (**ISI Journal**) (**9 citations**). *Journal relative impact factor: 0.817, Journal Influence Relative Score: 0.64439. Databases: ISI Web of Science, Scopus.*
 10. **Lungu, M.**, Lungu, R. *Reconfigurable Controller for Active Fault-Tolerant Control Systems with Applicability to Flight Control*. Proceedings of the Romanian Academy, Series A: Mathematics, Physics, Technical Sciences, Information Science, vol. 15, no. 2, pp. 191-199, 2014, ISSN: 1454-9069 (**ISI Journal**). *Journal relative impact factor: 0.537, Influence relative score: 0.104. Databases: ISI Web of Science.*
 11. Lungu, R., **Lungu, M.**, *Automatic Landing Control using H-inf Control and Dynamic Inversion*. Proceedings of the Institution of Mechanical Engineers Part G - Journal of Aerospace Engineering, vol. 228, no. 14, 2014, pp. 2612-2626, DOI: 10.1177/0954410014523946, ISSN: 0954-4100 (**ISI Journal**). *Journal relative impact factor: 1.18923, Influence relative score: 0.683. Databases: ISI Web of Science.*
 12. **Lungu, M.**, Lungu, R., *Design of Full-order Observers for Systems with Unknown Inputs by using the Eigenstructure Assignment*. Asian Journal of Control, vol. 16, no. 5, pp. 1470-1481,

- 2014 DOI: 10.1002/asjc.889, ISSN: 1561-8625 **(ISI Journal) (3 citations)**. *Journal relative impact factor: 1.411, Influence relative score: 0.433. Databases: ISI Web of Science, Scopus.*
13. Lungu, R., Sepcu, L., **Lungu, M.**, *Four-bar mechanism's PD and neural adaptive control for the thorax of the micromechanical flying insects*. *Journal of Dynamic Systems, Measurement and Control (Transactions of ASME)*, vol. 137, no. 5, 2015, DOI: 10.1115/1.4028793, ISSN: 0022-0434, e-ISSN: 1528-9028 **(ISI Journal) (1 citation)**. *Journal relative impact factor: 0.758, Influence relative score: 0.966. Databases: ISI Web of Science.*
 14. **Lungu, M.**, Lungu, R., *Application of H_2/H_∞ Technique to Aircraft Landing Control*. *Asian Journal of Control*, vol. 17, no. 6, pp. 2153-2164, 2015, DOI: 10.1002/asjc.1132, ISSN: 1561-8625 **(ISI Journal) (1 citation)**. *Journal relative impact factor: 1.411, Influence relative score: 0.459. Databases: ISI Web of Science.*
 15. Lungu, R., **Lungu, M.**, *Automatic Control of Aircraft in Lateral-Directional Plane During Landing*. *Asian Journal of Control*, vol. 18, no. 3, pp. 433-446, 2016, DOI: 10.1002/asjc.1133, ISSN: 1561-8625 **(ISI Journal) (1 citation)**. *Journal relative impact factor: 1.411, Influence relative score: 0.433. Databases: ISI Web of Science.*
 16. Lungu, R., **Lungu, M.**, *Control of the Aircraft Lateral-Directional Motion during Landing using the H -inf Control and the Dynamic Inversion*. *Proceedings of the Romanian Academy, Series A: Mathematics, Physics, Technical Sciences, Information Science*, vol. 16, no. 4, pp. 547-555, 2015, ISSN: 1454-9069 **(ISI Journal)**. *Journal relative impact factor: 1.658, Influence relative score: 0.369. Databases: ISI Web of Science.*
 17. **Lungu, M.**, Lungu, R., *Automatic Control of Aircraft Lateral-directional Motion during Landing using Neural Networks and Radio-technical Subsystems*. *Neurocomputing Journal*, vol. 171, pp. 471-481, 2016, ISSN: 0925-2312 **(ISI Journal) (1 citation)**. *Journal relative impact factor: 2.083, Influence relative score: 0.866. Databases: ISI Web of Science.*
 18. Lungu, R., **Lungu, M.**, *Application of H_2/H_∞ and Dynamic Inversion Techniques to Aircraft Landing Control*. *Aerospace Science and Technology*, vol. 46, pp. 146-158, 2015, ISSN: 1270-9638 **(ISI Journal) (4 citation)**. *Journal relative impact factor: 0.94, Influence relative score: 2.093. Databases: ISI Web of Science.*
 19. Lungu, R., **Lungu, M.**, *Design of Automatic Landing Systems using the H -inf Control and the Dynamic Inversion*. *Journal of Dynamic Systems, Measurement and Control (Transactions of ASME)*, vol. 138, no. 2, 5 pp, 2016, ISSN: 0022-0434 **(ISI Journal)**. *Journal relative impact factor: 0.978, Influence relative score: 0.7. Databases: ISI Web of Science.*
 20. Lungu, R., **Lungu, M.** *Adaptive Flight Control Law Based on Neural Networks and Dynamic Inversion for Micro Aerial Vehicles*. *Neurocomputing Journal*, vol. 199, pp. 40-49, 2016, ISSN: 0925-2312 **(ISI Journal) (2 citations)**. *Journal relative impact factor: 2.083, Influence relative score: 0.866. Databases: ISI Web of Science.*
 21. Lungu, R., **Lungu, M.** *Automatic Landing System using Neural Networks and Radio-technical Subsystems*. *Chinese Journal of Aeronautics*, 2017, ISSN: 1000-9361 **(ISI Journal)**. *Factor de impact relativ revista: 1.070. Published on-line; in the publishing process and indexing process in the databases: ISI Web of Science.*
 22. **Lungu, M.**, Lungu, R., *Landing Auto-pilots for Aircraft Motion in Longitudinal Plane using Adaptive Control Laws Based on Neural Networks and Dynamic Inversion*. *Asian Journal of Control*, vol. 19, no. 1, pp. 302-315, 2017, DOI: 10.1002/asjc.1380, ISSN: 1561-8625 **(ISI Journal)**. *Journal relative impact factor: 1.407, Influence relative score: 0.433. In the indexing process in the databases: ISI Web of Science.*
 23. Lungu, R., **Lungu, M.** *Automatic control of the micro aerial vehicles' attitude and position*. *International Journal of Micro Aerial Vehicles*, 2017, ISSN: 1756-8293 **(ISI Journal)**. *Journal relative impact factor: 0.343. Published on-line; in the publishing process and indexing process in the databases: ISI Web of Science.*

ISI PROCEEDINGS PAPERS

1. **Lungu, M.** *Neuro-Observer with Application to Longitudinal Motion of an Aircraft with Big Attack Angle*. Proceedings of the 11th International Conference on Applied and Theoretical Electricity (ICATE 2012), Craiova, 25-27 October, 2012. Journal „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B+ category), no. 36, pp. 404-409. ISSN: 1842-4805, DOI:10.1109/ICATE.2012.6403454 5117 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore, Copernicus.**
2. **Lungu, M.** *The Estimation of an Aircraft Motions by using the Bass-Gura Full-Order Observer*. Proceedings of the 11th International Conference on Applied and Theoretical Electricity (ICATE 2012), Craiova, 25-27 October, 2012. Journal „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B+ category), no. 36, pp. 410-414. ISSN: 1842-4805 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore, Copernicus.**
3. Lungu, R., Ispas, S., Iancu, M., **Lungu, M.** *Optimal Control of Helicopter Motion*. Proceedings of the 11th International Conference on Applied and Theoretical Electricity (ICATE 2012), Craiova, 25-27 October, 2012. Journal „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B+ category), no. 36, pp. 449-453. ISSN: 1842-4805 (**ISI Proceedings**) (4 citations). **Databases: ISI Web of Science, IEEE Xplore, Copernicus.**
4. Lungu, R., Iancu, M., Ispas, S., **Lungu, M.** *Adaptive Control of the Aircraft Pitch Angular Motion by using the Dynamic Inversion Principle*. Proceedings of the 11th International Conference on Applied and Theoretical Electricity (ICATE 2012), Craiova, 25-27 October, 2012. Journal „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B+ category), no. 36, pp. 454-458. ISSN: 1842-4805 (**ISI Proceedings**) (1 citation). **Databases: ISI Web of Science, IEEE Xplore, Copernicus.**
5. Calbureanu, M., **Lungu, M.**, Tutunea, D., Malciu, R., Dima, A., *Modeling with finite element the convective heat transfer in civil building EPS insulated walls*. Proceedings of the 10th International Conference on Applied Computer Science (ACS '10), Iwate, Japan, October 4-6, 2010, ISSN: 1792-4863 (**ISI Proceedings**) (2 citations). **Databases: ISI Web of Science.**
6. **Lungu, M.**, Lungu, R., Bacanu, Gh. *Angular stabilization systems of the rockets in vertical plane using differentiator gyroscope*. Recent Advances in Circuits, Systems and Signals, pp. 51-56, ISSN: 1792-4324. International Conference on Circuits, Systems and Signals, Malta, September 15-17, 2010 (**ISI Proceedings**). **Databases: ISI Web of Science, Scopus, ACM.**
7. **Lungu, M.**, Lungu, R., Sepcu, L. *Non-linear adaptive system for the control of the aircrafts' roll angle*. Recent Advances in Circuits, Systems and Signals, pp. 39-44, ISSN: 1792-4324. International Conference on Circuits, Systems and Signals, Malta, September 15-17, 2010 (**ISI Proceedings**). **Databases: ISI Web of Science, Scopus.**
8. Lungu, R., Kwatra, S., **Lungu, M.**, Grigorie, L. *The use of the hierarchical dynamic inversion to the aircrafts longitudinal movement*. Recent Advances in Circuits, Systems and Signals, pp. 34-39, ISSN: 1792-4324. International Conference on Circuits, Systems and Signals, Malta, September 15-17, 2010 (**ISI Proceedings**). **Databases: ISI Web of Science, Scopus, ACM.**
9. Lungu, R., Borgazi, **Lungu, M.**, Popa, D., Tutunea, D., Calbureanu, M. *New methods for the simulation with finite element of the human elbow*. Recent Advances in Circuits, Systems and Signals, pp. 45-50, ISSN: 1792-4324. International Conference on Circuits, Systems and Signals, Malta, September 15-17, 2010 (**ISI Proceedings**) (2 citations). **Databases: ISI Web of Science, Scopus.**
10. Grigorie T.L., Corcau J., **Lungu M.**, Sandu G.D. *Bi-Dimensional Position Detection Using TDOA Estimation through Cross Correlation of the Acoustic Signals. Part 1: Theoretical Background*. 2009 IEEE International Conference on ICT and Knowledge Engineering. December 1-2, 2009, Siam University, Bangkok, Thailand (**ISI Proceedings**) (3 citations). **Databases: ISI Web of Science, IEEE Xplore database, Scopus, Compendex.**

11. **Lungu, M.**, Lungu, R. *Non-linear Adaptive Controllers with Linear Dynamic Compensator and Neural Network*. Proceedings of the 11th WSEAS International Conference on Automatic Control, Modelling And Simulation, Istanbul, Turkey, May 30 - June 1, 2009, pp. 334-339. ISBN: 978-960-474-082-6, ISSN: 1790-5117 (**ISI Proceedings**) (**2 citations**). **Databases: ISI Web of Science.**
12. Malciu, R., Calbureanu, M., **Lungu, M.**, Dumitru, S. *Comparison between Vibrations Transversal Displacements Analytic Determined for a Linear Elastic Connecting Rod and a Linear Viscoelastic one (After the Validation by Experiment of the Vibrations Effective)*. Proceedings of the 11th WSEAS International Conference on Automatic Control, Modelling And Simulation, Istanbul, Turkey, May 30 - June 1, 2009, pp. 355-360. ISBN: 978-960-474-082-6, ISSN: 1790-5117 (**ISI Proceedings**) (**2 citations**). **Databases: ISI Web of Science.**
13. Calbureanu, M., Malciu, R., **Lungu, M.**, Dumitru, S. *Analytic Determination of the Accelerations of Vibrations for a Linear Viscoelastic Cinematic Element of a Crank and Connecting Rod Assembly Validated by Experiment*. Proceedings of the 11th WSEAS International Conference on Automatic Control, Modelling And Simulation, Istanbul, Turkey, May 30 - June 1, 2009, pp. 349-354, ISSN: 1790-5117 (**ISI Proceedings**) (**1 citation**). **Databases: ISI Web of Science.**
14. Lungu, R., **Lungu, M.**, Stoenescu, E., Calbureanu, M. *Reduced Order Observer for the Longitudinal and Lateral Movements of an Aircraft*. Proceedings of the 11th WSEAS International Conference on Automatic Control, Modelling And Simulation, Istanbul, Turkey, May 30 - June 1, 2009, pp. 328-333, ISSN: 1790-5117 (**ISI Proceedings**) (**3 citations**). **Databases: ISI Web of Science.**
15. **Lungu, M.**, Lungu, R., Stoenescu, E., Grigorie, L. *Prediction State Observer for the Longitudinal and Lateral Movements of an Aircraft*. Proceedings of the 11th WSEAS International Conference on Automatic Control, Modelling And Simulation, Istanbul, Turkey, May 30 - June 1, 2009, pp. 322-327, ISBN: 978-960-474-082-6, ISSN: 1790-5117 (**ISI Proceedings**) (**2 citations**). **Databases: ISI Web of Science.**
16. Dinca, L., Corcau, J., **Lungu, M.**, Tudosie, A., *Electro-hydrostatic Servo-actuators for Aircraft*. Proceedings of the 7th WSEAS International Conference on System Science and Simulation in Engineering (ICOSSE '08), Venice, Italy, November 21-23, 2008, pp. 217-222, ISSN: 1790-2769 (**ISI Proceedings**) (**2 citations**). **Databases: ISI Web of Science.**
17. Lungu, R., **Lungu, M.**, Dinca, L., Stoenescu, E. *On-line Parametric Identification and Discrete Optimal Command for the Aircrafts Longitudinal Movement*. Proceedings of the 7th WSEAS International Conference on System Science and Simulation in Engineering, Venice, Italy, November 21-23, 2008, pp. 211-216, ISBN: 978-960-474-027-7, ISSN: 1790-2769 (**ISI Proceedings**) (**3 citations**). **Databases: ISI Web of Science, ACM.**
18. Calbureanu, M., Malciu, R., **Lungu, M.**, Lungu, R., *Advanced Machining Technologies for Aircraft Component Parts with Thin Walls*. Annals of DAAM & The 19th International DAAAM Symposium "Intelligent Manufacturing & Automation: Focus on Next Generation of Intelligent Systems and Solutions", 22-25th October 2008, Trnava, Slovakia, pp. 189-190, ISSN: 1726-9679, ISBN: 978-3-901509-68-1 (**ISI Proceedings**). **Databases: ISI Web of Science.**
19. Calbureanu, M., Malciu, R., Lungu, M., Calbureanu, D. Aspects about the influence of the lubricant from a rectilinear pair above the work accuracy of the elastic elements from the high precision mechanisms, 12th WSEAS Int. Conf. on Engineering Mechanics, Structures, Engineering Geology, Heraklion, Crete Island, Greece, July 22-24, 2008, pp. 209-214, ISBN: 978-960-6766-88-6, ISSN: 1790-2769 (**ISI Proceedings**) (**1 citation**). **Databases: ISI Web of Science, Compendex.**
20. **Lungu, M.**, Lungu, R., Jula, N., Calbureanu M., Cepisca, C., *Optimal Command of Aircrafts' Move Using a Reduced Order Observer*. 9th WSEAS Int. Conf. on Automation & Information (ICAI'08), Bucharest, Romania, June 24-26, 2008, pp. 332-337, ISBN: 978-960-6766-77-0, ISSN: 1790-5117 (**ISI Proceedings**). **Databases: ISI Web of Science, ACM.**

21. **Lungu, M.**, Lungu, R., Jula, N., Cepisca, C., Calbureanu M. *Synthesis Algorithm of the Optimal Control Law for Flying Objects' Longitudinal Move*. 9th WSEAS Int. Conf. on Automation & Information (ICAI'08), Bucharest, Romania, June 24-26, 2008, pp. 326-332, ISBN: 978-960-6766-77-0, ISSN: 1790-5117 (**ISI Proceedings**). **Databases: ISI Web of Science, ACM.**
22. Corcau, J., Stoenescu, E., **Lungu, M.** *Comparative analysis of classical and fuzzy PI algorithms*. 7th WSEAS Int. Conf. on Artificial Intelligence, Knowledge Engineering and Data Bases, University of Cambridge, UK, Feb 20-22, 2008, pp. 189-192, ISBN: 978-960-6766-41-1, ISSN: 1790-5109 (**ISI Proceedings**). **Databases: ISI Web of Science, ACM.**
23. Sepcu, L., Lungu, R., **Lungu, M.**, *Optimal Control of MAVs' Gliding Motion – Part 1: Theoretical Background*, Proceedings of the International Conference on Electronics, Computers and Artificial Intelligence (ECAI - 2013), Pitesti, Romania, June 27-29, 2013, pp. 1-6, ISBN: 978-1-4673-4935-2 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
24. Sepcu, L., Lungu, R., **Lungu, M.**, *Optimal Control of MAVs' Gliding Motion – Part 2: Controller Design and Validation*, Proceedings of the International Conference on Electronics, Computers and Artificial Intelligence (ECAI - 2013), Pitesti, Romania, June 27-29, 2013, pp. 7-13, ISBN: 978-1-4673-4935-2 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
25. Buciu, G., Tarnita, D.N., Popa, D.L., **Lungu, M.**, Miritoiu, C., Ungureanu, A. *Virtual and Experimental Studies about Human Walking. Virtual Lower Leg Environment. Innovative Design of Tibia Nail*. Applied Mechanics and Materials, vol. 657, 2014, pp. 770-774, ISSN: 1660-9336, e-ISSN: 1662-7482 (**ISI Proceedings**). **Databases: ISI Web of Science.**
26. Lungu, R., **Lungu, M.**, Ioan, M., *Determination and Control of the Satellites' Attitude by using a Pyramidal Configuration of Four Control Moment Gyros*. 12th International Conference on Informatics in Control, Automation and Robotics (ICINCO 2015), Colmar, France, July 21-23, 2015, pp. 448-456 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
27. **Lungu, M.**, Lungu, R. *Reduced-Order Multiple Observer for Aircraft State Estimation during Landing*. 11th edition of the Int. Conference on Trends in Aerospace, Robotics, Manufacturing Systems, Mechanical Engineering, Bioengineering, Power and Energy Engineering, Materials Engineering, Jupiter, 29 iunie-2 iulie 2016; Applied Mechanics and Materials, vol. 841, pp. 253-259, 2016, DOI:10.4028/www.scientific.net/AMM.841.253, ISSN: 1660-9336 (**ISI Proceedings**). **Databases: Google Scholar, ISI Web of Science.**
28. **Lungu, M.**, Lungu, R., Preotu, O. *Estimation of Aircraft State during Landing by means of Multiple Observers*. 23th International Conference on Systems, Signals and Image Processing, 23-25 May 2016, Bratislava, Slovakia (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
29. **Lungu, M.**, Lungu, R., Grigorie, L., Preotu, O. *The Influence of Atmospheric Turbulences on Aircraft Landing Process*. International Conference on Applied and Theoretical Electricity – ICATE 2016 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
30. **Lungu, M.**, Lungu, R., Tutunea, D. *Control of Aircraft Landing using the Dynamic Inversion and the H-inf Control*. 17th International Carpathian Control Conference (ICCC 2016), Tatranská Lomnica, Slovak Republic, May 29 - June 1, 2016, pp. 461-466 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**
31. **Lungu, M.**, Lungu, R., Ioan, M. *Automatic Control of the Satellites' Attitude and Stored Energy using Inertial Wheels*. 17th International Carpathian Control Conference (ICCC 2016), Tatranská Lomnica, Slovak Republic, May 29 - June 1, 2016, pp. 455-460 (**ISI Proceedings**). **Databases: ISI Web of Science, IEEE Xplore.**

**PAPERS PUBLISHED IN PROCEEDINGS/
JOURNALS INDEXED IN DATABASES**

1. **Lungu, M.**, Lungu, R., Grigorie L., *Automat Control of the Aircrafts' Lateral Movement using the Dynamic Inversion*. International Conference on Mechanical, Industrial and Aerospace Engineering, July 27-29, Paris, France, World Academy of Science, Engineering and Technology, Issue 79, Year 7, pp. 381-388, ISSN: 2010-376X (Conference indexed in ERA). *Influence relative score: 0. Databases: ERA, Scopus.*
2. **Lungu, M.**, *Stabilization and control of a UAV flight attitude angles using the backstepping method*, International Conference on Modeling and Simulation, January 15-17, 2012, Zurich, Switzerland, World Academy of Science, Engineering and Technology, Issue 61, January 2012, pp. 299-306, ISSN: 2010-376X (Conference indexed in ERA) (4 citations). *Influence relative score: 0.5 (conference type A). Databases: ERA, Scopus.*
3. **Lungu, M.**, Lungu, R., Grigorie, L., *Aircrafts State Estimation by using an Adaptive Observer for MIMO Linear Time Varying Systems*. IEEE International Conference on High Performance Computing & Simulation (HPCS 2012), July 2-6, 2012, Madrid, Spain, pp. 648-653 (Conference indexed in ERA). *Influence relative score: 0.25 (conference type B). Databases: ERA, Scopus, IEEE Xplore, Scopus.*
4. **Lungu, M.** *Automatic control of aircraft landing by using the H_2/H_∞ control technique*. The 36th IASTED International Conference on Modelling, Identification and Control (MIC 2017), February 20-21, 2017, Innsbruck, Austria. **In publishing process and indexing in the database: Scopus.**
5. Lungu, R., **Lungu, M.**, Ioan, M., *Nonlinear Automatic Control of the Satellites by using the Quaternion and the Angular Velocities' Vectors*. 3rd International Workshop on Numerical Modelling in Aerospace Sciences (NMAS 2015), Buchaest, May 6-7, 2015. INCAS Bulletin, vol. 7, no. 2, pp. 93-103, ISSN: 2066-8201. **Databases: Copernicus.**
6. Sepcu, L., Negrea, P., **Lungu, M.**, Lungu, R., *Controllability and longitudinal movement stability of an insect-type micro air vehicle*. Scientific Bulletin – University “Politehnica” Bucharest, Series D: Mechanical Engineering, vol. 77, nr. 2, 2015, pag. 59-70, ISSN: 1454-2358. **Databases: Copernicus.**
7. Ioan, M., **Lungu, M.**, Lungu, R., *Control of the Satellites' Attitude using a Pyramidal Configuration of Four Variable Speed Control Moment Gyros*. Scientific Bulletin – University “Politehnica” Bucharest, Series D: Mechanical Engineering, 2017, ISSN: 1454-2358. **In publishing process and indexing in databases: Copernicus.**
8. **Lungu, M.**, Lungu, R. *State Estimation of the Controlled Generic Reentry Vehicles via Multiple Observer*. 16th International Conference on Mechatronics – Mechatronika 2014, December 3-5, 2014, Brno, Czech Republic. **Databases: Google Scholar.**
9. **Lungu, M.**, Lungu, R., Sepcu, L., *Multiple Observer with Application to Aircraft Longitudinal Motion*. 18th IEEE International Conference on System Theory, Control and Computing, Sinaia, Romania, 17-19 October, 2014, pp. 749-54. **Databases: Google Scholar.**
10. Calbureanu, M., Malciu, R., Tutunea, D., Ionescu, A., **Lungu, M.**, *The finite element analysis of the thermal stress distribution of a piston head*. International Journal of Mechanics, vol. 7, nr. 4, 2013, pag. 467-474, ISSN: 1998-4448 (3 citations). **Databases: Scopus.**
11. Tutunea, D., Calbureanu, M., **Lungu, M.**, *Computational fluid dynamics analysis of a resistance muffler*, Proceedings of the 11th International Conference on Heat Transfer, Thermal Engineering and Environment (HTE'13), Athens, Greece, 14-16 May 2013, ISBN: 978-1-61804-183-8. Recent Advances in Fluid Mechanics and Heat & Mass Transfer, ISSN: 2227-4596 (1 citation), pp. 31-34. **Databases: Scopus.**
12. **Lungu, M.**, Mastorakis, N., Grigorie, L. *Automat Control of the Flight Altitude Using the Dynamic Inversion and the Influence of Wind Shears and Sensors' Errors on the Aircrafts'*

Landing Process. 7th WSEAS International Conference on Dynamical Systems and Control, 1-3 July, 2011, Iasi, Romania; vol. Recent Researches in Computational Techniques, Non-linear Systems and Control, pp. 97-104, ISBN: 978-1-61804-011-4. **Databases: Scopus, ACM.**

13. Grigorie, L., Corcau, J. **Lungu, M.**, Edu, I., Obreja, R., *Precision improvement for a tunneling accelerometer by using an intelligent controller to close its loop*. 12th IEEE International Symposium on Computational Intelligence and Informatics (CINTI 2011), 21–22 November, 2011, Budapest, Hungary, ISBN: 978-1-4577-0044-6, DOI: 10.1109/CINTI.2011.6108509, pp. 253-258 (**2 citations**). **Databases: IEEE Xplore database, Scopus.**
14. Grigorie, L., **Lungu, M.**, Edu, I.R., Obreja, R. *Miniature Accelerometer Precision Improvement Using Intelligent Control*. 6th IEEE International Symposium on Applied Computational Intelligence and Informatics, May 19-21, 2011, Timisoara, Romania. **Databases: IEEE Xplore database, Scopus.**
15. Grigorie, L., **Lungu, M.**, Edu, I.R., Obreja, R. *Concepts for error modelling of miniature gyros used in inertial navigation systems*. International Conference on Mechanical Engineering, Robotics and Aerospace (ICMERA 2010), December, 2-4 2010, Bucharest, Romania. ISBN: 978-1-4244-8867-4. **Databases: Scopus.**
16. Grigorie, L., **Lungu, M.**, Corcau, J., Edu, I.R., Obreja, R. *Miniaturised Strap-Down Gyro Performance Improvement through On-Line Bias Correction over Temperature*. International Conference on Mechanical Engineering, Robotics and AeroSpace (ICMERA 2010), December 2-4, 2010, Bucharest, Romania. ISBN: 978-1-4244-8867-4. **Databases: Scopus.**
17. **Lungu, M.**, Lungu, R., Grigorie T.L., *Automatic Command Systems for the Flight Direction Control during the Landing Process*. 3rd IEEE International Symposium on Logistics and Industrial Informatics (LINDI 2011), August 25-27, Budapest, Hungary, ISBN: 978-1-4577-1840-3, DOI: 10.1109/LINDI.2011.6031131, pp. 117-122. **Databases: IEEE Xplore database.**
18. Grigorie, L., **Lungu, M.**, Edu, I.R., Obreja, R. *Concepts for error modeling of miniature gyros used in inertial navigation systems*. International Conference on Mechanical Engineering, Robotics and AeroSpace (ICMERA 2010), 2-4 dec. 2010, Bucuresti, Romania. ISBN: 978-1-4244-8867-4. **Databases: IEEE Xplore database.**
19. Calbureanu, M., Malciu, R., Tutunea, D., Ionescu, A., **Lungu, M.**, *Finite Element Modeling of a Spark Ignition Engine Piston Head*, Proceedings of the 11th International Conference on Heat Transfer, Thermal Engineering and Environment (HTE'13), Athens, Greece, 14-16 May 2013, ISBN: 978-1-61804-183-8. Recent Advances in Fluid Mechanics and Heat & Mass Transfer, ISSN: 2227-4596, pp. 61-64 (**3 citations**). **Databases: Compendex.**
20. Calbureanu, M., Malciu, R., Alboteanu, E., Ionescu, A., **Lungu, M.**, *Processing of the Accelerographic Recording Obtained in Oltenia Region during Strong Vrancea Earthquakes*, Proceedings of the 11th International Conference on Heat Transfer, Thermal Engineering and Environment, Athens, Greece, 14-16 May 2013. Recent Advances in Fluid Mechanics and Heat & Mass Transfer, ISSN: 2227-4596, pp. 65-70. **Databases: Scopus.**
21. **Lungu, M.**, *The influence of the Wind Shears and Sensor Errors upon Aircrafts Landing Process*. WSEAS Transactions on Advances in Engineering Education, Issue 12, Volume 7, December 2010, ISSN: 1790-1979. **Databases: Compendex/Scopus, ACM.**
22. **Lungu, M.**, *New non-linear adaptive command system for the aircrafts' attitude control*. Published in the Journal International Journal of Circuits, Systems and Signal Processing - N.A.U.N, Issues 1, Volume 5, 2011, pp. 19-28. ISSN: 1998-4464 (**1 citation**). **Databases: Scopus.**
23. **Lungu, M.**, *The stabilization and identification of the rockets' movement in vertical plane*. International Journal of Circuits, Systems and Signal Processing - N.A.U.N, Issues 1, Volume 5, 2011, pp. 9 - 18. ISSN: 1998-4464. **Databases: Scopus.**
24. **Lungu, M.**, Lungu, R., Mastorakis, N., Fariseu, R. *The Stabilization of the Rockets Using a Control System Including a Differentiator Gyroscope, an Accelerometer and a Correction Subsystem*. International Conference of the Institute for Environment, Engineering, Economics

- and Applied Mathematics (IEEEAM) - Mathematical Models for Engineering Science (MMES'10), 30 November - 2 December 2010, Puerto De La Cruz, Tenerife, pp. 37-43, ISBN: 978-960-474-252-3, ISSN: 1792-6734. **Databases: Compendex, Scopus, ACM.**
25. Lungu, R., **Lungu, M.**, Mastorakis, N., Calbureanu, M. *Rockets' Stabilization Using a Control System Including an Integrator Gyroscope, an Accelerometer and a Correction Subsystem*. International Conference of the Institute for Environment, Engineering, Economics and Applied Mathematics (IEEEAM) - Mathematical Models for Engineering Science (MMES' 10), 30 November – 2 December 2010, Puerto De La Cruz, Tenerife pp. 44-50, ISBN: 978-960-474-252-3, ISSN: 1792-6734. **Databases: Compendex, Scopus, ACM.**
 26. Calbureanu, M., Talu, M., Travieso-Gonzales, C., Talu, St., **Lungu, M.**, Malciu, R. *The Finite Element Analysis of Water Vapour Diffusion in a Brick with Vertical Holes*. International Conference of the Institute for Environment, Engineering, Economics and Applied Mathematics (IEEEAM) - Mathematical Models for Engineering Science (MMES'10), 30 November – 2 December 2010, Puerto De La Cruz, Tenerife pp. 57-62, ISBN: 978-960-474-252-3, ISSN: 1792-6734 (**1 citation**). **Databases: Compendex, Scopus, ACM.**
 27. **Lungu, M.**, Lungu, R., Calbureanu, M., Sepcu, L. *Static system for the automatic control of the aircraft yaw's angle with proportional – derivative control law*. Annals of DAAM & The 21th International DAAAM Symposium "Intelligent Manufacturing & Automation: Focus on Interdisciplinary Solutions", 20-23 October 2010, Zadar, Croatia, ISSN: 1726-9679. ISBN: 978-3-901509-73-5. **Databases: Compendex, Scopus, ACM.**
 28. **Lungu, M.**, Lungu, R., Sepcu, L., Calbureanu, M. *Automatic control system of the aircraft yaw's angle using a proportional – integrator – derivative control law*. Annals of DAAM & The 21th International DAAAM Symposium "Intelligent Manufacturing & Automation: Focus on Interdisciplinary Solutions", 20-23 October 2010, Zadar, Croatia, ISSN: 1726-9679. ISBN: 978-3-901509-73-5. **Databases: Compendex, Scopus, ACM.**
 29. Grigorie, L., **Lungu, M.**, Negrea, P., Baziukaite, D. *The compensation of the thermocouples cold junction temperature variation errors using a neuro – fuzzy controller*. International Conference on Applied Computer Science (IEEE.AM - ACS), Malta, September 15-17, 2010, pp.72-77, ISSN: 1792-4863, ISBN: 978-960-474-225-7. **Databases: Compendex, Scopus.**
 30. Lungu, R., Bekiarski, A., **Lungu, M.**, Calbureanu, M. *The Use of the Hierarchical Structured Dynamic Inversion to the Aircrafts Lateral Movement*. Latest Trends on Systems (Volume 1), pp. 71-77, ISSN: 1792-4235. The 14th WSEAS International Conference on Systems, Corfu, Greece, July 22-24, 2010. ISBN: 978-960-474-199-1. **Databases: Compendex, Scopus, ACM.**
 31. **Lungu, M.**, *Aircrafts' control and command using hierarchical dynamic inversion*. Published in Rev. WSEAS Transactions on Systems and Control, Issue 10, Volume 5, October 2010, pp. 792 – 801. ISSN: 1991-8763 (**3 citari**). **Databases: Scopus, Compendex.**
 32. Lungu, R, **Lungu, M.**, Dinca, L., Stoenescu, E. *On-line Parametric Identification and Discrete Optimal Command of the Flying Objects' Move*. Published in the Journal International Journal of Circuits, Systems and Signal Processing - N.A.U.N, Issues 4, Volume 2, 2008, pp. 274-283. ISSN: 1998-4464. **Databases: ACM, www.naun.org.**
 33. Calbureanu, M., Malciu, R., Lungu, M., Calbureanu, D., *The influence of the lubricant from a rectilinear pair above the work accuracy of the elastic elements from the high precision mechanisms*. Published in Rev. WSEAS Transactions on Applied and Theoretical Mechanics, Issue 5, Volume 3, May 2008, pp. 176-185 (**1 citation**). **Databases: Scopus, Compendex.**
 34. Dinca, L., Corcau, J., **Lungu, M.**, Tudosie, A. *Mathematical Models and Numerical Simulations for Electro-Hydrostatic Servo-Actuators*. Published in the Journal International Journal of Circuits, Systems and Signal Processing - N.A.U.N, Issues 4, Volume 2, 2008, pp. 229-238. ISSN: 1998-4464 (**5 citations**). **Databases: Google Scholar, www.naun.org.**
 35. Jula, N., **Lungu, M.**, Ursu, T., Cepisca, C., Racuciu, C., Raducanu, D. *Theoretical and Practical Aspects for Study and Optimization of the Aircrafts' Electro Energetic Systems*. Published in the

Journal WSEAS Transactions on Circuits and Systems, Issue 12, Volume 7, December 2008, pp. 999-1008. ISSN: 1109-2734 (2 citations). **Databases: Compendex, Scopus, ACM.**

36. **Lungu, M.**, Lungu, R., Jula, N., Calbureanu, M., Cepisca, C., *Optimal Control of Flying Objects' Move After Estimated State Vector Using a Reduced Order Observer*. Published in the Journal WSEAS Transactions on Circuits and Systems, Issue 6, Volume 7, June 2008, pp. 502-511. ISSN: 1109-2734 (1 citation). **Databases: Compendex, Scopus, ACM.**
37. **Lungu, M.**, Lungu, R., Jula, N., Cepisca, C., Calbureanu, M. *Aspects Regarding a New Method for the Optimal Law's Synthesis of Aircrafts' Move*. Published in the Journal WSEAS Transactions on Circuits and Systems, Issue 6, Volume 7, June 2008, pp. 492-501. ISSN: 1109-2734. **Databases: Compendex, Scopus, ACM.**
38. Lungu, R., **Lungu, M.**, Jula, N., Cepisca, C. *Systems for Move Stabilisation and for Aircrafts and Rockets Flight Optimization*. Published in the Journal WSEAS Transactions on Circuits and Systems, Issue 7, Vol. 7, July 2008, pp. 678-687. ISSN: 1109-2734. **Databases: Compendex, Scopus, ACM.**
39. **Lungu, M.**, Lungu, R., Jula, N., Cepisca, C. *Neuro - Adaptive Command Systems very maneuverable flying objects*. Published in the Journal WSEAS Transactions on Circuits and Systems, Issue 7, Vol. 7, 2008, pp. 668-677. ISSN: 1109-2734. **Databases: Compendex, Scopus, ACM.**
40. Preotu, O., Dumitrache, Al., **Lungu, M.** *Common aspects and differences in the behavior of classical configuration versus canard configuration aircraft in the presence of vertical gusts, assuming the hypothesis of an elastic fuselage*. International Conference of Aerospace Sciences "Aerospatial 2010", Sectiunea 2, Bucharest 20-21 October, 2010, ISSN: 2067-8622. INCAS Bulletin, vol. 3, Issue 2, 2011, pp. 65-75, ISSN: 2066-8201. **Database: Copernicus, Google Scholar.**
41. Grigorie, T.L., **Lungu, M.**, Edu, I.R., Obreja, R., *Closed loop high-precision accelerometer with smart control*, Scientific Bulletin of The "Politehnica" University of Timisoara, Romania, Transactions on Automatic Control and Computer Science, vol. 57, no. 71, 2012, ISSN 1224-600X. **Databases: Copernicus database, VINITI - All-Russian Institute of Scientific and Technical Information.**
42. **Lungu, M.** *Rockets' stabilization control systems using differentiator or integrator gyroscopes*. Proceedings of the 10th Int. Conf. on Applied and Theoretical Electricity ICATE 2010, Craiova, 8-9 October, 2010. Published in „Analele Universitatii din Craiova”, Electrical Engineering Series, no. 34, pp. 255-260, ISSN: 1842-4805. **Databases: Copernicus, Google Scholar.**
43. Lungu R., **Lungu, M.** *The study of the automatic system for the sealed cabins airflow regulation using indirectly action airflow regulators*. Proceedings of the 10th International Conference on applied and Theoretical Electricity ICATE 2010, Craiova, 8-9 October, 2010. Published in „Analele Universitatii din Craiova”, Electrical Engineering Series, no. 34, 261-266. ISSN: 1842-4805. **Databases: Copernicus, Google Scholar.**
44. Grigorie, L., **Lungu, M.**, Edu, I. R., Obreja, R. *Concepts error modelling of miniature accelerometers used in inertial navigation systems*. Proceedings of the 10th International Conference on applied and Theoretical Electricity ICATE 2010, Craiova, 8-9 October, 2010. Published in „Analele Universitatii din Craiova”, Electrical Engineering Series, no. 34, pp. 212-219. ISSN: 1842-4805 (2 citations). **Databases: Copernicus, Google Scholar.**
45. **Lungu, M.** *Aircrafts' move stabilization using optimal criteria and linear state observers*. 9th International Conference on Applied and Theoretical Electricity ICATE 2008, Craiova, 9-11 October, 2008. Published in „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B category), no. 32, pp. 267-272. ISSN: 1842-4805 (1 citation). **Databases: Copernicus, Google Scholar.**
46. Lungu, R., **Lungu, M.** *Neuro – adaptive command systems for rockets' move*. 9th Int. Conference on Applied and Theoretical Electricity ICATE 2008, Craiova, 9-11 October, 2008. Published in „Analele Universitatii din Craiova”, Electrical Engineering Series (CNCSIS journal – B

category), no. 32, pp. 261-266, ISSN: 1842-4805. **Databases: Copernicus, Google Scholar.**

47. Grigorie, T.L., **Lungu, M.**, Edu, I.R., Obreja, R. *Analysis of the Miniaturized Inertial Sensors Stochastic Errors with the Allan Variance Method: A Review*. International Conference of Aerospace Sciences "AEROSPATIAL 2010", Section 5, Bucharest 20 -21 October, 2010, ISSN: 2067-8622. **Databases: Copernicus, Google Scholar.**

PAPERS PUBLISHED IN THE PROCEEDINGS
OF NON-INDEXED INTERNATIONAL CONFERENCES

1. Ciunel, S., Dumitru, N., Tica, B., Popa, D.L., Popa-Mitroi, Gh., **Lungu, M.**, *Analysis and dynamic human cranio-cervical complex movements*, 3th International Congress Science and Management of Automotive and Transportation Engineering, 23-26 October 2014, Craiova.
2. **Lungu, M.**, Lungu, R., Sepcu, L. *Nonlinear Adaptive System for the Automatic Control of Rockets' Motion in Vertical Plane*, International Conference in Military Technology Proceeding, ICMT'13, Brno, 2013, pp. 717-726. ISBN: 978-80-7231-917-6.
3. **Lungu, M.**, Lungu, R., Sepcu, L. *Adaptive Observer Based on an Orthogonal Neural Network for the Estimation of the Aircraft's Longitudinal Motion*, International Conference in Military Technology Proceeding, ICMT'13, Brno, 2013, pp. 727-734. ISBN: 978-80-7231-917-6.
4. Grigorie, T.L., **Lungu, M.**, Edu, I.R., Obreja, R. *Influences of the Miniaturized Inertial Sensors Errors on the Navigation Solution in a Bidimensional SDINS in Vertical Plane*. 4th International Conference Computational Mechanics and Virtual Engineering (COMEC 2011), Transilvania University of Brasov, 20-22 October 2011, Brasov, Romania (**5 citations**).
5. Grigorie, T.L., Corcau, J., **Lungu, M.**, Sandu, G.D. *Bi-Dimensional Position Detection Using TDOA Estimation through Cross Correlation of the Acoustic Signals. Part 2: Experimental testing and validation*. 2009 IEEE International Conference on ICT and Knowledge Engineering. December 1-2, 2009, Siam University, Bangkok, Thailand. ISBN: 978-1-4244-4513-4.
6. Malciu, T., Sepcu L., **Lungu M.**, Malciu R. *The use of the four-bar mechanism to the air vehicles' flapping wing*. International Conference of Mechanical Engineering, ICOME 2010, Craiova, April 28-30, 2010.
7. Malciu, T., Malciu R., Calbureanu, M., **Lungu M.**, Sepcu L. *Flexible manufacturing approach of a part in an integrated manufacturing environment*. International Conference of Mechanical Engineering, ICOME 2010, Craiova, April 28-30, 2010.

24.02.2017

Associate Professor,
PhD. Mihai-Aureliu LUNGU



RESEARCH GRANTS WON WITHIN NATIONAL COMPETITIONS

1. **Modern architectures for the control of aircraft landing.** Program PN II – Human Resources (2015-2017), Young Teams. Coordinator institute: University of Craiova. Grant funds: 521.695.000 RON. Financial source: Executive Agency for Higher Education, Research, Development and Innovation Funding (UEFISCDI). *The role in the research grant: Person incharge.*
2. **COMISIS - Computational methods in scientific investigation of space.** Space Technology and Advanced Research - Program for Research, Development and Innovation; coloboration with European Space Agency (ESA) – 2013-2016. Coordinator institute: West University of Timisoara. Grant director: Prof. PhD. Vulcanov Dumitru. Grant funds: 1.000.000 RON. Financial source: Education Minsiter and ESA. *The role in the research grant: Person incharge from P1 – University of Craiova.*
3. **STS – System for sub-orbital testing, launching infrastructure development, flight tests.** Program PN-II – Partnerships in priority domains – 2014-2016. Coordinator institute: University Politehnica Bucharest. Grant director: Prof. PhD. Eng. Chelaru Teodor Viorel. Grant funds: 1.743.473 RON. Financial source: Executive Agency for Higher Education, Research, Development and Innovation Funding (UEFISCDI). *The role in the research grant: Person incharge from P5 – University of Craiova.*
4. **Algorithms and structures for aircrafts and rockets identification, estimation and control - 3 years postdoctoral scholarship (2010-2013) within the Grant “University research partnership - a step towards a postdoctoral school of the future”.** Grant code: POSDRU/89/1.5/S/61968. Contract financed from European Social Fund Operational Program Human Resources Development 2007-2013. *Role in the research grant: Post-doctoral scholarship owner (grant director).*
5. **Systems, equipment, technologies and advanced techniques for the increasing of the infrastructure and public/private interest protection degree – AVPROT.** Program *PN-II – Partnerships in priority domains* (2007-2010), No. 81 – 005/14.09.2007, domain „Space and Security”, coordinator: SEECTRON. Grant director: Associate Professor Eng. Adrian Coman – Military Technical Academy, Bucharest. Grant funds: 1.319.171 RON. Financial source: M.E.C.T.S. *The role in the research grant: Member of the research team.*
6. **Hydrostatic servo-actuator for aircrafts – SAHA.** Program *PN-II – Partnerships in priority domains* (2007-2010), Nr. 81 – 036/14.09.2007, domain „Space and Security”, coordinator: INCAS - Bucharest. Grant director: PhD Ursu Ioan. Grant funds: 1.163.305 RON. Financial source: M.E.C.T.S. *The role in the research grant: Member of the research team.*
7. **Multifunctional air system with high autonomy degree for the environment quality supervisor - SAMASCAM.** Program: *PN-II – Partnerships in priority domains* (2008 - 2011). Nr. 82-072/12.09.2008, domain „Space and Security”, coordinator: University of Craiova. Grant director: Professor PhD. Eng. Romulus Lungu. Grant funds: 2.000.000 RON. Financial source: M.E.C.T.S. *The role in the research grant: Member of the research team.*
8. **Air platform for the analysis of the aircraft flight qualities using similitude and scale reduction - PLATFUS.** Program: *PN-II – Partnerships in priority domains* (2008-2011). Nr. 82-091/11.09.2008, domain „Space and Security”, coordinator: INCAS – Bucharest. Grant director: PhD. Eng. Florician Mihai. Grant funds: 2.000.000 RON. Financial source: M.E.C.T.S. *The role in the research grant: Member of the research team.*
9. **Researches regarding the amplification of the Coanda effect.** Program *PN II - IDEAS* (2008-2011). Nr. 712/19.01.2009, coordinator: University of Craiova. Grant director: Assoc. Professor PhD. Preotu Octavian. Grant funds: 299.952 RON. Financial source: M.E.C.T.S. *The role in the research grant: Member of the research team.*
10. **High-precision strap-down inertial navigators, based on the connection and adaptive integration of the nano and micro inertial sensors in low cost networks, with a high degree of redundance.** Program *PN II – Human Resources* (2010–2013)– Young Teams. Grant director:

Associate PhD. Eng. Grigorie Lucian Teodor. Grant funds: 727.725 RON. Financial source: M.E.C.T.S. ***The role in the research grant: Member of the research team.***

11. **High-precision micro and nano smart sensors for space inertial navigation applications.** Space Technology and Advanced Research - Program for Research, Development and Innovation; coloboration with European Space Agency (ESA) – 2012-2015. Coordinator institute: University of Craiova. Grant director: Associate PhD. Eng. Grigorie Lucian Teodor. Financial source: Education Minsiter and ESA. ***The role in the research grant: Member of the research team.***
12. **High precision low-cost INS/GPS integrated navigation systems, based on intelligent data fusion algorithms.** Program PN II – Human Resources (2015-2017) – Young Teams. Coordinator institute: University of Craiova. Grant director: Associate Professor PhD. Eng. Grigorie Lucian Teodor. Grant funds: 550.000.000 RON. Financial source: Executive Agency for Higher Education, Research, Development and Innovation Funding (UEFISCDI). ***The role in the research grant: Member of the research team.***
13. **Demonstrator for direct Coanda effect amplification.** Program PN III – 2017-2018. Experimental-demonstrativ project. Coordinator institute: University of Craiova. Grant director: Associate Professor PhD. Preotu Octavian. Grant funds: 600.000 RON. Financial source: Executive Agency for Higher Education, Research, Development and Innovation Funding (UEFISCDI). ***The role in the research grant: Member of the research team.***

RESEARCH GRANTS WON WITHIN OTHER COMPETITIONS

1. **Virtual innovative bio-mechanical model for the testing the cinematic and dynamic behavior of the human bones in normal, accident or pathological situations.** Univeristy of Craiova grants' competition – interdisciplinary projects, 2013-2014. Grant funds: 24000 RON. Grant director: Associate PhD. Eng. Popa Dragoş – Faculty of Mechanics, University of Craiova. Financial source: Research Fund of the University of Craiova. ***The role in the research grant: Member of the research team.***
2. **Research regarding the improvement of the bio-reliability of the testing manikins in accidents and regarding the optimization of the elements and devices through the implementing of new and intelligent materials.** Univeristy of Craiova grants' competition – advanced research projects, 2013-2014. Grant funds: 12000 RON. Grant director: Lecturer PhD. Eng. Ciunel Ștefănița (Facultaty of Mechanics), University of Craiova. Financial source: Research Fund of the University of Craiova. ***The role in the research grant: Member of the research team.***

24.02.2017

Associate Professor,
PhD. Mihai-Aureliu LUNGU

