

Universitatea *Transilvania* din Braşov
Facultatea de Inginerie Mecanică

Poziția postului 26

Disciplinele postului:

Managementul termic și recuperarea energiei la motoarele cu ardere internă,

Acționări hidraulice și pneumatice,

Calculul și construcția motoarelor cu ardere internă.

Departamentul de Autovehicule și Transporturi

**FIȘA DE VERIFICARE A ÎNDEPLINIRII STANDARDELOR UNIVERSITĂȚII
pentru postul de șef de lucrări, poziția 26**

publicat în Monitorul Oficial al României nr. 571 din data de 10 mai 2016.

Candidat: LEAHU Cristian-Ioan Data nașterii: 5 ianuarie 1984

Funcția actuală: Cercetător științific gr.III Instituția: Universitatea Transilvania din Braşov

1. Studii universitare (licență și masterat)

Nr. crt.	Instituția de învățământ superior și facultatea	Domeniul	Perioada	Titlul acordat
1.	Universitatea Transilvania din Braşov, Facultatea de Inginerie Mecanică	Inginerie Mecanică	2002 - 2007	Inginer diplomat
2.	Universitatea Transilvania din Braşov, Facultatea de Inginerie Mecanică	Inginerie Mecanică	2007 - 2009	Diplomă de Master

2. Studii de doctorat

Nr. crt.	Instituția organizatoare de doctorat	Domeniul	Perioada	Titlul științific acordat
	Universitatea Transilvania din Braşov	Inginerie Mecanică	2007 - 2011	Doctor

3. Studii și burse postdoctorale (stagii de cel puțin 6 luni)

Nr. crt.	Instituția	Domeniul/ Specializarea	Perioada	Tipul de bursă
	Universitatea Transilvania din Braşov	Energie	15.04.2014-14.10.2015	POSDRU

4. Realizările profesional-științifice

Calitatea activităților didactice/ profesionale	Din Fișa de evaluare și din Propunerea de dezvoltare a carierei universitare
Lucrări publicate în reviste de specialitate recunoscute național / internațional	<ol style="list-style-type: none">1. Leahu, C.I., Chiru, A., Dogariu, D.M. (2016) A method of performing the supercharging process at the engines researched on the test bench. Applied Mechanics and Materials, DOI 10.4028/www.scientific.net/AMM.822.175, vol.822, pg.175-182.2. Leahu, C.I., Chiru, A., Dogariu, D.M., Mitroi, G. (2016) Dual supercharging with turbocharger and pressure wave supercharger. Applied Mechanics and Materials, DOI

Lucrări publicate în reviste de specialitate
recunoscute național / internațional

- 10.4028/www.scientific.net/AMM.823.329, vol.823, pg.329-334.
3. Leahu, C.I. (2015) Improvement of exhaust gas pressure's utilization for compressing the intake air in Diesel engine's cylinders. International Journal of Automotive Technology, DOI 10.1007/s12239-015-0093-3, vol.16, no.6, 2015, pg.913-921. (SRI=0,724; FI=0,969)
4. Leahu, C.I., Dogariu, D.M., Chiru, A. (2015) Researches on the influence of pressure wave compressor on the intake air temperature at the supercharged engines. Bulletin of the Transilvania University of Brasov, Series I: Engineering Sciences, ISSN 2065-2119, vol.8, no.1, pg.7-12.
5. Leahu, C.I., Chiru, A. (2015) Research on sequential speed driving of the pressure wave compressors. Annals of the Oradea University, Fascicle of Management and Technological Engineering, ISSN 1583-0691, no.1, pg.181-184.
6. Leahu, C.I., Chiru, A., Tarulescu, S. (2015) A modality to optimize common functioning of a pressure wave supercharger with an internal combustion engine. Applied Mechanics and Materials, DOI 10.4028/www.scientific.net/AMM.772.350, vol.772, pg.350-354.
7. Leahu, C.I. (2013) Theoretical and experimental researches as regards raising the efficiency of the supercharging process achieved by the pressure wave compressors. Bulletin of the Transilvania University of Braşov, Series I: Engineering Sciences, ISSN 2065-2119, vol.6, no.1, pg.7-12.
8. Leahu, C.I., Abăitancei, H., Radu, S. (2013) Drive with rotative speed independent from the engine, of the pressure wave compressors. Recent Journal, ISSN 1582-0246, vol.14, no.1, pg.29-35.
9. Leahu, C.I., Radu, Gh.Al. (2011) Optimization of joint operation of pressure waves compressors of type Compres with Diesel engines. Bulletin of the Transilvania University of Brasov, Series I: Engineering Sciences, ISSN 2065-2119, vol.4, no.1, pg.7-12.
10. Radu, Gh.Al., Leahu, C.I. (2011) Alternative solutions for supercharging with aggregates of turbocharger type. Bulletin of the Transilvania University of Brasov, Series I: Engineering Sciences, ISSN 2065-2119, vol.4, no.1, pg.13-18.

Lucrări prezentate la conferințe naționale/
internaționale în profilul postului

1. **Leahu, C.I.**, Tarulescu, S. The influence of thermal regime on gasoline direct injection engine performance and emissions. ACME - The 6th International Conference on Advanced Concepts on Mechanical Engineering, 9-10 June 2016, Iasi.
<http://mectuiasi.ro/acme2016/arrival.html>
2. **Leahu, C.I.**, Dogariu, D.M., Chiru, A., Rad, L.E., Mitroi, G. Aspects on modeling of the pressure wave compressors. EAEC-ESFA – The 14th European Automotive Engineers Cooperation and The 9th International Congress “Fuel Economy, Safety and Reliability of Motor Vehicles”, 25-27 November 2015, Bucuresti.
www.eaec-esfa2015.com/index.php/eaec/2015
3. Tarulescu, S., Tarulescu, R., Leahu, C.I. (2015) Optimizing Combustion in a single cylinder GDI SI engine. EAEC-ESFA – The 14th European Automotive Engineers Cooperation and The 9th International Congress “Fuel Economy, Safety and Reliability of Motor Vehicles”, 25-27 November 2015, Bucuresti.
www.eaec-esfa2015.com/index.php/eaec/2015
4. Dogariu, D.M., Tanasie, C., Chiru, A., Leahu, C.I., STancu, S.V. (2015) Model preparation for structural FEA on main components of an internal combustion engine. EAEC-ESFA – The 14th European Automotive Engineers Cooperation and The 9th International Congress “Fuel Economy, Safety and Reliability of Motor Vehicles”, 25-27 November 2015, Bucuresti.
www.eaec-esfa2015.com/index.php/eaec/2015
5. Rad, L.E., Chiru, A., Leahu, C.I., Dogariu, D.M. (2015) Composite materials testing method steering column bracket test. EAEC-ESFA – The 14th European Automotive Engineers Cooperation and The 9th International Congress “Fuel Economy, Safety and Reliability of Motor Vehicles”, 25-27 November 2015, Bucuresti.
www.eaec-esfa2015.com/index.php/eaec/2015
6. Rad, L.E., Chiru, A., Leahu, C.I. (2015) Calculation of the steering column bracket made of composite materials reinforced with continuous fibers. EAEC-ESFA – The 14th European Automotive Engineers Cooperation and The 9th International Congress “Fuel Economy, Safety and Reliability of Motor Vehicles”, 25-27 November 2015, Bucuresti.

Lucrări prezentate la conferințe naționale/
internaționale în profilul postului

7. Radu, S., Hirceaga, M., Radu, Gh.Al., Leahu, C.I., Abaitancei, H., Iakab-Peter, M. (2016) Simulation models of the Comprex type pressure wave supercharger. ICOME – International Conference of Mechanical Engineering, 8-9 October 2015, Craiova. <http://www.mecanica.ucv.ro/ViataAcademica/Conferinte/ICOME2015/index.html>
8. **Leahu, C.I.**, Chiru, A., Dogariu, D.M. Research on identifying the performances of the supercharging aggregates. SMAT – International Congress Science and Management of Automotive and Transportation Engineering, 23-25 October 2014, Craiova. <http://mecanica.ucv.ro/ViataAcademica/Conferinte/smat2014/index.html>
9. Dogariu, D.M., Chiru, A., **Leahu, C.I.**, Stancu V.S. Flow simulation through an electrohydraulic switching valve using finite element method. SMAT – International Congress Science and Management of Automotive and Transportation Engineering, 23-25 October 2014, Craiova. <http://mecanica.ucv.ro/ViataAcademica/Conferinte/smat2014/index.html>
10. **Leahu, C.I.**, Roman, C., Radu, S., Iakab-Peter, M. Experimental research on the supercharging of the compression ignition engines with pressure wave compressor driven by electric motor. AFASES – The 15th International Conference of Scientific Paper, 23-25 May 2013, Braşov. <http://www.afahc.ro/ro/afases.html>
11. Roman, C., Talabă, D., Abăitancei, H., **Leahu, C.I.**, Radu, S. Analysis solicitations injection systems of high and very high pressure using multi domain simulation. AFASES – The 15th International Conference of Scientific Paper, 23-25 May 2013, Braşov. <http://www.afahc.ro/ro/afases.html>
12. Mărdărescu, V.G. Hîrceagă, M., Radu, Gh.Al., **Leahu, C.I.**, A study of parameters influencing the performance of a pressure wave supercharger. CONAT – The 11th International Congress on Automotive and Transport Engineering, 27-29 October 2010, Braşov. <http://www.conat.ro/index.php/conat/2010>
13. **Leahu, C.I.**, Radu, Gh.Al., Mărdărescu, V.G., Hîrceagă, M. Improving energetical and environmental performance of Diesel engines, by the efficiency supercharge process. CONAT

	<p>– The 11th International Congress on Automotive and Transport Engineering, 27-29 October 2010, Braşov. http://www.conat.ro/index.php/conat/2010</p>
Volum(e) de specialitate publicat(e) în edituri recunoscute naţional	<p>LEAHU, C.I. (2012) Optimizarea funcţionării comune a motoarelor cu aprindere prin comprimare, cu agregatele de supraalimentare cu unde de presiune de tip Comprex, Editura Universităţii Transilvania din Braşov, ISBN 978-606-19-0036-7.</p>

**Director de departament,
prof.dr.ing. Nicolae ISPAS**



**Candidat,
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