

List of Publications – associate professor Eng. Daniel MORARIU, PhD

Books

1. **D. Morariu**, *Interfaces and Communication Protocols*, “Lucian Blaga” Publishing House, Sibiu, 238 pages, ISBN 978-606-12-1259-0, 2016, (in Romanian);
2. Radu G. Cretulescu, **Daniel I. Morariu**, "Dezvoltarea aplicațiilor WEB", Published at Editura Universității “Lucian Blaga” Sibiu, 2015
3. R. Cretulescu, **D. Morariu**, "*Text Mining. Tehnici de clasificare si clustering al documentelor*", Publishing house Albastra, Cluj Napoca, 2012, ISBN 978-973-650-289-7, 232 pages (in Romanian)
4. Coauthor at, Coordinators: I. Voncila, A. Repanovici, C. Albu, D. Volovici, *Sistem integrat pentru indexarea si partajarea on-line a documentelor tehnice digitizate – Ghid de proiectare, realizare si utilizare*, Galati University Press, Galati, ISBN 978-606-8348-27-8, 2011, (in Romanian);
5. M. Breazu, **D. Morariu**, G. Curea *Object Oriented Programing – Laboratory Manual*, “Lucian Blaga” Publishing House, Sibiu, ISBN 978-973-739-918-2, 2010, (in Romanian);
6. **D. Morariu**, *Text Mining Methods based on Support Vector Machine*”, MATRIX ROM Publishing House, București, ISBN 978-973-755-343-0, 2008 (in English);
7. **D. Morariu**, *Interfaces and Communication Protocols - Laboratory Manual*, “Lucian Blaga” Publishing House, Sibiu, 104 pages, ISBN 978-973-739-447-7, 2007, (in Romanian);

Scientific Activity

1. Adrian Florea, Daniel-Ioan Popa, Daniel Morariu, Ionela Maniu, Lasse Berntzen, Ugo Fiore, *Digital farming based on a smart and user-friendly IoT irrigation system: A conifer nursery case study*, IET Cyber-Physical Systems: Theory & Applications, <https://doi.org/10.1049/cps2.12054>, WOS:000977303000001, 27 April 2023, IF pe 2021 0,44, încadrat Q3,
2. Macarie Breazu, Daniel Morariu; Radu G. Cretulescu; Antoniu Pitic, Adrian Bărglăzan, *In search for the simplest example that proves Huffman coding overperforms Shannon-Fano coding*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2022-0001, ISSN: L-2067-354X, Vol 12, No 2 (2022)
3. FLOREA Adrian, MIRONESCU Ion, CRACIUNEAN Cristian Daniel, MORARIU Ionel Daniel, VOLOVICI Daniel, *Design Methodology and Tools in Factory of the Future*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2021-0001, ISSN: L-2067-354X, Vol 11, No 1 (2021)
4. Arpad Gellert, Remus Brad, Daniel Morariu, Mihai Neghina, *Filtering Random Valued Impulse Noise from Grayscale Images through Support Vector Machine and Markov Chain*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2021-0004, ISSN: L-2067-354X, Vol 11, No 1 (2021)

5. Macarie Breazu, Radu Cretulescu, Daniel Morariu, *Online assessment solution without in-person proctoring*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2021-0003, ISSN: L-2067-354X, Vol 11, No 1 (2021)
6. Adrian BĂRBULESCU, Daniel I. MORARIU, - *Part of Speech Tagging Using Hidden Markov Models*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2020-0005, ISSN: L-2067-354X, Vol 10, No 1 (2020)
7. Breazu M., Volovici D., Morariu D., Cretulescu R. - *On Hagelbarger's and Shannon's matching pennies playing machines*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, DOI: 10.2478/ijasitels-2020-0003, ISSN: L-2067-354X, Vol 10, No 1 (2020)
8. Radu G. CREȚULESCU, Daniel I. MORARIU, Macarie BREAZU, Daniel VOLOVICI - *DBSCAN ALGORITHM FOR DOCUMENT CLUSTERING*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, Vo. 9, No. 1, ISSN 2559-365X, 2019
9. Claudia CÎRCIOROABA, Mihai STANCU, Daniel I. MORARIU - *Anomaly detection on the real production traffic*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, Vol 7, No. 1, 2017, pg. 12-19, ISSN 2067-354X
10. R. Cretulescu, D. Morariu, , M. BREAZU - *Improving the Web search using search engines query modifiers*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, Vo. 8, No. 1, ISSN 2559-365X, 2018
11. D. Morariu, L. Vintan, R. Cretulescu, - *An Extension of the VSM Documents Representation using Word Embedding*, Proceedings of the BRCEBE-ICEBE'17 Conference, Sibiu, pp. 259-267, ISSN 1843-6730, October 2017, Sibiu, Romania (**Articol indexat (ISI) Thomson Reuters (WoS)**)
12. L. Vintan, D. Morariu, R. Cretulescu, M. Vintan, - *An Extension of the VSM Documents Representation*, International Journal of Computers, Communications & Control, Vol. 12, No. 3, pp. 402-414, ISSN 1841-9836, May 2017 (Impact Factor: IF=1,374, cf. JCR 2016 (Q3, 96/146 in Computer Science, **SRI=0,420** cf. <http://uefiscdi.gov.ro/userfiles/file/CENAPOSS/RIS2015.pdf>; WOS:[000402475300008](https://doi.org/10.1109/ICSTCC.2015.7321279), DOI: <http://dx.doi.org/10.15837/ijccc.2017.3>.)
13. Claudia CÎRCIOROABA, Mihai STANCU, Daniel I. MORARIU, Daniel VOLOVICI - *Part of Speech Tagging in Romanian Texts*, The 8th International conference on Information Science and Information Literacy, ISSN 2067-9882, April 2017, Sibiu.
14. D. Morariu, R. Cretulescu, M. BREAZU - *The WEKA MultilayerPerceptron Classifier*, The 8th International conference on Information Science and Information Literacy, ISSN 2067-9882, April 2017, Sibiu
15. R. Cretulescu, D. Morariu, M. BREAZU - *Using WEKA framework in document classification*, The 7th International conference on Information Science and Information Literacy, ISSN 2067-9882, April 2016, Sibiu.
16. Cretulescu, R.; David, A.; **Morariu, D.**; Vintan, L., *Part-of-speech labeling for Reuters database*, System Theory, Control and Computing (ICSTCC), 2015 19th International Conference on, Year: 2015, Pages: 117 - 122, DOI: 10.1109/ICSTCC.2015.7321279, IEEE Conference Publications <http://ieeexplore.ieee.org/xpl/articleDetails.jsp?reload=true&arnumber=7321279&newsearch=true&searchWithin=%22Last%20Name%22:Cretulescu>, <http://www.aie.ugal.ro/icstcc2015>

17. R. Cretulescu, D. Morariu, M. BREAZU - *Document Classification using Naive Bayes*, International Journal of Advanced Statistics and IT&C for Economics and Life Sciences, Vo. 6, No. 1, ISSN 2559-365X, 2016
18. **D. Morariu**, Hann Meng (Royal University of Phnom Penh), *Khmer Character Recognition using Artificial Neural Network*, Asia-Pacific Signal and Information Processing Association- Annual Summit and Conference, Cambodia, 10.1109/APSIPA.2014.7041824, 2014, http://ieeexplore.ieee.org/xpl/freeabs_all.jsp?arnumber=7041824&abstractAccess=no&userType=inst
19. R. CRETULESCU, D. MORARIU, L. VINȚAN, *Clustering Documents: A Synthetic State of the Art Overview*, Joint International Conference of Doctoral and Post-Doctoral Researchers, ISSN 2067-9882, September 2014, Craiova.
20. R. CRETULESCU, A. DAVID, **D. MORARIU**, L. VINȚAN - *Part of Speech Tagging with Naive Bayes Methods*, Proceedings of The 18th International Conference on System Theory, Control and Computing, Sinaia (Romania), October 17 - 19, 2014, v. <http://www.ace.tuiasi.ro/icstcc2014/index.html>; pg. 446-451, DOI: 10.1109/ICSTCC.2014.6982457, 2014
21. R. Cretulescu, D. Morariu, M. BREAZU - *An Introduction to Clustering*, The 5th international conference on Information Science and Information Literacy, ISSN 2067-9882, April 2014, Sibiu.
22. **Daniel I. MORARIU**, Radu G. CRETULESCU, Lucian N. VINȚAN, *Vector versus Tree Model Representation in Document Clustering*, Romanian Journal of Information Science and Technology, Volume 16, Number 1/2013, pp. 81-102, ISSN 1453-8254, Romanian Academy, Bucharest, 2013; IF= 0.283 (la 30.07.2013), v. <http://uefiscdi.gov.ro/userfiles/file/CENAPOSS/ScorulRelativDeInfluenta2013.xls>, 2013
23. **D. MORARIU**, R. CRETULESCU, M. BREAZU, *Feature Selection in Document Classification*, The 4th international conference on Information Science and Information Literacy, ISSN 2067-9882, April 2013, Sibiu.
24. R. Cretulescu, **D. Morariu**, M. Breazu, L. Vintan - *Weight Space Exploration Using Genetic Algorithms for Meta-classifier in Text Document Classification*, Journal of Studies in Informatics and Control, Vol. 21, June 2012, pp. 147-154, ISSN 1200-1766, impact factor 0.578, 2012;
25. **Daniel I. MORARIU**, Radu G. CRETULESCU, Macarie BREAZU, *Word Sense Disambiguation for Text Mining*, The third international conference in Romania of "Information Science and Information Literacy", ISSN 2067-9882, (<http://bcu.ulbsibiu.ro/conference2012/index.html>) April 2012;
26. CRETULESCU R., **MORARIU D.**, VINTAN L. - *Clustering Text Documents: An Overview*, Acta Universitatis Cibiniensis. Technical Series, vol. LXIII, ISSN 1583-7149, pp. 28-35, "L. Blaga" University of Sibiu, 2012 (acceptat in urma sustinerii in fata comisiei stiintifice aferente Conferintei nationale a doctoranzilor din tara, tinuta la ULB Sibiu in anul 2011)
27. **D. Morariu**, R. Cretulescu., L. Vintan - *Using Suffix Tree Document Representation in Hierarchical Agglomerative Clustering*, An International Journal of Science, Engineering and Technology, Issue 59, ISSN 2011-376x, eISSN, 2010-2778, part I, pag. 131-136, November 2011, Paris, France;
28. R. Cretulescu., **D. Morariu**, L. Vintan - *Ongoing Research in Document Classification at the "Lucian Blaga" University of Sibiu*, Section "News From Projects" in the 5th International Symposium on Intelligent Distributed Computing IDC2011, October 2011, Delft, Nederland;

29. R. Cretulescu., **D. Morariu**, M. Breazu, L. Vintan – *Using Genetic Algorithms for Weights Space Exploration in an Eurovision-like weighted Meta-Classifier*, The second international conference in Romania of Information Science and Information Literacy, ISSN 2067-9882, April 2011;
30. R. Cretulescu, **D. Morariu**, L. Vintan, I. Coman – *An Adaptive Meta-classifier for Text document*, 16th International Conference on Information Systems Analysis, pp. 372-377, ISBN-13: 978-1-934272-86-2(Collection), ISBN-13: 978-1-934272-88-6(Volume II) ,Florida, USA, 2010 (http://www.iis.org/CDs2010/CD2010IMC/ISAS_2010/Abstract.asp?myurl=UA277CD.pdf)
31. **D. Morariu**, R. Cretulescu, L. Vintan – *Improving a SVM Meta-classifier for Text Documents by using Naive Bayes*, International Journal of Computers, Communications & Control, Vol. V, No. 3, pp. 351-361, ISSN 1841-9836, E-ISSN 1841-9844, September 2010 (impact factor 0.650 for 2010 - http://journal.univagora.ro/?page=article_details&id=418)
32. D. Volovici, M. Breazu, A.C. Mitea, **D. Morariu** – *Digital Information Retrieval*, Journal of Studies in Informatics and Control, Vol. 19, issue 2, June 2010, pp. 185-192, ISSN 1220-1766, June 2010 (impact factor 0.671 for 2010 - http://www.sic.ici.ro/sic2010_2/index.html)
33. D. Volovici, M. Breazu, G. Curea, **D. Morariu** – *Statistical Methods for Performance Evaluation of WEB Document Classification*, Journal of Studies in Informatics and Control, Vol. 19, issue 2, June 2010, pp. 169-175, ISSN 1220-1766, June 2010 (impact factor 0.671 for 2010 - http://www.sic.ici.ro/sic2010_2/index.html)
34. R. Cretulescu., **D. Morariu**, L. Vintan – *Eurovision-like weighted Non-Adaptive Meta-classifier for Text Documents*, Proceedings of the 8th RoEduNet IEEE International Conference Networking in Education and Research, pp. 145-150, ISBN 978-606-8085-15-9, Galati, December 2009 (indexed ISI Web of Science - <http://apps.isiknowledge.com/>)
35. **D. Morariu**, M. Vintan, L. Vintan "Aspects Concerning SVM Method's Scalability", Published at International Symposium on Intelligent and Distributed Computing (IDC 2007) in Studies in Computational Intelligence volume 78, ISBN: 978-3-540-74929-5, ISSN 1860-949x, E-ISSN 1860-9503, pp. 125-134 , Craiova, October 2007 (factor impact 0.515 for 2007, ISI Thomson Web of Knowledge – v. <http://apps.isiknowledge.com/>)
36. **D. Morariu**, M. Vintan, L. Vintan, *Studying SVM Method's Scalability Using Text Documents*, Scientific International Journal for Parallel and Distributed Computing: Scalable Computing: Practice and Experience, Vol. 9, pp. 1-10, ISSN 1895-1767 (www.scpe.org), 2008
37. **D. Morariu**, L. Vintan, *Kernel's Correlation for Improving SVM in Text Documents' Classification*, "Acta Universitatis Cibiniensis", Technical Series. (Computer Science and Automatic Control) , vol. LV, pg. 90-97, ISSN 1583-7149, "Lucian Blaga" University of Sibiu, , 2007;
38. **D. Morariu**, L. Vintan, V. Tresp, *Evaluating some Feature Selection Methods for an Improved SVM Classifier*, International Journal of Intelligent Technology, vol. 1, no. 4, ISSN 1305-6417, pages 288-298, 2006;
39. **D. Morariu**, L. Vintan, V. Tresp, *Meta-classification using SVM classifiers for Text Documents*, Proceedings of the 3rd International Conference on Machine Learning and Pattern Recognition (MLPR 2006), Barcelona, ISSN 1305-5313, pages 222-227, October 2006;

40. **D. Morariu**, L. Vintan, V. Tresp, *Evolutionary Feature Selection for Text Documents using the SVM*, Proceedings of the 3rd International Conference on Machine Learning and Pattern Recognition (MLPR 2006), Barcelona, ISSN 1305-5313, pages 215-221, October 2006;
41. **D. Morariu**, L. Vintan, V. Tresp, *Feature Selection Methods for an Improved SVM Classifier*, Proceedings of the 14th International Conference on Computational and Information Science, Prague, ISSN 1305-5313, pages 84-89, August 2006;
42. **D. Morariu**, L. Vintan, *A Better Correlation of the SVM kernel's Parameters*, Proceedings of the 5th RoEduNet International Conference, Sibiu, ISBN (13) 978-973-739-277-0, pages 244-249, June 2006;
43. **D. Morariu**, G. Curea, *Learning using the Support Vector Concept*, Proceedings of Scientific Workshop „The Science Challenge in XXI Century”, organized by Land Forces Military Academy Sibiu, ISBN 973-8088-85-2, pages 29-36, Sibiu, December 2003;
44. G. Curea, **D. Morariu**, *Structure of web data using XML*, Proceedings of Scientific Workshop „The Science Challenge in XXI Century”, organized by Land Forces Military Academy Sibiu, ISBN 973-8088-85-2, pages 21-28, Sibiu, December 2003;
45. B. Ilie, A. Santa, **D. Morariu**, *Some aspects for using DICOM standards in medical imagistic*, Proceedings of Scientific Workshop Tg. Mures 27-28 October, Targu Mures, 2000;
46. B. Ilie, A. Santa, **D. Morariu**, *DICOM Standards used in Medical Imagistic implemented in Sibiu Hospital's computer network*, Proceedings of Scientific Workshop Tg. Mures 27-28 October, Targu Mures, 2000 (pages 47-57);
47. **D. Morariu**, N. Achim, *Diagnosing a thermoelectric system using signals harmonics* at Scientific Workshop „Beyond 2000: Engineering Research Strategies”, Sibiu, 1999.May 12, 2017, Sibiu, Daniel MORARIU

Research Projects

1. Members at a researcher in the ERASMUS-EDU-2022-PI-ALL-INNO strategic project “Co-Creative Decision-Makers for 5.0 Organizations” (2023-2026).
2. Member of the „Engineers of the Future - Smart, Skilled, Secure”, 2022-1-PL01-KA220-VET-000086326, Erasmus+ Programme KA2 PARTNERSHIP IN VET, Budget ULBS 51,000 Euro, 01/10/2022 - 30/09/2024.
3. Member of the project "Modernizing agricultural practice using Internet of Things", Grant ANPCDEF 20-COP-0019 Education, Scholarships, Apprenticeships and Youth Entrepreneurship Programme (ESAYEP), nr. F-SEE-026/06.2021 - EEA Grants.
4. Members at a researcher in the Erasmus+ KA2 strategic project “The FoF-Designer: Digital Design Skills for Factories of the Future” (2019-2021).
5. Director at a research project from Continental Automotive Systems Sibiu, “Offline Analysis Tools – Processing Logic”, Contract No. 1156/ 06.12.2018, period 1.01.2019-30.11.2019, value 11995Euro.
6. Director at a research project from Continental Automotive Systems Sibiu, “Offline Analysis Tools – Importer”, Contract No. 1121/ 25.05.2018, period 1.06.2018-30.11.2018, value 8818Euro.
7. Director at a research project from CNCISIS, Project Name –*Automatic Classification of Unstructured Data using MetaClassifiers based on Support Vector Machine and Naïve Bayes*, Contract No. PD_670 (27/04.08.2010), years 2010-2012, see: <http://webspace.ulbsibiu.ro/daniel.morariu/ACUD>

8. Member in a research project from CNCISIS- PNII, Project name - *Tehnici pentru managementul conținutului digital - TEMACOD*, director of project D. Volovici, coordinator Universitatea Politehnica București. Nr. Contract 12099/01.10.2008,2008-2010, see CNCISIS site: http://www.cncsis.ro/PNCIDI%20II/Ideii/2008/Exploratorie/Primate/DOMENIU_5.html, respective ULB Sibiu site http://cercetare.ulbsibiu.ro/PNII_2008.php
9. Member in a research project from CNCISIS- PNII, Project name - *Sistem integrat pentru indexarea și partajarea on-line a documentelor tehnice digitizate – SIPTEH*, director of project D. Volovici, coordinator Universitatea Dunărea de jos from Galați. No. Contract 12133/01.10.2008, 2008-2011see CNCISIS site: http://www.cncsis.ro/PNCIDI%20II/Ideii/2008/Exploratorie/Primate/DOMENIU_5.html, respective UB Sibiu site http://cercetare.ulbsibiu.ro/PNII_2008.php
10. Member in a research project from CNCISIS tip A, with project “*Advanced superscalar microarchitecture with parallel and speculative processing*”, director of project L. VINTAN, code 39, years 2007 - 2008
11. Member in a research project from CNCISIS, with project “*Extinderea Paradigmei analizei scurcircuitelor monofazate in retelele electrice de inalta tensiune prin metode clasice si euristice*”, director of project M. VINTAN, code 485, years 2008 – 2010, 510320RON see CNCISIS and ULBSIBIU sites http://www.cncsis.ro/PNCIDI%20II/Ideii/2008/Exploratorie/Primate/DOMENIU_5.html, respectively http://cercetare.ulbsibiu.ro/PNII_2008.php
12. Member in a research project from CNCISIS, with project “*Improving superscalar architectures paradigm by instruction reuse and value prediction*”, director of project L. VINTAN, code 71/2004, years 2004 - 2006
13. Member in a research project from CNCISIS, with project „*Research about loss compression for images*”, director of project M. BREAZU, code 13, years 2004-2005.
14. I obtained from ANSTI – National Agency for Science, Technology and Innovation – Romania a research grant as **project director** with project „*Monitoring Special Parameters for generators maintenance*”, code 6229/596/2000, for two years (2000 and 2001) with total cost of 36 mil lei(~800Eur).
15. Member in a research project from CNCISIS, with project „*Research about elaboration new highly performance unconventional architecture*”, director of project L. VINTAN, number 34965, code 8/2001, 2001.
16. Member in a research project from ANSTI, with project „*Research about neuronal and fractal compression for images*”, director of project M. BREAZU, code 6229/640/2000, in 2000 and 2001.

Other Activities and Technical reports

D. Morariu, *Relevant characteristics extraction from semantically unstructured data*, 3rd PhD Report, University „Lucian Blaga“ of Sibiu, October 2006;

D. Morariu, *Classification and Clustering using Support Vector Machine*, 2nd PhD Report, University „Lucian Blaga“ of Sibiu, September 2005;

D. Morariu, *Web Information Retrieval*, 1st PhD Report, University „Lucian Blaga“ of Sibiu, February 2005;

D. Morariu, *Hardware Key for the protection of IBM compatible Computers*, at Students Scientific Workshop organized by „Lucian Blaga“ University, Sibiu, 1998.

Conferences and research stages

- 21-25 October 2006 Barcelona, Spain, participated at 15th Enformatika Conference
- 24-28 August 2006 Prague, Czech Republic, participated at 14th Enformatika Conference
- 7 October-12 November 2005 – a PhD research stage at Siemens AG CT, Neural Network Department, Munchen, Germany
- 1 July – 23 July 2004 – a PhD research stage at Siemens AG CT, Neural Network Department, Munchen, Germany
- 2 April – 30 April 2003 – a PhD research stage at Siemens AG CT, Neural Network Department, Munchen, Germany
- 17 -18 October 2002 – a experience exchange with Siemens AG CT, Munchen Germany

March 04, 2024, Sibiu

Eng. Daniel MORARIU